2020 Index IEEE Systems Journal Vol. 14

This index covers all technical items—papers, correspondence, reviews, etc.—that appeared in this periodical during 2019, and items from previous years that were commented upon or corrected in 2019. Departments and other items may also be covered if they have been judged to have archival value.

The Author Index contains the primary entry for each item, listed under the first author's name. The primary entry includes the coauthors' names, the title of the paper or other item, and its location, specified by the publication abbreviation, year, month, and inclusive pagination. The Subject Index contains entries describing the item under all appropriate subject headings, plus the first author's name, the publication abbreviation, month, and year, and inclusive pages. Note that the item title is found only under the primary entry in the Author Index.

Author Index

Α

Aamir, M., see Liu, M., JSYST March 2020 582-591

Abapour, M., see Hemmati, M., JSYST Dec. 2020 5340-5349

Abbas, H., see Imran, M., JSYST June 2020 1933-1944

Abbas, H., see Bangash, Y.A., JSYST Sept. 2020 4489-4499

Abd-Allah, M.A., see Ebrahim, M.A., JSYST Sept. 2020 3893-3903

Abdel-Nasser, M., see Mahmoud, K., JSYST March 2020 760-770

Abdel-Rahman, M.J., see Gomez, M.M., JSYST March 2020 489-499

Abdelaziz, A.Y., see Osama, R.A., JSYST March 2020 916-926

Abdelkefi, F., see Chaieb, C., JSYST Sept. 2020 3957-3967

Abdelmawgoud, A., Jamshidi, M., and Benavidez, P., Distributed Estimation in Multimissile Cyber-Physical Systems With Time Delay; JSYST March 2020 1491-1502

Abdollahi, F., see Rezaee, H., JSYST Sept. 2020 3539-3546

Abdul Rahim, N.B., and Ferris, T.L.J., A Method to Establish a Trade-Space of System Requirements and Life Cycle Cost; *JSYST March* 2020 1257-1264

Abdurrahman, L., Hybrid Configuration in Information Technology Value Model; JSYST Sept. 2020 4515-4522

Abedi, M., see Zolfaghari, M., JSYST March 2020 1117-1124

Abedi, M., see Khodadoost Arani, A.A., JSYST March 2020 1080-1087

Abedinia, O., Bagheri, M., Naderi, M.S., and Ghadimi, N., A New Combinatory Approach for Wind Power Forecasting; JSYST Sept. 2020 4614-4625

Abinahed, J., see Zhai, X., JSYST June 2020 1592-1601

Abs da Cruz, A.V., see Pereira, C.S., JSYST Sept. 2020 3926-3937

Abu-Mahfouz, A.M., see Ndiaye, M., JSYST June 2020 2347-2357

Abualigah, L.M., see Khasawneh, A.M., JSYST Dec. 2020 4735-4745

Adamidi, E.S., Gazis, E.N., and Nikita, K.S., A Safety System for Human Radiation Protection and Guidance in Extreme Environmental Conditions; JSYST March 2020 1384-1394

Aftab, M.A., Hussain, S.M.S., Ali, I., and Ustun, T.S., A Novel SCL Configuration Method for Modeling Microgrids With IEC 61850; JSYST June 2020 2676-2683

Afzal, H., see Bangash, Y.A., JSYST Sept. 2020 4489-4499

Agarwal, S., see Muhlmeyer, M., JSYST Dec. 2020 5187-5198

Agba, B.L., see Alam, M.S., JSYST Sept. 2020 4079-4088

Agbossou, K., see Guzman, C., JSYST Sept. 2020 4262-4271

Aggarwal, P., see Shaikh, M.H.N., JSYST Sept. 2020 3313-3324

Aghaei, J., see Javidsharifi, M., JSYST June 2020 2703-2712

Aghdam, A., Editorial; JSYST March 2020 7-8

Aghdam, A., Editorial; JSYST June 2020 1537

Aghdam, A., Editorial; JSYST Sept. 2020 3071

Aghdam, A., Editorial; JSYST Dec. 2020 4652

Agrawal, H., and Asawa, K., Decentralized Learning for Opportunistic Spectrum Access: Multiuser Restless Multiarmed Bandit Formulation; JSYST June 2020 2485-2496

Ahamed, T.P.I., see S., N., JSYST March 2020 1007-1014

Ahmad, E., Alaslani, M., Dogar, F.R., and Shihada, B., Location-Aware, Context-Driven QoS for IoT Applications; JSYST March 2020 232-243

1

Ahmad, F., see Shariff, S.M., JSYST June 2020 2748-2758

Ahmad, W., Hasan, O., Awwad, F., Bastaki, N., and Hasan, S.R., Formal Reliability Analysis of an Integrated Power Generation System Using Theorem Proving; JSYST Dec. 2020 4820-4831

Ahmadi, A., see Moghaddam, M.J.H., JSYST Sept. 2020 3530-3538

Ahmed, A., see Akram, T., JSYST Sept. 2020 3475-3482

Ahmed, M.H., see Othman, M.M., JSYST March 2020 699-707

Ahn, C.K., see He, W., JSYST June 2020 1549-1557

Ahn, C.K., see Zou, W., JSYST Dec. 2020 4810-4819

Ajib, W., see Chaieb, C., JSYST Sept. 2020 3957-3967

Akram, T., Awais, M., Naqvi, R., Ahmed, A., and Naeem, M., Multicriteria UAV Base Stations Placement for Disaster Management; JSYST Sept. 2020 3475-3482

Al Mhdawi, A.K., and Al-Raweshidy, H.S., A Smart Optimization of Fault Diagnosis in Electrical Grid Using Distributed Software-Defined IoT System; JSYST June 2020 2780-2790

Al-Dhahir, N., see Mabrouk, A., JSYST March 2020 665-668

Al-Dhahir, N., see Gouissem, A., JSYST June 2020 2133-2143

Al-Dhahir, N., see Chen, P., JSYST Sept. 2020 3801-3812

Al-Dweik, A., see Al-Jarrah, M.A., JSYST June 2020 2225-2236

Al-Dweik, A., see Kalbat, F., JSYST June 2020 2237-2248

Al-Jarrah, M.A., Al-Dweik, A., Ikki, S.S., and Alsusa, E., Spectrum-Occupancy Aware Cooperative Spectrum Sensing Using Adaptive Detection; JSYST June 2020 2225-2236

Al-Khatib, A., see Hiari, O., JSYST March 2020 1435-1446

Al-Raweshidy, H.S., see Yaseen, F.A., JSYST June 2020 1670-1681

Al-Raweshidy, H.S., see Al Mhdawi, A.K., JSYST June 2020 2780-2790

Al-Rizzo, H., see Al-Wahhamy, A., JSYST March 2020 614-620

AL-Tam, F., see Correia, N., JSYST Dec. 2020 5096-5099

Al-Wahhamy, A., Al-Rizzo, H., and Buris, N.E., Efficient Evaluation of Massive MIMO Channel Capacity; JSYST March 2020 614-620

Alabbasi, A., Roeland, D., and Cavdar, C., Interplay of Processing and Radio Parameters: A Service-Oriented Performance Study; JSYST March 2020 398-409

Alam, M.S., see Shariff, S.M., JSYST June 2020 2748-2758

Alam, M.S., Selim, B., Kaddoum, G., and Agba, B.L., Mitigation Techniques for Impulsive Noise With Memory Modeled by a Two State Markov-Gaussian Process; JSYST Sept. 2020 4079-4088

Alaslani, M., see Ahmad, E., JSYST March 2020 232-243

Aldarwbi, M., see Baroudi, U., JSYST Sept. 2020 3093-3104

Ali, I., see Aftab, M.A., JSYST June 2020 2676-2683

Ali, K., Nguyen, H.X., Vien, Q., Shah, P., and Raza, M., Deployment of Drone-Based Small Cells for Public Safety Communication System; JSYST June 2020 2882-2891

Allahdadi, K., Sadeghkhani, I., and Fani, B., Protection of Converter-Interfaced Microgrids Using Modified Short-Time Correlation Transform; JSYST Dec. 2020 5172-5175

Alleyne, M., see Sturgis, M., JSYST March 2020 1427-1434

Alphones, A., see Chen, C., JSYST Sept. 2020 3202-3213

AlShabi, M., and Elnady, A., Recursive Smooth Variable Structure Filter for Estimation Processes in Direct Power Control Scheme Under Balanced and Unbalanced Power Grid; JSYST March 2020 971-982

Alsusa, E., see Al-Jarrah, M.A., JSYST June 2020 2225-2236

Altunbas, I., see Yarkin, F., JSYST March 2020 500-509

Aman, M.N., see Mohammed, O.O., JSYST March 2020 1230-1233

Amin, R., see Rajamanickam, S., JSYST June 2020 1972-1983

Amira, A., see Zhai, X., JSYST June 2020 1592-1601

Amjady, N., see Dehghan, S., JSYST Sept. 2020 4110-4118

An, K., see Zhang, X., JSYST June 2020 1909-1920

An, K., see Yan, X., JSYST Sept. 2020 3343-3350

Andersson, M.R., see Chvojka, P., JSYST June 2020 2544-2550

Anvari-Moghaddam, A., see Mirzaei, M.A., JSYST Sept. 2020 3598-3608

Anvari-Moghaddam, A., see Hemmati, M., JSYST Dec. 2020 5340-5349

Anwar, S., Yuen, C., Sun, H., Guan, Y.L., and Babar, Z., A Novel Receiver Design of Nonorthogonal FDM Systems in Underwater Acoustics Communication; JSYST Sept. 2020 3875-3884

Aoi, S., see Kimura, H., JSYST Sept. 2020 3451-3462

Arapoglou, P., see Lyras, N.K., JSYST Sept. 2020 3968-3976

Arefi, A., see Shafiei, M., JSYST Dec. 2020 5265-5273

Aristidou, P., see Dehghan, S., JSYST Sept. 2020 4110-4118

Arnold, E.P., see Dori, D., JSYST June 2020 1538-1548

Asadi, H., see Qazani, M.R.C., JSYST Dec. 2020 5073-5083

Asano, Y., see Kimura, H., JSYST Sept. 2020 3451-3462

Asawa, K., see Agrawal, H., JSYST June 2020 2485-2496

Asemani, M.H., see Vafamand, N., JSYST Sept. 2020 4025-4035

Asghar, M.S.J., see Shariff, S.M., JSYST June 2020 2748-2758

Ashouri-Zadeh, A., see Hosseini, S.A., JSYST March 2020 1125-1134

Ashouri-Zadeh, A., see Toulabi, M., JSYST June 2020 2615-2623

Ashtiani, F., see Vaezi, K., JSYST June 2020 2257-2268

Ashtiani, F., see Javedankherad, M., JSYST Sept. 2020 3129-3138

Askarizadeh, M., see Mohammadi, Z., JSYST Sept. 2020 3214-3224

Asprou, M., see Zacharia, L., JSYST March 2020 422-432

Assi, C., see Kabir, M.E., JSYST Sept. 2020 4221-4231

Atazadegan, M.H., see Zarei, A., JSYST June 2020 2813-2824

Atmani, N., see Khanouche, M.E., JSYST Sept. 2020 4155-4164

Atrish, A., see Mukherjee, A., JSYST March 2020 1325-1332

Aujla, G.S., see Kaur, K., JSYST March 2020 1195-1205

Austin-Breneman, J., see Meluso, J., JSYST Sept. 2020 3463-3474

Avalos, A., see Djilali, L., JSYST June 2020 2825-2836

Awais, M., see Akram, T., JSYST Sept. 2020 3475-3482

Awwad, F., see Ahmad, W., JSYST Dec. 2020 4820-4831

Ayadi, R., Kammoun, I., and Siala, M., Bridging the Gap Between CP-OFDM and ZP-OFDM for the Provision of Ultra-Low Latency Services in 5G; JSYST March 2020 603-613

Ayepah-Mensah, D., see Sun, G., JSYST Dec. 2020 4694-4705

Azam, F., see Priyadarshi, N., JSYST Sept. 2020 3334-3342

Azimi, S.M., and Hamzeh, M., Voltage/Current Large Transient Suppression in DC Microgrids Using Local Information and Active Stabilizing Capability; JSYST March 2020 1109-1116

Azimi, S.M., and Hamzeh, M., Adaptive Interconnection and Damping Assignment Passivity-Based Control of Interlinking Converter in Hybrid AC/DC Grids; JSYST Dec. 2020 4718-4725

В

Babaie, S., see Gharamaleki, M.M., JSYST Dec. 2020 4883-4890

Babar, Z., see Anwar, S., JSYST Sept. 2020 3875-3884

Babazadeh-Dizaji, R., and Hamzeh, M., Distributed Hierarchical Control for Optimal Power Dispatch in Multiple DC Microgrids; JSYST March 2020 1015, 1023

Baboli, P.T., see Mahzarnia, M., JSYST Sept. 2020 4059-4070

Babu, G.V.N.Y., and Sarkar, V., Transient Instability Mitigation via Repetitive Corrective Actions Based Upon the Real-Time Macrocoherency Evaluation; JSYST Dec. 2020 5084-5095

Babu P., N., see Kumar, V.N., JSYST Sept. 2020 4308-4319

Bachelor, G., Brusa, E., Ferretto, D., and Mitschke, A., Model-Based Design of Complex Aeronautical Systems Through Digital Twin and Thread Concepts; JSYST June 2020 1568-1579

Baek, H., see Lee, J., JSYST June 2020 3061-3064

Baghaee, H.R., see Petrovic, I., JSYST June 2020 2665-2675

Bagheri, M., see Darabi, A., JSYST March 2020 1171-1182

Bagheri, M., see Abedinia, O., JSYST Sept. 2020 4614-4625

Bai, X., see Chan, R.Y., JSYST March 2020 208-219

Bai, X., see Lyu, Z., JSYST Dec. 2020 5061-5072

Bakirtzis, G., Simon, B.J., Collins, A.G., Fleming, C.H., and Elks, C.R., Data-Driven Vulnerability Exploration for Design Phase System Analysis; JSYST Dec. 2020 4864-4873

Baklouti, A., Nguyen, N., Mhenni, F., Choley, J., and Mlika, A., Dynamic Fault Tree Generation for Safety-Critical Systems Within a Systems Engineering Approach; JSYST March 2020 1512-1522

Bandung, Y., see Kurniawan, N.B., JSYST Sept. 2020 3105-3116

Banerjee, A., see Paul, A., JSYST Sept. 2020 3791-3800

Bangash, Y.A., Abbas, H., Iqbal, W., Khan, M.M.Z.M., Rauf, B., and Afzal, H., Delay Reduction Through Optimal Controller Placement to Boost Scalability in an SDDC; JSYST Sept. 2020 4489-4499

Bansal, R.C., see Lupangu, C., JSYST Sept. 2020 4071-4078

Bansal, Y., and Sodhi, R., PMUs Enabled Tellegen's Theorem-Based Fault Identification Method for Unbalanced Active Distribution Network Using RTDS; JSYST Sept. 2020 4567-4578

Barbosa, J.L.V., see da Silva, J.M., JSYST March 2020 1183-1194

Barkallah, M., see Siala, H., JSYST Sept. 2020 3977-3986

Baroudi, U., see Belhaiza, S., JSYST March 2020 1147-1158

Baroudi, U., Aldarwbi, M., and Younis, M., Energy-Aware Connectivity Restoration Mechanism for Cyber-Physical Systems of Networked Sensors and Robots; JSYST Sept. 2020 3093-3104

Basar, E., see Yarkin, F., JSYST March 2020 500-509

Bashiri, M., see Sabouhi, H., JSYST June 2020 2643-2652

Bastaki, N., see Ahmad, W., JSYST Dec. 2020 4820-4831

Basturk, I., and Chen, Y., Energy Efficiency for MISO-OFDMA-Based User-Relay Assisted Cellular Networks; *JSYST Dec.* 2020 5274-5283

Basumallik, S., see Ma, R., JSYST Sept. 2020 3558-3569

Batinge, B., see Malisa, R., JSYST March 2020 1523-1530

Bauduin, J., see Liscouet-Hanke, S., JSYST Dec. 2020 5441-5450

Begriche, Y., see Hammi, B., JSYST Sept. 2020 3440-3450

Belanger, D., see Liu, C., JSYST March 2020 1365-1374

Belhaiza, S., Baroudi, U., and Elhallaoui, I., A Game Theoretic Model for the Multiperiodic Smart Grid Demand Response Problem; JSYST March 2020 1147-1158

Belkheiri, M., see Djilali, L., JSYST June 2020 2825-2836

Bellini, E., Coconea, L., and Nesi, P., A Functional Resonance Analysis Method Driven Resilience Quantification for Socio-Technical Systems; JSYST March 2020 1234-1244

Ben-Brahim, L., see Gouissem, A., JSYST June 2020 2133-2143

Benavidez, P., see Abdelmawgoud, A., JSYST March 2020 1491-1502

Benli, E., Motai, Y., and Rogers, J., Visual Perception for Multiple Human–Robot Interaction From Motion Behavior; *JSYST June 2020 2937-2948*

Bensaali, F., see Zhai, X., JSYST June 2020 1592-1601

Bhalja, B., see Rao, J.T., JSYST Sept. 2020 3705-3716

Bhalja, B.R., see Makwana, Y.M., JSYST June 2020 2770-2779

Bhamidi, L., and Sivasubramani, S., Optimal Planning and Operational Strategy of a Residential Microgrid With Demand Side Management; *JSYST June* 2020 2624-2632

Bhaskar, M.S., see Priyadarshi, N., JSYST March 2020 1218-1229

Bhaskar, M.S., see Priyadarshi, N., JSYST Sept. 2020 3334-3342

Bhattacharya, A., see Das, S., JSYST Sept. 2020 4394-4401

Bhiri, M.T., see Rouis, T.S., JSYST June 2020 1647-1657

Bian, R., see Xiong, H., JSYST Sept. 2020 3744-3754 Bian, Y., see Kasimu, A., JSYST March 2020 1375-1383

Bilal, M., and Pack, S., Secure Distribution of Protected Content in Information-Centric Networking; JSYST June 2020 1921-1932

Bilionis, I., see Safarkhani, S., JSYST Sept. 2020 3277-3288

Bishnoi, S.K., see Singh, P., JSYST March 2020 880-888

Blaabjerg, F., see Priyadarshi, N., JSYST March 2020 1218-1229

Blaabjerg, F., see Peyghami, S., JSYST June 2020 2861-2872

Blaabjerg, F., see Vafamand, N., JSYST Sept. 2020 4025-4035

Blaabjerg, F., see Priyadarshi, N., JSYST Sept. 2020 3334-3342

Boateng, G.O., see Sun, G., JSYST Dec. 2020 4694-4705

Bohara, V.A., see Shaikh, M.H.N., JSYST Sept. 2020 3313-3324

Bonthagorla, P.K., see Pendem, S.R., JSYST March 2020 1046-1057

Borky, J.M., see Nelson, T., JSYST Sept. 2020 3844-3854

Bose, A., see Poudel, S., JSYST Sept. 2020 3506-3517

Boudau, S., see Wu, Q., JSYST Dec. 2020 4765-4776

Boudjadar, J., see Gheisarnejad, M., JSYST March 2020 1058-1068

Braga, R.T.V., see Silva, R.d.A., JSYST Sept. 2020 3609-3617

Braun, T., see da Silva, J.M., JSYST March 2020 1183-1194

Brusa, E., see Bachelor, G., JSYST June 2020 1568-1579

Buris, N.E., see Al-Wahhamy, A., JSYST March 2020 614-620

Burton, A., see Chvojka, P., JSYST June 2020 2544-2550

Butans, E., see Punzo, G., JSYST Sept. 2020 3865-3874

Buyya, R., see Goudarzi, P., JSYST March 2020 927-938

 \mathbf{C}

Cabatac, M.T.A.M., see Hong, Y., JSYST June 2020 2725-2735

Cacialli, F., see Chvojka, P., JSYST June 2020 2544-2550

Cai, Y., see He, Q., JSYST June 2020 1874-1885

Cai, Y., Santos, R.B., Givigi, S.N., and Fileti, A.M.F., A Pipeline Leak Classification and Location Estimation System With Convolutional Neural Networks; JSYST Sept. 2020 3072-3081

Cai, Y., see Zhou, Y., JSYST Dec. 2020 5253-5264

Camponogara, A., Poor, H.V., and Ribeiro, M.V., PLC Systems Under the Presence of a Malicious Wireless Communication Device: Physical Layer Security Analyses; JSYST Dec. 2020 4901-4910

Cao, J., see Xu, S., JSYST June 2020 1740-1751

Cao, P., see Li, D., JSYST Dec. 2020 4726-4734

Cao, R., Hao, L., Gao, Q., Deng, J., and Chen, J., Modeling and Decision-Making Methods for a Class of Cyber–Physical Systems Based on Modified Hybrid Stochastic Timed Petri Net; JSYST Dec. 2020 4684-4693

Cao, S., see Chen, X., JSYST Dec. 2020 5396-5406

Cao, Y., see Wang, T., JSYST March 2020 410-421

Cao, Y., see Yang, J., JSYST March 2020 172-183

Cao, Y., see Li, P., JSYST June 2020 2042-2053

Cao, Z., see Pang, L., JSYST June 2020 2965-2968

Caputo, J., see Retiere, N., JSYST June 2020 2736-2747

Cardenas, A., see Guzman, C., JSYST Sept. 2020 4262-4271

Carrizosa, E., Marin, A., and Pelegrin, M., Spotting Key Members in Networks: Clustering-Embedded Eigenvector Centrality; JSYST Sept. 2020 3916-3925

Castillejo, P., see Chen, Y., JSYST June 2020 2066-2077

Catalao, J.P.S., see Javidsharifi, M., JSYST June 2020 2703-2712

Cavdar, C., see Alabbasi, A., JSYST March 2020 398-409

Cavdar, C., see Masoudi, M., JSYST Dec. 2020 5100-5110

Chae, J., see Jung, B., JSYST June 2020 1852-1861

Chai, R., Song, X., and Chen, Q., Joint Task Offloading, CNN Layer Scheduling, and Resource Allocation in Cooperative Computing System; JSYST Dec. 2020 5350-5361

Chai, Y., and Zeng, X., Delay- and Interference-Aware Routing for Wireless Mesh Network; JSYST Sept. 2020 4119-4130

Chaibakhsh, A., see Kordestani, M., JSYST Sept. 2020 3813-3824

Chaieb, C., Mlika, Z., Abdelkefi, F., and Ajib, W., On the Optimization of User Association and Resource Allocation in HetNets With mm-Wave Base Stations; JSYST Sept. 2020 3957-3967

Chaitanya, B.K., Yadav, A., and Pazoki, M., An Intelligent Detection of High-Impedance Faults for Distribution Lines Integrated With Distributed Generators; JSYST March 2020 870-879

Chakrabarti, S., see Meghwani, A., JSYST March 2020 1159-1170

Challa, R., Zalyubovskiy, V.V., Raza, S.M., Choo, H., and De, A., Network Slice Admission Model: Tradeoff Between Monetization and Rejections; JSYST March 2020 657-660

Chan, K.Y., see Liu, Z., JSYST June 2020 2557-2568

Chan, R.Y., Sato-Shimokawara, E., Bai, X., Yukiharu, M., Kuo, S., and Chung, A., A Context-Aware Augmentative and Alternative Communication System for School Children With Intellectual Disabilities; *JSYST March* 2020 208-219

Chand, S., see Kumar, M., JSYST June 2020 2032-2041

Chang, C., see Liu, M., JSYST March 2020 582-591

Chang, K., and Choi, Y., Performance Evaluation of In-Band Full-Duplex System Using One-Time-Slot Two-Way Relay; JSYST March 2020 510-519

Chang, K., and Lee, S., Robust OFDM-Based Synchronization Against Very High Fractional CFO and Time-Varying Fading; JSYST Sept. 2020 4047-4058

Chang, Q., see Wang, H., JSYST March 2020 538-547

Chang, Y., and Lai, Y., Campus Edge Computing Network Based on IoT Street Lighting Nodes; JSYST March 2020 164-171

Chao, H., see Zhang, C., JSYST June 2020 1840-1851

Chao, H., see Gan, W., JSYST Sept. 2020 4442-4453

Chatterjee, A., and Chatterjee, D., An Improved Current Balancing Technique of Two-Winding IG Suitable for Wind-PV-Based Grid-Isolated Hybrid Generation System; JSYST Dec. 2020 4874-4882

Chatterjee, D., see Chatterjee, A., JSYST Dec. 2020 4874-4882

Chatterjee, K., see Sandhya, K., JSYST Dec. 2020 5160-5171

Chatterjee, S., see Gomez, M.M., JSYST March 2020 489-499

Chattopadhyay, S., see Mukherjee, N., JSYST Sept. 2020 4320-4328

Chattopadhyaya, A., see Mukherjee, N., JSYST Sept. 2020 4320-4328

Chaturvedi, A., Tiwari, A., and Chaturvedi, S., SysEvoRecomd: Network Reconstruction by Graph Evolution and Change Learning; JSYST Sept. 2020 4007-4014

Chaturvedi, K., and Rao, S., Distributed Elections Using Site-Push Majority Winner Monitoring; JSYST June 2020 1682-1691

Chaturvedi, S., see Chaturvedi, A., JSYST Sept. 2020 4007-4014

Chatzinotas, S., see Yan, X., JSYST Sept. 2020 3343-3350

Chau, L.H., see Hai, D.T., JSYST June 2020 2358-2369

Chaubey, V.K., see Rahman, Z., JSYST Sept. 2020 4036-4046

Chaudhuri, N.R., see Yogarathinam, A., JSYST March 2020 939-949

Chavhan, S., Gupta, D., N. C.B., Khanna, A., and Rodrigues, J.J.P.C., Agent Pseudonymous Authentication-Based Conditional Privacy Preservation: An Emergent Intelligence Technique; JSYST Dec. 2020 5233-5244

Chen, A., see Clemente, J., JSYST March 2020 1277-1284

Chen, C., see Li, X., JSYST March 2020 39-50

Chen, C., see Zhang, C., JSYST June 2020 1840-1851

Chen, C., Ding, Y., Wang, Z., Zhao, J., Guo, B., and Zhang, D., VTracer: When Online Vehicle Trajectory Compression Meets Mobile Edge Computing; JSYST June 2020 1635-1646

Chen, C., Yang, H., Du, P., Zhong, W., Alphones, A., Yang, Y., and Deng, X., User-Centric MIMO Techniques for Indoor Visible Light Communication Systems; JSYST Sept. 2020 3202-3213

Chen, C., see Li, J., JSYST Sept. 2020 3082-3092

Chen, D., Zheng, Y., Chen, Y., and Lee, K., Online Power Management for Latency-Sensitive Bluetooth Low-Energy Beacons; JSYST June 2020 2411-2420

Chen, D., see Tao, X., JSYST Sept. 2020 3256-3266

Chen, H., see Liu, Y., JSYST June 2020 2121-2132

Chen, H., Han, Q., Jajodia, S., Lindelauf, R., Subrahmanian, V.S., and Xiong, Y., Disclose or Exploit? A Game-Theoretic Approach to Strategic Decision Making in Cyber-Warfare; JSYST Sept. 2020 3779-3790

Chen, H., see Jiang, Y., JSYST Sept. 2020 3717-3728

Chen, J., Wei, L., U., L., and Hao, F., A Temporal Recommendation Mechanism Based on Signed Network of User Interest Changes; JSYST March 2020 244-252

Chen, J., Wang, C., Wu, E.H., and Chou, C., Simultaneous Heterogeneous Sensor Localization, Joint Tracking, and Upper Extremity Modeling for Stroke Rehabilitation; JSYST Sept. 2020 3570-3581

Chen, J., see Cao, R., JSYST Dec. 2020 4684-4693

Chen, L., Yang, A., Hu, H., and Naeem, W., RBPF-MSIS: Toward Rao-Black-wellized Particle Filter SLAM for Autonomous Underwater Vehicle With Slow Mechanical Scanning Imaging Sonar; JSYST Sept. 2020 3301-3312

Chen, M., see Zhai, X., JSYST June 2020 1592-1601

Chen, P., Ouyang, J., Zhu, W., Lin, M., Shafie, A.E., and Al-Dhahir, N., Artificial-Noise-Aided Energy-Efficient Secure Beamforming for Multi-Eaves-droppers in Cognitive Radio Networks; JSYST Sept. 2020 3801-3812

Chen, Q., see Chai, R., JSYST Dec. 2020 5350-5361

Chen, Q., see Dai, C., JSYST Dec. 2020 5025-5036

Chen, T., Sun, L., Ling, K., and Ho, W.K., Robust Power System State Estimation Using *t*-Distribution Noise Model; *JSYST March 2020 771-781*

Chen, T., see Sun, L., JSYST June 2020 2801-2812

Chen, W., see Yang, S., JSYST March 2020 1447-1456

Chen, X., Leung, K., and Lam, A.Y.S., Power Output Smoothing for Renewable Energy System: Planning, Algorithms, and Analysis; JSYST March 2020 1034-1045

Chen, X., see Pang, L., JSYST June 2020 2965-2968

Chen, X., Gong, F., and Ding, H., Partial-Fixed Interference Alignment in Multiuser Interference Channel; JSYST June 2020 2303-2310

Chen, X., Cheng, L., Liu, C., Liu, Q., Liu, J., Mao, Y., and Murphy, J., A WOA-Based Optimization Approach for Task Scheduling in Cloud Computing Systems; JSYST Sept. 2020 3117-3128

Chen, X., Wei, F., Cao, S., Soh, C.B., and Tseng, K.J., PMU Placement for Measurement Redundancy Distribution Considering Zero Injection Bus and Contingencies; JSYST Dec. 2020 5396-5406

Chen, Y., see Zhan, Y., JSYST March 2020 592-602

Chen, Y., see Zhou, Y., JSYST March 2020 333-342

Chen, Y., see Zhang, D., JSYST March 2020 661-664

Chen, Y., Martinez-Ortega, J., Castillejo, P., and Lopez, L., An Elliptic Curve-Based Scalable Data Aggregation Scheme for Smart Grid; JSYST June 2020 2066-2077

Chen, Y., Li, R., Zhao, Z., and Zhang, H., Study on Base Station Topology in National Cellular Networks: Take Advantage of Alpha Shapes, Betti Numbers, and Euler Characteristics; JSYST June 2020 2202-2213

Chen, Y., see Chen, D., JSYST June 2020 2411-2420

Chen, Y., see Fan, B., JSYST June 2020 2097-2108

Chen, Y., see Tseng, S., JSYST Sept. 2020 3351-3359

Chen, Y., see Basturk, I., JSYST Dec. 2020 5274-5283

Chen, Z., Zou, H., Yang, J., Jiang, H., and Xie, L., WiFi Fingerprinting Indoor Localization Using Local Feature-Based Deep LSTM; JSYST June 2020 3001-3010

Chen, Z., see Li, J., JSYST Sept. 2020 3082-3092

Cheng, C., see Wang, J.V., JSYST March 2020 152-163

Cheng, C., see Dai, J., JSYST June 2020 2421-2431

Cheng, C., see Dai, J., JSYST Dec. 2020 4832-4841

Cheng, G., see Xia, J., JSYST Sept. 2020 4296-4307

Cheng, L., see Chen, X., JSYST Sept. 2020 3117-3128

Cheng, W., see Liu, D., JSYST June 2020 2323-2334

Cherifi, A., see Khanouche, M.E., JSYST Sept. 2020 4155-4164

Chi, K., see Fan, X., JSYST Dec. 2020 4943-4954

Chiu, W., Manoharan, S.H., and Huang, T., Weight Induced Norm Approach to Group Decision Making for Multiobjective Optimization Problems in Systems Engineering; JSYST June 2020 1580-1591

Cho, D., see Sim, Y., JSYST Dec. 2020 5245-5252

Cho, H., see Zhang, C., JSYST June 2020 1840-1851

Cho, J., see Ko, B., JSYST Sept. 2020 4591-4601

Choi, H., see Lee, K., JSYST March 2020 649-652

Choi, H., see Lee, K., JSYST Sept. 2020 4217-4220

Choi, J., see Saad, M., JSYST March 2020 321-332

Choi, K., see Ko, B., JSYST Sept. 2020 4591-4601 Choi, Y., see Chang, K., JSYST March 2020 510-519

Choley, J., see Baklouti, A., JSYST March 2020 1512-1522

Choley, J., see Siala, H., JSYST Sept. 2020 3977-3986

Choo, H., see Challa, R., JSYST March 2020 657-660

Choo, K.R., see Jia, X., JSYST March 2020 560-571

Choo, K.R., see Kaur, K., JSYST March 2020 1195-1205

Choo, K.R., see Feng, Q., JSYST June 2020 1820-1829

Choo, K.R., see Zhang, Y., JSYST Dec. 2020 5320-5328

Chou, C., see Chen, J., JSYST Sept. 2020 3570-3581

Chowdhury, B., see Mitra, B., JSYST March 2020 1069-1079

Christophorou, C., see Ioannou, I., JSYST Sept. 2020 4232-4241

Chuah, T.C., and Lee, Y.L., QoS-Aware Cross-Layer Optimization of Hybrid DSL-LTE Access Networks; *JSYST June 2020 2175-2186*

Chun, C., see Kang, J., JSYST Sept. 2020 4340-4343

Chun, C., see Kang, J., JSYST Sept. 2020 3740-3743

Chun, C., see Kang, J., JSYST Sept. 2020 3414-3417

Chung, A., see Chan, R.Y., JSYST March 2020 208-219

Chvojka, P., Haigh, P.A., Minotto, A., Burton, A., Murto, P., Genene, Z., Mammo, W., Andersson, M.R., Wang, E., Ghassemlooy, Z., Cacialli, F., Darwazeh, I., and Zvanovec, S., Expanded Multiband Super-Nyquist CAP Modulation for Highly Bandlimited Organic Visible Light Communications; *JSYST June 2020 2544-2550*

Clarke, K., see Jurado-Lasso, F.F., JSYST June 2020 2335-2346

Clarke, K., see Jurado-Lasso, F.F., JSYST Dec. 2020 4653-4662

Clemente, J., Li, F., Valero, M., Chen, A., and Song, W., ASIS: Autonomous Seismic Imaging System With *In Situ* Data Analytics and Renewable Energy; *JSYST March* 2020 1277-1284

Clemente, J., see Li, F., JSYST Sept. 2020 3383-3389

Coconea, L., see Bellini, E., JSYST March 2020 1234-1244

Colen, G.R., see De M. B. A. Dib, L., JSYST June 2020 2164-2174

Colen, G.R., and Ribeiro, M.V., A Flexible Multicarrier Scheme Based on the Discrete Orthogonal Stockwell Transform; *JSYST Dec.* 2020 5284-5295

Colletti, R.A., Qamar, A., Nuesch, S.P., and Paredis, C.J.J., Best Practice Patterns for Variant Modeling of Activities in Model-Based Systems Engineering; JSYST Sept. 2020 4165-4175

Collings, I.B., see Suraweera, N., JSYST Dec. 2020 4798-4809

Collins, A.G., see Bakirtzis, G., JSYST Dec. 2020 4864-4873

Condino, M., see McDonald, R.T., JSYST Sept. 2020 3755-3766

Confrey, J., Etemadi, A.H., Stuban, S.M.F., and Eveleigh, T.J., Energy Storage Systems Architecture Optimization for Grid Resilience With High Penetration of Distributed Photovoltaic Generation; JSYST March 2020 1135-1146

Correia, N., and AL-Tam, F., Flow Setup Aware Controller Placement in Distributed Software-Defined Networking; JSYST Dec. 2020 5096-5099

Costa, I., see da Silva, J.M., JSYST March 2020 1183-1194

Coveney, P.V., see Zhai, X., JSYST June 2020 1592-1601

Cui, J., see Ding, R., JSYST March 2020 633-644

Cui, J., see Wang, Y., JSYST Dec. 2020 5373-5383

Cui, W., see Yang, S., JSYST March 2020 1447-1456

Cui, Y., see Zhang, L., JSYST March 2020 387-397

D

da Silva, J.M., Costa, I., Santos, J.V.C.d., Barbosa, J.L.V., Braun, T., and Pessin, G., Toward a More Reliable System for Contingency Selection in Static Security Analysis of Electric Power Systems; JSYST March 2020 1183-1194

Dai, C., Luo, J., Fu, S., Wu, J., and Chen, Q., Dynamic User Association for Resilient Backhauling in Satellite-Terrestrial Integrated Networks; JSYST Dec. 2020 5025-5036

Dai, J., Zhang, M., Wang, J., Shi, J., Song, R., and Cheng, C., Effect of Doppler Shift on the Performance of Multicell Full-Duplex Massive MIMO Networks; JSYST June 2020 2421-2431

Dai, J., Liu, J., Wang, J., Song, R., and Cheng, C., Asymptotic Analysis of Full-Duplex Large-Scale MIMO Systems With Low-Resolution ADCs/DACs Over Rician Fading Channels; *JSYST Dec.* 2020 4832-4841

Dai, R., see Manshadi, S.D., JSYST March 2020 803-812

Dai, Z., Wang, J., Zhou, H., and Huang, H., A Review on the Recent Development in the Design and Optimization of Magnetic Coupling Mechanism of Wireless Power Transmission; JSYST Sept. 2020 4368-4381

Dai, Z., see Xu, X., JSYST Sept. 2020 3399-3409

Dakua, S., see Zhai, X., JSYST June 2020 1592-1601

Dao, V., see Vo, V.N., JSYST Dec. 2020 4955-4966

Darabi, A., Bagheri, M., and Gharehpetian, G.B., Highly Accurate Directional Overcurrent Coordination via Combination of Rosen's Gradient Projection— Complex Method With GA-PSO Algorithm; JSYST March 2020 1171-1182

Darak, S.J., see Kumar, R., JSYST June 2020 2085-2096

Darak, S.J., see Joshi, H., JSYST Dec. 2020 4931-4942

Darwazeh, I., see Chvojka, P., JSYST June 2020 2544-2550

Das, D., see Limbasiya, T., JSYST March 2020 520-529

Das, P., Shuvro, R.A., Rahnamay-Naeini, M., Povinelli, K., Ghani, N., and Hayat, M.M., A Theory for Optimizing Insecure Internetwork Connections; JSYST Dec. 2020 4842-4853

Das, S., see Fowler, K.R., JSYST March 2020 1309-1316

Das, S., and Bhattacharya, A., Application of the Mixture of Lognormal Distribution to Represent the First-Order Statistics of Wireless Channels; JSYST Sept. 2020 4394-4401

Das, S.S., see Goswami, D., JSYST Dec. 2020 5199-5209

Dasgupta, M., see Sowjanya, K., JSYST June 2020 2154-2163

DaSilva, L., see Gomez, M.M., JSYST March 2020 489-499

De, A., see Challa, R., JSYST March 2020 657-660

De, A., see Mukherjee, R., JSYST Sept. 2020 3836-3843

De, D., see Mukherjee, A., JSYST March 2020 353-362

De, P., Novel Algorithms for Blind Sensing of Signals With Variable Bandwidths in Cognitive Radio; *JSYST Sept. 2020 4272-4283*

De L. Filomeno, M., see De M. B. A. Dib, L., JSYST June 2020 2164-2174

de la Llera, J.C., see Espinoza, S., JSYST June 2020 2837-2848
De M. B. A. Dib, L., Colen, G.R., De L. Filomeno, M., and Ribeiro, M.V., Orthogonal Chirp Division Multiplexing for Baseband Data Communication

de Silva, C.W., see Li, T., JSYST June 2020 1692-1703

Systems; JSYST June 2020 2164-2174

Deb, P., see Mukherjee, A., JSYST March 2020 353-362

Debbarma, S., see Roy, S.D., JSYST June 2020 2023-2031

Dehghan, S., Amjady, N., and Aristidou, P., A Robust Coordinated Expansion Planning Model For Wind Farm-Integrated Power Systems With Flexibility Sources Using Affine Policies; JSYST Sept. 2020 4110-4118

Dehghanian, P., see Pourahmadi, F., JSYST March 2020 718-728

Delli Priscoli, F., see Liberati, F., JSYST Sept. 2020 3586-3597

Demeulemeester, E., see Wang, J., JSYST Dec. 2020 5451-5462

Deng, J., see Cao, R., JSYST Dec. 2020 4684-4693

Deng, L., Ning, B., and Jiang, Y., A Lightweight Certificateless Aggregation Signature Scheme With Provably Security in the Standard Model; JSYST Sept. 2020 4242-4251

Deng, L., Anonymous Aggregate Encryption Scheme for Industrial Internet of Things; JSYST Sept. 2020 3999-4006

Deng, W., see Huang, K., JSYST Sept. 2020 4329-4339

Deng, X., see Chen, C., JSYST Sept. 2020 3202-3213

Dey, J., see Kumar, N., JSYST March 2020 909-915

Dhaka, K., see Kumar, P., JSYST June 2020 2497-2507

Dhok, S.B., see Prasanna, A.L., JSYST June 2020 2293-2302

Dhok, S.B., see Yadav, S., JSYST June 2020 2585-2588

Dhurandher, S.K., see Gupta, N., JSYST June 2020 2400-2410

Di Giorgio, A., see Liberati, F., JSYST Sept. 2020 3586-3597

Di Maio, F., Mascherona, R., and Zio, E., Risk Analysis of Cyber-Physical Systems by GTST-MLD; JSYST March 2020 1333-1340

Dias, D.M., see Pereira, C.S., JSYST Sept. 2020 3926-3937

Ding, H., see Chen, X., JSYST June 2020 2303-2310

Ding, R., Xu, Y., Cui, J., and Zhong, H., A Public Auditing Protocol for Cloud Storage System With Intrusion-Resilience; JSYST March 2020 633-644

Ding, Y., see Chen, C., JSYST June 2020 1635-1646

Dinh, T.H., see Hoang, V.T., JSYST June 2020 2925-2936

Djilali, L., Sanchez, E.N., Ornelas-Tellez, F., Avalos, A., and Belkheiri, M., Improving Microgrid Low-Voltage Ride-Through Capacity Using Neural Control; JSYST June 2020 2825-2836

Doan, S., Yeh, H., and Yang, Y., Two-Mode Adaptive Schemes for VAR Control With Solar Power and Energy Storage; JSYST March 2020 889-899

Doan, S., see Yang, Y., JSYST March 2020 852-861

Doan, S.H., see Yang, Y., JSYST March 2020 689-698

Doan, S.H., see Yang, Y., JSYST March 2020 842-851

Dogar, F.R., see Ahmad, E., JSYST March 2020 232-243

Dong, G., Li, R., Jiang, J., Wu, H., and McClure, S.C., Multigranular Wavelet Decomposition-Based Support Vector Regression and Moving Average Method for Service-Time Prediction on Web Map Service Platforms; JSYST Sept. 2020 3653-3664

Doostmohammadian, M., Rabiee, H.R., and Khan, U.A., Cyber-Social Systems: Modeling, Inference, and Optimal Design; *JSYST March 2020 73-83*

Doostmohammadian, M., Minimal Driver Nodes for Structural Controllability of Large-Scale Dynamical Systems: Node Classification; JSYST Sept. 2020 4209-4216

Dori, D., Sillitto, H., Griego, R.M., McKinney, D., Arnold, E.P., Godfrey, P., Martin, J., Jackson, S., and Krob, D., System Definition, System Worldviews, and Systemness Characteristics; JSYST June 2020 1538-1548

Doroudi, A., see Sabouhi, H., JSYST June 2020 2643-2652

Dou, C., see Zhang, B., JSYST June 2020 2849-2860

Dragicevic, T., see Vafamand, N., JSYST Sept. 2020 4025-4035

Drayer, E., and Routtenberg, T., Detection of False Data Injection Attacks in Smart Grids Based on Graph Signal Processing; JSYST June 2020 1886-1896

Du, C., Gao, S., Jia, N., Kong, D., Jiang, J., Tian, G., Su, Y., Wang, Q., and Li, C., A High-Accuracy Least-Time-Domain Mixture Features Machine-Fault Diagnosis Based on Wireless Sensor Network; JSYST Sept. 2020 4101-4109

Du, P., see Chen, C., JSYST Sept. 2020 3202-3213

Du, Y., see Xing, L., JSYST Sept. 2020 4252-4261

Du, Z., see Xiong, H., JSYST Sept. 2020 3744-3754

Dubey, A., see Krishnamoorthy, G., JSYST June 2020 2633-2642

Dubey, A., see Poudel, S., JSYST Sept. 2020 3506-3517

Dung, L.T., see Van Nguyen, L., JSYST Dec. 2020 4777-4785

Durad, M.H., see Imran, M., JSYST June 2020 1933-1944

Dyer, S.A., see Fowler, K.R., JSYST March 2020 1317-1324

Dyer, S.A., see Fowler, K.R., JSYST March 2020 1309-1316

 \mathbf{E}

E.A., J., see S., N., JSYST March 2020 1007-1014

Ebrahim, M.A., Wadie, F., and Abd-Allah, M.A., An Algorithm for Detection of Fault, Islanding, and Power Swings in DG-Equipped Radial Distribution Networks; *JSYST Sept.* 2020 3893-3903

Efrem, C.N., see Lyras, N.K., JSYST Sept. 2020 3968-3976

Eftekharnejad, S., see Ma, R., JSYST Sept. 2020 3558-3569

El-Mashed, M.G., Optimizing Design Parameters for Relay-Aided Massive MIMO Systems; JSYST June 2020 2249-2256

El-Saadany, E.F., see Saleh, K.A., JSYST Sept. 2020 4284-4295

El-Taweel, N.A., Farag, H.E.Z., and Mohamed, M., Integrated Utility-Transit Model for Optimal Configuration of Battery Electric Bus Systems; JSYST March 2020 738-748

Eldar, Y.C., see Gong, T., JSYST Dec. 2020 5296-5307

Elhallaoui, I., see Belhaiza, S., JSYST March 2020 1147-1158

Elks, C.R., see Bakirtzis, G., JSYST Dec. 2020 4864-4873

Elnady, A., see AlShabi, M., JSYST March 2020 971-982

Escribano, F.J., see Tarable, A., JSYST June 2020 2214-2224

Esfahani, S.S., see Zhai, X., JSYST June 2020 1592-1601

Espinoza, S., Poulos, A., Rudnick, H., de la Llera, J.C., Panteli, M., and Mancarella, P., Risk and Resilience Assessment With Component Criticality Ranking of Electric Power Systems Subject to Earthquakes; *JSYST June* 2020 2837-2848

Etemadi, A.H., see Confrey, J., JSYST March 2020 1135-1146

Eveleigh, T.J., see Confrey, J., JSYST March 2020 1135-1146

Evin, E., and Uluda, Y., Bioanalytical Device Design With Model-Based Systems Engineering Tools; JSYST Sept. 2020 3139-3149

F

Fadoul, M.M., and Leow, C.Y., Joint Nullspace Projection-Based Interference Mitigation for Full-Duplex Relay-Assisted Multicell Networks; JSYST June 2020 2392-2399

Fan, B., He, Z., Tian, H., Kong, D., and Chen, Y., Energy-Efficient Resource Allocation for Dynamic Priority-Based Vehicular Mobile-Health Communications; JSYST June 2020 2097-2108

Fan, C., and Mostafavi, A., Metanetwork Framework for Performance Analysis of Disaster Management System-of-Systems; JSYST March 2020 1265-1276
 Fan, P., see Jiang, R., JSYST March 2020 1206-1217

Fan, X., Wang, S., Wang, Y., Xu, J., and Chi, K., Energy-Efficient Barrier Lifetime Prolonging Scheme Based on Repairing in Directional Sensor Networks; JSYST Dec. 2020 4943-4954

Fan, Y., see Lyu, Z., JSYST Sept. 2020 3518-3529

Fang, C., see Wang, Z., JSYST June 2020 2913-2924

Fang, H., see Tseng, S., JSYST Sept. 2020 3351-3359

Fang, S., Fang, Y., Wang, H., and Liu, L., Optimal Heterogeneous Energy Storage Management for Multienergy Cruise Ships; JSYST Dec. 2020 4754-4764

Fang, Y., see Xu, C., JSYST June 2020 2443-2454

Fang, Y., see Fang, S., JSYST Dec. 2020 4754-4764

Fang, Z., see Wang, Z., JSYST Sept. 2020 4188-4196

Fani, B., see Allahdadi, K., JSYST Dec. 2020 5172-5175

6

Farag, H.E.Z., see El-Taweel, N.A., JSYST March 2020 738-748

Farkhondehmaal, F., and Salado, A., Efficient Population of the Verification Tradespace Using Bayesian Inference; JSYST Sept. 2020 3225-3232

Fatemi, S.S., and Samet, H., Allocation of Renewables, Switches, and Relays Considering Relays Actual Operation Time; JSYST March 2020 950-959

Fattouche, M., A Novel Communication System of High Capacity; JSYST Sept. 2020 4197-4208

Fayad, A., see Hammi, B., JSYST Sept. 2020 3440-3450

Fazel, M.S., see Jafari, R., JSYST June 2020 2109-2120

Feng, Q., He, D., Wang, H., Kumar, N., and Choo, K.R., White-Box Implementation of Shamir's Identity-Based Signature Scheme; JSYST June 2020 1820-1829

Fernandez, E., see Lahon, R., JSYST March 2020 1098-1108

Fernandez, E., see Mahmud, K., JSYST Sept. 2020 3641-3652

Ferreira, A., see Fruchard, M., JSYST June 2020 2892-2900

Ferretto, D., see Bachelor, G., JSYST June 2020 1568-1579

Ferris, T.L.J., see Abdul Rahim, N.B., JSYST March 2020 1257-1264

Figueiredo, K., see Kohler, M., JSYST Dec. 2020 5111-5120

Fileti, A.M.F., see Cai, Y., JSYST Sept. 2020 3072-3081

Fillingim, K.B., Shapiro, H., Paredis, C.J.J., and Fu, K., Process Heuristics: Extraction, Analysis, and Repository Considerations; JSYST Dec. 2020 5148-5159

Firdaus, A., and Mishra, S., Mitigation of Power and Frequency Instability to Improve Load Sharing Among Distributed Inverters in Microgrid Systems; JSYST March 2020 1024-1033

Fleming, C.H., see Bakirtzis, G., JSYST Dec. 2020 4864-4873

Fotuhi-Firuzabad, M., see Sabouhi, H., JSYST June 2020 2643-2652

Fotuhi-Firuzabad, M., see Peyghami, S., JSYST June 2020 2861-2872

Fourati, L.C., see Hentati, A.I., JSYST June 2020 2969-2979

Fowler, K.R., and Dyer, S.A., A Model for the Build-Versus-Buy Decision in Developing Embedded Systems; JSYST March 2020 1317-1324

Fowler, K.R., Das, S., and Dyer, S.A., A Study of the Build-Versus-Buy Decision in Developing Embedded Systems; JSYST March 2020 1309-1316

Fruchard, M., Sadelli, L., and Ferreira, A., Local Controllability, Trajectory Planning, and Stabilization of a Two-Agent Underactuated Microrobotic System; JSYST June 2020 2892-2900

Fu, K., see Fillingim, K.B., JSYST Dec. 2020 5148-5159

Fu, S., see Dai, C., JSYST Dec. 2020 5025-5036

Fu, Y., and He, Z., Bayesian-Inference-Based Sliding Window Trust Model Against Probabilistic SSDF Attack in Cognitive Radio Networks; JSYST June 2020 1764-1775

Fu, Y., see Zhou, R., JSYST Dec. 2020 4919-4930

G

Gabbar, H.A., Othman, A.M., Pino, F., and Repetto, M., Improved Performance of Flywheel Fast Charging System (FFCS) Using Enhanced Artificial Immune System (EAIS); JSYST March 2020 824-831

Galavani, S., see Moradi-Dalvand, M., JSYST June 2020 2873-2881

Gan, D., see Shen, D., JSYST Sept. 2020 4500-4514

Gan, W., Lin, J.C., Chao, H., Vasilakos, A.V., and Yu, P.S., Utility-Driven Data Analytics on Uncertain Data; *JSYST Sept. 2020 4442-4453*

Gandoman, F.H., see Moghaddam, M.J.H., JSYST Sept. 2020 3530-3538

Ganganath, N., see Wang, J.V., JSYST March 2020 152-163

Gao, C., see Li, J., JSYST March 2020 433-444

Gao, D., Guo, Q., Tong, J., Wu, N., Xi, J., and Yu, Y., Extreme-Learning-Machine-Based Noniterative and Iterative Nonlinearity Mitigation for LED Communication Systems; JSYST Dec. 2020 4674-4683

Gao, Q., see Cao, R., JSYST Dec. 2020 4684-4693

Gao, S., see Zang, T., JSYST March 2020 572-581

Gao, S., see Du, C., JSYST Sept. 2020 4101-4109

Gao, X., see Yang, D., JSYST Sept. 2020 4477-4488

Gao, X., Peng, M., Tse, C.K., and Zhang, H., A Stochastic Model of Cascading Failure Dynamics in Cyber-Physical Power Systems; JSYST Sept. 2020 4626-4637

Gao, Y., see Wang, Z., JSYST June 2020 2913-2924

Garg, P., see Jani, M., JSYST March 2020 469-476

Garg, S., see Kaur, K., JSYST March 2020 1195-1205

Garzaniti, N., Golkar, A., and Maggiore, P., Additive Manufacturing Evaluation Tool for Design Studies; JSYST Sept. 2020 4382-4393

Gastli, A., see Gouissem, A., JSYST June 2020 2133-2143

Gazis, E.N., see Adamidi, E.S., JSYST March 2020 1384-1394

Ge, J., see Zhang, C., JSYST June 2020 2192-2201

Genene, Z., see Chvojka, P., JSYST June 2020 2544-2550

Ghadimi, N., see Abedinia, O., JSYST Sept. 2020 4614-4625

Ghanbari, T., see Jarrahi, M.A., JSYST Sept. 2020 3987-3998

Ghani, N., see Das, P., JSYST Dec. 2020 4842-4853

Gharamaleki, M.M., and Babaie, S., A New Distributed Fault Detection Method for Wireless Sensor Networks; JSYST Dec. 2020 4883-4890

Gharehpetian, G.B., see Zolfaghari, M., JSYST March 2020 1117-1124

Gharehpetian, G.B., see Darabi, A., JSYST March 2020 1171-1182

Gharehpetian, G.B., see Khodadoost Arani, A.A., JSYST March 2020 1080-1087

Ghassemi, A., see Goudarzi, P., JSYST March 2020 927-938

Ghassemlooy, Z., see Chvojka, P., JSYST June 2020 2544-2550

Ghazzai, H., see Lucic, M.C., JSYST Dec. 2020 4786-4797

Gheisarnejad, M., Mohammadi-Moghadam, H., Boudjadar, J., and Khooban, M.H., Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG; JSYST March 2020 1058-1068

Ghose, T., see Sandhya, K., JSYST Dec. 2020 5160-5171

Ghosh, J., and Jayakody, D.N.K., An Analytical View of ASE for Multicell OFDMA Networks Based on Frequency-Reuse Scheme; JSYST March 2020 645-648

Ghosh, S., see Manohar, M., JSYST Sept. 2020 3430-3439

Giuseppi, A., see Liberati, F., JSYST Sept. 2020 3586-3597

Givigi, S.N., see Cai, Y., JSYST Sept. 2020 3072-3081

Glavas, H., see Petrovic, I., JSYST June 2020 2665-2675

Godfrey, P., see Dori, D., JSYST June 2020 1538-1548

Gokaraju, R., see Meghwani, A., JSYST March 2020 1159-1170

Gokaraju, R., see Makwana, Y.M., JSYST June 2020 2770-2779

Golestaneh, F., see Shafiei, M., JSYST Dec. 2020 5265-5273

Golkar, A., Experiential Systems Engineering Education Concept Using Stratospheric Balloon Missions; JSYST June 2020 1558-1567

Golkar, A., see Garzaniti, N., JSYST Sept. 2020 4382-4393

Gomez, M.M., Chatterjee, S., Abdel-Rahman, M.J., MacKenzie, A.B., Weiss, M.B.H., and DaSilva, L., Market-Driven Stochastic Resource Allocation Framework for Wireless Network Virtualization; JSYST March 2020 489-499

Gong, F., see Chen, X., JSYST June 2020 2303-2310

Gong, F., see Zhang, C., JSYST June 2020 2192-2201

Gong, T., Shlezinger, N., Ioushua, S.S., Namer, M., Yang, Z., and Eldar, Y.C., RF Chain Reduction for MIMO Systems: A Hardware Prototype; JSYST Dec. 2020 5296-5307

Gong, Z., see Zhou, R., JSYST June 2020 2990-3000

Gong, Z., see Zhou, R., JSYST Dec. 2020 4919-4930

Gooi, H.B., see Shafiei, M., JSYST Dec. 2020 5265-5273

Gopakumar, P., see Pal, D., JSYST March 2020 862-869

Gopalswamy, S., see Shangguan, L., JSYST March 2020 1457-1467

Gope, P., and Sikdar, B., An Efficient Privacy-Friendly Hop-by-Hop Data Aggregation Scheme for Smart Grids; *JSYST March 2020 343-352*

Goswami, D., and Das, S.S., Iterative Sub-Band and Power Allocation in Downlink Multiband NOMA; *JSYST Dec.* 2020 5199-5209

Goudarzi, P., Ghassemi, A., Mirsarraf, M.R., and Buyya, R., Joint Energy-QoE Efficient Content Delivery Networks Using Real-Time Energy Management; JSYST March 2020 927-938

Gouissem, A., Hamila, R., Al-Dhahir, N., Ben-Brahim, L., and Gastli, A., Time-Dependent Bit Error Rate Analysis for Smart Utility Networks in the Presence of WLAN Interferers; *JSYST June 2020 2133-2143*

Gourisetti, S.N.G., Mylrea, M., and Patangia, H., Cybersecurity Vulnerability Mitigation Framework Through Empirical Paradigm (CyFEr): Prioritized Gap Analysis; JSYST June 2020 1897-1908

Gouyon, D., see Wu, Q., JSYST Dec. 2020 4765-4776

Gray, J., see Meng, Z., JSYST March 2020 113-123

Griego, R.M., see Dori, D., JSYST June 2020 1538-1548

Gu, C., see Wang, H., JSYST June 2020 2684-2693

Gu, C., see Yan, X., JSYST June 2020 2694-2702

Gu, T., see Xu, X., JSYST Sept. 2020 3399-3409

Guan, P., see Pang, L., JSYST June 2020 2965-2968

Guan, X., see Liu, Z., JSYST June 2020 2557-2568 Guan, X., see Luo, X., JSYST June 2020 2901-2912

Guan, X., see Wang, X., JSYST Sept. 2020 4454-4465

Guan, Y.L., see Anwar, S., JSYST Sept. 2020 3875-3884

Guerrero, J.M., see Tan, S., JSYST Dec. 2020 5329-5339

Gui, L., He, B., Xiao, F., and Shu, F., Resolution Limit of Positioning Error for Range-Free Localization Schemes; JSYST June 2020 2980-2989

Gui, L., Zhou, Y., Shu, F., Zhou, H., Zhou, X., Li, J., and Wang, J., Robust Directional Modulation Design for Secrecy Rate Maximization in Multiuser Networks; JSYST Sept. 2020 3150-3160

Guimaraes, H.N., see Leles, M.C.R., JSYST March 2020 1468-1478

Guo, B., see Chen, C., JSYST June 2020 1635-1646

Guo, D., see Wang, K., JSYST June 2020 1862-1873

Guo, D., see Zhang, X., JSYST June 2020 1909-1920

Guo, D., see Xia, J., JSYST Sept. 2020 4296-4307

Guo, D., see Yan, Y., JSYST Sept. 2020 3233-3244

Guo, N., see Zhang, C., JSYST June 2020 2192-2201

Guo, Q., see Sun, M., JSYST June 2020 2432-2442

Guo, Q., see Gao, D., JSYST Dec. 2020 4674-4683

Guo, S., see Wang, Z., JSYST June 2020 2913-2924

Guo, S., Zhou, X., and Zhou, X., Energy-Efficient Resource Allocation in SWIPT Cooperative Wireless Networks; JSYST Sept. 2020 4131-4142

Guo, W., see Moutsinas, G., JSYST June 2020 2551-2556

Guo, Y., see Xie, Y., JSYST March 2020 1245-1256

Guo, Z., Liu, S., and Zhang, Z., Traffic Control for RDMA-Enabled Data Center Networks: A Survey; JSYST March 2020 677-688

Gupta, A., see Jani, M., JSYST March 2020 469-476

Gupta, A., see Jain, P., JSYST June 2020 2382-2391

Gupta, C.P., see Lahon, R., JSYST March 2020 1098-1108

Gupta, D., see Chavhan, S., JSYST Dec. 2020 5233-5244

Gupta, N., Dhurandher, S.K., and Sehgal, A., A Contract Theory Approach-Based Scheme to Encourage Secondary Users for Cooperative Sensing in Cognitive Radio Networks; JSYST June 2020 2400-2410

Gururaj, M.V., and Padhy, N.P., An Improvized Coordinated Voltage Control Scheme for Better Utilization of Regulating Devices During Various Operating Conditions of a Distribution System; JSYST Dec. 2020 4891-4900

Guzman, C., Cardenas, A., and Agbossou, K., Local Estimation of Critical and Off-Peak Periods for Grid-Friendly Flexible Load Management; JSYST Sept. 2020 4262-4271

Ha, D., see Tran, D., JSYST March 2020 253-264

Ha, D.T., see Retiere, N., JSYST June 2020 2736-2747

Ha, Q.P., see Hoang, V.T., JSYST June 2020 2925-2936

Haddar, M., see Siala, H., JSYST Sept. 2020 3977-3986

Hai, D.T., Chau, L.H., and Hung, N.T., A Priority-Based Multiobjective Design for Routing, Spectrum, and Network Coding Assignment Problem in Network-Coding-Enabled Elastic Optical Networks; JSYST June 2020 2358-2369

Haigh, P.A., see Chvojka, P., JSYST June 2020 2544-2550

Hailat, T.F., see Salameh, H.A.B., JSYST March 2020 84-92

Hamdi, N., see Mabrouk, A., JSYST March 2020 665-668

Hamila, R., see Gouissem, A., JSYST June 2020 2133-2143

Hammi, B., Fayad, A., Khatoun, R., Zeadally, S., and Begriche, Y., A Lightweight ECC-Based Authentication Scheme for Internet of Things (IoT); JSYST Sept. 2020 3440-3450

Hamzeh, M., see Azimi, S.M., JSYST March 2020 1109-1116

Hamzeh, M., see Babazadeh-Dizaji, R., JSYST March 2020 1015-1023

Hamzeh, M., see Azimi, S.M., JSYST Dec. 2020 4718-4725

Han, D.S., see Sarker, M.A.L., JSYST Sept. 2020 3582-3585

Han, J., see Yang, T., JSYST June 2020 3057-3060

Han, Q., see Chen, H., JSYST Sept. 2020 3779-3790

Han, R., see Tan, S., JSYST Dec. 2020 5329-5339

Han, S., see Li, J., JSYST March 2020 433-444

Han, W., see Liu, J., JSYST March 2020 1503-1511

Han, W., see Liu, J., JSYST June 2020 3027-3038 Han, W., see Liu, Y., JSYST Sept. 2020 4406-4417

Hanawal, M.K., see Kumar, R., JSYST June 2020 2085-2096 Hancke, G.P., see Ndiaye, M., JSYST June 2020 2347-2357

Hanly, S.V., see Suraweera, N., JSYST Dec. 2020 4798-4809

Hao, F., see Chen, J., JSYST March 2020 244-252

Hao, L., see Cao, R., JSYST Dec. 2020 4684-4693

Hao, M., see Zhou, R., JSYST June 2020 2990-3000

Hao, W., Sun, G., Muta, O., Zhang, J., and Yang, S., Coordinated Hybrid Precoding Design in Millimeter Wave Fog-RAN; JSYST March 2020 673-676

Hartong, M.W., and Roddy, S.A., An Information Theoretic Approach to Platform Technology Selection to Aid Influence Operations; JSYST Dec. 2020

Hasan, O., see Ahmad, W., JSYST Dec. 2020 4820-4831

Hasan, S.R., see Ahmad, W., JSYST Dec. 2020 4820-4831

Hayat, M.M., see Das, P., JSYST Dec. 2020 4842-4853

He, B., see Gui, L., JSYST June 2020 2980-2989

He, D., see Jia, X., JSYST March 2020 560-571

He, D., see Verma, G.K., JSYST March 2020 621-632

He, D., see Feng, Q., JSYST June 2020 1820-1829

He, D., see Zhang, Y., JSYST Dec. 2020 5320-5328

He, Q., Wang, X., Yi, B., Mao, F., Cai, Y., and Huang, M., Opinion Maximization Through Unknown Influence Power in Social Networks Under Weighted Voter Model; JSYST June 2020 1874-1885

He, W., Ahn, C.K., and Xiang, Z., Global Fault-Tolerant Sampled-Data Control for Large-Scale Switched Time-Delay Nonlinear Systems; JSYST June 2020 1549-1557

He, Z., see Fan, B., JSYST June 2020 2097-2108

He, Z., see Fu, Y., JSYST June 2020 1764-1775

Hedley, M., see Suraweera, N., JSYST Dec. 2020 4798-4809

Heidarabadi, H., see Pourahmadi, F., JSYST March 2020 718-728

Hemmati, M., Mohammadi-Ivatloo, B., Abapour, M., and Anvari-Moghaddam, A., Optimal Chance-Constrained Scheduling of Reconfigurable Microgrids Considering Islanding Operation Constraints; JSYST Dec. 2020 5340-5349

Hentati, A.I., and Fourati, L.C., Mobile Target Tracking Mechanisms Using Unmanned Aerial Vehicle: Investigations and Future Directions; JSYST June 2020 2969-2979

Hersyandika, R., see Joshi, K.C., JSYST June 2020 2144-2153

Hiari, O., Mesleh, R., and Al-Khatib, A., A System Simulation Framework for Modeling Space Modulation Techniques; JSYST March 2020 1435-1446

Ho, P., see Padidar, P., JSYST Sept. 2020 4466-4476

Ho, W.K., see Chen, T., JSYST March 2020 771-781

Ho, W.K., see Sun, L., JSYST June 2020 2801-2812

Hoang, V.T., Phung, M.D., Dinh, T.H., and Ha, Q.P., System Architecture for Real-Time Surface Inspection Using Multiple UAVs; JSYST June 2020

Hollmann, E.H., see Pereira, C.S., JSYST Sept. 2020 3926-3937

Holm-Nielsen, J.B., see Priyadarshi, N., JSYST March 2020 1218-1229

Holm-Nielsen, J.B., see Priyadarshi, N., JSYST Sept. 2020 3334-3342

Holm-Nielsen, J.B., see Mahmud, K., JSYST Sept. 2020 3641-3652

Hong, C., see Lee, K., JSYST Sept. 2020 3618-3629

Hong, J., see Lee, K., JSYST Sept. 2020 4217-4220

Hong, J., see Zhou, Y., JSYST Dec. 2020 5253-5264

Hong, Y., and Cabatac, M.T.A.M., Fault Detection, Classification, and Location by Static Switch in Microgrids Using Wavelet Transform and Taguchi-Based Artificial Neural Network; JSYST June 2020 2725-2735

Hong, Y., and Nguyen, M., Multiobjective Multiscenario Under-Frequency Load Shedding in a Standalone Power System; JSYST June 2020 2759-2769

Hooshyar, A., see Saleh, K.A., JSYST Sept. 2020 4284-4295

Horne, D., and Nair, S., A New Privacy-Enhanced Technology for Fair Matchmaking With Identity Linked Wishes; JSYST March 2020 298-309

Hossain, J., see Islam, M.R., JSYST Sept. 2020 3676-3686

Hosseini, S.A., Toulabi, M., Ashouri-Zadeh, A., and Ranjbar, A.M., Modified Power Reserve Management Solution in Power System Considering Frequency Constraints; JSYST March 2020 1125-1134

Hosseini, S.H., see Pourahmadi, F., JSYST March 2020 718-728

Hou, Y., see Jia, W., JSYST June 2020 2464-2472

Hu, C., see Li, P., JSYST June 2020 2042-2053

Hu, D., Zhang, Q., Li, Q., and Qin, J., Joint Position, Decoding Order, and Power Allocation Optimization in UAV-Based NOMA Downlink Communications; JSYST June 2020 2949-2960

Hu, H., see Chen, L., JSYST Sept. 2020 3301-3312

Hu, J., see Wu, J., JSYST June 2020 2532-2543

Hu, S., see Sun, J., JSYST June 2020 1728-1739

Hu, W., see Li, J., JSYST Sept. 2020 3082-3092

Hu, X., see Wang, J., JSYST Dec. 2020 5451-5462

Hu, Y., see Zhou, Y., JSYST March 2020 220-231

Hu, Y., see Zhang, D., JSYST March 2020 661-664

Huang, H., see Dai, Z., JSYST Sept. 2020 4368-4381

Huang, H., see Savkin, A.V., JSYST Dec. 2020 4746-4749

Huang, J., Xiong, Y., Huang, W., Xu, C., and Miao, F., SieveDroid: Intercepting Undesirable Private-Data Transmissions in Android Applications; JSYST March 2020 375-386

Huang, J., see Muhlmeyer, M., JSYST Dec. 2020 5187-5198

Huang, K., Xiang, Z., Deng, W., Tan, X., and Yang, C., Reweighted Compressed Sensing-Based Smart Grids Topology Reconstruction With Application to Identification of Power Line Outage; JSYST Sept. 2020 4329-4339

Huang, L., see Tian, M., JSYST June 2020 2597-2600

Huang, L., see Zhao, L., JSYST Sept. 2020 3904-3915

Huang, M., see He, Q., JSYST June 2020 1874-1885

Huang, P., see Wang, Q., JSYST Sept. 2020 4015-4024

Huang, Q., see Li, J., JSYST Sept. 2020 3082-3092

Huang, T., see Zang, T., JSYST March 2020 572-581

Huang, T., see Chiu, W., JSYST June 2020 1580-1591

Huang, W., see Huang, J., JSYST March 2020 375-386

Huang, Y., see Zhang, H., JSYST March 2020 445-456

Huang, Y., see Zou, W., JSYST Dec. 2020 4810-4819

Hung, N.T., see Hai, D.T., JSYST June 2020 2358-2369

Huo, Q., see Ma, Z., JSYST Sept. 2020 4602-4613

Hussain, S.M.S., see Aftab, M.A., JSYST June 2020 2676-2683

Hussein, M.M., see Mahmoud, K., JSYST March 2020 760-770

Hutchison, N., see Zavala, A., JSYST Dec. 2020 5049-5060

Hwang, J., see Lee, K., JSYST Sept. 2020 3618-3629

I

Idrissi, A., see Rehioui, H., JSYST March 2020 530-537

Ikki, S.S., see Al-Jarrah, M.A., JSYST June 2020 2225-2236

Imran, A., see Onireti, O., JSYST June 2020 2520-2531

Imran, M., Durad, M.H., Khan, F.A., and Abbas, H., DAISY: A Detection and Mitigation System Against Denial-of-Service Attacks in Software-Defined Networks; JSYST June 2020 1933-1944

Imran, M.A., see Onireti, O., JSYST June 2020 2520-2531

Ioannou, I., Vassiliou, V., Christophorou, C., and Pitsillides, A., Distributed Artificial Intelligence Solution for D2D Communication in 5G Networks; JSYST Sept. 2020 4232-4241

Ioushua, S.S., see Gong, T., JSYST Dec. 2020 5296-5307

Iqbal, W., see Bangash, Y.A., JSYST Sept. 2020 4489-4499

Islam, M.R., Lu, H., Hossain, J., and Li, L., Multiobjective Optimization Technique for Mitigating Unbalance and Improving Voltage Considering Higher Penetration of Electric Vehicles and Distributed Generation; JSYST Sept. 2020 3676-3686

Islam, M.R., see Islam, M.R., JSYST Sept. 2020 3676-3686

J

Jackson, S., see Dori, D., JSYST June 2020 1538-1548

Jafari, R., Mahdavi, M., and Fazel, M.S., Sum-Throughput Maximization of Secondary Users in an In-Band Full-Duplex Cognitive Wireless Powered Communication Network; JSYST June 2020 2109-2120

Jahanara, H., see Liscouet-Hanke, S., JSYST Dec. 2020 5441-5450

Jain, P., and Gupta, A., Energy-Efficient Adaptive Sectorization for 5G Green Wireless Communication Systems; JSYST June 2020 2382-2391

Jajodia, S., see Chen, H., JSYST Sept. 2020 3779-3790

Jalali, F., and Zaimbashi, A., Cognitive Radio Spectrum Sensing Under Joint TX/RX I/Q Imbalance and Uncalibrated Receiver; JSYST March 2020 105-112

Jalilian, A., see Rostami, A., JSYST March 2020 813-823

Jamshidi, M., see Abdelmawgoud, A., JSYST March 2020 1491-1502

Jana, P.K., see Muduli, L., JSYST June 2020 3039-3046

Jani, M., Garg, P., and Gupta, A., Performance Analysis of a Mixed Cooperative PLC-VLC System for Indoor Communication Systems; JSYST March 2020 469-476

Jarrahi, M.A., Samet, H., and Ghanbari, T., Novel Change Detection and Fault Classification Scheme for AC Microgrids; JSYST Sept. 2020 3987-3998

Javedankherad, M., Zeinalpour-Yazdi, Z., and Ashtiani, F., Content Placement in Cache Networks Using Graph Coloring; JSYST Sept. 2020 3129-3138

Javidsharifi, M., Niknam, T., Aghaei, J., Shafie-khah, M., and Catalao, J.P.S., Probabilistic Model for Microgrids Optimal Energy Management Considering AC Network Constraints; JSYST June 2020 2703-2712

Jayakody, D.N.K., see Ghosh, J., JSYST March 2020 645-648

Jayakody, D.N.K., see Yadav, S., JSYST June 2020 2585-2588

Jha, A., see Misra, S., JSYST March 2020 144-151

Ji, S., and Wang, W., Physical-Layer Security for Frequency Diverse Array Communication System Over Nakagami-m Fading Channels; JSYST June 2020 2370-2381

Jia, F., see Zhang, C., JSYST June 2020 2192-2201

Jia, M., see Li, F., JSYST June 2020 2187-2191

Jia, N., see Du, C., JSYST Sept. 2020 4101-4109

Jia, W., Wang, W., Hou, Y., and Zhang, S., Integrated Communication and Localization System With OFDM-Chirp Waveform; JSYST June 2020 2464-2472

Jia, X., He, D., Kumar, N., and Choo, K.R., A Provably Secure and Efficient Identity-Based Anonymous Authentication Scheme for Mobile Edge Computing; JSYST March 2020 560-571

Jiang, H., see Chen, Z., JSYST June 2020 3001-3010

Jiang, J., see Dong, G., JSYST Sept. 2020 3653-3664

Jiang, J., see Du, C., JSYST Sept. 2020 4101-4109

Jiang, P., Men, J., Xu, H., Zheng, S., Kong, Y., and Zhang, L., A Variable Neighborhood Search-Based Hybrid Multiobjective Evolutionary Algorithm for HazMat Heterogeneous Vehicle Routing Problem With Time Windows; JSYST Sept. 2020 4344-4355

Jiang, R., Xiong, K., Fan, P., Zhou, L., and Zhong, Z., Outage Probability and Throughput of Multirelay SWIPT-WPCN Networks With Nonlinear EH Model and Imperfect CSI; JSYST March 2020 1206-1217

Jiang, Y., see Deng, L., JSYST Sept. 2020 4242-4251

Jiang, Y., Wang, L., Zhao, H., and Chen, H., Covert Communications in D2D Underlaying Cellular Networks With Power Domain NOMA; JSYST Sept. 2020 3717-3728

Jiao, B., see Xing, L., JSYST Sept. 2020 4252-4261

Jin, H., see Li, P., JSYST June 2020 2042-2053

Jin, M., see Sun, M., JSYST June 2020 2432-2442

Jin, Q., Lin, R., and Yang, F., E-WACGAN: Enhanced Generative Model of Signaling Data Based on WGAN-GP and ACGAN; JSYST Sept. 2020 3289-3300

Jin, Y., Kwak, K.S., and Yoo, S., A Novel Energy Supply Strategy for Stable Sensor Data Delivery in Wireless Sensor Networks; JSYST Sept. 2020 3418-3429

Johnson, M., see Suraweera, N., JSYST Dec. 2020 4798-4809

Jooste, K., see Ma, C., JSYST June 2020 1992-2002

Jose, J., and Kowli, A., Path-Based Distribution Feeder Reconfiguration for Optimization of Losses and Reliability; JSYST March 2020 1417-1426

Joshi, A., see Khanna, K., JSYST June 2020 1945-1952

Joshi, H., Darak, S.J., and Kumar, A.A., Low-Complexity Reconfigurable and Intelligent Ultrawideband Angular Sensing; JSYST Dec. 2020 4931-4942

Joshi, K.C., Hersyandika, R., and Prasad, R.V., Association, Blockage, and Handoffs in IEEE 802.11ad-Based 60-GHz Picocells—A Closer Look; JSYST June 2020 2144-2153

Ju, Y., Zhu, Y., Wang, H., Pei, Q., and Zheng, H., Artificial Noise Hopping: A Practical Secure Transmission Technique With Experimental Analysis for Millimeter Wave Systems; JSYST Dec. 2020 5121-5132

Jung, B., Lim, S., Chae, J., Pu, C., and Min, M., MQry: Elastic Validity Region for Querying Mobile Point-of-Interests in Infrastructure-Less Networks; JSYST June 2020 1852-1861

Jurado-Lasso, F.F., Clarke, K., and Nirmalathas, A., A Software-Defined Management System for IP-Enabled WSNs; JSYST June 2020 2335-2346

Jurado-Lasso, F.F., Clarke, K., and Nirmalathas, A., Performance Analysis of Software-Defined Multihop Wireless Sensor Networks; JSYST Dec. 2020 4653-4662

Justo, J.J., see Lupangu, C., JSYST Sept. 2020 4071-4078

K

K.N., S., see S., N., JSYST March 2020 1007-1014

Kabir, M.E., Assi, C., Tushar, M.H.K., and Yan, J., Optimal Scheduling of EV Charging at a Solar Power-Based Charging Station; JSYST Sept. 2020 4221-4231

Kaddoum, G., see Tran, D., JSYST March 2020 253-264

Kaddoum, G., see Alam, M.S., JSYST Sept. 2020 4079-4088

Kader, M.F., see Sarker, M.A.L., JSYST Sept. 2020 3582-3585

Kaiwartya, O., see Verma, G.K., JSYST June 2020 1704-1715

Kaiwartya, O., see Khasawneh, A.M., JSYST Dec. 2020 4735-4745

Kaiwartya, O., see Kumar, S., JSYST Dec. 2020 4663-4673

Kalam, A., see Moghaddam, M.J.H., JSYST Sept. 2020 3530-3538

Kalbat, F., Al-Dweik, A., Sharif, B., and Karagiannidis, G.K., Performance Analysis of Precoded Wireless OFDM With Carrier Frequency Offset; JSYST June 2020 2237-2248

Kammoun, I., see Ayadi, R., JSYST March 2020 603-613

Kandasamy, N.K., see Kaur, R., JSYST March 2020 729-737

Kang, H., see Park, L.H., JSYST Sept. 2020 4545-4556

Kang, J., Chun, C., Kim, I., and Kim, D.I., Deep RNN-Based Channel Tracking for Wireless Energy Transfer System; JSYST Sept. 2020 4340-4343

Kang, J., and Chun, C., Joint Trajectory Design, Tx Power Allocation, and Rx Power Splitting for UAV-Enabled Multicasting SWIPT Systems; JSYST Sept. 2020 3740-3743

Kang, J., Kim, I., and Chun, C., Deep Learning-Based MIMO-NOMA With Imperfect SIC Decoding; JSYST Sept. 2020 3414-3417

Kaple, T., see Raut, P., JSYST Sept. 2020 3390-3398

Kapoor, A., and Sharma, A., Optimal Charge/Discharge Scheduling of Battery Storage Interconnected With Residential PV System; JSYST Sept. 2020 3825-3835

Karagiannidis, G.K., see Kalbat, F., JSYST June 2020 2237-2248

Karimi, V., Mohseni, R., and Samadi, S., Adaptive OFDM Waveform Design for Cognitive Radar in Signal-Dependent Clutter; JSYST Sept. 2020 3630-3640

Karmakar, S., see Lala, H., JSYST Sept. 2020 3494-3505

Kasimu, A., Wu, D.D., and Bian, Y., System Dynamic-Based Oil Weathering Processes: Simulation and Analysis; JSYST March 2020 1375-1383

Katti, C.P., see Kumar, M., JSYST June 2020 2032-2041

Kaur, H., and Sood, S.K., Energy-Efficient IoT-Fog-Cloud Architectural Paradigm for Real-Time Wildfire Prediction and Forecasting; JSYST June 2020 2003-2011

Kaur, K., Garg, S., Kumar, N., Aujla, G.S., Choo, K.R., and Obaidat, M.S., An Adaptive Grid Frequency Support Mechanism for Energy Management in Cloud Data Centers; JSYST March 2020 1195-1205

Kaur, R., Krishnasamy, V., Kandasamy, N.K., and Kumar, S., Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers; JSYST March 2020 729-737

Kaveh, M., and Mosavi, M.R., A Lightweight Mutual Authentication for Smart Grid Neighborhood Area Network Communications Based on Physically Unclonable Function; JSYST Sept. 2020 4535-4544

Kaynak, O., see Liu, T., JSYST June 2020 1830-1839

Kazari, H., see Toulabi, M., JSYST June 2020 2615-2623

Keane, A., see Nouri, A., JSYST Sept. 2020 3767-3778

Keshavarz, A., see Saber, M.J., JSYST Sept. 2020 4402-4405

Khalid, H.M., Muyeen, S.M., and Peng, J.C., Cyber-Attacks in a Looped Energy-Water Nexus: An Inoculated Sub-Observer-Based Approach; JSYST June 2020 2054-2065

Khalid, H.M., and Peng, J.C., Bidirectional Charging in V2G Systems: An In-Cell Variation Analysis of Vehicle Batteries; JSYST Sept. 2020 3665-3675

Khalifeh, A., see Khasawneh, A.M., JSYST Dec. 2020 4735-4745

Khan, F.A., see Imran, M., JSYST June 2020 1933-1944

Khan, M.K., see Li, X., JSYST March 2020 39-50

Khan, M.M.Z.M., see Bangash, Y.A., JSYST Sept. 2020 4489-4499

Khan, S., see Shariff, S.M., JSYST June 2020 2748-2758

Khan, U.A., see Doostmohammadian, M., JSYST March 2020 73-83

Khani, H., and Nie, H., Near-Optimal Detection of Monobit Digitized UWB Signals in the Presence of Noise and Strong Intersymbol Interference; JSYST June 2020 2311-2322

Khanna, A., see Chavhan, S., JSYST Dec. 2020 5233-5244

Khanna, K., Panigrahi, B.K., and Joshi, A., Priority-Based Protection Against the Malicious Data Injection Attacks on State Estimation; JSYST June 2020 1945-1952

Khanouche, M.E., Atmani, N., and Cherifi, A., Improved Teaching Learning-Based QoS-Aware Services Composition for Internet of Things; JSYST Sept. 2020 4155-4164

Khasawneh, A.M., Kaiwartya, O., Khalifeh, A., Abualigah, L.M., and Lloret, J., Green Computing in Underwater Wireless Sensor Networks Pressure Centric Energy Modeling; *JSYST Dec. 2020 4735-4745*

Khatami, R., and Parvania, M., Spatio-Temporal Value of Energy Storage in Transmission Networks; *JSYST Sept. 2020 3855-3864*

Khatoun, R., see Hammi, B., JSYST Sept. 2020 3440-3450

Khodadoost Arani, A.A., Gharehpetian, G.B., and Abedi, M., A Novel Control Method Based on Droop for Cooperation of Flywheel and Battery Energy Storage Systems in Islanded Microgrids; JSYST March 2020 1080-1087

Khodayar, M.E., see Manshadi, S.D., JSYST March 2020 803-812

Khooban, M.H., see Gheisarnejad, M., JSYST March 2020 1058-1068

Khooban, M.H., see Vafamand, N., JSYST Sept. 2020 4025-4035

Kiaei, I., see Rostami, M., JSYST March 2020 1088-1097

Kilicay-Ergin, N.H., see Srinivasan, S.M., JSYST March 2020 1353-1364

Kim, D.I., see Kang, J., JSYST Sept. 2020 4340-4343

Kim, I., see Kang, J., JSYST Sept. 2020 4340-4343

Kim, I., see Kang, J., JSYST Sept. 2020 3414-3417

Kim, J., see Saad, M., JSYST March 2020 321-332

Kim, J., see Lee, H., JSYST June 2020 2589-2592

Kim, R., see Ko, B., JSYST Sept. 2020 4591-4601

Kim, S., see Yang, T., JSYST June 2020 3057-3060

Kim, S., see Ko, B., JSYST Sept. 2020 4591-4601

Kim, S., see Ko, B., JSYST Sept. 2020 4591-4601

Kim, T., see Kumar, G., JSYST Sept. 2020 3949-3956

Kimura, H., Kimura, T., Asano, Y., Kunugi, T., and Aoi, S., An Improved Rapid-Source Parameter Determination System (AQUA) for Giant Earthquakes; JSYST Sept. 2020 3451-3462

Kimura, T., see Kimura, H., JSYST Sept. 2020 3451-3462

Kiranmayi, R., see Kumar, V.N., JSYST Sept. 2020 4308-4319

Kitts, C.A., see McDonald, R.T., JSYST Sept. 2020 3755-3766

Kmimech, M., see Rouis, T.S., JSYST June 2020 1647-1657

Ko, B., Lee, G., Choi, K., Kim, R., Kim, S., Cho, J., and Kim, S., Flexible Control Structure for Enhancement of Scalability in DC Microgrids; JSYST Sept. 2020 4591-4601

Koch, F.L., see Vieira, K., JSYST June 2020 1984-1991

Kohler, M., Vellasco, M., Silva, E., and Figueiredo, K., SimProxy Decision Support System: A Neural Network Proxy Applied to Reservoir and Surface Integrated Optimization; JSYST Dec. 2020 5111-5120

Koley, E., see Manohar, M., JSYST Sept. 2020 3430-3439

Kong, D., see Fan, B., JSYST June 2020 2097-2108

Kong, D., see Du, C., JSYST Sept. 2020 4101-4109

Kong, L., see Zhou, Y., JSYST Dec. 2020 5253-5264

Kong, P., Computation and Sensor Offloading for Cloud-Based Infrastructure-Assisted Autonomous Vehicles; JSYST Sept. 2020 3360-3370

Kong, Y., see Jiang, P., JSYST Sept. 2020 4344-4355

Koo, I., see Tuan, P.V., JSYST March 2020 457-468

Kordestani, M., Chaibakhsh, A., and Saif, M., SMS-A Security Management System for Steam Turbines Using a Multisensor Array; JSYST Sept. 2020 3813-3824

Kordestani, M., Samadi, M.F., and Saif, M., A New Hybrid Fault Prognosis Method for MFS Systems Based on Distributed Neural Networks and Recursive Bayesian Algorithm; JSYST Dec. 2020 5407-5416

Kothari, S., see Zavala, A., JSYST Dec. 2020 5049-5060

Kourogiorgas, C.I., see Lyras, N.K., JSYST Sept. 2020 3968-3976

Koutroulis, E., see Malisovas, A., JSYST Dec. 2020 4706-4717

Kowli, A., see Jose, J., JSYST March 2020 1417-1426

Kozlov, S.A., see Teles, G., JSYST Sept. 2020 4557-4566

Krishnamoorthy, G., and Dubey, A., Transmission–Distribution Cosimulation: Analytical Methods for Iterative Coupling; JSYST June 2020 2633-2642

Krishnasamy, V., see Kaur, R., JSYST March 2020 729-737

Krob, D., see Dori, D., JSYST June 2020 1538-1548

Kroposki, B., see Saleem, D., JSYST March 2020 17-27

Kuenzi, A., see Vuppala, S., JSYST June 2020 1810-1819

Kumar, A.A., see Joshi, H., JSYST Dec. 2020 4931-4942

Kumar, D., see Sandhya, K., JSYST Dec. 2020 5160-5171

Kumar, G., Saha, R., Rai, M.K., Thomas, R., and Kim, T., A Lattice Signcrypted Secured Localization in Wireless Sensor Networks; *JSYST Sept. 2020 3949*-

Kumar, M., Chand, S., and Katti, C.P., A Secure End-to-End Verifiable Internet-Voting System Using Identity-Based Blind Signature; JSYST June 2020 2032-2041

Kumar, M., and Tyagi, B., An Optimal Multivariable Constrained Nonlinear (MVCNL) Stochastic Microgrid Planning and Operation Problem With Renewable Penetration; JSYST Sept. 2020 4143-4154

Kumar, M., see Shivhare, A., JSYST Dec. 2020 4854-4863

Kumar, N., see Jia, X., JSYST March 2020 560-571

Kumar, N., see Kaur, K., JSYST March 2020 1195-1205

Kumar, N., see Verma, G.K., JSYST March 2020 621-632

Kumar, N., Saha, T.K., and Dey, J., Multilevel Inverter (MLI)-Based Stand-Alone Photovoltaic System: Modeling, Analysis, and Control; JSYST March 2020 909-915

Kumar, N., see Feng, Q., JSYST June 2020 1820-1829

Kumar, N., see Verma, G.K., JSYST June 2020 1704-1715

Kumar, N., see Li, X., JSYST Sept. 2020 3547-3557

Kumar, N., see Kumar, S., JSYST Dec. 2020 4663-4673

Kumar, P., see Pandey, A., JSYST June 2020 1953-1962

Kumar, P., and Dhaka, K., Performance of Wireless Powered DF Relay System Under Nakagami-mFading: Relay Assists Energy-Constrained Source; JSYST June 2020 2497-2507

Kumar, R., Darak, S.J., Hanawal, M.K., and Yadav, A., Distributed Learning and Coordination in Cognitive Infrastructureless Networks of Unknown Size; JSYST June 2020 2085-2096

Kumar, S., see Kaur, R., JSYST March 2020 729-737

Kumar, S., Nanomachine Localization in a Diffusive Molecular Communication System; JSYST June 2020 3011-3014

Kumar, S., see Pandey, A., JSYST June 2020 1953-1962

Kumar, S., and Misra, S., Procurement-Based User Association for LTE-Advanced HetNets; JSYST Sept. 2020 3194-3201

Kumar, S., Kaiwartya, O., Rathee, M., Kumar, N., and Lloret, J., Toward Energy-Oriented Optimization for Green Communication in Sensor Enabled IoT Environments; JSYST Dec. 2020 4663-4673

Kumar, V., Mukherjee, M., and Lloret, J., Reconfigurable Architecture of UFMC Transmitter for 5G and Its FPGA Prototype; JSYST March 2020 28-38

Kumar, V., see Prasanna, A.L., JSYST June 2020 2293-2302

Kumar, V., see Sen, S., JSYST June 2020 2653-2664

Kumar, V., see Yadav, S., JSYST June 2020 2585-2588

Kumar, V., see Sen, S., JSYST Sept. 2020 4418-4429

Kumar, V.N., Babu P., N., Kiranmayi, R., Siano, P., and Panda, G., Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator; JSYST Sept. 2020 4308-4319

Kung, S., see Zhou, Y., JSYST March 2020 220-231

Kunugi, T., see Kimura, H., JSYST Sept. 2020 3451-3462

Kuo, S., see Chan, R.Y., JSYST March 2020 208-219

Kurniawan, N.B., Suhardi, Bandung, Y., and Yustianto, P., Services Computing Systems Engineering Framework: A Proposition and Evaluation Through SOA Principles and Analysis Model; JSYST Sept. 2020 3105-3116

Kwak, K.S., see Jin, Y., JSYST Sept. 2020 3418-3429

Kwon, T., see Park, L.H., JSYST Sept. 2020 4545-4556

Kyriakides, E., see Zacharia, L., JSYST March 2020 422-432

Ī

Lahon, R., Gupta, C.P., and Fernandez, E., Priority-Based Scheduling of Energy Exchanges Between Cooperative Microgrids in Risk-Averse Environment; JSYST March 2020 1098-1108

Lai, C., and Zhang, X., Duration-Sensitive Task Allocation for Mobile Crowd Sensing; JSYST Sept. 2020 4430-4441

Lai, X., Zhang, Q., and Qin, J., Downlink NOMA Networks With Hybrid Long-Packet and Short-Packet Communications in Flat Rayleigh Fading Channels; JSYST Sept. 2020 3410-3413

Lai, Y., see Chang, Y., JSYST March 2020 164-171

Lala, H., and Karmakar, S., Detection and Experimental Validation of High Impedance Arc Fault in Distribution System Using Empirical Mode Decomposition; JSYST Sept. 2020 3494-3505

Lam, A.Y.S., see Chen, X., JSYST March 2020 1034-1045

Lam, K., see Li, F., JSYST June 2020 2187-2191

Latify, M.A., see Nemati, H., JSYST March 2020 793-802

Leao, J.L.D.S., see Vieira, K., JSYST June 2020 1984-1991

Ledwich, G., see Shafiei, M., JSYST Dec. 2020 5265-5273

Lee, G., see Ko, B., JSYST Sept. 2020 4591-4601

Lee, H., and Lee, J., Adaptive Traffic Management and Energy Cooperation in Renewable-Energy-Powered Cellular Networks; JSYST March 2020 132-143

Lee, H., Kim, J., and Lee, J., Resource Allocation in Wireless Networks With Deep Reinforcement Learning: A Circumstance-Independent Approach; JSYST June 2020 2589-2592

Lee, H., and Lee, J., EHLinQ: Distributed Scheduler for D2D Communication With RF Energy Harvesting; JSYST June 2020 2281-2292

Lee, H., see Yu, H., JSYST Dec. 2020 4990-5001

Lee, J., see Lee, H., JSYST March 2020 132-143

Lee, J., Baek, H., and Lim, J., Cooperative Sensing Scheme for Acquisition of Rotational Synchronization of Radar; JSYST June 2020 3061-3064

Lee, J., see Lee, H., JSYST June 2020 2589-2592

Lee, J., see Lee, H., JSYST June 2020 2281-2292

Lee, K., and Choi, H., Fast Wireless Power Transfer for Multiple Receivers in Linear Topology; *JSYST March* 2020 649-652

Lee, K., see Chen, D., JSYST June 2020 2411-2420

Lee, K., Hong, J., and Choi, H., Adaptive Jamming Power Control for Untrusted Relay Networks With Imperfect Channel Reciprocity; *JSYST Sept.* 2020 4217-4220

Lee, K., Hong, C., Hwang, J., and Yoo, C., Dynamic Network Scheduling for Virtual Routers; *JSYST Sept. 2020 3618-3629*

Lee, K., and Lee, W., Learning-Based Resource Management for SWIPT; JSYST Dec. 2020 4750-4753

Lee, S., see Chang, K., JSYST Sept. 2020 4047-4058

Lee, T., see Park, L.H., JSYST Sept. 2020 4545-4556

Lee, W., see Lee, K., JSYST Dec. 2020 4750-4753

Lee, Y.L., see Chuah, T.C., JSYST June 2020 2175-2186

Legg, P., see Xu, S., JSYST June 2020 1740-1751

Lehtonen, M., see Mahmoud, K., JSYST March 2020 760-770

Leles, M.C.R., Mozelli, L.A., Sbruzzi, E.F., Nascimento, C.L., and Guimaraes, H.N., A Multicriteria Trading System Based on Singular Spectrum Analysis Trading Rules; JSYST March 2020 1468-1478

Leow, C.Y., see Fadoul, M.M., JSYST June 2020 2392-2399

Leung, H., see Li, H., JSYST March 2020 653-656

Leung, K., see Ye, J., JSYST March 2020 1285-1296

Leung, K., see Chen, X., JSYST March 2020 1034-1045

Levrat, E., see Wu, Q., JSYST Dec. 2020 4765-4776

Li, B., see Li, T., JSYST June 2020 1692-1703

Li, C., see Du, C., JSYST Sept. 2020 4101-4109

Li, D., Zhao, X., and Cao, P., An Enhanced Motorway Control System for Mixed Manual/Automated Traffic Flow; JSYST Dec. 2020 4726-4734

Li, F., see Clemente, J., JSYST March 2020 1277-1284

Li, F., see Wang, H., JSYST June 2020 2684-2693

Li, F., Lam, K., Jia, M., Zhao, K., Li, X., and Wang, L., Spectrum Optimization for Satellite Communication Systems With Heterogeneous User Preferences; JSYST June 2020 2187-2191

Li, F., see Yan, X., JSYST June 2020 2694-2702

Li, F., Clemente, J., Valero, M., Tse, Z., Li, S., and Song, W., Smart Home Monitoring System via Footstep-Induced Vibrations; JSYST Sept. 2020 3383-3389

Li, G., Li, Y., and Roozitalab, F., Midterm Load Forecasting: A Multistep Approach Based on Phase Space Reconstruction and Support Vector Machine; JSYST Dec. 2020 4967-4977

Li, H., Zhou, S., Yuan, W., Li, J., and Leung, H., Adversarial-Example Attacks Toward Android Malware Detection System; JSYST March 2020 653-656

Li, J., see Li, H., JSYST March 2020 653-656

Li, J., Han, S., Tai, X., Gao, C., and Zhang, Q., Physical Layer Security Enhancement for Satellite Communication Among Similar Channels: Relay Selection and Power Allocation; JSYST March 2020 433-444

Li, J., see Liu, J., JSYST March 2020 1503-1511

Li, J., see Li, X., JSYST March 2020 669-672

Li, J., see Yan, H., JSYST June 2020 1788-1797

Li, J., see Liu, J., JSYST June 2020 3027-3038

Li, J., see Wang, X., JSYST Sept. 2020 4356-4367

Li, J., see Gui, L., JSYST Sept. 2020 3150-3160

Li, J., Hu, W., Wu, X., Huang, Q., Liu, Z., Chen, C., and Chen, Z., Cable Connection Optimization for Onshore Wind Farms Considering Restricted Area and Topography; JSYST Sept. 2020 3082-3092

Li, K., see Luo, S., JSYST June 2020 2581-2584

Li, L., see Li, X., JSYST March 2020 669-672

Li, L., see Islam, M.R., JSYST Sept. 2020 3676-3686

Li, L., see Wang, X., JSYST Sept. 2020 4356-4367

Li, M., see Tian, X., JSYST March 2020 548-559

Li, M., see Zhou, X., JSYST June 2020 1798-1809

Li, N., see Wu, J., JSYST March 2020 1479-1490

Li, P., Xu, C., Jin, H., Hu, C., Luo, Y., Cao, Y., Mathew, J., and Ma, Y., ChainSDI: A Software-Defined Infrastructure for Regulation-Compliant Home-Based Healthcare Services Secured by Blockchains; JSYST June 2020 2042-2053

Li, P., see Yang, L., JSYST June 2020 1623-1634

Li, P., see Wang, Z., JSYST June 2020 2913-2924

Li, Q., and Yang, L., Robust Optimization for Energy Efficiency in MIMO Two-Way Relay Networks With SWIPT; JSYST March 2020 196-207

Li, Q., see Hu, D., JSYST June 2020 2949-2960

Li, Q., see Tian, M., JSYST June 2020 2597-2600

Li, Q., see Zhao, S., JSYST Dec. 2020 5144-5147

Li, R., see Chen, Y., JSYST June 2020 2202-2213

Li, R., see Dong, G., JSYST Sept. 2020 3653-3664

Li, S., and Xiang, Z., Sampled-Data Decentralized Output Feedback Control for a Class of Switched Large-Scale Stochastic Nonlinear Systems; JSYST June 2020 1602-1610

Li, S., see Xu, S., JSYST June 2020 1740-1751

Li, S., see Li, F., JSYST Sept. 2020 3383-3389

Li, S., see Yan, Y., JSYST Sept. 2020 3233-3244

Li, S., see Suraweera, N., JSYST Dec. 2020 4798-4809

Li, T., Tong, K., Xia, M., Li, B., and de Silva, C.W., Information-Based Hierarchical Planning for a Mobile Sensing Network in Environmental Mapping; JSYST June 2020 1692-1703 Li, X., Peng, J., Obaidat, M.S., Wu, F., Khan, M.K., and Chen, C., A Secure Three-Factor User Authentication Protocol With Forward Secrecy for Wireless Medical Sensor Network Systems; JSYST March 2020 39-50

Li, X., Li, J., and Li, L., Performance Analysis of Impaired SWIPT NOMA Relaying Networks Over Imperfect Weibull Channels; JSYST March 2020 669-672

Li, X., see Wang, H., JSYST March 2020 538-547

Li, X., see Li, F., JSYST June 2020 2187-2191

Li, X., see Luo, X., JSYST June 2020 2901-2912

Li, X., see Luo, X., JSYST June 2020 2901-2912

Li, X., see Pan, H., JSYST Sept. 2020 3938-3948

Li, X., Liu, T., Obaidat, M.S., Wu, F., Vijayakumar, P., and Kumar, N., A Light-weight Privacy-Preserving Authentication Protocol for VANETs; JSYST Sept. 2020 3547-3557

Li, Y., see Sun, M., JSYST June 2020 2432-2442

Li, Y., see Xiong, H., JSYST Sept. 2020 3744-3754

Li, Y., see Li, G., JSYST Dec. 2020 4967-4977

Li, Y., see Zhang, Y., JSYST Dec. 2020 5320-5328

Lian, C., see Lyu, Z., JSYST Dec. 2020 5061-5072

Lian, F., see Lin, C., JSYST Sept. 2020 4523-4534

Lian, H., see Pan, H., JSYST Sept. 2020 3938-3948 **Liang, C.,** see Yang, S., JSYST March 2020 1447-1456

Liao, J., see Zhuang, Z., JSYST June 2020 1658-1669

Liberati, F., Di Giorgio, A., Giuseppi, A., Pietrabissa, A., and Delli Priscoli, F., Efficient and Risk-Aware Control of Electricity Distribution Grids; JSYST Sept. 2020 3586-3597

Lim, J., see Lee, J., JSYST June 2020 3061-3064

Lim, S., see Jung, B., JSYST June 2020 1852-1861

Limbasiya, T., and Das, D., Lightweight Secure Message Broadcasting Protocol for Vehicle-to-Vehicle Communication; JSYST March 2020 520-529

Lin, C., and Lian, F., System Integration of Sensor-Fusion Localization Tasks Using Vision-Based Driving Lane Detection and Road-Marker Recognition; JSYST Sept. 2020 4523-4534

Lin, D., and Tang, Y., Edge Computing-Based Mobile Health System: Network Architecture and Resource Allocation; *JSYST June 2020 1716-1727*

Lin, F.P., and Tsai, Z., Hierarchical Edge-Cloud SDN Controller System With Optimal Adaptive Resource Allocation for Load-Balancing; JSYST March 2020 265-276

Lin, J.C., see Gan, W., JSYST Sept. 2020 4442-4453

Lin, M., see Wang, J., JSYST Sept. 2020 4176-4187

Lin, M., see Chen, P., JSYST Sept. 2020 3801-3812

Lin, R., see Jin, Q., JSYST Sept. 2020 3289-3300

Lin, S., see Wang, J., JSYST Sept. 2020 4176-4187

Lin, Y., see Van, L., JSYST June 2020 3015-3026

Lin, Y., see Van, L., JSYST June 2020 3015-3026

Lindelauf, R., see Chen, H., JSYST Sept. 2020 3779-3790

Ling, K., see Chen, T., JSYST March 2020 771-781

Ling, K.V., see Sun, L., JSYST June 2020 2801-2812

Lins, R.G., N. Givigi, S., FPGA-Based Design Optimization in Autonomous Robot Systems for Inspection of Civil Infrastructure; JSYST June 2020 2961-2964

Liscouet-Hanke, S., Jahanara, H., and Bauduin, J., A Model-Based Systems Engineering Approach for the Efficient Specification of Test Rig Architectures for Flight Control Computers; JSYST Dec. 2020 5441-5450

Lisi, S.S., see Masoudi, M., JSYST Dec. 2020 5100-5110

Liu, B., see Xu, S., JSYST June 2020 1740-1751

Liu, B., see Wu, T., JSYST Dec. 2020 5429-5440

Liu, C., Rouse, W.B., and Belanger, D., Understanding Risks and Opportunities of Autonomous Vehicle Technology Adoption Through Systems Dynamic Scenario Modeling—The American Insurance Industry; JSYST March 2020 1365-1374

Liu, C., see Wang, J., JSYST June 2020 3047-3056

Liu, C., see Wang, J., JSYST Sept. 2020 4176-4187

Liu, C., see Chen, X., JSYST Sept. 2020 3117-3128

Liu, D., see Zhang, Z., JSYST March 2020 184-195

Liu, D., Cheng, W., and Wen, W., An Online Bearing Fault Diagnosis Technique via Improved Demodulation Spectrum Analysis Under Variable Speed Conditions; JSYST June 2020 2323-2334

Liu, F., see Wang, Q., JSYST Sept. 2020 4015-4024

Liu, G., see Manshadi, S.D., JSYST March 2020 803-812

Liu, G., see Sun, G., JSYST Dec. 2020 4694-4705

Liu, J., Han, W., Li, J., Zhang, Y., and Su, X., Integration Design of Sortie Scheduling for Carrier Aircrafts Based on Hybrid Flexible Flowshop; JSYST March 2020 1503-1511

Liu, J., Han, W., Wang, X., and Li, J., Research on Cooperative Trajectory Planning and Tracking Problem for Multiple Carrier Aircraft on the Deck; JSYST June 2020 3027-3038

Liu, J., see Chen, X., JSYST Sept. 2020 3117-3128

Liu, J., see Dai, J., JSYST Dec. 2020 4832-4841

Liu, K., see Wu, T., JSYST Dec. 2020 5429-5440

Liu, L., see Wang, Z., JSYST June 2020 2913-2924

Liu, L., see Fang, S., JSYST Dec. 2020 4754-4764

Liu, M., Tu, S., Xiao, C., Waqas, M., Rehman, S.u., Aamir, M., and Chang, C., The Allocation and Reuse Scheme of Physical Cell Identifications Based on Maximum Degree First Coloring Algorithm; JSYST March 2020 582-591

Liu, M., see Lu, W., JSYST Sept. 2020 3695-3704

Liu, Q., see Tian, X., JSYST March 2020 548-559

Liu, Q., see Lu, W., JSYST Sept. 2020 3695-3704

Liu, Q., see Chen, X., JSYST Sept. 2020 3117-3128

Liu, S., see Guo, Z., JSYST March 2020 677-688

Liu, S., Siano, P., and Wang, X., Intrusion-Detector-Dependent Frequency Regulation for Microgrids Under Denial-of-Service Attacks; JSYST June 2020 2593-2596

Liu, S., see Wang, Z., JSYST Sept. 2020 4188-4196

Liu, S., see Zhou, Y., JSYST Dec. 2020 5253-5264

Liu, T., Luo, H., Kaynak, O., and Yin, S., A Novel Control-Performance-Oriented Data-Driven Fault Classification Approach; JSYST June 2020 1830-1839

Liu, T., see Li, X., JSYST Sept. 2020 3547-3557

Liu, W., see Zhang, H., JSYST June 2020 2569-2580

Liu, Y., see Song, J., JSYST March 2020 900-908

Liu, Y., see Zhi, T., JSYST June 2020 1776-1787

Liu, Y., Chen, H., Wang, L., and Meng, W., Artificial Noisy MIMO Systems Under Correlated Scattering Rayleigh Fading—A Physical Layer Security Approach; JSYST June 2020 2121-2132

Liu, Y., Pan, C., You, L., and Han, W., D2D-Enabled User Cooperation in Massive MIMO; JSYST Sept. 2020 4406-4417

Liu, Z., Xie, Y., Yuan, Y., Ma, K., Chan, K.Y., and Guan, X., Robust Power Control for Clustering-Based Vehicle-to-Vehicle Communication; JSYST June 2020 2557-2568

Liu, Z., see Li, J., JSYST Sept. 2020 3082-3092

Lloret, J., see Kumar, V., JSYST March 2020 28-38

Lloret, J., see Khasawneh, A.M., JSYST Dec. 2020 4735-4745

Lloret, J., see Kumar, S., JSYST Dec. 2020 4663-4673

Logenthiran, T., see Quek, Y.T., JSYST March 2020 1395-1404

Lopez, L., see Chen, Y., JSYST June 2020 2066-2077

Lotfifard, S., see Rostami, M., JSYST March 2020 1088-1097

Louati, J., see Siala, H., JSYST Sept. 2020 3977-3986

Lu, H., see Islam, M.R., JSYST Sept. 2020 3676-3686

Lu, H., Xie, X., Shi, Z., and Yang, H., Fairness Enhancement for Opportunistic Interference Alignment Algorithm With Low Latency Communications; JSYST Dec. 2020 5002-5013

Lu, J., Wang, G., and Torngren, M., Design Ontology in a Case Study for Cosimulation in a Model-Based Systems Engineering Tool-Chain; JSYST March 2020 1297-1308

Lu, J., see Tao, X., JSYST Sept. 2020 3256-3266

Lu, W., see Zhang, H., JSYST June 2020 2569-2580

Lu, W., Liu, M., and Liu, Q., Increment-Exchange-Based Decentralized Multiobjective Optimal Power Flow for Active Distribution Grids; JSYST Sept. 2020 3695-3704

Lu, X., see Zhou, R., JSYST Dec. 2020 4919-4930

Lucic, M.C., Ghazzai, H., and Massoud, Y., A Generalized Dynamic Planning Framework for Green UAV-Assisted Intelligent Transportation System Infrastructure; JSYST Dec. 2020 4786-4797

Lun, Y., Yao, P., and Wang, Y., Trajectory Optimization of SUAV for Marine Vessels Communication Relay Mission; JSYST Dec. 2020 5014-5024

Luo, H., see Wei, H., JSYST March 2020 61-72

Luo, H., see Liu, T., JSYST June 2020 1830-1839

Luo, J., see Dai, C., JSYST Dec. 2020 5025-5036

Luo, L., see Xia, J., JSYST Sept. 2020 4296-4307

Luo, S., Xing, H., and Li, K., Near-Optimal Multicast Tree Construction in Leaf-Spine Data Center Networks; *JSYST June 2020 2581-2584*

Luo, X., Li, X., Li, X., Yan, J., and Guan, X., Globally Stable Formation Control of Nonholonomic Multiagent Systems With Bearing-Only Measurement; JSYST June 2020 2901-2912

Luo, X., see Wang, X., JSYST Sept. 2020 4454-4465

Luo, Y., see Li, P., JSYST June 2020 2042-2053

Lupangu, C., Justo, J.J., and Bansal, R.C., Model Predictive for Reactive Power Scheduling Control Strategy for PV-Battery Hybrid System in Competitive Energy Market; JSYST Sept. 2020 4071-4078

Lyras, N.K., Efrem, C.N., Kourogiorgas, C.I., Panagopoulos, A.D., and Arapoglou, P., Optimizing the Ground Network of Optical MEO Satellite Communication Systems; JSYST Sept. 2020 3968-3976

Lyu, Z., Wei, Z., Wang, X., Fan, Y., Xia, C., and Shi, L., A Periodic Multinode Charging and Data Collection Scheme With Optimal Traveling Path in WRSNs; JSYST Sept. 2020 3518-3529

Lyu, Z., Wei, H., Bai, X., and Lian, C., Microservice-Based Architecture for an Energy Management System; *JSYST Dec.* 2020 5061-5072

M

Ma, C., Wang, B., Jooste, K., Zhang, Z., and Ping, Y., Practical Privacy-Preserving Frequent Itemset Mining on Supermarket Transactions; JSYST June 2020 1992-2002

Ma, K., see Liu, Z., JSYST June 2020 2557-2568

Ma, R., Basumallik, S., and Eftekharnejad, S., A PMU-Based Data-Driven Approach for Classifying Power System Events Considering Cyberattacks; JSYST Sept. 2020 3558-3569

Ma, Y., see Li, P., JSYST June 2020 2042-2053

Ma, Z., Huo, Q., Yang, X., and Zhao, X., Safety Cruise Control of Connected Vehicles Using Radar and Vehicle-to-Vehicle Communication; JSYST Sept. 2020 4602-4613

Mabrouk, A., Shafie, A.E., Tourki, K., Al-Dhahir, N., and Hamdi, N., Securing Untrusted Full-Duplex Relay Channels in the Presence of Multiple External Cluster-Based Eavesdroppers; *JSYST March* 2020 665-668

Maciejowski, J.M., see Sun, L., JSYST June 2020 2801-2812

MacKenzie, A.B., see Gomez, M.M., JSYST March 2020 489-499

Mackey, A., Spachos, P., and Plataniotis, K.N., Smart Parking System Based on Bluetooth Low Energy Beacons With Particle Filtering; JSYST Sept. 2020 3371,3382

Mady, A.E., see Vuppala, S., JSYST June 2020 1810-1819

Maggiore, P., see Garzaniti, N., JSYST Sept. 2020 4382-4393

Mahdavi, M., see Jafari, R., JSYST June 2020 2109-2120

Mahdawi, L., see Salameh, H.A.B., JSYST March 2020 84-92

Mahmoud, K., Hussein, M.M., Abdel-Nasser, M., and Lehtonen, M., Optimal Voltage Control in Distribution Systems With Intermittent PV Using Multiobjective Grey-Wolf-Lévy Optimizer; JSYST March 2020 760-770

Mahmud, K., Sahoo, A.K., Fernandez, E., Sanjeevikumar, P., and Holm-Nielsen, J.B., Computational Tools for Modeling and Analysis of Power Generation and Transmission Systems of the Smart Grid; JSYST Sept. 2020 3641-3652

Mahzarnia, M., Moghaddam, M.P., Baboli, P.T., and Siano, P., A Review of the Measures to Enhance Power Systems Resilience; JSYST Sept. 2020 4059-4070

Mai, Z., see Xiong, H., JSYST Sept. 2020 3744-3754

Maier, M.W., and Wendoloski, E.B., Value Uncertainty Analysis in Architecture and Trade Studies; JSYST Dec. 2020 5417-5428

Maity, I., see Mondal, A., JSYST March 2020 124-131

Maity, S.P., see Paul, A., JSYST Sept. 2020 3791-3800

Makwana, Y.M., Bhalja, B.R., and Gokaraju, R., Improvement in Recloser– Fuse Coordination Technique Based on Modification Factor; JSYST June 2020 2770-2779

Malisa, R., Schwella, E., and Batinge, B., Augmenting Water Supplies Through Urban Wastewater Recycling (March 2019); *JSYST March 2020 1523-1530*

Malisovas, A., and Koutroulis, E., Design Optimization of RES-Based Desalination Systems Cooperating With Smart Grids; JSYST Dec. 2020 4706-4717

Mallikarjuna, B., see Pal, D., JSYST March 2020 862-869

Mammo, W., see Chvojka, P., JSYST June 2020 2544-2550

Mancarella, P., see Zhou, Y., JSYST March 2020 749-759

Mancarella, P., see Espinoza, S., JSYST June 2020 2837-2848

Manohar, M., Koley, E., and Ghosh, S., Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV–Wind System With Immunity Against Solar Irradiance and Wind Speed; *JSYST Sept. 2020 3430-3439*

Manoharan, S.H., see Chiu, W., JSYST June 2020 1580-1591

Manshadi, S.D., Liu, G., Khodayar, M.E., Wang, J., and Dai, R., A Distributed Convex Relaxation Approach to Solve the Power Flow Problem; JSYST March 2020 803-812

Mao, F., see He, Q., JSYST June 2020 1874-1885

Mao, Y., see Chen, X., JSYST Sept. 2020 3117-3128

Marin, A., see Carrizosa, E., JSYST Sept. 2020 3916-3925

Marin, M., see Olauson, J., JSYST Sept. 2020 3687-3694

Martin, J., see Dori, D., JSYST June 2020 1538-1548

Martinez-Ortega, J., see Chen, Y., JSYST June 2020 2066-2077

Marzband, M., see Mirzaei, M.A., JSYST Sept. 2020 3598-3608

Marzooghi, H., see Paidi, E.S.N.R., JSYST Dec. 2020 4978-4989

Mascherona, R., see Di Maio, F., JSYST March 2020 1333-1340

Masoudi, M., Lisi, S.S., and Cavdar, C., Cost-Effective Migration Toward Virtualized C-RAN With Scalable Fronthaul Design; JSYST Dec. 2020 5100-5110

Massoud, Y., see Lucic, M.C., JSYST Dec. 2020 4786-4797

Mathew, A., Roy, A., and Mathew, J., Intelligent Residential Energy Management System Using Deep Reinforcement Learning; JSYST Dec. 2020 5362-5372

Mathew, J., see Li, P., JSYST June 2020 2042-2053

Mathew, J., see Mathew, A., JSYST Dec. 2020 5362-5372

Mayfield, M., see Punzo, G., JSYST Sept. 2020 3865-3874

Mazloum, J., see Saber, M.J., JSYST Sept. 2020 4402-4405

McClure, S.C., see Dong, G., JSYST Sept. 2020 3653-3664

McDonald, R.T., Condino, M., Neumann, M.A., and Kitts, C.A., Navigation of Scalar Fronts With Multirobot Clusters in Simulation and Experiment; JSYST Sept. 2020 3755-3766

McKinney, D., see Dori, D., JSYST June 2020 1538-1548

Meena, N.K., see Singh, P., JSYST March 2020 880-888

Meghwani, A., Gokaraju, R., Srivastava, S.C., and Chakrabarti, S., Local Measurements-Based Backup Protection for DC Microgrids Using Sequential Analyzing Technique; JSYST March 2020 1159-1170

Mei, Q., see Xiong, H., JSYST March 2020 310-320

Meluso, J., Austin-Breneman, J., and Shaw, L., An Agent-Based Model of Miscommunication in Complex System Engineering Organizations; JSYST Sept. 2020 3463-3474

Men, J., see Jiang, P., JSYST Sept. 2020 4344-4355

Meng, W., see Liu, Y., JSYST June 2020 2121-2132

Meng, Z., Wu, Z., and Gray, J., Architecting Ubiquitous Communication and Collaborative-Automation-Based Machine Network Systems for Flexible Manufacturing; JSYST March 2020 113-123

Mesleh, R., see Hiari, O., JSYST March 2020 1435-1446

Mhenni, F., see Baklouti, A., JSYST March 2020 1512-1522

Mhenni, F., see Siala, H., JSYST Sept. 2020 3977-3986

Mi, Z., see Xie, Y., JSYST March 2020 1245-1256

Miao, F., see Huang, J., JSYST March 2020 375-386

Mikkili, S., see Pendem, S.R., JSYST March 2020 1046-1057

Min, M., see Jung, B., JSYST June 2020 1852-1861

Minotto, A., see Chvojka, P., JSYST June 2020 2544-2550

Mirsarraf, M.R., see Goudarzi, P., JSYST March 2020 927-938

Mirzaei, M.A., Nazari-Heris, M., Mohammadi-Ivatloo, B., Zare, K., Marzband, M., and Anvari-Moghaddam, A., A Novel Hybrid Framework for Co-Optimization of Power and Natural Gas Networks Integrated With Emerging Technologies; JSYST Sept. 2020 3598-3608

Mishra, D.P., see Muduli, L., JSYST June 2020 3039-3046

Mishra, M.K., see Pawar, P., JSYST June 2020 2269-2280

Mishra, S., see Sharma, D., JSYST March 2020 782-792

Mishra, S., see Firdaus, A., JSYST March 2020 1024-1033

Misra, S., see Roy, A., JSYST March 2020 9-16

Misra, S., Roy, S.K., Roy, A., Obaidat, M.S., and Jha, A., MEGAN: Multipurpose Energy-Efficient, Adaptable, and Low-Cost Wireless Sensor Node for the Internet of Things; *JSYST March 2020 144-151*

Misra, S., see Mondal, A., JSYST March 2020 124-131

Misra, S., see Mukherjee, A., JSYST March 2020 1325-1332

Misra, S., see Kumar, S., JSYST Sept. 2020 3194-3201

Mitra, B., Chowdhury, B., and Willis, A., Protection Coordination for Assembly HVDC Breakers for HVDC Multiterminal Grids Using Wavelet Transform; JSYST March 2020 1069-1079

Mitschke, A., see Bachelor, G., JSYST June 2020 1568-1579

Mlika, A., see Baklouti, A., JSYST March 2020 1512-1522

Mlika, Z., see Chaieb, C., JSYST Sept. 2020 3957-3967

Moghaddam, M.J.H., Kalam, A., Shi, J., Nowdeh, S.A., Gandoman, F.H., and Ahmadi, A., A New Model for Reconfiguration and Distributed Generation Allocation in Distribution Network Considering Power Quality Indices and Network Losses; JSYST Sept. 2020 3530-3538

Moghaddam, M.P., see Mahzarnia, M., JSYST Sept. 2020 4059-4070

Mohaisen, A., see Saad, M., JSYST March 2020 321-332

Mohamed, M., see El-Taweel, N.A., JSYST March 2020 738-748

Mohammadi, Z., Soleimanpour-Moghadam, M., Askarizadeh, M., and Talebi, S., Increasing the Lifetime of Underwater Acoustic Sensor Networks: Difference Convex Approach; JSYST Sept. 2020 3214-3224

Mohammadi-ivatloo, B., see Moradi-Dalvand, M., JSYST June 2020 2873-

Mohammadi-Ivatloo, B., see Mirzaei, M.A., JSYST Sept. 2020 3598-3608

Mohammadi-Ivatloo, B., see Hemmati, M., JSYST Dec. 2020 5340-5349

Mohammadi-Moghadam, H., see Gheisarnejad, M., JSYST March 2020 1058-1068

Mohammed, O.O., Mustafa, M.W., and Aman, M.N., A Graph-Theoretic Approach to Capacity Benefit Margin Calculation for Large Multiarea Power Systems; *JSYST March 2020 1230-1233*

Mohanta, D.K., see Pal, D., JSYST March 2020 862-869

Mohanty, S.R., see Prakash, T., JSYST June 2020 2012-2022

Mohanty, S.R., see Prakash, T., JSYST Sept. 2020 3267-3276

Mohseni, R., see Karimi, V., JSYST Sept. 2020 3630-3640

Mokryani, G., see Zubo, R.H.A., JSYST March 2020 1405-1416

Mondal, A., see Roy, A., JSYST March 2020 9-16

Mondal, A., Misra, S., and Maity, I., AMOPE: Performance Analysis of Open-Flow Systems in Software-Defined Networks; JSYST March 2020 124-131

Moradi-Dalvand, M., Nazari-Heris, M., Mohammadi-ivatloo, B., Galavani, S., and Rabiee, A., A Two-Stage Mathematical Programming Approach for the Solution of Combined Heat and Power Economic Dispatch; JSYST June 2020 2873-2881

Mosalanezhad, R., see Zarei, A., JSYST June 2020 2813-2824

Mosavi, M.R., see Kaveh, M., JSYST Sept. 2020 4535-4544

Mostafavi, A., see Fan, C., JSYST March 2020 1265-1276

Motai, Y., see Benli, E., JSYST June 2020 2937-2948

Mousavi, Y., see Zarei, A., JSYST June 2020 2813-2824

Moutsinas, G., and Guo, W., Probabilistic Stability of Traffic Load Balancing on Wireless Complex Networks; *JSYST June 2020 2551-2556*

Mozelli, L.A., see Leles, M.C.R., JSYST March 2020 1468-1478

Mu, Y., see Zhang, L., JSYST March 2020 387-397

Muduli, L., Mishra, D.P., and Jana, P.K., Optimized Fuzzy Logic-Based Fire Monitoring in Underground Coal Mines: Binary Particle Swarm Optimization Approach; JSYST June 2020 3039-3046

Muhlmeyer, M., Agarwal, S., and Huang, J., Modeling Social Contagion and Information Diffusion in Complex Socio-Technical Systems; JSYST Dec. 2020 5187-5198 Mukherjee, A., Deb, P., De, D., and Obaidat, M.S., WmA-MiFN: A Weighted Majority and Auction Game Based Green Ultra-Dense Micro-Femtocell Network System; JSYST March 2020 353-362

Mukherjee, A., Misra, S., and Atrish, A., MiND: Mind Networked Device Architecture for Attention-Gated Ambient Assisted Living Systems; JSYST March 2020 1325-1332

Mukherjee, M., see Kumar, V., JSYST March 2020 28-38

Mukherjee, N., Chattopadhyaya, A., Chattopadhyay, S., and Sengupta, S., Discrete-Wavelet-Transform and Stockwell-Transform-Based Statistical Parameters Estimation for Fault Analysis in Grid-Connected Wind Power System; JSYST Sept. 2020 4320-4328

Mukherjee, R., and De, A., Development of an Ensemble Decision Tree-Based Power System Dynamic Security State Predictor; JSYST Sept. 2020 3836-3843

Mundhe, P., Yadav, V.K., Verma, S., and Venkatesan, S., Efficient Lattice-Based Ring Signature for Message Authentication in VANETs; JSYST Dec. 2020 5463-5474

Murphy, J., see Chen, X., JSYST Sept. 2020 3117-3128

Murto, P., see Chvojka, P., JSYST June 2020 2544-2550

Musa, A., see Salameh, H.A.B., JSYST March 2020 84-92

Mustafa, M.W., see Mohammed, O.O., JSYST March 2020 1230-1233

Muta, O., see Hao, W., JSYST March 2020 673-676

Muyeen, S.M., see Khalid, H.M., JSYST June 2020 2054-2065

Mylrea, M., see Gourisetti, S.N.G., JSYST June 2020 1897-1908

N

N, C.B., see Chavhan, S., JSYST Dec. 2020 5233-5244

N. Givigi, S., see Lins, R.G., JSYST June 2020 2961-2964

Na, C., see Pan, H., JSYST Sept. 2020 3938-3948

Naderi, M.S., see Abedinia, O., JSYST Sept. 2020 4614-4625

Naeem, M., see Akram, T., JSYST Sept. 2020 3475-3482

Naeem, W., see Chen, L., JSYST Sept. 2020 3301-3312

Nahavandi, S., see Qazani, M.R.C., JSYST Dec. 2020 5073-5083

Nair, S., see Horne, D., JSYST March 2020 298-309

Namer, M., see Gong, T., JSYST Dec. 2020 5296-5307

Nan, Y., Yi, G., Wang, C., and Tu, Z., A Novel Effectiveness Evaluation Method Based on Simultaneous Probabilistic Finite-State Machines; JSYST June 2020 1611-1622

Naqvi, R., see Akram, T., JSYST Sept. 2020 3475-3482

Nascimento, C.L., see Leles, M.C.R., JSYST March 2020 1468-1478

Nazari-Heris, M., see Moradi-Dalvand, M., JSYST June 2020 2873-2881

Nazari-Heris, M., see Mirzaei, M.A., JSYST Sept. 2020 3598-3608

Ndiaye, M., Abu-Mahfouz, A.M., and Hancke, G.P., SDNMM—A Generic SDN-Based Modular Management System for Wireless Sensor Networks; JSYST June 2020 2347-2357

Neill, C.J., see Srinivasan, S.M., JSYST March 2020 1353-1364

Nelson, T., Borky, J.M., and Sega, R.M., System-of-Systems Quality Attribute-Based Architectural Alternatives; *JSYST Sept. 2020 3844-3854*

Nemati, H., Latify, M.A., and Yousefi, G.R., Optimal Coordinated Expansion Planning of Transmission and Electrical Energy Storage Systems Under Physical Intentional Attacks; *JSYST March 2020 793-802*

Nesi, P., see Bellini, E., JSYST March 2020 1234-1244

Neumann, M.A., see McDonald, R.T., JSYST Sept. 2020 3755-3766

Nguyen, B.C., see Van Nguyen, L., JSYST Dec. 2020 4777-4785

Nguyen, H.X., see Ali, K., JSYST June 2020 2882-2891

Nguyen, M., see Hong, Y., JSYST June 2020 2759-2769

Nguyen, N., see Baklouti, A., JSYST March 2020 1512-1522

Ni, W., see Suraweera, N., JSYST Dec. 2020 4798-4809

Nie, H., see Khani, H., JSYST June 2020 2311-2322

Nie, X., see Sun, J., JSYST June 2020 1728-1739

Nikita, K.S., see Adamidi, E.S., JSYST March 2020 1384-1394

Niknam, T., see Javidsharifi, M., JSYST June 2020 2703-2712

Nikolovski, S., see Petrovic, I., JSYST June 2020 2665-2675

Ning, B., see Deng, L., JSYST Sept. 2020 4242-4251

Nirmalathas, A., see Jurado-Lasso, F.F., JSYST June 2020 2335-2346

Nirmalathas, A., see Jurado-Lasso, F.F., JSYST Dec. 2020 4653-4662

Niu, H., see Yan, Y., JSYST Sept. 2020 3233-3244

Niyato, D., see Wang, X., JSYST Sept. 2020 4356-4367

Noguchi, H., and Sugano, S., Ephemeral-Cyber-Physical System: A Cloud-Like CPS Using Shared Devices in Open IoT; *JSYST Dec. 2020 5176-5186*

Nojavan, M., and Seyedi, H., Voltage Stability Constrained OPF in Multi-Micro-Grid Considering Demand Response Programs; JSYST Dec. 2020 5221-5228

Nourbakhsh, G., see Shafiei, M., JSYST Dec. 2020 5265-5273

Nouri, A., see Pouladi, A., JSYST March 2020 960-970

Nouri, A., Soroudi, A., and Keane, A., Fast Resource Scheduling for Distribution Systems Enabled With Discrete Control Devices; *JSYST Sept.* 2020 3767-3778

Nowdeh, S.A., see Moghaddam, M.J.H., JSYST Sept. 2020 3530-3538

Ntontin, K., and Verikoukis, C., Relay-Aided Outdoor-to-Indoor Communication in Millimeter-Wave Cellular Networks; *JSYST June 2020 2473-2484*

Nuesch, S.P., see Colletti, R.A., JSYST Sept. 2020 4165-4175

Nyang, D., see Saad, M., JSYST March 2020 321-332

0

Obaidat, M.S., see Roy, A., JSYST March 2020 9-16

Obaidat, M.S., see Xie, Y., JSYST March 2020 1245-1256

Obaidat, M.S., see Li, X., JSYST March 2020 39-50

Obaidat, M.S., see Misra, S., JSYST March 2020 144-151

Obaidat, M.S., see Mukherjee, A., JSYST March 2020 353-362

Obaidat, M.S., see Kaur, K., JSYST March 2020 1195-1205

Obaidat, M.S., see Wei, H., JSYST March 2020 61-72

Obaidat, M.S., see Sowjanya, K., JSYST June 2020 2154-2163

Obaidat, M.S., see Verma, G.K., JSYST June 2020 1704-1715

Obaidat, M.S., see Li, X., JSYST Sept. 2020 3547-3557

Oikonomou, K., and Parvania, M., Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets; *JSYST Sept.* 2020 3729-3739

Olamaei, J., see Rostami, A., JSYST March 2020 813-823

Olauson, J., Marin, M., and Soder, L., Creating Power System Network Layouts: A Fast Parallel Algorithm; JSYST Sept. 2020 3687-3694

Onireti, O., Zhang, L., Imran, A., and Imran, M.A., Outage Probability in the Uplink of Multitier Millimeter Wave Cellular Networks; JSYST June 2020 2520-2531

Ornelas-Tellez, F., see Djilali, L., JSYST June 2020 2825-2836

Osama, R.A., Zobaa, A.F., and Abdelaziz, A.Y., A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids; JSYST March 2020 916-926

Othman, A.M., see Gabbar, H.A., JSYST March 2020 824-831

Othman, M.M., Ahmed, M.H., and Salama, M.M.A., A Coordinated Real-Time Voltage Control Approach for Increasing the Penetration of Distributed Generation; *JSYST March* 2020 699-707

Ou, G., see Sang, Y., JSYST Sept. 2020 3245-3255

Ouyang, J., see Chen, P., JSYST Sept. 2020 3801-3812

P

Pacheco, M.A.C., see Pereira, C.S., JSYST Sept. 2020 3926-3937

Pack, S., see Bilal, M., JSYST June 2020 1921-1932

Padhy, N.P., see Gururaj, M.V., JSYST Dec. 2020 4891-4900

Padidar, P., Ho, P., and Peng, L., End-to-End Distortion Analysis of Nonorthogonal Layered Coding Over Relay-Assisted Networks; JSYST Sept. 2020 4466-4476

Padmanaban, S., see Priyadarshi, N., JSYST March 2020 1218-1229

Padmanaban, S., see Priyadarshi, N., JSYST Sept. 2020 3334-3342

Paidi, E.S.N.R., Marzooghi, H., Yu, J., and Terzija, V., Development and Validation of Artificial Neural Network-Based Tools for Forecasting of Power System Inertia With Wind Farms Penetration; JSYST Dec. 2020 4978-4989

Pal, D., Mallikarjuna, B., Gopakumar, P., Reddy, M.J.B., Panigrahi, B.K., and Mohanta, D.K., Probabilistic Study of Undervoltage Load Shedding Scheme to Mitigate the Impact of Protection System Hidden Failures; JSYST March 2020 862-869 Palisetty, R., and Ray, K.C., Multiuser Variable Rate GO-OFDMA Architecture and Its FPGA Prototype; JSYST June 2020 2455-2463

Pamshetti, V.B., Singh, S., and Singh, S.P., Combined Impact of Network Reconfiguration and Volt-VAR Control Devices on Energy Savings in the Presence of Distributed Generation; JSYST March 2020 995-1006

Pan, C., see Liu, Y., JSYST Sept. 2020 4406-4417

Pan, H., Lian, H., Na, C., and Li, X., Modeling and Vulnerability Analysis of Cyber-Physical Power Systems Based on Community Theory; JSYST Sept. 2020 3938-3948

Pan, X., see Wang, X., JSYST Sept. 2020 4454-4465

Panagopoulos, A.D., see Lyras, N.K., JSYST Sept. 2020 3968-3976

Panchal, J.H., see Safarkhani, S., JSYST Sept. 2020 3277-3288

Panda, G., see Kumar, V.N., JSYST Sept. 2020 4308-4319

Pandey, A., Sequeria, R., Kumar, P., and Kumar, S., A Multistage Deep Residual Network for Biomedical Cyber-Physical Systems; JSYST June 2020 1953-1962

Pang, L., Cao, Z., Yu, J., Guan, P., Chen, X., and Zhang, W., A Robust Visual Person-Following Approach for Mobile Robots in Disturbing Environments; JSYST June 2020 2965-2968

Panigrahi, B.K., see Pal, D., JSYST March 2020 862-869

Panigrahi, B.K., see Khanna, K., JSYST June 2020 1945-1952

Panteli, M., see Zhou, Y., JSYST March 2020 749-759

Panteli, M., see Espinoza, S., JSYST June 2020 2837-2848

Paredis, C.J.J., see Colletti, R.A., JSYST Sept. 2020 4165-4175

Paredis, C.J.J., see Fillingim, K.B., JSYST Dec. 2020 5148-5159

Park, L.H., Yu, J., Kang, H., Lee, T., and Kwon, T., Birds of a Feature: Intrafamily Clustering for Version Identification of Packed Malware; JSYST Sept. 2020 4545-4556

Park, S., see Yang, T., JSYST June 2020 3057-3060

Parvania, M., see Senemar, S., JSYST March 2020 832-841

Parvania, M., see Khatami, R., JSYST Sept. 2020 3855-3864

Parvania, M., see Oikonomou, K., JSYST Sept. 2020 3729-3739

Parvizimosaed, M., and Zhuang, W., Enhanced Active and Reactive Power Sharing in Islanded Microgrids; JSYST Dec. 2020 5037-5048

Patangia, H., see Gourisetti, S.N.G., JSYST June 2020 1897-1908

Paul, A., Banerjee, A., and Maity, S.P., Residual Energy Maximization in Cognitive Radio Networks With Q-Routing; JSYST Sept. 2020 3791-3800

Pawar, P., Trivedi, A., and Mishra, M.K., Outage and ASE Analyses for Power Controlled D2D Communication; JSYST June 2020 2269-2280

Pazoki, M., see Chaitanya, B.K., JSYST March 2020 870-879

Pecci, F., see Ulusoy, A., JSYST Sept. 2020 4579-4590

Pei, Q., see Ju, Y., JSYST Dec. 2020 5121-5132

Pei, T., see Zhan, Y., JSYST March 2020 592-602

Pelegrin, M., see Carrizosa, E., JSYST Sept. 2020 3916-3925

Pendem, S.R., Mikkili, S., and Bonthagorla, P.K., PV Distributed-MPP Tracking: Total-Cross-Tied Configuration of String-Integrated-Converters to Extract the Maximum Power Under Various PSCs; JSYST March 2020 1046-1057

Peng, J., see Li, X., JSYST March 2020 39-50

Peng, J.C., see Khalid, H.M., JSYST June 2020 2054-2065

Peng, J.C., see Khalid, H.M., JSYST Sept. 2020 3665-3675

Peng, L., see Padidar, P., JSYST Sept. 2020 4466-4476

Peng, M., see Gao, X., JSYST Sept. 2020 4626-4637

Pereira, C.S., Dias, D.M., Pacheco, M.A.C., Vellasco, M.M.B.R., Abs da Cruz, A.V., and Hollmann, E.H., Quantum-Inspired Genetic Programming Algorithm for the Crude Oil Scheduling of a Real-World Refinery; JSYST Sept. 2020 3926-3937

Pessin, G., see da Silva, J.M., JSYST March 2020 1183-1194

Petrovic, I., Nikolovski, S., Baghaee, H.R., and Glavas, H., Determining Impact of Lightning Strike Location on Failures in Transmission Network Elements Using Fuzzy Decision-Making; JSYST June 2020 2665-2675

Peyghami, S., Fotuhi-Firuzabad, M., and Blaabjerg, F., Reliability Evaluation in Microgrids With Non-Exponential Failure Rates of Power Units; JSYST June 2020 2861-2872

Phung, M.D., see Hoang, V.T., JSYST June 2020 2925-2936

Pietrabissa, A., see Liberati, F., JSYST Sept. 2020 3586-3597

Ping, Y., see Ma, C., JSYST June 2020 1992-2002

Pino, F., see Gabbar, H.A., JSYST March 2020 824-831

Piran, M.J., see Saber, M.J., JSYST Sept. 2020 4402-4405

Pitchaimuthu, R., see Ramachandran, V., JSYST March 2020 708-717

Pitsillides, A., see Ioannou, I., JSYST Sept. 2020 4232-4241

Plataniotis, K.N., see Spachos, P., JSYST Sept. 2020 3483-3493

Plataniotis, K.N., see Mackey, A., JSYST Sept. 2020 3371-3382

Poor, H.V., see Camponogara, A., JSYST Dec. 2020 4901-4910

Poudel, S., Dubey, A., and Bose, A., Risk-Based Probabilistic Quantification of Power Distribution System Operational Resilience; JSYST Sept. 2020 3506-3517

Pouladi, A., Zadeh, A.K., and Nouri, A., Control of Parallel ULTC Transformers in Active Distribution Systems; JSYST March 2020 960-970

Poulos, A., see Espinoza, S., JSYST June 2020 2837-2848

Pourahmadi, F., Heidarabadi, H., Hosseini, S.H., and Dehghanian, P., Dynamic Uncertainty Set Characterization for Bulk Power Grid Flexibility Assessment; JSYST March 2020 718-728

Pouresmaeil, E., see Rostami, A., JSYST March 2020 813-823

Povinelli, K., see Das, P., JSYST Dec. 2020 4842-4853

Prakash, T., Singh, V.P., and Mohanty, S.R., Cyber-Attack Resilient Design of Wide-Area PSS Considering Practical Communication Constraints; JSYST June 2020 2012-2022

Prakash, T., Mohanty, S.R., and Singh, V.P., PMU-Assisted Zone-3 Protection Scheme for PV Integrated Power Systems Immune to Interharmonics; JSYST Sept. 2020 3267-3276

Prasad, R.V., see Joshi, K.C., JSYST June 2020 2144-2153

Prasanna, A.L., Kumar, V., and Dhok, S.B., Cooperative Communication and Energy-Harvesting-Enabled Energy-Efficient Design of MI-Based Clustered Nonconventional WSNs; JSYST June 2020 2293-2302

Priyadarshi, N., Padmanaban, S., Holm-Nielsen, J.B., Blaabjerg, F., and Bhaskar, M.S., An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance; JSYST March 2020 1218-1229

Priyadarshi, N., Padmanaban, S., Bhaskar, M.S., Blaabjerg, F., Holm-Nielsen, J.B., Azam, F., and Sharma, A.K., A Hybrid Photovoltaic-Fuel Cell-Based Single-Stage Grid Integration With Lyapunov Control Scheme; *JSYST Sept.* 2020 3334-3342

Pu, C., see Jung, B., JSYST June 2020 1852-1861

Punzo, G., Tewari, A., Butans, E., Vasile, M., Purvis, A., Mayfield, M., and Varga, L., Engineering Resilient Complex Systems: The Necessary Shift Toward Complexity Science; JSYST Sept. 2020 3865-3874

Purvis, A., see Punzo, G., JSYST Sept. 2020 3865-3874

Q

Qamar, A., see Colletti, R.A., JSYST Sept. 2020 4165-4175

Qazani, M.R.C., Asadi, H., and Nahavandi, S., High-Fidelity Hexarot Simulation-Based Motion Platform Using Fuzzy Incremental Controller and Model Predictive Control-Based Motion Cueing Algorithm; JSYST Dec. 2020 5073-5083

Qi, Q., see Zhuang, Z., JSYST June 2020 1658-1669

Qin, J., see Hu, D., JSYST June 2020 2949-2960

Qin, J., see Lai, X., JSYST Sept. 2020 3410-3413

Qiu, Y., see Wang, J., JSYST Sept. 2020 4176-4187

Qu, H., Xu, X., Zhao, J., Yan, F., and Wang, W., A Robust Hyperbolic Tangent-Based Energy Detector With Gaussian and Non-Gaussian Noise Environments in Cognitive Radio System; JSYST Sept. 2020 3161-3172

Qu, Q., see Zhan, Y., JSYST March 2020 592-602

Quan, W., see Wang, K., JSYST June 2020 1862-1873

Quek, Y.T., Woo, W.L., and Logenthiran, T., Load Disaggregation Using One-Directional Convolutional Stacked Long Short-Term Memory Recurrent Neural Network; JSYST March 2020 1395-1404

Qureshi, K.I., Wang, L., Sun, L., Zhu, C., and Shu, L., A Review on Design and Implementation of Software-Defined WLANs; JSYST June 2020 2601-2614

R

Rabiee, A., see Moradi-Dalvand, M., JSYST June 2020 2873-2881

Rabiee, H.R., see Doostmohammadian, M., JSYST March 2020 73-83

Rafat, Y., see Shariff, S.M., JSYST June 2020 2748-2758

Rahman, Z., Zafaruddin, S.M., and Chaubey, V.K., Performance of Opportunistic Receiver Beam Selection in Multiaperture OWC Systems Over Foggy Channels; JSYST Sept. 2020 4036-4046

Rahnamay-Naeini, M., see Das, P., JSYST Dec. 2020 4842-4853

Rai, M.K., see Kumar, G., JSYST Sept. 2020 3949-3956

Rajabalizadeh, S., and Tafreshi, S.M.M., A Practicable Copula-Based Approach for Power Forecasting of Small-Scale Photovoltaic Systems; JSYST Dec. 2020 4911-4918

Rajamanickam, S., Vollala, S., Amin, R., and Ramasubramanian, N., Insider Attack Protection: Lightweight Password-Based Authentication Techniques Using ECC; JSYST June 2020 1972-1983

Ramachandran, V., Pitchaimuthu, R., and Selvan, M.P., Systematized Active Power Control of PMSG-Based Wind-Driven Generators; JSYST March 2020 708-717

Ramasubramanian, N., see Rajamanickam, S., JSYST June 2020 1972-1983

Ramirez-Marquez, J.E., see Zavala, A., JSYST Dec. 2020 5049-5060

Ranjbar, A.M., see Hosseini, S.A., JSYST March 2020 1125-1134

Ranjbar, A.M., see Toulabi, M., JSYST June 2020 2615-2623

Rao, J.T., and Bhalja, B., A New Phase Angle of Superimposed Positive Sequence Current-Based Discrimination Scheme for Prevention of Maloperation of Distance Relay During Severe Stressed Conditions; JSYST Sept. 2020 3705-3716

Rao, S., see Chaturvedi, K., JSYST June 2020 1682-1691

Rastegar, M., see Senemar, S., JSYST March 2020 832-841

Rathee, M., see Kumar, S., JSYST Dec. 2020 4663-4673

Rauf, B., see Bangash, Y.A., JSYST Sept. 2020 4489-4499

Raut, P., Kaple, T., and Sharma, P.K., Outage and Average Rate Performances of Full-Duplex Multiuser AF Relay Systems With Time-Selective Fading; JSYST Sept. 2020 3390-3398

Ray, K.C., see Palisetty, R., JSYST June 2020 2455-2463

Ray, S., see Sowjanya, K., JSYST June 2020 2154-2163

Raza, M., see Ali, K., JSYST June 2020 2882-2891

Raza, S.M., see Challa, R., JSYST March 2020 657-660

Reddy, M.J.B., see Pal, D., JSYST March 2020 862-869

Rehioui, H., and Idrissi, A., New Clustering Algorithms for Twitter Sentiment Analysis; JSYST March 2020 530-537

Rehman, S.u., see Liu, M., JSYST March 2020 582-591

Ren, G., see Zhao, B., JSYST Sept. 2020 4089-4100

Repetto, M., see Gabbar, H.A., JSYST March 2020 824-831

Requena-Carrion, J., see Yang, J., JSYST March 2020 172-183

Retiere, N., Ha, D.T., and Caputo, J., Spectral Graph Analysis of the Geometry of Power Flows in Transmission Networks; *JSYST June 2020 2736-2747*

Rezaee, H., and Abdollahi, F., Secure Consensus Control of Multiagent Cyber-Physical Systems With Uncertain Nonlinear Models; JSYST Sept. 2020 3539-3546

Ribeiro, M.V., see De M. B. A. Dib, L., JSYST June 2020 2164-2174

Ribeiro, M.V., see Camponogara, A., JSYST Dec. 2020 4901-4910

Ribeiro, M.V., see Colen, G.R., JSYST Dec. 2020 5284-5295

Richardson, R.A., see Zhai, X., JSYST June 2020 1592-1601

Rivera, J., see Saleem, D., JSYST March 2020 17-27

Roddy, S.A., see Hartong, M.W., JSYST Dec. 2020 5308-5319

Rodrigues, J.J.P.C., see Teles, G., JSYST Sept. 2020 4557-4566

Rodrigues, J.J.P.C., see Chavhan, S., JSYST Dec. 2020 5233-5244

Roeland, D., see Alabbasi, A., JSYST March 2020 398-409

Rogers, J., see Benli, E., JSYST June 2020 2937-2948

Roh, H., see Yang, T., JSYST June 2020 3057-3060

Roozitalab, F., see Li, G., JSYST Dec. 2020 4967-4977

Rostami, A., Jalilian, A., Zabihi, S., Olamaei, J., and Pouresmaeil, E., Islanding Detection of Distributed Generation Based on Parallel Inductive Impedance Switching; JSYST March 2020 813-823

Rostami, M., Kiaei, I., and Lotfifard, S., Improving Power Systems Transient Stability by Coordinated Control of Energy Storage Systems and Synchronous Generators in Presence of Measurement Noise; JSYST March 2020 1088-1097 Rouis, T.S., Bhiri, M.T., Sliman, L., and Kmimech, M., An MDE-Based Tool for Early Analysis of UML2.0/PSM Atomic and Composite Components; JSYST June 2020 1647-1657

Rouse, W.B., see Liu, C., JSYST March 2020 1365-1374

Routtenberg, T., see Drayer, E., JSYST June 2020 1886-1896

Roy, A., Mondal, A., Misra, S., and Obaidat, M.S., ORCID: Opportunistic Reconnectivity for Network Management in the Presence of Dumb Nodes in Wireless Sensor Networks; JSYST March 2020 9-16

Roy, A., see Misra, S., JSYST March 2020 144-151

Roy, A., see Mathew, A., JSYST Dec. 2020 5362-5372

Roy, S.D., and Debbarma, S., Detection and Mitigation of Cyber-Attacks on AGC Systems of Low Inertia Power Grid; *JSYST June 2020 2023-2031*

Roy, S.K., see Misra, S., JSYST March 2020 144-151

Rudnick, H., see Espinoza, S., JSYST June 2020 2837-2848

S

S., N., K.N., S., E.A., J., and Ahamed, T.P.I., Comparative Analysis of Communication Assisted Grid Synchronization Methods in Microgrids; *JSYST March* 2020 1007-1014

Saad, M., Choi, J., Nyang, D., Kim, J., and Mohaisen, A., Toward Characterizing Blockchain-Based Cryptocurrencies for Highly Accurate Predictions; JSYST March 2020 321-332

Saber, M.J., Mazloum, J., Sazdar, A.M., Keshavarz, A., and Piran, M.J., On Secure Mixed RF-FSO Decode-and-Forward Relaying Systems With Energy Harvesting; *JSYST Sept. 2020 4402-4405*

Sabouhi, H., Doroudi, A., Fotuhi-Firuzabad, M., and Bashiri, M., Electrical Power System Resilience Assessment: A Comprehensive Approach; JSYST June 2020 2643-2652

Sadeghkhani, I., see Allahdadi, K., JSYST Dec. 2020 5172-5175

Sadelli, L., see Fruchard, M., JSYST June 2020 2892-2900

Safarkhani, S., Bilionis, I., and Panchal, J.H., Toward a Theory of Systems Engineering Processes: A Principal–Agent Model of a One-Shot, Shallow Process; JSYST Sept. 2020 3277-3288

Safdar, G.A., see Syed, T.S., JSYST March 2020 288-297

Saha, R., see Kumar, G., JSYST Sept. 2020 3949-3956

Saha, T.K., see Kumar, N., JSYST March 2020 909-915

Sahoo, A.K., see Mahmud, K., JSYST Sept. 2020 3641-3652

Sahraei-Ardakani, M., see Sang, Y., JSYST Sept. 2020 3245-3255

Saif, M., see Kordestani, M., JSYST Sept. 2020 3813-3824

Saif, M., see Kordestani, M., JSYST Dec. 2020 5407-5416

Salado, A., see Farkhondehmaal, F., JSYST Sept. 2020 3225-3232

Salama, M.M.A., see Othman, M.M., *JSYST March* 2020 699-707

Salameh, H.A.B., Mahdawi, L., Musa, A., and Hailat, T.F., End-to-End Performance Analysis With Decode-and-Forward Relays in Multihop Wireless Systems Over\$\alpha\$- η-μ Fading Channels; *JSYST March 2020 84-92*

Saleem, D., Sundararajan, A., Sanghvi, A., Rivera, J., Sarwat, A.I., and Kroposki, B., A Multidimensional Holistic Framework for the Security of Distributed Energy and Control Systems; JSYST March 2020 17-27

Saleem, K., see Teles, G., JSYST Sept. 2020 4557-4566

Saleh, K.A., Hooshyar, A., El-Saadany, E.F., and Zeineldin, H.H., Protection of High-Voltage DC Grids Using Traveling-Wave Frequency Characteristics; JSYST Sept. 2020 4284-4295

Salous, S., see Shi, C., JSYST March 2020 983-994

Samadi, M.F., see Kordestani, M., JSYST Dec. 2020 5407-5416

Samadi, S., see Karimi, V., JSYST Sept. 2020 3630-3640

Samet, H., see Fatemi, S.S., JSYST March 2020 950-959

Samet, H., see Jarrahi, M.A., JSYST Sept. 2020 3987-3998

Sanchez, E.N., see Djilali, L., JSYST June 2020 2825-2836

Sandhya, K., Ghose, T., Kumar, D., and Chatterjee, K., PN Inference Based Autonomous Sequential Restoration of Distribution System Under Natural Disaster; JSYST Dec. 2020 5160-5171

Sang, Y., Xue, J., Sahraei-Ardakani, M., and Ou, G., An Integrated Preventive Operation Framework for Power Systems During Hurricanes; JSYST Sept. 2020 3245-3255

Sanghvi, A., see Saleem, D., JSYST March 2020 17-27

Sangwan, R.S., see Srinivasan, S.M., JSYST March 2020 1353-1364

Sanjeevikumar, P., see Mahmud, K., JSYST Sept. 2020 3641-3652

Santos, J.V.C.d., see da Silva, J.M., JSYST March 2020 1183-1194

Santos, R.B., see Cai, Y., JSYST Sept. 2020 3072-3081

Sarkar, V., see Babu, G.V.N.Y., JSYST Dec. 2020 5084-5095

Sarker, M.A.L., Kader, M.F., and Han, D.S., Rate-Loss Mitigation for a Millimeter-Wave Beamspace MIMO Lens Antenna Array System Using a Hybrid Beam Selection Scheme; JSYST Sept. 2020 3582-3585

Sarwat, A.I., see Saleem, D., JSYST March 2020 17-27

Sato-Shimokawara, E., see Chan, R.Y., JSYST March 2020 208-219

Savkin, A.V., and Huang, H., Navigation of a Network of Aerial Drones for Monitoring a Frontier of a Moving Environmental Disaster Area; JSYST Dec. 2020 4746-4749

Sazdar, A.M., see Saber, M.J., JSYST Sept. 2020 4402-4405

Sbruzzi, E.F., see Leles, M.C.R., JSYST March 2020 1468-1478

Schwella, E., see Malisa, R., JSYST March 2020 1523-1530

Sega, R.M., see Nelson, T., JSYST Sept. 2020 3844-3854

Sehgal, A., see Gupta, N., JSYST June 2020 2400-2410

Seifi, A.R., see Senemar, S., JSYST March 2020 832-841

Selim, B., see Alam, M.S., JSYST Sept. 2020 4079-4088

Sellathurai, M., see Shi, C., JSYST March 2020 983-994

Selvan, M.P., see Ramachandran, V., JSYST March 2020 708-717

Sen, S., and Kumar, V., Simplified Modeling and HIL Validation of Solar PVs and Storage-Based Islanded Microgrid With Generation Uncertainties; JSYST June 2020 2653-2664

Sen, S., and Kumar, V., Decentralized Output-Feedback-Based Robust LQR V-f Controller for PV-Battery Microgrid Including Generation Uncertainties; JSYST Sept. 2020 4418-4429

Senarathne, P.G.C.N., see Yue, Y., JSYST March 2020 1341-1352

Senemar, S., Seifi, A.R., Rastegar, M., and Parvania, M., Probabilistic Optimal Dynamic Planning of Onsite Solar Generation for Residential Energy Hubs; JSYST March 2020 832-841

Sengupta, S., see Mukherjee, N., JSYST Sept. 2020 4320-4328

Sequeria, R., see Pandey, A., JSYST June 2020 1953-1962

Seyedi, H., see Nojavan, M., JSYST Dec. 2020 5221-5228

Sha, E.H., see Wu, T., JSYST Dec. 2020 5429-5440

Shafie, A.E., see Mabrouk, A., JSYST March 2020 665-668

Shafie, A.E., see Chen, P., JSYST Sept. 2020 3801-3812

Shafie-khah, M., see Javidsharifi, M., JSYST June 2020 2703-2712

Shafiei, M., Golestaneh, F., Ledwich, G., Nourbakhsh, G., Gooi, H.B., and Arefi, A., Fault Detection for Low-Voltage Residential Distribution Systems With Low-Frequency Measured Data; JSYST Dec. 2020 5265-5273

Shah, P., see Ali, K., JSYST June 2020 2882-2891

Shaikh, M.H.N., Bohara, V.A., Aggarwal, P., and Srivastava, A., Energy Efficiency Evaluation for Downlink Full-Duplex Nonlinear MU-MIMO-OFDM System With Self-Energy Recycling; JSYST Sept. 2020 3313-3324

Shan, A., see Xu, X., JSYST Sept. 2020 3399-3409

Shang, Y., Consensus and Clustering of Expressed and Private Opinions in Dynamical Networks Against Attacks; JSYST June 2020 2078-2084

Shangguan, L., and Gopalswamy, S., Health Monitoring for Cyber Physical Systems; JSYST March 2020 1457-1467

Shao, J., see Song, J., JSYST March 2020 900-908

Shapiro, H., see Fillingim, K.B., JSYST Dec. 2020 5148-5159

Sharif, B., see Kalbat, F., JSYST June 2020 2237-2248

Shariff, S.M., Alam, M.S., Ahmad, F., Rafat, Y., Asghar, M.S.J., and Khan, S., System Design and Realization of a Solar-Powered Electric Vehicle Charging Station; JSYST June 2020 2748-2758

Sharma, A., see Kapoor, A., JSYST Sept. 2020 3825-3835

Sharma, A.K., see Priyadarshi, N., JSYST Sept. 2020 3334-3342

Sharma, D., and Mishra, S., Disturbance-Observer-Based Frequency Regulation Scheme for Low-Inertia Microgrid Systems; JSYST March 2020 782-792

Sharma, P.K., see Raut, P., JSYST Sept. 2020 3390-3398

Shaw, L., see Meluso, J., JSYST Sept. 2020 3463-3474

Shen, D., Wu, H., Xia, B., and Gan, D., Polynomial Chaos Expansion for Parametric Problems in Engineering Systems: A Review; JSYST Sept. 2020 4500-4514

Shen, G., see Su, Y., JSYST June 2020 1963-1971

Shen, Z., see Xu, K., JSYST March 2020 93-104

Shi, C., Wang, F., Sellathurai, M., Zhou, J., and Salous, S., Low Probability of Intercept-Based Optimal Power Allocation Scheme for an Integrated Multistatic Radar and Communication System; JSYST March 2020 983-994

Shi, J., see Dai, J., JSYST June 2020 2421-2431

Shi, J., see Moghaddam, M.J.H., JSYST Sept. 2020 3530-3538

Shi, L., see Lyu, Z., JSYST Sept. 2020 3518-3529

Shi, Z., see Lu, H., JSYST Dec. 2020 5002-5013

Shih, T.K., see Zhang, C., JSYST June 2020 1840-1851

Shihada, B., see Ahmad, E., JSYST March 2020 232-243

Shivhare, A., Singh, V.K., and Kumar, M., Anticomplementary Triangles for Efficient Coverage in Sensor Network-Based IoT; *JSYST Dec. 2020 4854-*

Shlezinger, N., see Gong, T., JSYST Dec. 2020 5296-5307

Shu, F., see Gui, L., JSYST June 2020 2980-2989

Shu, F., see Gui, L., JSYST Sept. 2020 3150-3160

Shu, L., see Wang, Y., JSYST March 2020 477-488

Shu, L., see Qureshi, K.I., JSYST June 2020 2601-2614

Shuvro, R.A., see Das, P., JSYST Dec. 2020 4842-4853

Siala, H., Mhenni, F., Choley, J., Barkallah, M., Louati, J., and Haddar, M., Toward a Robust Design of an Aileron Electromechanical Actuator: Sensitivity Analysis and Parametric Tolerancing Using a Variational Approach; JSYST Sept. 2020 3977-3986

Siala, M., see Ayadi, R., JSYST March 2020 603-613

Siano, P., see Liu, S., JSYST June 2020 2593-2596

Siano, P., see Kumar, V.N., JSYST Sept. 2020 4308-4319

Siano, P., see Mahzarnia, M., JSYST Sept. 2020 4059-4070

Sikdar, B., see Gope, P., JSYST March 2020 343-352

Sillitto, H., see Dori, D., JSYST June 2020 1538-1548

Silva, E., see Kohler, M., JSYST Dec. 2020 5111-5120

Silva, R.d.A., and Braga, R.T.V., Simulating Systems-of-Systems With Agent-Based Modeling: A Systematic Literature Review; JSYST Sept. 2020 3609-3617

Sim, Y., and Cho, D., Performance Analysis of Priority-Based Access Class Barring Scheme for Massive MTC Random Access; *JSYST Dec. 2020 5245*-5252

Simon, B.J., see Bakirtzis, G., JSYST Dec. 2020 4864-4873

Singh, B.B., see Verma, G.K., JSYST March 2020 621-632

Singh, B.B., see Verma, G.K., JSYST June 2020 1704-1715

Singh, C., see Urgun, D., JSYST June 2020 2791-2800

Singh, P., Bishnoi, S.K., and Meena, N.K., Moth Search Optimization for Optimal DERs Integration in Conjunction to OLTC Tap Operations in Distribution Systems; JSYST March 2020 880-888

Singh, S., see Pamshetti, V.B., JSYST March 2020 995-1006

Singh, S.P., see Pamshetti, V.B., JSYST March 2020 995-1006

Singh, V.K., see Shivhare, A., JSYST Dec. 2020 4854-4863

Singh, V.P., see Prakash, T., JSYST June 2020 2012-2022

Singh, V.P., see Prakash, T., JSYST Sept. 2020 3267-3276

Sivasubramani, S., see Bhamidi, L., JSYST June 2020 2624-2632

Sliman, L., see Rouis, T.S., JSYST June 2020 1647-1657

So-In, C., see Vo, V.N., JSYST Dec. 2020 4955-4966

Sobral, J.B.M., see Vieira, K., JSYST June 2020 1984-1991

Soder, L., see Olauson, J., JSYST Sept. 2020 3687-3694

Sodhi, R., see Bansal, Y., JSYST Sept. 2020 4567-4578

Soh, C.B., see Chen, X., JSYST Dec. 2020 5396-5406

Soleimanpour-Moghadam, M., see Mohammadi, Z., JSYST Sept. 2020 3214-

Soneji, S., see Zavala, A., JSYST Dec. 2020 5049-5060

Song, J., Liu, Y., Shao, J., and Tang, C., A Dynamic Membership Data Aggregation (DMDA) Protocol for Smart Grid; JSYST March 2020 900-908

Song, R., see Dai, J., JSYST June 2020 2421-2431

Song, R., see Dai, J., JSYST Dec. 2020 4832-4841

Song, T., see Wu, J., JSYST June 2020 2532-2543

Song, W., see Clemente, J., JSYST March 2020 1277-1284

Song, W., see Li, F., JSYST Sept. 2020 3383-3389

Song, X., see Chai, R., JSYST Dec. 2020 5350-5361

Sood, S.K., see Kaur, H., JSYST June 2020 2003-2011

Soroudi, A., see Nouri, A., JSYST Sept. 2020 3767-3778

Sowjanya, K., Dasgupta, M., Ray, S., and Obaidat, M.S., An Efficient Elliptic Curve Cryptography-Based Without Pairing KPABE for Internet of Things; JSYST June 2020 2154-2163

Spachos, P., and Plataniotis, K.N., BLE Beacons for Indoor Positioning at an Interactive IoT-Based Smart Museum; *JSYST Sept.* 2020 3483-3493

Spachos, P., see Mackey, A., JSYST Sept. 2020 3371-3382

Srinivasan, S.M., Kilicay-Ergin, N.H., Sangwan, R.S., and Neill, C.J., Ranking Critical Activities in Complex System Development Projects; JSYST March 2020 1353-1364

Srivastava, A., see Shaikh, M.H.N., JSYST Sept. 2020 3313-3324

Srivastava, S.C., see Meghwani, A., JSYST March 2020 1159-1170

Stoianov, I., see Ulusoy, A., JSYST Sept. 2020 4579-4590

Stuban, S.M.F., see Confrey, J., JSYST March 2020 1135-1146

Sturgis, M., and Alleyne, M., Bee-Inspired Evaluation Algorithm Leads to Improved Decision Making in Groups; JSYST March 2020 1427-1434

Su, X., see Liu, J., JSYST March 2020 1503-1511

Su, Y., Shen, G., and Zhang, M., A Novel Privacy-Preserving Authentication Scheme for V2G Networks; JSYST June 2020 1963-1971

Su, Y., see Du, C., JSYST Sept. 2020 4101-4109

Su, Z., see Wu, J., JSYST March 2020 1479-1490

Su, Z., see Wu, J., JSYST Dec. 2020 5210-5220

Subrahmanian, V.S., see Chen, H., JSYST Sept. 2020 3779-3790

Sugano, S., see Noguchi, H., JSYST Dec. 2020 5176-5186

Suhardi, see Kurniawan, N.B., JSYST Sept. 2020 3105-3116

Sun, G., see Hao, W., JSYST March 2020 673-676

Sun, G., Boateng, G.O., Ayepah-Mensah, D., Liu, G., and Wei, J., Autonomous Resource Slicing for Virtualized Vehicular Networks With D2D Communications Based on Deep Reinforcement Learning; JSYST Dec. 2020 4694-4705

Sun, H., see Zhuang, Z., JSYST June 2020 1658-1669

Sun, H., see Anwar, S., JSYST Sept. 2020 3875-3884

Sun, J., Hu, S., Nie, X., and Walker, J., Efficient Ranked Multi-Keyword Retrieval With Privacy Protection for Multiple Data Owners in Cloud Computing; JSYST June 2020 1728-1739

Sun, J., see Zhang, G., JSYST Sept. 2020 4638-4647

Sun, L., see Chen, T., JSYST March 2020 771-781

Sun, L., see Qureshi, K.I., JSYST June 2020 2601-2614

Sun, L., Chen, T., Ho, W.K., Ling, K.V., and Maciejowski, J.M., Covariance Analysis of LAV Robust Dynamic State Estimation in Power Systems; JSYST June 2020 2801-2812

Sun, M., Jin, M., Guo, Q., and Li, Y., Throughput Maximization for Cognitive Radio With Wirelessly Powered Primary Users; JSYST June 2020 2432-2442

Sun, W., see Tian, M., JSYST June 2020 2597-2600

Sun, Y., see Yang, J., JSYST March 2020 172-183

Sun, Y., see Wei, H., JSYST March 2020 61-72

Sun, Y., see Yang, D., JSYST Sept. 2020 4477-4488

Sundararajan, A., see Saleem, D., JSYST March 2020 17-27

Suraweera, N., Li, S., Johnson, M., Collings, I.B., Hanly, S.V., Ni, W., and Hedley, M., Environment-Assisted Passive WiFi Tracking With Self-Localizing Asynchronous Sniffers; JSYST Dec. 2020 4798-4809

Syed, T.S., and Safdar, G.A., Energy-Efficient GCSA Medium Access Protocol for Infrastructure-Based Cognitive Radio Networks; JSYST March 2020 288-297

T

Tafreshi, S.M.M., see Rajabalizadeh, S., JSYST Dec. 2020 4911-4918

Tai, X., see Li, J., JSYST March 2020 433-444

Talebi, S., see Mohammadi, Z., JSYST Sept. 2020 3214-3224

Tan, F., see Zhou, L., JSYST June 2020 2508-2519

Tan, S., Guerrero, J.M., Xie, P., Han, R., and Vasquez, J.C., Brief Survey on Attack Detection Methods for Cyber-Physical Systems; *JSYST Dec.* 2020 5329-5339

Tan, W., see Zhao, L., JSYST Sept. 2020 3904-3915

Tan, X., see Huang, K., JSYST Sept. 2020 4329-4339

Tan, X., see Xing, L., JSYST Sept. 2020 4252-4261

Tang, C., see Song, J., JSYST March 2020 900-908

Tang, M., see Wang, T., JSYST March 2020 410-421

Tang, M., see Zhou, R., JSYST June 2020 2990-3000

Tang, Y., see Lin, D., JSYST June 2020 1716-1727

Tang, Y.Y., see Yang, L., JSYST June 2020 1623-1634

Tao, H.Y.S., see Zavala, A., JSYST Dec. 2020 5049-5060

Tao, X., Lu, J., Chen, D., and Torngren, M., Probabilistic Inference of Fault Condition of Cyber-Physical Systems Under Uncertainty; JSYST Sept. 2020 3256-3266

Tarable, A., and Escribano, F.J., Chaos-Based Anytime-Reliable Coded Communications; JSYST June 2020 2214-2224

Teles, G., Rodrigues, J.J.P.C., Saleem, K., and Kozlov, S.A., Classification Methods Applied to Credit Scoring With Collateral; JSYST Sept. 2020 4557-4566

Terzija, V., see Paidi, E.S.N.R., JSYST Dec. 2020 4978-4989

Tewari, A., see Punzo, G., JSYST Sept. 2020 3865-3874

Thomas, R., see Kumar, G., JSYST Sept. 2020 3949-3956

Tian, G., see Du, C., JSYST Sept. 2020 4101-4109

Tian, H., see Fan, B., JSYST June 2020 2097-2108

Tian, M., Sun, W., Huang, L., Zhao, S., and Li, Q., Joint Beamforming and Relay Selection in AF Two-Way Relay Networks With Energy Transfer; JSYST June 2020 2597-2600

Tian, M., see Zhao, S., JSYST Dec. 2020 5144-5147

Tian, X., Liu, Q., Wang, Z., and Li, M., Secure Hybrid Beamformers Design in mmWave MIMO Wiretap Systems; *JSYST March 2020 548-559*

Tiwari, A., see Chaturvedi, A., JSYST Sept. 2020 4007-4014

Tong, J., see Gao, D., JSYST Dec. 2020 4674-4683

Tong, K., see Li, T., JSYST June 2020 1692-1703

Torngren, M., see Lu, J., JSYST March 2020 1297-1308

Torngren, M., see Tao, X., JSYST Sept. 2020 3256-3266

Toulabi, M., see Hosseini, S.A., JSYST March 2020 1125-1134

Toulabi, M., Ashouri-Zadeh, A., Kazari, H., and Ranjbar, A.M., Application of Bang-Bang Controller to Emulate Primary Frequency Response in DFIGs; JSYST June 2020 2615-2623

Tourki, K., see Mabrouk, A., JSYST March 2020 665-668

Tran, D., Tran, H., Ha, D., and Kaddoum, G., Secure Transmit Antenna Selection Protocol for MIMO NOMA Networks Over Nakagami-m Channels; JSYST March 2020 253-264

Tran, D., see Vo, V.N., JSYST Dec. 2020 4955-4966

Tran, H., see Tran, D., JSYST March 2020 253-264

Tran, H., see Vo, V.N., JSYST Dec. 2020 4955-4966

Tran, X.N., see Van Nguyen, L., JSYST Dec. 2020 4777-4785

Trivedi, A., see Pawar, P., JSYST June 2020 2269-2280

Tsai, Z., see Lin, F.P., JSYST March 2020 265-276

Tse, C.K., see Wang, J.V., JSYST March 2020 152-163

Tse, C.K., see Gao, X., JSYST Sept. 2020 4626-4637

Tse, C.K., see Wang, W., JSYST Dec. 2020 5475-5485

Tse, Z., see Li, F., JSYST Sept. 2020 3383-3389

Tseng, K.J., see Chen, X., JSYST Dec. 2020 5396-5406

Tseng, S., Chen, Y., and Fang, H., Cross PHY/APP Layer User Grouping and Power Allocation for Uplink Multiantenna NOMA Video Communication Systems; JSYST Sept. 2020 3351-3359

Tu, S., see Liu, M., JSYST March 2020 582-591

Tu, Z., see Nan, Y., JSYST June 2020 1611-1622

Tuan, P.V., and Koo, I., Optimizing Efficient Energy Transmission on a SWIPT Interference Channel Under Linear/Nonlinear EH Models; JSYST March 2020 457-468

Tushar, M.H.K., see Kabir, M.E., JSYST Sept. 2020 4221-4231

Tyagi, B., see Kumar, M., JSYST Sept. 2020 4143-4154

U

U., L., see Chen, J., JSYST March 2020 244-252

Uhlemann, E., see Vo, V.N., JSYST Dec. 2020 4955-4966

Uluda, Y., see Evin, E., JSYST Sept. 2020 3139-3149

Ulusoy, A., Pecci, F., and Stoianov, I., An MINLP-Based Approach for the Design-for-Control of Resilient Water Supply Systems; JSYST Sept. 2020 4579-4590

Urgun, D., Singh, C., and Vittal, V., Importance Sampling Using Multilabel Radial Basis Classification for Composite Power System Reliability Evaluation; JSYST June 2020 2791-2800

Ustun, T.S., see Aftab, M.A., JSYST June 2020 2676-2683

V

Vaezi, K., and Ashtiani, F., Delay-Optimal Cooperation Policy in a Slotted Aloha Full-Duplex Wireless Network: Static Approach; JSYST June 2020 2257-2268

Vafamand, N., Asemani, M.H., Dragicevic, T., Blaabjerg, F., and Khooban, M.H., Fuzzy-Observer-Based Predictive Stabilization of DC Microgrids With Power Buffers Through an Imperfect 5G Network; JSYST Sept. 2020 4025-4035

Valero, M., see Clemente, J., JSYST March 2020 1277-1284

Valero, M., see Li, F., JSYST Sept. 2020 3383-3389

Van, L., Lin, Y., Wu, T., and Lin, Y., An Intelligent Elevator Development and Management System; JSYST June 2020 3015-3026

Van Nguyen, L., Nguyen, B.C., Tran, X.N., and Dung, L.T., Transmit Antenna Selection for Full-Duplex Spatial Modulation Multiple-Input Multiple-Output System; JSYST Dec. 2020 4777-4785

Varga, L., see Punzo, G., JSYST Sept. 2020 3865-3874

Vasilakos, A.V., see Gan, W., JSYST Sept. 2020 4442-4453

Vasile, M., see Punzo, G., JSYST Sept. 2020 3865-3874

Vasquez, J.C., see Tan, S., JSYST Dec. 2020 5329-5339

Vassiliou, V., see Ioannou, I., JSYST Sept. 2020 4232-4241

Vellasco, M., see Kohler, M., JSYST Dec. 2020 5111-5120

Vellasco, M.M.B.R., see Pereira, C.S., JSYST Sept. 2020 3926-3937

Venkatesan, S., see Mundhe, P., JSYST Dec. 2020 5463-5474

Verikoukis, C., see Ntontin, K., JSYST June 2020 2473-2484

Verma, G.K., Singh, B.B., Kumar, N., and He, D., CB-PS: An Efficient Short-Certificate-Based Proxy Signature Scheme for UAVs; JSYST March 2020 621-632

Verma, G.K., Singh, B.B., Kumar, N., Kaiwartya, O., and Obaidat, M.S., PFC-BAS: Pairing Free and Provable Certificate-Based Aggregate Signature Scheme for the e-Healthcare Monitoring System; JSYST June 2020 1704-1715

Verma, S., see Mundhe, P., JSYST Dec. 2020 5463-5474

Vieira, K., Koch, F.L., Sobral, J.B.M., Westphall, C.B., and Leao, J.L.D.S., Autonomic Intrusion Detection and Response Using Big Data; JSYST June 2020 1984-1991

Vien, Q., see Ali, K., JSYST June 2020 2882-2891

Vijayakumar, P., see Li, X., JSYST Sept. 2020 3547-3557

Vittal, V., see Urgun, D., JSYST June 2020 2791-2800

Vo, V.N., Tran, H., Dao, V., So-In, C., Tran, D., and Uhlemann, E., On Communication Performance in Energy Harvesting WSNs Under a Cooperative Jamming Attack; JSYST Dec. 2020 4955-4966

Vollala, S., see Rajamanickam, S., JSYST June 2020 1972-1983

Vuppala, S., Mady, A.E., and Kuenzi, A., Moving Target Defense Mechanism for Side-Channel Attacks; JSYST June 2020 1810-1819

w

Wadie, F., see Ebrahim, M.A., JSYST Sept. 2020 3893-3903

Walker, J., see Sun, J., JSYST June 2020 1728-1739

Wang, B., see Zhan, Y., JSYST March 2020 592-602

Wang, B., see Zhou, Y., JSYST March 2020 749-759

Wang, B., see Zhang, H., JSYST March 2020 445-456

Wang, B., see Ma, C., JSYST June 2020 1992-2002

Wang, C., see Nan, Y., JSYST June 2020 1611-1622

Wang, C., see Chen, J., JSYST Sept. 2020 3570-3581

Wang, C., see Wang, J., JSYST Sept. 2020 3325-3333
Wang D. see Yue V. ISYST March 2020 1341-1352

Wang, D., see Yue, Y., JSYST March 2020 1341-1352

Wang, E., see Chvojka, P., JSYST June 2020 2544-2550

Wang, F., see Shi, C., JSYST March 2020 983-994

Wang, G., see Lu, J., JSYST March 2020 1297-1308

Wang, H., see Wu, J., JSYST March 2020 1479-1490

Wang, H., Chang, Q., Xu, Y., and Li, X., Adaptive Narrow-Band Interference Suppression and Performance Evaluation Based on Code-Aided in GNSS Inter-Satellite Links; JSYST March 2020 538-547

Wang, H., see Yang, S., JSYST March 2020 1447-1456

Wang, H., Gu, C., Zhang, X., and Li, F., Optimal CHP Planning in Integrated Energy Systems Considering Network Charges; JSYST June 2020 2684-2693

Wang, H., see Feng, Q., JSYST June 2020 1820-1829

Wang, H., see Wu, J., JSYST Dec. 2020 5210-5220

Wang, H., see Fang, S., JSYST Dec. 2020 4754-4764

Wang, H., see Ju, Y., JSYST Dec. 2020 5121-5132

Wang, J., see Zhang, H., JSYST March 2020 445-456

Wang, J., see Manshadi, S.D., JSYST March 2020 803-812

Wang, J., see Zhi, T., JSYST June 2020 1776-1787

Wang, J., see Zhuang, Z., JSYST June 2020 1658-1669

Wang, J., see Dai, J., JSYST June 2020 2421-2431

Wang, J., Liu, C., and Zhou, M., Improved Bacterial Foraging Algorithm for Cell Formation and Product Scheduling Considering Learning and Forgetting Factors in Cellular Manufacturing Systems; JSYST June 2020 3047-3056

Wang, J., see Dai, Z., JSYST Sept. 2020 4368-4381

Wang, J., Qiu, Y., Lin, S., Lin, M., and Liu, C., On the Secrecy Performance of Random VLC Networks With Imperfect CSI and Protected Zone; JSYST Sept. 2020 4176-4187

Wang, J., see Wang, J., JSYST Sept. 2020 4176-4187

Wang, J., see Gui, L., JSYST Sept. 2020 3150-3160

Wang, J., Wang, C., Wei, Y., and Zhang, C., Neuroadaptive Sliding Mode Formation Control of Autonomous Underwater Vehicles With Uncertain Dynamics; JSYST Sept. 2020 3325-3333

Wang, J., see Dai, J., JSYST Dec. 2020 4832-4841

Wang, J., Demeulemeester, E., Hu, X., and Wu, G., Expectation and SAA Models and Algorithms for Scheduling of Multiple Earth Observation Satellites Under the Impact of Clouds; JSYST Dec. 2020 5451-5462

Wang, J.V., Ganganath, N., Cheng, C., and Tse, C.K., Bio-Inspired Heuristics for VM Consolidation in Cloud Data Centers; JSYST March 2020 152-163

Wang, K., Guo, D., and Quan, W., Analyzing NDN NACK on Interest Flooding Attack via SIS Epidemic Model; JSYST June 2020 1862-1873

Wang, L., see Li, F., JSYST June 2020 2187-2191

Wang, L., see Qureshi, K.I., JSYST June 2020 2601-2614

Wang, L., see Liu, Y., JSYST June 2020 2121-2132

Wang, L., see Wang, X., JSYST Sept. 2020 4356-4367

Wang, L., see Jiang, Y., JSYST Sept. 2020 3717-3728

Wang, Q., Liu, F., Huang, P., Xing, S., and Zhao, X., A Hierarchical Attention Model for CTR Prediction Based on User Interest; *JSYST Sept. 2020 4015-*

Wang, Q., see Du, C., JSYST Sept. 2020 4101-4109

Wang, R., see Xing, L., JSYST Sept. 2020 4252-4261

Wang, S., see Fan, X., JSYST Dec. 2020 4943-4954

Wang, S., see Wang, W., JSYST Dec. 2020 5475-5485

Wang, T., see Zang, T., JSYST March 2020 572-581

Wang, T., Tang, M., and Cao, Y., Resource Optimization Protocol Based on Multicommunity Model for Intermittently Connected Mobile Networks; JSYST March 2020 410-421

Wang, T., see Zhou, X., JSYST June 2020 1798-1809

Wang, W., see Jia, W., JSYST June 2020 2464-2472

Wang, W., see Zhou, X., JSYST June 2020 1798-1809

Wang, W., see Ji, S., JSYST June 2020 2370-2381

Wang, W., see Qu, H., JSYST Sept. 2020 3161-3172

Wang, W., Tse, C.K., and Wang, S., Performance Comparison of Nonlinear Kalman Filters in Epidemic Tracking on Networks; *JSYST Dec.* 2020 5475-5485

Wang, X., see Liu, S., JSYST June 2020 2593-2596

Wang, X., see He, Q., JSYST June 2020 1874-1885

Wang, X., Zhang, K., Zhang, S., and Wu, L., Equilibrium Analysis of Electricity Market With Demand Response Exchange to Counterbalance Bid Deviations of Renewable Generators; JSYST June 2020 2713-2724

Wang, X., see Liu, J., JSYST June 2020 3027-3038

Wang, X., see Lyu, Z., JSYST Sept. 2020 3518-3529

Wang, X., Luo, X., Pan, X., and Guan, X., Detection and Location of Bias Load Injection Attack in Smart Grid via Robust Adaptive Observer; JSYST Sept. 2020 4454-4465

Wang, X., Li, L., Li, J., Yang, C., Wang, L., and Niyato, D., Traffic-Aware Multiple Association in Ultradense Networks: A State-Based Potential Game; JSYST Sept. 2020 4356-4367

Wang, Y., see Xu, K., JSYST March 2020 93-104

Wang, Y., see Yue, Y., JSYST March 2020 1341-1352

Wang, Y., Zhang, X., Zhang, H., Yu, R., and Shu, L., Fast Switching With VM Migration in 5G Cloud Radio Access Networks; JSYST March 2020 477-488

Wang, Y., see Fan, X., JSYST Dec. 2020 4943-4954

Wang, Y., see Lun, Y., JSYST Dec. 2020 5014-5024

Wang, Y., Zhong, H., Xu, Y., Cui, J., and Wu, G., Enhanced Security Identity-Based Privacy-Preserving Authentication Scheme Supporting Revocation for VANETs; JSYST Dec. 2020 5373-5383

Wang, Z., see Zhan, Y., JSYST March 2020 592-602

Wang, Z., see Tian, X., JSYST March 2020 548-559

Wang, Z., see Chen, C., JSYST June 2020 1635-1646

Wang, Z., Gao, Y., Fang, C., Liu, L., Guo, S., and Li, P., Optimal Connected Cruise Control With Arbitrary Communication Delays; JSYST June 2020 2913-2924

Wang, Z., Liu, S., and Fang, Z., Research on SoS-GERT Network Model for Equipment System of Systems Contribution Evaluation Based on Joint Operation; JSYST Sept. 2020 4188-4196

Waqas, M., see Liu, M., JSYST March 2020 582-591

Wei, F., see Chen, X., JSYST Dec. 2020 5396-5406

Wei, H., Luo, H., Sun, Y., and Obaidat, M.S., Cache-Aware Computation Offloading in IoT Systems; JSYST March 2020 61-72

Wei, H., see Lyu, Z., JSYST Dec. 2020 5061-5072

Wei, J., see Sun, G., JSYST Dec. 2020 4694-4705

Wei, L., see Chen, J., JSYST March 2020 244-252

Wei, X., see Zang, T., JSYST March 2020 572-581

Wei, X., Yao, P., and Xie, Z., Comprehensive Optimization of Energy Storage and Standoff Tracking for Solar-Powered UAV; JSYST Dec. 2020 5133-5143

Wei, Y., see Wang, J., JSYST Sept. 2020 3325-3333

Wei, Z., see Lyu, Z., JSYST Sept. 2020 3518-3529

Weiss, M.B.H., see Gomez, M.M., JSYST March 2020 489-499

Wen, M., see Yue, Y., JSYST March 2020 1341-1352

Wen, W., see Liu, D., JSYST June 2020 2323-2334

Wendoloski, E.B., see Maier, M.W., JSYST Dec. 2020 5417-5428

Westphall, C.B., see Vieira, K., JSYST June 2020 1984-1991

Willis, A., see Mitra, B., JSYST March 2020 1069-1079

Woo, W.L., see Quek, Y.T., JSYST March 2020 1395-1404

Wu, D.D., see Kasimu, A., JSYST March 2020 1375-1383

Wu, E.H., see Chen, J., JSYST Sept. 2020 3570-3581

Wu, F., see Li, X., JSYST March 2020 39-50

Wu, F., see Li, X., JSYST Sept. 2020 3547-3557

Wu, G., see Wang, Y., JSYST Dec. 2020 5373-5383

Wu, G., see Wang, J., JSYST Dec. 2020 5451-5462

Wu, H., see Dong, G., JSYST Sept. 2020 3653-3664

Wu, H., see Shen, D., JSYST Sept. 2020 4500-4514

Wu, J., Wang, H., Li, N., and Su, Z., Formation Obstacle Avoidance: A Fluid-Based Solution; JSYST March 2020 1479-1490

Wu, J., Yu, Y., Zhu, H., Song, T., and Hu, J., Cost-Benefit Tradeoff of Byzantine Attack in Cooperative Spectrum Sensing; *JSYST June 2020 2532-2543*

Wu, J., Wang, H., Zhang, M., and Su, Z., Cooperative Dynamic Fuzzy Perimeter Surveillance: Modeling and Fluid-Based Framework; JSYST Dec. 2020 5210-5220

Wu, J., see Dai, C., JSYST Dec. 2020 5025-5036

Wu, K., see Zhou, Y., JSYST Dec. 2020 5253-5264

Wu, L., see Wang, X., JSYST June 2020 2713-2724

Wu, M., see Xu, C., JSYST June 2020 2443-2454

Wu, M., see Xu, C., JSYST Dec. 2020 5384-5395

Wu, N., see Gao, D., JSYST Dec. 2020 4674-4683

Wu, Q., Gouyon, D., Levrat, E., and Boudau, S., Use of Patterns for Know-How Reuse in a Model-Based Systems Engineering Framework; JSYST Dec. 2020 4765-4776

Wu, T., see Van, L., JSYST June 2020 3015-3026

Wu, T., Liu, K., Xiao, C., Liu, B., Zhuge, Q., and Sha, E.H., Multigranularity Space Management Scheme for Accelerating the Write Performance of In-Memory File Systems; JSYST Dec. 2020 5429-5440

Wu, X., see Zhang, Z., JSYST March 2020 184-195

Wu, X., see Li, J., JSYST Sept. 2020 3082-3092

Wu, Z., see Meng, Z., JSYST March 2020 113-123

Wu, Z., see Zhou, Y., JSYST Dec. 2020 5253-5264

X

Xi, J., see Gao, D., JSYST Dec. 2020 4674-4683

Xia, B., see Shen, D., JSYST Sept. 2020 4500-4514

Xia, C., see Lyu, Z., JSYST Sept. 2020 3518-3529

Xia, J., Guo, D., Luo, L., and Cheng, G., Topology-Aware Data Placement Strategy for Fault-Tolerant Storage Systems; *JSYST Sept. 2020 4296-4307*

Xia, M., see Li, T., JSYST June 2020 1692-1703

Xia, X., see Xu, K., JSYST March 2020 93-104

Xiang, S., and Yang, J., Reliability Evaluation and Reliability-Based Optimal Design for Wireless Sensor Networks; *JSYST June 2020 1752-1763*

Xiang, Y., see Yang, L., JSYST June 2020 1623-1634

Xiang, Z., see Li, S., JSYST June 2020 1602-1610

Xiang, Z., see He, W., JSYST June 2020 1549-1557

Xiang, Z., see Huang, K., JSYST Sept. 2020 4329-4339

Xiang, Z., see Zou, W., JSYST Dec. 2020 4810-4819

Xiao, C., see Liu, M., JSYST March 2020 582-591

Xiao, C., see Wu, T., JSYST Dec. 2020 5429-5440

Xiao, F., see Gui, L., JSYST June 2020 2980-2989

Xiao, H., see Yan, X., JSYST Sept. 2020 3343-3350

Xie, J., see Zhang, H., JSYST June 2020 2569-2580

Xie, L., see Chen, Z., JSYST June 2020 3001-3010

Xie, N., see Zhao, L., JSYST Sept. 2020 3904-3915

Xie, P., see Tan, S., JSYST Dec. 2020 5329-5339

Xie, X., see Yang, H., JSYST March 2020 363-374

Xie, X., see Yang, H., JSYST March 2020 51-60

Xie, X., see Lu, H., JSYST Dec. 2020 5002-5013

Xie, Y., Guo, Y., Mi, Z., Yang, Y., and Obaidat, M.S., Loosely Coupled Cloud Robotic Framework for QoS-Driven Resource Allocation-Based Web Service Composition; JSYST March 2020 1245-1256

Xie, Y., see Liu, Z., JSYST June 2020 2557-2568

Xie, Z., see Wei, X., JSYST Dec. 2020 5133-5143

Xing, H., see Luo, S., JSYST June 2020 2581-2584

Xing, L., Jiao, B., Du, Y., Tan, X., and Wang, R., Intelligent Energy-Saving Supervision System of Urban Buildings Based on the Internet of Things: A Case Study; JSYST Sept. 2020 4252-4261

Xing, S., see Wang, Q., JSYST Sept. 2020 4015-4024

Xiong, H., Mei, Q., and Zhao, Y., Efficient and Provably Secure Certificateless Parallel Key-Insulated Signature Without Pairing for IIoT Environments; JSYST March 2020 310-320

Xiong, H., Bian, R., Li, Y., Du, Z., and Mai, Z., Fault-Tolerant GNSS/SINS/DVL/CNS Integrated Navigation and Positioning Mechanism Based on Adaptive Information Sharing Factors; *JSYST Sept. 2020 3744-3754*

Xiong, K., see Jiang, R., JSYST March 2020 1206-1217

Xiong, Y., see Huang, J., JSYST March 2020 375-386

Xiong, Y., see Chen, H., JSYST Sept. 2020 3779-3790

Xu, C., see Huang, J., JSYST March 2020 375-386 **Xu, C.,** see Li, P., JSYST June 2020 2042-2053

Xu, C., Wu, M., Xu, Y., and Fang, Y., Uplink Low-Power Scheduling for Delay-Bounded Industrial Wireless Networks Based on Imperfect Power-Domain NOMA; JSYST June 2020 2443-2454

Xu, C., Wu, M., Xu, Y., and Xu, Y., Shortest Uplink Scheduling for NOMA-Based Industrial Wireless Networks; JSYST Dec. 2020 5384-5395 Xu, D., Legitimate Surveillance With Battery-Aided Wireless Powered Full-Duplex Monitor; *JSYST Dec.* 2020 5229-5232

Xu, H., see Jiang, P., JSYST Sept. 2020 4344-4355

Xu, J., see Fan, X., JSYST Dec. 2020 4943-4954

Xu, K., Shen, Z., Wang, Y., and Xia, X., Location-Aided mMIMO Channel Tracking and Hybrid Beamforming for High-Speed Railway Communications: An Angle-Domain Approach; JSYST March 2020 93-104

Xu, L., see Zhao, L., JSYST Sept. 2020 3904-3915

Xu, S., Cao, J., Legg, P., Liu, B., and Li, S., Venue2Vec: An Efficient Embedding Model for Fine-Grained User Location Prediction in Geo-Social Networks; JSYST June 2020 1740-1751

Xu, X., see Qu, H., JSYST Sept. 2020 3161-3172

Xu, X., Dai, Z., Shan, A., and Gu, T., Connected Target ε-probability Coverage in WSNs With Directional Probabilistic Sensors; JSYST Sept. 2020 3399-3400

Xu, Y., see Ding, R., JSYST March 2020 633-644

Xu, Y., see Wang, H., JSYST March 2020 538-547

Xu, Y., see Xu, C., JSYST June 2020 2443-2454

Xu, Y., see Wang, Y., JSYST Dec. 2020 5373-5383

Xu, Y., see Xu, C., JSYST Dec. 2020 5384-5395

Xu, Y., see Xu, C., JSYST Dec. 2020 5384-5395

Xue, J., see Sang, Y., JSYST Sept. 2020 3245-3255

Y

Yadav, A., see Chaitanya, B.K., JSYST March 2020 870-879

Yadav, A., see Kumar, R., JSYST June 2020 2085-2096

Yadav, S., Kumar, V., Dhok, S.B., and Jayakody, D.N.K., Energy-Efficient Design of MI Communication-Based 3-D Non-Conventional WSNs; JSYST June 2020 2585-2588

Yadav, V.K., see Mundhe, P., JSYST Dec. 2020 5463-5474

Yan, F., see Qu, H., JSYST Sept. 2020 3161-3172

Yan, H., Li, J., and Zhang, Y., Remote Data Checking With a Designated Verifier in Cloud Storage; JSYST June 2020 1788-1797

Yan, J., see Luo, X., JSYST June 2020 2901-2912

Yan, J., see Kabir, M.E., JSYST Sept. 2020 4221-4231

Yan, X., Gu, C., Zhang, X., and Li, F., Robust Optimization-Based Energy Storage Operation for System Congestion Management; JSYST June 2020 2694-2702

Yan, X., Xiao, H., An, K., Zheng, G., and Chatzinotas, S., Ergodic Capacity of NOMA-Based Uplink Satellite Networks With Randomly Deployed Users; JSYST Sept. 2020 3343-3350

Yan, Y., Yang, W., Guo, D., Li, S., Niu, H., and Zhang, B., Robust Secure Beamforming and Power Splitting for Millimeter-Wave Cognitive Satellite-Terrestrial Networks With SWIPT; *JSYST Sept.* 2020 3233-3244

Yang, A., see Chen, L., JSYST Sept. 2020 3301-3312

Yang, C., see Yue, Y., JSYST March 2020 1341-1352

Yang, C., see Huang, K., JSYST Sept. 2020 4329-4339

Yang, C., see Wang, X., JSYST Sept. 2020 4356-4367

Yang, D., Sun, Y., Zhou, B., Gao, X., and Zhang, H., Critical Nodes Identification of Complex Power Systems Based on Electric Cactus Structure; JSYST Sept. 2020 4477-4488

Yang, F., see Jin, Q., JSYST Sept. 2020 3289-3300

Yang, H., see Zhou, Y., JSYST March 2020 220-231

Yang, H., and Xie, X., Energy-Efficient Joint Scheduling and Resource Management for UAV-Enabled Multicell Networks; JSYST March 2020 363-374

Yang, H., and Xie, X., An Actor-Critic Deep Reinforcement Learning Approach for Transmission Scheduling in Cognitive Internet of Things Systems; JSYST March 2020 51-60

Yang, H., see Chen, C., JSYST Sept. 2020 3202-3213

Yang, H., see Lu, H., JSYST Dec. 2020 5002-5013

Yang, J., Sun, Y., Requena-Carrion, J., and Cao, Y., An Analytical Model for Information Centric Internet of Things Networks in Opportunistic Scenarios; JSYST March 2020 172-183

Yang, J., see Chen, Z., JSYST June 2020 3001-3010

Yang, J., see Xiang, S., JSYST June 2020 1752-1763

Yang, L., see Zhang, H., JSYST March 2020 445-456

Yang, L., see Li, Q., JSYST March 2020 196-207

Yang, L., Li, P., Yang, X., Xiang, Y., and Tang, Y.Y., Simultaneous Benefit Maximization of Conflicting Opinions: Modeling and Analysis; JSYST June 2020 1623-1634

Yang, S., see Hao, W., JSYST March 2020 673-676

Yang, S., Chen, W., Zhang, X., Liang, C., Wang, H., and Cui, W., A Graph-Based Model for Transmission Network Vulnerability Analysis; JSYST March 2020 1447-1456

Yang, T., Roh, H., Han, J., Park, S., and Kim, S., Microscale Particulate Matter Monitoring With Reliable Event Transport in Urban Environments; JSYST June 2020 3057-3060

Yang, W., see Yan, Y., JSYST Sept. 2020 3233-3244

Yang, X., see Yang, L., JSYST June 2020 1623-1634

Yang, X., see Ma, Z., JSYST Sept. 2020 4602-4613

Yang, X., and Zhao, F., Echo State Network and Echo State Gaussian Process for Non-Line-of-Sight Target Tracking; *JSYST Sept.* 2020 3885-3892

Yang, Y., see Doan, S., JSYST March 2020 889-899

Yang, Y., see Xie, Y., JSYST March 2020 1245-1256

Yang, Y., Yeh, H., and Doan, S.H., Model Predictive Control via PV-Based VAR Scheme for Power Distribution Systems With Regular and Unexpected Abnormal Loads; JSYST March 2020 689-698

Yang, Y., Yeh, H., and Doan, S., Optimal Control Methods for Photovoltaic Enabled Grid With Abnormal Power Loads; JSYST March 2020 852-861

Yang, Y., Yeh, H., and Doan, S.H., A Mixed Integer Nonlinear Program Based Power Load Estimator for Distribution Grid; JSYST March 2020 842-851

Yang, Y., see Chen, C., JSYST Sept. 2020 3202-3213

Yang, Z., see Gong, T., JSYST Dec. 2020 5296-5307

Yao, P., Zhao, Z., and Zhu, Q., Path Planning for Autonomous Underwater Vehicles With Simultaneous Arrival in Ocean Environment; *JSYST Sept.* 2020 3185-3193

Yao, P., see Lun, Y., JSYST Dec. 2020 5014-5024

Yao, P., see Wei, X., JSYST Dec. 2020 5133-5143

Yarkin, F., Altunbas, I., and Basar, E., Cooperative Space Shift Keying Media-Based Modulation With Hybrid Relaying; JSYST March 2020 500-509

Yaseen, F.A., and Al-Raweshidy, H.S., Proactive Forwarding of High Data Rate in Smart Virtualization Networks for High-Speed Trains; JSYST June 2020 1670-1681

Ye, J., and Leung, K., Adaptive and Stable Delay Control for Combating Bufferbloat: Theory and Algorithms; JSYST March 2020 1285-1296

Yeh, H., see Doan, S., JSYST March 2020 889-899

Yeh, H., see Yang, Y., JSYST March 2020 689-698

Yeh, H., Design Precoded Space-Time-Frequency 4×1 and 4×2 OFDM Architectures in Frequency-Selective Fading Channels; *JSYST March* 2020 277-287

Yeh, H., see Yang, Y., JSYST March 2020 852-861

Yeh, H., see Yang, Y., JSYST March 2020 842-851

Yi, B., see He, Q., JSYST June 2020 1874-1885

Yi, G., see Nan, Y., JSYST June 2020 1611-1622

Yin, S., see Liu, T., JSYST June 2020 1830-1839

Yogarathinam, A., and Chaudhuri, N.R., A New MIMO ORC Architecture for Power Oscillation Damping Using Remote Feedback Signals Under Intermittent Observations; JSYST March 2020 939-949

Yoo, C., see Lee, K., JSYST Sept. 2020 3618-3629

Yoo, S., see Jin, Y., JSYST Sept. 2020 3418-3429

You, L., see Liu, Y., JSYST Sept. 2020 4406-4417

Younis, M., see Baroudi, U., JSYST Sept. 2020 3093-3104

Yousefi, G.R., see Nemati, H., JSYST March 2020 793-802

Yu, F., see Zhou, L., JSYST June 2020 2508-2519

Yu, H., and Lee, H., Joint Optimization of Power and Fronthaul Compression for Data and Pilot Signals in Uplink C-RANs; JSYST Dec. 2020 4990-5001

Yu, J., see Pang, L., JSYST June 2020 2965-2968

Yu, J., see Park, L.H., JSYST Sept. 2020 4545-4556

Yu, J., see Paidi, E.S.N.R., JSYST Dec. 2020 4978-4989

Yu, P.S., see Gan, W., JSYST Sept. 2020 4442-4453

Yu, R., see Wang, Y., JSYST March 2020 477-488

Yu, Y., see Wu, J., JSYST June 2020 2532-2543 **Yu, Y.,** see Gao, D., JSYST Dec. 2020 4674-4683 Yuan, W., see Li, H., JSYST March 2020 653-656

Yuan, Y., see Liu, Z., JSYST June 2020 2557-2568

Yue, D., see Zhang, B., JSYST June 2020 2849-2860

Yue, Y., Yang, C., Wang, Y., Senarathne, P.G.C.N., Zhang, J., Wen, M., and Wang, D., A Multilevel Fusion System for Multirobot 3-D Mapping Using Heterogeneous Sensors; JSYST March 2020 1341-1352

Yuen, C., see Anwar, S., JSYST Sept. 2020 3875-3884

Yukiharu, M., see Chan, R.Y., JSYST March 2020 208-219

Yustianto, P., see Kurniawan, N.B., JSYST Sept. 2020 3105-3116

7

Zabihi, S., see Rostami, A., JSYST March 2020 813-823

Zacharia, L., Asprou, M., and Kyriakides, E., Measurement Errors and Delays on Wide-Area Control Based on IEEE Std C37.118.1-2011: Impact and Compensation; JSYST March 2020 422-432

Zadeh, A.K., see Pouladi, A., JSYST March 2020 960-970

Zafaruddin, S.M., see Rahman, Z., JSYST Sept. 2020 4036-4046

Zaimbashi, A., see Jalali, F., JSYST March 2020 105-112

Zalyubovskiy, V.V., see Challa, R., JSYST March 2020 657-660

Zang, T., Gao, S., Huang, T., Wei, X., and Wang, T., Complex Network-Based Transmission Network Vulnerability Assessment Using Adjacent Graphs; JSYST March 2020 572-581

Zare, K., see Mirzaei, M.A., JSYST Sept. 2020 3598-3608

Zarei, A., Mousavi, Y., Mosalanezhad, R., and Atazadegan, M.H., Robust Voltage Control in Inverter-Interfaced Microgrids Under Plug-and-Play Functionalities; JSYST June 2020 2813-2824

Zavala, A., Soneji, S., Kothari, S., Ramirez-Marquez, J.E., Tao, H.Y.S., and Hutchison, N., Systems Engineers' Effectiveness in an Organization: Text and Visual Analytics Approach; JSYST Dec. 2020 5049-5060

Zeadally, S., see Hammi, B., JSYST Sept. 2020 3440-3450

Zeinalpour-Yazdi, Z., see Javedankherad, M., JSYST Sept. 2020 3129-3138

Zeineldin, H.H., see Saleh, K.A., JSYST Sept. 2020 4284-4295

Zeng, B., see Zhang, D., JSYST March 2020 661-664

Zeng, X., see Chai, Y., JSYST Sept. 2020 4119-4130

Zhai, X., Chen, M., Esfahani, S.S., Amira, A., Bensaali, F., Abinahed, J., Dakua, S., Richardson, R.A., and Coveney, P.V., Heterogeneous System-on-Chip-Based Lattice-Boltzmann Visual Simulation System; JSYST June 2020 1592-1601

Zhan, Y., Wang, B., Wang, Z., Pei, T., Chen, Y., Qu, Q., and Zhang, Z., Improved Proxy Re-Encryption With Delegatable Verifiability; JSYST March 2020 592-602

Zhang, A., see Zhang, G., JSYST Sept. 2020 4638-4647

Zhang, B., Dou, C., Yue, D., Zhang, Z., and Zhang, T., A Cyber-Physical Cooperative Hierarchical Control Strategy for Islanded Microgrid Facing With Random Communication Failure; JSYST June 2020 2849-2860

Zhang, B., see Zhang, X., JSYST June 2020 1909-1920

Zhang, B., see Yan, Y., JSYST Sept. 2020 3233-3244

Zhang, C., Ge, J., Gong, F., Jia, F., and Guo, N., Security--Reliability Tradeoff for Untrusted and Selfish Relay-Assisted D2D Communications in Heterogeneous Cellular Networks for IoT; JSYST June 2020 2192-2201

Zhang, C., Cho, H., Chen, C., Shih, T.K., and Chao, H., Fuzzy-Based 3-D Stream Traffic Lightweighting Over Mobile P2P Network; JSYST June 2020 1840-1851

Zhang, C., see Wang, J., JSYST Sept. 2020 3325-3333

Zhang, D., Hu, Y., Chen, Y., and Zeng, B., Calibrating Phase Offsets for Commodity WiFi; *JSYST March* 2020 661-664

Zhang, D., see Chen, C., JSYST June 2020 1635-1646

Zhang, G., Zhang, A., Zhao, P., and Sun, J., Lightweight Privacy-Preserving Scheme in Wi-Fi Fingerprint-Based Indoor Localization; JSYST Sept. 2020 4638-4647

Zhang, H., see Wang, Y., JSYST March 2020 477-488

Zhang, H., Huang, Y., Wang, J., Wang, B., and Yang, L., Multiobjective Precoder Design for Coexisting Wireless Energy Transfer and Information Transmission Systems; JSYST March 2020 445-456

Zhang, H., see Zhi, T., JSYST June 2020 1776-1787

Zhang, H., see Chen, Y., JSYST June 2020 2202-2213

Zhang, H., Liu, W., Xie, J., Zhang, Z., and Lu, W., Joint Subarray Selection and Power Allocation for Cognitive Target Tracking in Large-Scale MIMO Radar Networks; JSYST June 2020 2569-2580

Zhang, H., see Yang, D., JSYST Sept. 2020 4477-4488

Zhang, H., see Zhao, B., JSYST Sept. 2020 4089-4100

Zhang, H., see Gao, X., JSYST Sept. 2020 4626-4637

Zhang, 11., see Gao, X., 35151 Sept. 2020 4020-4057

Zhang, J., see Hao, W., JSYST March 2020 673-676 Zhang, J., see Yue, Y., JSYST March 2020 1341-1352

71 IV VI VI ICYCE I 2020 2712 272

Zhang, K., see Wang, X., JSYST June 2020 2713-2724

Zhang, L., Cui, Y., and Mu, Y., Improving Security and Privacy Attribute Based Data Sharing in Cloud Computing; *JSYST March 2020 387-397*

Zhang, L., see Onireti, O., JSYST June 2020 2520-2531

Zhang, L., see Jiang, P., JSYST Sept. 2020 4344-4355

Zhang, M., see Dai, J., JSYST June 2020 2421-2431

Zhang, M., see Su, Y., JSYST June 2020 1963-1971

Zhang, M., see Zhang, Y., JSYST Dec. 2020 5320-5328

Zhang, M., see Wu, J., JSYST Dec. 2020 5210-5220

Zhang, Q., see Li, J., JSYST March 2020 433-444

Zhang, Q., see Hu, D., JSYST June 2020 2949-2960

Zhang, Q., see 11d, D., solist same 2020 2545 2500

Zhang, Q., see Lai, X., JSYST Sept. 2020 3410-3413

Zhang, S., see Jia, W., JSYST June 2020 2464-2472

Zhang, S., see Wang, X., JSYST June 2020 2713-2724

Zhang, T., see Zhang, B., JSYST June 2020 2849-2860

Zhang, W., see Pang, L., JSYST June 2020 2965-2968

Zhang, X., see Yang, S., JSYST March 2020 1447-1456 **Zhang, X.,** see Wang, Y., JSYST March 2020 477-488

Zhang, X., see Wang, H., JSYST June 2020 2684-2693

Zhang, X., Guo, D., An, K., and Zhang, B., Secure Communications Over Cell-Free Massive MIMO Networks With Hardware Impairments; JSYST June 2020 1909-1920

Zhang, X., see Yan, X., JSYST June 2020 2694-2702

Zhang, X., see Lai, C., JSYST Sept. 2020 4430-4441

Zhang, Y., see Liu, J., JSYST March 2020 1503-1511

Zhang, Y., see Yan, H., JSYST June 2020 1788-1797

Zhang, Y., He, D., Li, Y., Zhang, M., and Choo, K.R., Efficient Obfuscation for Encrypted Identity-Based Signatures in Wireless Body Area Networks; JSYST Dec. 2020 5320-5328

Zhang, Z., see Zhan, Y., JSYST March 2020 592-602

Zhang, Z., see Guo, Z., JSYST March 2020 677-688

Zhang, Z., Wu, X., and Liu, D., Joint Precoding and Combining Design for Hybrid Beamforming Systems With Subconnected Structure; JSYST March 2020 184-195

Zhang, Z., see Ma, C., JSYST June 2020 1992-2002

Zhang, Z., see Zhang, B., JSYST June 2020 2849-2860

Zhang, Z., see Zhang, H., JSYST June 2020 2569-2580

Zhao, B., Ren, G., and Zhang, H., Random Pattern Multiplexing for Random Access in IoT-Oriented Satellite Networks; *JSYST Sept. 2020 4089-4100*

Zhao, F., see Yang, X., JSYST Sept. 2020 3885-3892

Zhao, H., see Jiang, Y., JSYST Sept. 2020 3717-3728

Zhao, J., see Chen, C., JSYST June 2020 1635-1646

Zhao, J., see Qu, H., JSYST Sept. 2020 3161-3172

Zhao, K., see Li, F., JSYST June 2020 2187-2191

Zhao, L., Tan, W., Xu, L., Xie, N., and Huang, L., Crowd-Based Cooperative Task Allocation via Multicriteria Optimization and Decision-Making; JSYST Sept. 2020 3904-3915

Zhao, P., see Zhang, G., JSYST Sept. 2020 4638-4647

Zhao, S., see Tian, M., JSYST June 2020 2597-2600

Zhao, S., Li, Q., and Tian, M., Capacity-Maximized Transmitter Precoding for MU MIMO VLC Systems With Bounded Channel Uncertainties; JSYST Dec. 2020 5144-5147

Zhao, X., see Ma, Z., JSYST Sept. 2020 4602-4613

Zhao, X., see Wang, Q., JSYST Sept. 2020 4015-4024

Zhao, X., see Li, D., JSYST Dec. 2020 4726-4734

Zhao, Y., see Xiong, H., JSYST March 2020 310-320

Zhao, Z., see Chen, Y., JSYST June 2020 2202-2213 **Zhao, Z.,** see Yao, P., JSYST Sept. 2020 3185-3193

Zheng, G., see Yan, X., JSYST Sept. 2020 3343-3350

Zheng, H., see Ju, Y., JSYST Dec. 2020 5121-5132

Zheng, S., see Jiang, P., JSYST Sept. 2020 4344-4355

Zheng, Y., see Chen, D., JSYST June 2020 2411-2420

Zhi, T., Liu, Y., Wang, J., and Zhang, H., Resist Interest Flooding Attacks via Entropy–SVM and Jensen–Shannon Divergence in Information-Centric Networking; JSYST June 2020 1776-1787

Zhong, F., see Zhou, X., JSYST June 2020 1798-1809

Zhong, H., see Ding, R., JSYST March 2020 633-644

Zhong, H., see Wang, Y., JSYST Dec. 2020 5373-5383

Zhong, W., see Chen, C., JSYST Sept. 2020 3202-3213

Zhong, Z., see Jiang, R., JSYST March 2020 1206-1217

Zhou, B., see Yang, D., JSYST Sept. 2020 4477-4488

Zhou, H., see Dai, Z., JSYST Sept. 2020 4368-4381

Zhou, H., see Gui, L., JSYST Sept. 2020 3150-3160

Zhou, J., see Shi, C., JSYST March 2020 983-994

Zhou, L., see Jiang, R., JSYST March 2020 1206-1217

Zhou, L., Tan, F., and Yu, F., A Robust Synchronization-Based Chaotic Secure Communication Scheme With Double-Layered and Multiple Hybrid Networks; JSYST June 2020 2508-2519

Zhou, M., see Wang, J., JSYST June 2020 3047-3056

Zhou, R., Tang, M., Gong, Z., and Hao, M., FreeTrack: Device-Free Human Tracking With Deep Neural Networks and Particle Filtering; JSYST June 2020 2990-3000

Zhou, R., Gong, Z., Lu, X., and Fu, Y., WiFlowCount: Device-Free People Flow Counting by Exploiting Doppler Effect in Commodity WiFi; JSYST Dec. 2020 4919-4930

Zhou, S., see Li, H., JSYST March 2020 653-656

Zhou, X., Wang, W., Wang, T., Li, M., and Zhong, F., Online Planning for Multiagent Situational Information Gathering in the Markov Environment; JSYST June 2020 1798-1809

Zhou, X., see Guo, S., JSYST Sept. 2020 4131-4142

Zhou, X., see Guo, S., JSYST Sept. 2020 4131-4142

Zhou, X., see Gui, L., JSYST Sept. 2020 3150-3160

Zhou, Y., Yang, H., Hu, Y., and Kung, S., Cross-Layer Network Lifetime Maximization in Underwater Wireless Sensor Networks; JSYST March 2020 220-231

Zhou, Y., Panteli, M., Wang, B., and Mancarella, P., Quantifying the System-Level Resilience of Thermal Power Generation to Extreme Temperatures and Water Scarcity; JSYST March 2020 749-759

Zhou, Y., and Chen, Y., Novel Energy-Harvesting AF Relaying Schemes With Channel Estimation Errors; *JSYST March* 2020 333-342

Zhou, Y., see Gui, L., JSYST Sept. 2020 3150-3160

Zhou, Y., Kong, L., Cai, Y., Wu, Z., Liu, S., Hong, J., and Wu, K., A Decomposition-Based Local Search for Large-Scale Many-Objective Vehicle Routing Problems With Simultaneous Delivery and Pickup and Time Windows; JSYST Dec. 2020 5253-5264

Zhu, C., see Qureshi, K.I., JSYST June 2020 2601-2614

Zhu, H., see Wu, J., JSYST June 2020 2532-2543

Zhu, Q., see Yao, P., JSYST Sept. 2020 3185-3193

Zhu, W., see Chen, P., JSYST Sept. 2020 3801-3812

Zhu, Y., see Ju, Y., JSYST Dec. 2020 5121-5132

Zhuang, W., see Parvizimosaed, M., JSYST Dec. 2020 5037-5048

Zhuang, Z., Wang, J., Qi, Q., Sun, H., and Liao, J., Toward Greater Intelligence in Route Planning: A Graph-Aware Deep Learning Approach; JSYST June 2020 1658-1669

Zhuge, Q., see Wu, T., JSYST Dec. 2020 5429-5440

Zio, E., see Di Maio, F., JSYST March 2020 1333-1340

Zobaa, A.F., see Osama, R.A., JSYST March 2020 916-926

Zogovic, N., Energy Efficiency Versus Reliability Tradeoff Improvement in Low-Power Wireless Communications; *JSYST Sept. 2020 3173-3184*

Zolfaghari, M., Abedi, M., and Gharehpetian, G.B., Robust Nonlinear State Feedback Control of Bidirectional Interlink Power Converters in Grid-Connected Hybrid Microgrids; JSYST March 2020 1117-1124

Zou, H., see Chen, Z., JSYST June 2020 3001-3010

Zou, W., Huang, Y., Ahn, C.K., and Xiang, Z., Containment Control of Linear Multiagent Systems With Stochastic Disturbances via Event-Triggered Strategies; JSYST Dec. 2020 4810-4819

Zubo, R.H.A., and Mokryani, G., Active Distribution Network Operation: A Market-Based Approach; JSYST March 2020 1405-1416

Zvanovec, S., see Chvojka, P., JSYST June 2020 2544-2550

Subject Index

Numeric

3G mobile communication

Procurement-Based User Association for LTE-Advanced HetNets. *Kumar*, S., +, JSYST Sept. 2020 3194-3201

4G mobile communication

Design Precoded Space-Time-Frequency 4 × 1 and 4 × 2 OFDM Architectures in Frequency-Selective Fading Channels. *Yeh, H., JSYST March 2020* 277-287

5G mobile communication

A Novel Communication System of High Capacity. Fattouche, M., JSYST Sept. 2020 4197-4208

Deep Learning-Based MIMO-NOMA With Imperfect SIC Decoding. *Kang*, J., +, JSYST Sept. 2020 3414-3417

Design Precoded Space-Time-Frequency 4 × 1 and 4 × 2 OFDM Architectures in Frequency-Selective Fading Channels. *Yeh, H., JSYST March 2020* 277-287

Distributed Artificial Intelligence Solution for D2D Communication in 5G Networks. *Ioannou*, *I.*, +, *JSYST Sept. 2020 4232-4241*

Efficient Evaluation of Massive MIMO Channel Capacity. *Al-Wahhamy, A.*, +, *JSYST March 2020 614-620*

Energy-Efficient Adaptive Sectorization for 5G Green Wireless Communication Systems. *Jain, P., +, JSYST June 2020 2382-2391*

Fast Switching With VM Migration in 5G Cloud Radio Access Networks. Wang, Y., +, JSYST March 2020 477-488

Joint Optimization of Power and Fronthaul Compression for Data and Pilot Signals in Uplink C-RANs. *Yu, H.*, +, *JSYST Dec. 2020 4990-5001*

Joint Precoding and Combining Design for Hybrid Beamforming Systems With Subconnected Structure. Zhang, Z., +, JSYST March 2020 184-195

Market-Driven Stochastic Resource Allocation Framework for Wireless Network Virtualization. *Gomez, M.M.*, +, *JSYST March 2020 489-499*

Performance Analysis of Priority-Based Access Class Barring Scheme for Massive MTC Random Access. Sim, Y., +, JSYST Dec. 2020 5245-5252

Reconfigurable Architecture of UFMC Transmitter for 5G and Its FPGA Prototype. Kumar, V., +, JSYST March 2020 28-38

Traffic-Aware Multiple Association in Ultradense Networks: A State-Based Potential Game. Wang, X., +, JSYST Sept. 2020 4356-4367

A

Absorption

Trajectory Optimization of SUAV for Marine Vessels Communication Relay Mission. Lun, Y., +, JSYST Dec. 2020 5014-5024

Acceleration

Multigranularity Space Management Scheme for Accelerating the Write Performance of In-Memory File Systems. Wu, T., +, JSYST Dec. 2020 5429-5440

Acceleration control

Safety Cruise Control of Connected Vehicles Using Radar and Vehicle-to-Vehicle Communication. Ma, Z., +, JSYST Sept. 2020 4602-4613

Accelerator magnets

A Safety System for Human Radiation Protection and Guidance in Extreme Environmental Conditions. *Adamidi, E.S.*, +, *JSYST March 2020 1384-1394*

Access protocols

Delay-Optimal Cooperation Policy in a Slotted Aloha Full-Duplex Wireless Network: Static Approach. *Vaezi*, K., +, *JSYST June 2020 2257-2268*

Deployment of Drone-Based Small Cells for Public Safety Communication System. *Ali*, K., +, *JSYST June 2020 2882-2891*

Energy-Efficient GCSA Medium Access Protocol for Infrastructure-Based Cognitive Radio Networks. Syed, T.S., +, JSYST March 2020 288-297

Random Pattern Multiplexing for Random Access in IoT-Oriented Satellite Networks. Zhao, B., +, JSYST Sept. 2020 4089-4100

Accidents

Efficient Lattice-Based Ring Signature for Message Authentication in VANETs. Mundhe, P., +, JSYST Dec. 2020 5463-5474

Enhanced Security Identity-Based Privacy-Preserving Authentication Scheme Supporting Revocation for VANETs. Wang, Y., +, JSYST Dec. 2020 5373-5383

Acoustic waves

Green Computing in Underwater Wireless Sensor Networks Pressure Centric Energy Modeling. *Khasawneh, A.M.*, +, *JSYST Dec. 2020 4735-4745*

Actuators

Ephemeral-Cyber-Physical System: A Cloud-Like CPS Using Shared Devices in Open IoT. *Noguchi, H.*, +, *JSYST Dec. 2020 5176-5186*

Ad hoc networks

Agent Pseudonymous Authentication-Based Conditional Privacy Preservation: An Emergent Intelligence Technique. *Chavhan, S.*, +, *JSYST Dec.* 2020 5233-5244

Ada

An MDE-Based Tool for Early Analysis of UML2.0/PSM Atomic and Composite Components. *Rouis, T.S.*, +, *JSYST June 2020 1647-1657*

Adaptation models

An Information Theoretic Approach to Platform Technology Selection to Aid Influence Operations. *Hartong, M.W.*, +, *JSYST Dec. 2020 5308-5319* High-Fidelity Hexarot Simulation-Based Motion Platform Using Fuzzy Incremental Controller and Model Predictive Control-Based Motion Cue-

ing Algorithm. Qazani, M.R.C., +, JSYST Dec. 2020 5073-5083

Adaptive control

Adaptive Jamming Power Control for Untrusted Relay Networks With Imperfect Channel Reciprocity. Lee, K., +, JSYST Sept. 2020 4217-4220

Local Controllability, Trajectory Planning, and Stabilization of a Two-Agent Underactuated Microrobotic System. *Fruchard, M.*, +, *JSYST June 2020 2892-2900*

Navigation of Scalar Fronts With Multirobot Clusters in Simulation and Experiment. McDonald, R.T., +, JSYST Sept. 2020 3755-3766

Neuroadaptive Sliding Mode Formation Control of Autonomous Underwater Vehicles With Uncertain Dynamics. Wang, J., +, JSYST Sept. 2020 3325-3333

Optimal Control Methods for Photovoltaic Enabled Grid With Abnormal Power Loads. *Yang, Y.*, +, *JSYST March 2020 852-861*

Robust Nonlinear State Feedback Control of Bidirectional Interlink Power Converters in Grid-Connected Hybrid Microgrids. *Zolfaghari, M.*, +, *JSYST March 2020 1117-1124*

Additive noise

A Flexible Multicarrier Scheme Based on the Discrete Orthogonal Stockwell Transform. Colen, G.R., +, JSYST Dec. 2020 5284-5295

Advertising data processing

A Hierarchical Attention Model for CTR Prediction Based on User Interest. Wang, Q., +, JSYST Sept. 2020 4015-4024

Aerospace control

A Model-Based Systems Engineering Approach for the Efficient Specification of Test Rig Architectures for Flight Control Computers. *Liscouet-Hanke, S.*, +, *JSYST Dec. 2020 5441-5450*

Toward a Robust Design of an Aileron Electromechanical Actuator: Sensitivity Analysis and Parametric Tolerancing Using a Variational Approach. Siala, H., +, JSYST Sept. 2020 3977-3986

Aerospace industry

Model-Based Design of Complex Aeronautical Systems Through Digital Twin and Thread Concepts. *Bachelor, G.*, +, *JSYST June 2020 1568-1579*

Air pollution

Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur*; R., +, *JSYST March* 2020 729-737

Air pollution control

Improved Performance of Flywheel Fast Charging System (FFCS) Using Enhanced Artificial Immune System (EAIS). Gabbar, H.A., +, JSYST March 2020 824-831

Optimal Scheduling of EV Charging at a Solar Power-Based Charging Station. Kabir, M.E., +, JSYST Sept. 2020 4221-4231

Aircraft

A Model-Based Systems Engineering Approach for the Efficient Specification of Test Rig Architectures for Flight Control Computers. *Liscouet-Hanke*, S., +, *JSYST Dec.* 2020 5441-5450

A New Hybrid Fault Prognosis Method for MFS Systems Based on Distributed Neural Networks and Recursive Bayesian Algorithm. *Kordestani, M.*, +, *JSYST Dec.* 2020 5407-5416

Model-Based Design of Complex Aeronautical Systems Through Digital Twin and Thread Concepts. *Bachelor*, G., +, JSYST June 2020 1568-1579

Aircraft communication

Multicriteria UAV Base Stations Placement for Disaster Management. Akram, T., +, JSYST Sept. 2020 3475-3482

Aircraft control

Integration Design of Sortie Scheduling for Carrier Aircrafts Based on Hybrid Flexible Flowshop. *Liu*, *J.*, +, *JSYST March 2020 1503-1511*

Research on Cooperative Trajectory Planning and Tracking Problem for Multiple Carrier Aircraft on the Deck. *Liu, J.*, +, *JSYST June 2020 3027-3038*

Toward a Robust Design of an Aileron Electromechanical Actuator: Sensitivity Analysis and Parametric Tolerancing Using a Variational Approach. Siala, H., +, JSYST Sept. 2020 3977-3986

Algebra

Polynomial Chaos Expansion for Parametric Problems in Engineering Systems: A Review. Shen, D., +, JSYST Sept. 2020 4500-4514

Amplify and forward communication

Energy-Efficient Resource Allocation in SWIPT Cooperative Wireless Networks. *Guo*, S., +, *JSYST Sept.* 2020 4131-4142

Joint Beamforming and Relay Selection in AF Two-Way Relay Networks With Energy Transfer. *Tian, M.*, +, *JSYST June 2020 2597-2600*

Novel Energy-Harvesting AF Relaying Schemes With Channel Estimation Errors. *Zhou, Y.*, +, *JSYST March 2020 333-342*

Outage and Average Rate Performances of Full-Duplex Multiuser AF Relay Systems With Time-Selective Fading. *Raut, P.*, +, *JSYST Sept. 2020 3390*-3398

Performance Evaluation of In-Band Full-Duplex System Using One-Time-Slot Two-Way Relay. *Chang, K.*, +, *JSYST March 2020 510-519*

Amplitude modulation

Expanded Multiband Super-Nyquist CAP Modulation for Highly Bandlimited Organic Visible Light Communications. *Chvojka, P.*, +, *JSYST June* 2020 2544-2550

Analog-digital conversion

Near-Optimal Detection of Monobit Digitized UWB Signals in the Presence of Noise and Strong Intersymbol Interference. *Khani, H.*, +, *JSYST June* 2020 2311-2322

Analytical models

Brief Survey on Attack Detection Methods for Cyber-Physical Systems. *Tan,* S., +, *JSYST Dec.* 2020 5329-5339

Data-Driven Vulnerability Exploration for Design Phase System Analysis. Bakirtzis, G., +, JSYST Dec. 2020 4864-4873

Modeling and Decision-Making Methods for a Class of Cyber–Physical Systems Based on Modified Hybrid Stochastic Timed Petri Net. *Cao, R.*, +, *JSYST Dec. 2020 4684-4693*

Performance Analysis of Priority-Based Access Class Barring Scheme for Massive MTC Random Access. Sim, Y., +, JSYST Dec. 2020 5245-5252

Android (operating system)

Adversarial-Example Attacks Toward Android Malware Detection System. Li, H., +, JSYST March 2020 653-656

SieveDroid: Intercepting Undesirable Private-Data Transmissions in Android Applications. *Huang, J.*, +, *JSYST March 2020 375-386*

Ant colony optimization

An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, N., +, *JSYST March 2020 1218-1229*

Antenna arrays

Artificial-Noise-Aided Energy-Efficient Secure Beamforming for Multi-Eavesdroppers in Cognitive Radio Networks. *Chen, P., +, JSYST Sept. 2020 3801-3812*

Cognitive Radio Spectrum Sensing Under Joint TX/RX I/Q Imbalance and Uncalibrated Receiver. *Jalali*, F., +, *JSYST March* 2020 105-112

Cooperative Space Shift Keying Media-Based Modulation With Hybrid Relaying. Yarkin, F., +, JSYST March 2020 500-509

Joint Precoding and Combining Design for Hybrid Beamforming Systems With Subconnected Structure. Zhang, Z., +, JSYST March 2020 184-195

Antennas

Artificial Noisy MIMO Systems Under Correlated Scattering Rayleigh Fading—A Physical Layer Security Approach. *Liu, Y.*, +, *JSYST June 2020* 2121-2132

Asymptotic Analysis of Full-Duplex Large-Scale MIMO Systems With Low-Resolution ADCs/DACs Over Rician Fading Channels. *Dai*, *J*., +, *JSYST Dec.* 2020 4832-4841

Application program interfaces

AMOPE: Performance Analysis of OpenFlow Systems in Software-Defined Networks. *Mondal, A.*, +, *JSYST March 2020 124-131*

ChainSDI: A Software-Defined Infrastructure for Regulation-Compliant Home-Based Healthcare Services Secured by Blockchains. *Li*, *P*, +, *JSYST June 2020 2042-2053*

Approximation theory

A Two-Stage Mathematical Programming Approach for the Solution of Combined Heat and Power Economic Dispatch. *Moradi-Dalvand, M.*, +, *JSYST June 2020 2873-2881*

Artificial Noisy MIMO Systems Under Correlated Scattering Rayleigh Fading—A Physical Layer Security Approach. *Liu, Y.*, +, *JSYST June 2020* 2121-2132

Connected Target ε-probability Coverage in WSNs With Directional Probabilistic Sensors. Xu, X., +, JSYST Sept. 2020 3399-3409

Covariance Analysis of LAV Robust Dynamic State Estimation in Power Systems. Sun, L., +, JSYST June 2020 2801-2812

Efficient Evaluation of Massive MIMO Channel Capacity. *Al-Wahhamy, A.*, +, *JSYST March 2020 614-620*

Joint Beamforming and Relay Selection in AF Two-Way Relay Networks With Energy Transfer. *Tian, M., +, JSYST June 2020 2597-2600*

Near-Optimal Detection of Monobit Digitized UWB Signals in the Presence of Noise and Strong Intersymbol Interference. *Khani, H.*, +, *JSYST June* 2020 2311-2322

Optimizing Efficient Energy Transmission on a SWIPT Interference Channel Under Linear/Nonlinear EH Models. *Tuan, P.V.*, +, *JSYST March 2020* 457-468

Secure Communications Over Cell-Free Massive MIMO Networks With Hardware Impairments. Zhang, X., +, JSYST June 2020 1909-1920

Arcs (electric)

Detection and Experimental Validation of High Impedance Arc Fault in Distribution System Using Empirical Mode Decomposition. *Lala, H.*, +, *JSYST Sept. 2020 3494-3505*

Array signal processing

Artificial Noise Hopping: A Practical Secure Transmission Technique With Experimental Analysis for Millimeter Wave Systems. *Ju, Y.*, +, *JSYST Dec.* 2020 5121-5132

Artificial-Noise-Aided Energy-Efficient Secure Beamforming for Multi-Eavesdroppers in Cognitive Radio Networks. *Chen, P.*, +, *JSYST Sept. 2020 3801-3812*

Joint Beamforming and Relay Selection in AF Two-Way Relay Networks With Energy Transfer. *Tian, M.*, +, *JSYST June 2020 2597-2600*

Joint Nullspace Projection-Based Interference Mitigation for Full-Duplex Relay-Assisted Multicell Networks. *Fadoul, M.M.*, +, *JSYST June 2020* 2392-2399

Joint Precoding and Combining Design for Hybrid Beamforming Systems With Subconnected Structure. Zhang, Z., +, JSYST March 2020 184-195

Joint Trajectory Design, Tx Power Allocation, and Rx Power Splitting for UAV-Enabled Multicasting SWIPT Systems. *Kang, J.*, +, *JSYST Sept.* 2020 3740-3743

Location-Aided mMIMO Channel Tracking and Hybrid Beamforming for High-Speed Railway Communications: An Angle-Domain Approach. *Xu*, *K.*, +, *JSYST March 2020 93-104*

Optimizing Efficient Energy Transmission on a SWIPT Interference Channel Under Linear/Nonlinear EH Models. *Tuan, P.V.*, +, *JSYST March 2020* 457-468

Partial-Fixed Interference Alignment in Multiuser Interference Channel. Chen, X., +, JSYST June 2020 2303-2310

Robust Directional Modulation Design for Secrecy Rate Maximization in Multiuser Networks. *Gui*, *L.*, +, *JSYST Sept. 2020 3150-3160*

Robust Secure Beamforming and Power Splitting for Millimeter-Wave Cognitive Satellite-Terrestrial Networks With SWIPT. *Yan, Y.*, +, *JSYST Sept.* 2020 3233-3244

Secure Hybrid Beamformers Design in mmWave MIMO Wiretap Systems. Tian, X., +, JSYST March 2020 548-559

Securing Untrusted Full-Duplex Relay Channels in the Presence of Multiple External Cluster-Based Eavesdroppers. *Mabrouk, A.*, +, *JSYST March* 2020 665-668

Artificial immune systems

Improved Performance of Flywheel Fast Charging System (FFCS) Using Enhanced Artificial Immune System (EAIS). *Gabbar, H.A.*, +, *JSYST March 2020 824-831*

Artificial intelligence

Distributed Artificial Intelligence Solution for D2D Communication in 5G Networks. *Ioannou*, *I.*, +, *JSYST Sept. 2020 4232-4241*

Load Disaggregation Using One-Directional Convolutional Stacked Long Short-Term Memory Recurrent Neural Network. Quek, Y.T., +, JSYST March 2020 1395-1404

Artificial neural networks

Learning-Based Resource Management for SWIPT. Lee, K., +, JSYST Dec. 2020 4750-4753

Artificial satellites

Optimizing the Ground Network of Optical MEO Satellite Communication Systems. *Lyras*, *N.K.*, +, *JSYST Sept. 2020 3968-3976*

Assisted living

MiND: Mind Networked Device Architecture for Attention-Gated Ambient Assisted Living Systems. *Mukherjee, A.*, +, *JSYST March 2020 1325-1332* Smart Home Monitoring System via Footstep-Induced Vibrations. *Li, F*, +, *JSYST Sept. 2020 3383-3389*

Asymptotic stability

Sampled-Data Decentralized Output Feedback Control for a Class of Switched Large-Scale Stochastic Nonlinear Systems. *Li*, *S.*, +, *JSYST June* 2020 1602-1610

Asynchronous generators

A New MIMO ORC Architecture for Power Oscillation Damping Using Remote Feedback Signals Under Intermittent Observations. *Yogarathinam, A.*, +, *JSYST March 2020 939-949*

Application of Bang–Bang Controller to Emulate Primary Frequency Response in DFIGs. *Toulabi*, M., +, *JSYST June 2020 2615-2623*

Atmospheric modeling

A Model-Based Systems Engineering Approach for the Efficient Specification of Test Rig Architectures for Flight Control Computers. *Liscouet-Hanke*, S., +, *JSYST Dec.* 2020 5441-5450

A New Hybrid Fault Prognosis Method for MFS Systems Based on Distributed Neural Networks and Recursive Bayesian Algorithm. *Kordestani, M.*, +, *JSYST Dec.* 2020 5407-5416

Comprehensive Optimization of Energy Storage and Standoff Tracking for Solar-Powered UAV. Wei, X., +, JSYST Dec. 2020 5133-5143

Atmospheric turbulence

Performance of Opportunistic Receiver Beam Selection in Multiaperture OWC Systems Over Foggy Channels. *Rahman, Z.*, +, *JSYST Sept. 2020* 4036-4046

Australia

Fault Detection for Low-Voltage Residential Distribution Systems With Low-Frequency Measured Data. Shafiei, M., +, JSYST Dec. 2020 5265-5272

26 IEEE SYSTEMS JOURNAL

Authentication

Agent Pseudonymous Authentication-Based Conditional Privacy Preservation: An Emergent Intelligence Technique. *Chavhan, S.*, +, *JSYST Dec.* 2020 5233-5244

Efficient Lattice-Based Ring Signature for Message Authentication in VANETs. Mundhe, P., +, JSYST Dec. 2020 5463-5474

Enhanced Security Identity-Based Privacy-Preserving Authentication Scheme Supporting Revocation for VANETs. Wang, Y., +, JSYST Dec. 2020 5373-5383

Authorization

A Lattice Signcrypted Secured Localization in Wireless Sensor Networks. Kumar, G., +, JSYST Sept. 2020 3949-3956

A Lightweight Mutual Authentication for Smart Grid Neighborhood Area Network Communications Based on Physically Unclonable Function. Kaveh, M., +, JSYST Sept. 2020 4535-4544

A Novel Privacy-Preserving Authentication Scheme for V2G Networks. Su, Y, +, JSYST June 2020 1963-1971

A Secure Three-Factor User Authentication Protocol With Forward Secrecy for Wireless Medical Sensor Network Systems. *Li*, *X*., +, *JSYST March* 2020 39-50

An Efficient Elliptic Curve Cryptography-Based Without Pairing KPABE for Internet of Things. Sowjanya, K., +, JSYST June 2020 2154-2163

Deployment of Drone-Based Small Cells for Public Safety Communication System. *Ali*, K., +, *JSYST June 2020 2882-2891*

Improving Security and Privacy Attribute Based Data Sharing in Cloud Computing. Zhang, L., +, JSYST March 2020 387-397

Insider Attack Protection: Lightweight Password-Based Authentication Techniques Using ECC. *Rajamanickam, S.*, +, *JSYST June 2020 1972-1983*

Automation

An Information Theoretic Approach to Platform Technology Selection to Aid Influence Operations. *Hartong, M.W.*, +, *JSYST Dec. 2020 5308-5319*

Automobile industry

Ranking Critical Activities in Complex System Development Projects. Srinivasan, S.M., +, JSYST March 2020 1353-1364

Automobiles

Improved Performance of Flywheel Fast Charging System (FFCS) Using Enhanced Artificial Immune System (EAIS). Gabbar, H.A., +, JSYST March 2020 824-831

Integrated Utility-Transit Model for Optimal Configuration of Battery Electric Bus Systems. *El-Taweel, N.A.*, +, *JSYST March 2020 738-748*

Optimal Connected Cruise Control With Arbitrary Communication Delays. Wang, Z., +, JSYST June 2020 2913-2924

Understanding Risks and Opportunities of Autonomous Vehicle Technology Adoption Through Systems Dynamic Scenario Modeling—The American Insurance Industry. *Liu, C.*, +, *JSYST March 2020 1365-1374*

Autonomous aerial vehicles

CB-PS: An Efficient Short-Certificate-Based Proxy Signature Scheme for UAVs. Verma, G.K., +, JSYST March 2020 621-632

Energy-Efficient Joint Scheduling and Resource Management for UAV-Enabled Multicell Networks. Yang, H., +, JSYST March 2020 363-374

Joint Position, Decoding Order, and Power Allocation Optimization in UAV-Based NOMA Downlink Communications. *Hu, D.*, +, *JSYST June 2020 2949-2960*

Mobile Target Tracking Mechanisms Using Unmanned Aerial Vehicle: Investigations and Future Directions. *Hentati, A.I.*, +, *JSYST June 2020* 2969-2979

Multicriteria UAV Base Stations Placement for Disaster Management. Akram, T., +, JSYST Sept. 2020 3475-3482

System Architecture for Real-Time Surface Inspection Using Multiple UAVs. Hoang, V.T., +, JSYST June 2020 2925-2936

Autonomous underwater vehicles

Neuroadaptive Sliding Mode Formation Control of Autonomous Underwater Vehicles With Uncertain Dynamics. Wang, J., +, JSYST Sept. 2020 3325-3333

Path Planning for Autonomous Underwater Vehicles With Simultaneous Arrival in Ocean Environment. *Yao*, P., +, *JSYST Sept.* 2020 3185-3193

Autoregressive moving average processes

Energy-Efficient IoT-Fog-Cloud Architectural Paradigm for Real-Time Wildfire Prediction and Forecasting. Kaur, H., +, JSYST June 2020 2003-2011

Autoregressive processes

A Practicable Copula-Based Approach for Power Forecasting of Small-Scale Photovoltaic Systems. *Rajabalizadeh*, S., +, JSYST Dec. 2020 4911-4918

Outage and Average Rate Performances of Full-Duplex Multiuser AF Relay Systems With Time-Selective Fading. *Raut*, P., +, JSYST Sept. 2020 3390-3398

AWGN channels

A Novel Communication System of High Capacity. Fattouche, M., JSYST Sept. 2020 4197-4208

Chaos-Based Anytime-Reliable Coded Communications. *Tarable, A.*, +, *JSYST June 2020 2214-2224*

В

Backpropagation

A High-Accuracy Least-Time-Domain Mixture Features Machine-Fault Diagnosis Based on Wireless Sensor Network. *Du, C.*, +, *JSYST Sept. 2020* 4101-4109

Band-pass filters

An Online Bearing Fault Diagnosis Technique via Improved Demodulation Spectrum Analysis Under Variable Speed Conditions. *Liu, D.*, +, *JSYST June 2020 2323-2334*

Bandwidth

Joint Optimization of Power and Fronthaul Compression for Data and Pilot Signals in Uplink C-RANs. Yu, H., +, JSYST Dec. 2020 4990-5001

Bandwidth allocation

Dynamic Network Scheduling for Virtual Routers. *Lee, K.*, +, *JSYST Sept.* 2020 3618-3629

Bang-bang control

Application of Bang–Bang Controller to Emulate Primary Frequency Response in DFIGs. *Toulabi*, M., +, *JSYST June 2020 2615-2623*

Base stations

Dynamic User Association for Resilient Backhauling in Satellite–Terrestrial Integrated Networks. *Dai, C.*, +, *JSYST Dec. 2020 5025-5036*

Baseband

Cost-Effective Migration Toward Virtualized C-RAN With Scalable Fronthaul Design. *Masoudi*, M., +, *JSYST Dec. 2020 5100-5110*

Batteries

Design Optimization of RES-Based Desalination Systems Cooperating With Smart Grids. Malisovas, A., +, JSYST Dec. 2020 4706-4717

Energy-Efficient Barrier Lifetime Prolonging Scheme Based on Repairing in Directional Sensor Networks. Fan, X., +, JSYST Dec. 2020 4943-4954

Formal Reliability Analysis of an Integrated Power Generation System Using Theorem Proving. Ahmad, W., +, JSYST Dec. 2020 4820-4831

Legitimate Surveillance With Battery-Aided Wireless Powered Full-Duplex Monitor. Xu, D., JSYST Dec. 2020 5229-5232

Optimal Chance-Constrained Scheduling of Reconfigurable Microgrids Considering Islanding Operation Constraints. *Hemmati, M.*, +, *JSYST Dec.* 2020 5340-5349

Optimal Heterogeneous Energy Storage Management for Multienergy Cruise Ships. Fang, S., +, JSYST Dec. 2020 4754-4764

Battery management systems

Detection and Mitigation of Cyber-Attacks on AGC Systems of Low Inertia Power Grid. Roy, S.D., +, JSYST June 2020 2023-2031

Model Predictive for Reactive Power Scheduling Control Strategy for PV—Battery Hybrid System in Competitive Energy Market. *Lupangu, C.*, +, *JSYST Sept. 2020 4071-4078*

Battery powered vehicles

A Novel Privacy-Preserving Authentication Scheme for V2G Networks. Su, Y, +, JSYST June 2020 1963-1971

Bidirectional Charging in V2G Systems: An In-Cell Variation Analysis of Vehicle Batteries. *Khalid, H.M.*, +, *JSYST Sept. 2020 3665-3675*

Integrated Utility-Transit Model for Optimal Configuration of Battery Electric Bus Systems. *El-Taweel, N.A.*, +, *JSYST March 2020 738-748*

Optimal Scheduling of EV Charging at a Solar Power-Based Charging Station. Kabir, M.E., +, JSYST Sept. 2020 4221-4231

System Design and Realization of a Solar-Powered Electric Vehicle Charging Station. Shariff, S.M., +, JSYST June 2020 2748-2758

Battery storage plants

Optimal Charge/Discharge Scheduling of Battery Storage Interconnected With Residential PV System. *Kapoor, A., +, JSYST Sept. 2020 3825-3835*

Bayes methods

A New Hybrid Fault Prognosis Method for MFS Systems Based on Distributed Neural Networks and Recursive Bayesian Algorithm. *Kordestani, M.*, +, *JSYST Dec.* 2020 5407-5416

Echo State Network and Echo State Gaussian Process for Non-Line-of-Sight Target Tracking. Yang, X., +, JSYST Sept. 2020 3885-3892

Health Monitoring for Cyber Physical Systems. Shangguan, L., +, JSYST March 2020 1457-1467

Probabilistic Inference of Fault Condition of Cyber-Physical Systems Under Uncertainty. *Tao*, X., +, *JSYST Sept. 2020 3256-3266*

Behavioral sciences

System Definition, System Worldviews, and Systemness Characteristics. *Dori*, D., +, *JSYST June* 2020 1538-1548

Belief maintenance

Distributed Artificial Intelligence Solution for D2D Communication in 5G Networks. *Ioannou*, *I.*, +, *JSYST Sept. 2020 4232-4241*

Belief networks

Efficient Population of the Verification Tradespace Using Bayesian Inference. Farkhondehmaal, F., +, JSYST Sept. 2020 3225-3232

Risk Analysis of Cyber-Physical Systems by GTST-MLD. Di Maio, F., +, JSYST March 2020 1333-1340

SysEvoRecomd: Network Reconstruction by Graph Evolution and Change Learning. *Chaturvedi*, A., +, *JSYST Sept. 2020 4007-4014*

Big Data

Autonomic Intrusion Detection and Response Using Big Data. Vieira, K., +, JSYST June 2020 1984-1991

Biomechanics

Simultaneous Heterogeneous Sensor Localization, Joint Tracking, and Upper Extremity Modeling for Stroke Rehabilitation. *Chen, J.*, +, *JSYST Sept. 2020 3570-3581*

Biomedical communication

ChainSDI: A Software-Defined Infrastructure for Regulation-Compliant Home-Based Healthcare Services Secured by Blockchains. *Li*, *P*, +, *JSYST June* 2020 2042-2053

Energy-Efficient Resource Allocation for Dynamic Priority-Based Vehicular Mobile-Health Communications. Fan, B., +, JSYST June 2020 2097-2108

PFCBAS: Pairing Free and Provable Certificate-Based Aggregate Signature Scheme for the e-Healthcare Monitoring System. *Verma, G.K.*, +, *JSYST June 2020 1704-1715*

Block codes

Design Precoded Space-Time-Frequency 4×1 and 4×2 OFDM Architectures in Frequency-Selective Fading Channels. *Yeh, H., JSYST March 2020 277-287*

Blood vessels

Heterogeneous System-on-Chip-Based Lattice-Boltzmann Visual Simulation System. Zhai, X., +, JSYST June 2020 1592-1601

Bluetootl

A Context-Aware Augmentative and Alternative Communication System for School Children With Intellectual Disabilities. *Chan, R.Y.*, +, *JSYST March* 2020 208-219

BLE Beacons for Indoor Positioning at an Interactive IoT-Based Smart Museum. Spachos, P., +, JSYST Sept. 2020 3483-3493

Microscale Particulate Matter Monitoring With Reliable Event Transport in Urban Environments. *Yang*, T., +, *JSYST June* 2020 3057-3060

Online Power Management for Latency-Sensitive Bluetooth Low-Energy Beacons. Chen, D., +, JSYST June 2020 2411-2420

Smart Parking System Based on Bluetooth Low Energy Beacons With Particle Filtering. *Mackey, A.*, +, *JSYST Sept. 2020 3371-3382*

Body area networks

Efficient Obfuscation for Encrypted Identity-Based Signatures in Wireless Body Area Networks. *Zhang, Y.*, +, *JSYST Dec. 2020 5320-5328*

Body sensor networks

A Secure Three-Factor User Authentication Protocol With Forward Secrecy for Wireless Medical Sensor Network Systems. *Li*, *X*., +, *JSYST March* 2020 39-50

Boilers

Probabilistic Optimal Dynamic Planning of Onsite Solar Generation for Residential Energy Hubs. Senemar, S., +, JSYST March 2020 832-841

Boltzmann machines

SysEvoRecomd: Network Reconstruction by Graph Evolution and Change Learning. Chaturvedi, A., +, JSYST Sept. 2020 4007-4014

Brain-computer interfaces

MiND: Mind Networked Device Architecture for Attention-Gated Ambient Assisted Living Systems. Mukherjee, A., +, JSYST March 2020 1325-1332

Brakes

Best Practice Patterns for Variant Modeling of Activities in Model-Based Systems Engineering. Colletti, R.A., +, JSYST Sept. 2020 4165-4175

Broadband communication

PLC Systems Under the Presence of a Malicious Wireless Communication Device: Physical Layer Security Analyses. *Camponogara*, A., +, *JSYST Dec.* 2020 4901-4910

Broadcast communication

Online Power Management for Latency-Sensitive Bluetooth Low-Energy Beacons. Chen, D., +, JSYST June 2020 2411-2420

Broadcasting

Lightweight Secure Message Broadcasting Protocol for Vehicle-to-Vehicle Communication. *Limbasiya*, T., +, *JSYST March* 2020 520-529

Building integrated photovoltaics

Energy Storage Systems Architecture Optimization for Grid Resilience With High Penetration of Distributed Photovoltaic Generation. *Confrey, J.*, +, *JSYST March 2020 1135-1146*

Optimal Charge/Discharge Scheduling of Battery Storage Interconnected With Residential PV System. *Kapoor*, A., +, *JSYST Sept. 2020 3825-3835*

PV Distributed-MPP Tracking: Total-Cross-Tied Configuration of String-Integrated-Converters to Extract the Maximum Power Under Various PSCs. Pendem, S.R., +, JSYST March 2020 1046-1057

System Design and Realization of a Solar-Powered Electric Vehicle Charging Station. Shariff, S.M., +, JSYST June 2020 2748-2758

Building management systems

Intelligent Energy-Saving Supervision System of Urban Buildings Based on the Internet of Things: A Case Study. Xing, L., +, JSYST Sept. 2020 4252-4261

Local Estimation of Critical and Off-Peak Periods for Grid-Friendly Flexible Load Management. *Guzman, C.*, +, *JSYST Sept. 2020 4262-4271*

Business data processing

A Multidimensional Holistic Framework for the Security of Distributed Energy and Control Systems. Saleem, D., +, JSYST March 2020 17-27

Hybrid Configuration in Information Technology Value Model. *Abdurrahman, L., JSYST Sept. 2020 4515-4522*

C

Cache storage

Cache-Aware Computation Offloading in IoT Systems. Wei, H., +, JSYST March 2020 61-72

Content Placement in Cache Networks Using Graph Coloring. *Javedankherad, M.*, +, *JSYST Sept. 2020 3129-3138*

Calibration

Calibrating Phase Offsets for Commodity WiFi. Zhang, D., +, JSYST March 2020 661-664

Cameras

A Safety System for Human Radiation Protection and Guidance in Extreme Environmental Conditions. *Adamidi, E.S.*, +, *JSYST March 2020 1384-1394*

Ephemeral-Cyber-Physical System: A Cloud-Like CPS Using Shared Devices in Open IoT. *Noguchi, H., +, JSYST Dec. 2020 5176-5186*

Visual Perception for Multiple Human–Robot Interaction From Motion Behavior. Benli, E., +, JSYST June 2020 2937-2948

28 IEEE SYSTEMS JOURNAL

Capacitors

Adaptive Interconnection and Damping Assignment Passivity-Based Control of Interlinking Converter in Hybrid AC/DC Grids. *Azimi, S.M.*, +, *JSYST Dec.* 2020 4718-4725

Carbon

Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur*, R., +, *JSYST March* 2020 729-737

Carrier transmission on power lines

Mitigation Techniques for Impulsive Noise With Memory Modeled by a Two State Markov-Gaussian Process. *Alam, M.S.*, +, *JSYST Sept. 2020* 4079-4088

Orthogonal Chirp Division Multiplexing for Baseband Data Communication Systems. De M. B. A. Dib, L., +, JSYST June 2020 2164-2174

Performance Analysis of a Mixed Cooperative PLC–VLC System for Indoor Communication Systems. *Jani, M.*, +, *JSYST March 2020 469-476*

Cartography

Multigranular Wavelet Decomposition-Based Support Vector Regression and Moving Average Method for Service-Time Prediction on Web Map Service Platforms. *Dong. G.*, +, *JSYST Sept. 2020 3653-3664*

Cellular manufacturing

Improved Bacterial Foraging Algorithm for Cell Formation and Product Scheduling Considering Learning and Forgetting Factors in Cellular Manufacturing Systems. Wang, J., +, JSYST June 2020 3047-3056

Cellular networks

Energy Efficiency for MISO-OFDMA-Based User-Relay Assisted Cellular Networks. *Basturk, I.*, +, *JSYST Dec. 2020 5274-5283*

Cellular radio

Adaptive Traffic Management and Energy Cooperation in Renewable-Energy-Powered Cellular Networks. Lee, H., +, JSYST March 2020 132-143

An Analytical View of ASE for Multicell OFDMA Networks Based on Frequency-Reuse Scheme. *Ghosh, J., +, JSYST March 2020 645-648*

Content Placement in Cache Networks Using Graph Coloring. *Javedankherad, M.*, +, *JSYST Sept. 2020 3129-3138*

Covert Communications in D2D Underlaying Cellular Networks With Power Domain NOMA. *Jiang, Y.*, +, *JSYST Sept. 2020 3717-3728*

D2D-Enabled User Cooperation in Massive MIMO. *Liu*, Y, +, *JSYST Sept.* 2020 4406-4417

Deployment of Drone-Based Small Cells for Public Safety Communication System. *Ali, K., +, JSYST June 2020 2882-2891*

Distributed Artificial Intelligence Solution for D2D Communication in 5G Networks. *Ioannou, I.*, +, *JSYST Sept. 2020 4232-4241*

Downlink NOMA Networks With Hybrid Long-Packet and Short-Packet Communications in Flat Rayleigh Fading Channels. *Lai*, X., +, *JSYST Sept.* 2020 3410-3413

Edge Computing-Based Mobile Health System: Network Architecture and Resource Allocation. *Lin, D.*, +, *JSYST June 2020 1716-1727*

Effect of Doppler Shift on the Performance of Multicell Full-Duplex Massive MIMO Networks. *Dai, J.*, +, *JSYST June 2020 2421-2431*

Efficient Evaluation of Massive MIMO Channel Capacity. *Al-Wahhamy, A.*, +, *JSYST March 2020 614-620*

End-to-End Distortion Analysis of Nonorthogonal Layered Coding Over Relay-Assisted Networks. *Padidar, P., +, JSYST Sept. 2020 4466-4476*

Energy-Efficient Adaptive Sectorization for 5G Green Wireless Communication Systems. *Jain, P., +, JSYST June 2020 2382-2391*

Energy-Efficient Joint Scheduling and Resource Management for UAV-Enabled Multicell Networks. Yang, H., +, JSYST March 2020 363-374

Joint Nullspace Projection-Based Interference Mitigation for Full-Duplex Relay-Assisted Multicell Networks. *Fadoul, M.M.*, +, *JSYST June 2020* 2392-2399

Outage and ASE Analyses for Power Controlled D2D Communication. Pawar, P., +, JSYST June 2020 2269-2280

Outage Probability in the Uplink of Multitier Millimeter Wave Cellular Networks. Onireti, O., +, JSYST June 2020 2520-2531

Probabilistic Stability of Traffic Load Balancing on Wireless Complex Networks. *Moutsinas, G.*, +, *JSYST June 2020 2551-2556*

Relay-Aided Outdoor-to-Indoor Communication in Millimeter-Wave Cellular Networks. *Ntontin, K.*, +, *JSYST June 2020 2473-2484*

Robust OFDM-Based Synchronization Against Very High Fractional CFO and Time-Varying Fading. Chang, K., +, JSYST Sept. 2020 4047-4058

Security--Reliability Tradeoff for Untrusted and Selfish Relay-Assisted D2D Communications in Heterogeneous Cellular Networks for IoT. *Zhang, C.*, +, *JSYST June 2020 2192-2201*

Study on Base Station Topology in National Cellular Networks: Take Advantage of Alpha Shapes, Betti Numbers, and Euler Characteristics. *Chen, Y.*, +, *JSYST June 2020 2202-2213*

The Allocation and Reuse Scheme of Physical Cell Identifications Based on Maximum Degree First Coloring Algorithm. *Liu, M.*, +, *JSYST March* 2020 582-591

Centralized control

Flow Setup Aware Controller Placement in Distributed Software-Defined Networking. *Correia, N.*, +, *JSYST Dec. 2020 5096-5099*

Channel allocation

Adaptive Traffic Management and Energy Cooperation in Renewable-Energy-Powered Cellular Networks. *Lee, H., +, JSYST March 2020 132-143*

Artificial Noisy MIMO Systems Under Correlated Scattering Rayleigh Fading—A Physical Layer Security Approach. *Liu, Y., +, JSYST June 2020* 2121-2132

Energy-Efficient Resource Allocation for Dynamic Priority-Based Vehicular Mobile-Health Communications. Fan, B., +, JSYST June 2020 2097-2108

Channel bank filters

Bridging the Gap Between CP-OFDM and ZP-OFDM for the Provision of Ultra-Low Latency Services in 5G. *Ayadi*, R., +, *JSYST March* 2020 603-613

Reconfigurable Architecture of UFMC Transmitter for 5G and Its FPGA Prototype. *Kumar, V., +, JSYST March 2020 28-38*

Channel capacity

A Novel Communication System of High Capacity. Fattouche, M., JSYST Sept. 2020 4197-4208

Efficient Evaluation of Massive MIMO Channel Capacity. *Al-Wahhamy, A.*, +, *JSYST March 2020 614-620*

Ergodic Capacity of NOMA-Based Uplink Satellite Networks With Randomly Deployed Users. Yan, X., +, JSYST Sept. 2020 3343-3350

On the Secrecy Performance of Random VLC Networks With Imperfect CSI and Protected Zone. Wang, J., +, JSYST Sept. 2020 4176-4187

Performance of Opportunistic Receiver Beam Selection in Multiaperture OWC Systems Over Foggy Channels. *Rahman, Z.*, +, *JSYST Sept. 2020* 4036-4046

Physical-Layer Security for Frequency Diverse Array Communication System Over Nakagami-*m* Fading Channels. *Ji*, S., +, *JSYST June 2020 2370-2381*

Channel coding

Chaos-Based Anytime-Reliable Coded Communications. *Tarable, A.*, +, *JSYST June 2020 2214-2224*

Design Precoded Space-Time-Frequency 4 × 1 and 4 × 2 OFDM Architectures in Frequency-Selective Fading Channels. *Yeh, H., JSYST March 2020* 277-287

End-to-End Distortion Analysis of Nonorthogonal Layered Coding Over Relay-Assisted Networks. *Padidar, P., +, JSYST Sept. 2020 4466-4476*

Securing Untrusted Full-Duplex Relay Channels in the Presence of Multiple External Cluster-Based Eavesdroppers. *Mabrouk, A.*, +, *JSYST March* 2020 665-668

Channel estimation

A Novel Receiver Design of Nonorthogonal FDM Systems in Underwater Acoustics Communication. *Anwar, S., +, JSYST Sept. 2020 3875-3884*

A System Simulation Framework for Modeling Space Modulation Techniques. *Hiari*, O., +, *JSYST March 2020 1435-1446*

D2D-Enabled User Cooperation in Massive MIMO. *Liu*, Y, +, *JSYST Sept.* 2020 4406-4417

Deep RNN-Based Channel Tracking for Wireless Energy Transfer System. Kang, J., +, JSYST Sept. 2020 4340-4343

Location-Aided mMIMO Channel Tracking and Hybrid Beamforming for High-Speed Railway Communications: An Angle-Domain Approach. *Xu*, *K.*, +, *JSYST March 2020 93-104*

Novel Energy-Harvesting AF Relaying Schemes With Channel Estimation Errors. Zhou, Y., +, JSYST March 2020 333-342

- Optimizing Design Parameters for Relay-Aided Massive MIMO Systems. El-Mashed, M.G., JSYST June 2020 2249-2256
- Outage and Average Rate Performances of Full-Duplex Multiuser AF Relay Systems With Time-Selective Fading. *Raut, P.*, +, *JSYST Sept. 2020 3390-3398*
- Performance Analysis of Precoded Wireless OFDM With Carrier Frequency Offset. Kalbat, F., +, JSYST June 2020 2237-2248
- RF Chain Reduction for MIMO Systems: A Hardware Prototype. *Gong, T.*, +, *JSYST Dec. 2020 5296-5307*
- Robust Directional Modulation Design for Secrecy Rate Maximization in Multiuser Networks. *Gui*, *L.*, +, *JSYST Sept. 2020 3150-3160*

Chaos

- Chaos-Based Anytime-Reliable Coded Communications. *Tarable, A.*, +, JSYST June 2020 2214-2224
- Polynomial Chaos Expansion for Parametric Problems in Engineering Systems: A Review. Shen, D., +, JSYST Sept. 2020 4500-4514

Chaotic communication

A Robust Synchronization-Based Chaotic Secure Communication Scheme With Double-Layered and Multiple Hybrid Networks. *Zhou, L.*, +, *JSYST June 2020 2508-2519*

Chebyshev approximation

Outage and Average Rate Performances of Full-Duplex Multiuser AF Relay Systems With Time-Selective Fading. *Raut, P.*, +, *JSYST Sept. 2020 3390-3398*

Checkpointing

Distributed Elections Using Site-Push Majority Winner Monitoring. Chaturvedi, K., +, JSYST June 2020 1682-1691

Chirp modulation

Orthogonal Chirp Division Multiplexing for Baseband Data Communication Systems. De M. B. A. Dib, L., +, JSYST June 2020 2164-2174

Choppers (circuits)

Systematized Active Power Control of PMSG-Based Wind-Driven Generators. Ramachandran, V., +, JSYST March 2020 708-717

Circuit breakers

- Improvement in Recloser–Fuse Coordination Technique Based on Modification Factor. Makwana, Y.M., +, JSYST June 2020 2770-2779
- Protection Coordination for Assembly HVDC Breakers for HVDC Multiterminal Grids Using Wavelet Transform. *Mitra*, B., +, *JSYST March 2020* 1069-1079

Circuit faults

Protection of Converter-Interfaced Microgrids Using Modified Short-Time Correlation Transform. *Allahdadi, K.*, +, *JSYST Dec. 2020 5172-5175*

Closed loop systems

- A New MIMO ORC Architecture for Power Oscillation Damping Using Remote Feedback Signals Under Intermittent Observations. *Yogarathinam, A.*, +, *JSYST March 2020 939-949*
- Cyber-Attacks in a Looped Energy-Water Nexus: An Inoculated Sub-Observer-Based Approach. Khalid, H.M., +, JSYST June 2020 2054-2065
- Global Fault-Tolerant Sampled-Data Control for Large-Scale Switched Time-Delay Nonlinear Systems. He, W., +, JSYST June 2020 1549-1557
- Globally Stable Formation Control of Nonholonomic Multiagent Systems With Bearing-Only Measurement. *Luo*, X., +, *JSYST June* 2020 2901-2912
- Model Predictive Control via PV-Based VAR Scheme for Power Distribution Systems With Regular and Unexpected Abnormal Loads. *Yang. Y.*, +, *JSYST March 2020 689-698*
- Neuroadaptive Sliding Mode Formation Control of Autonomous Underwater Vehicles With Uncertain Dynamics. Wang, J., +, JSYST Sept. 2020 3325-3333
- Robust Nonlinear State Feedback Control of Bidirectional Interlink Power Converters in Grid-Connected Hybrid Microgrids. *Zolfaghari, M.*, +, *JSYST March 2020 1117-1124*
- Sampled-Data Decentralized Output Feedback Control for a Class of Switched Large-Scale Stochastic Nonlinear Systems. *Li*, S., +, *JSYST June* 2020 1602-1610

Closed-form solutions

Fairness Enhancement for Opportunistic Interference Alignment Algorithm With Low Latency Communications. *Lu, H.*, +, *JSYST Dec. 2020 5002-5013*

Cloud computing

- A Provably Secure and Efficient Identity-Based Anonymous Authentication Scheme for Mobile Edge Computing. *Jia, X.*, +, *JSYST March 2020 560*-571
- A Public Auditing Protocol for Cloud Storage System With Intrusion-Resilience. *Ding*, R., +, *JSYST March* 2020 633-644
- A WOA-Based Optimization Approach for Task Scheduling in Cloud Computing Systems. Chen, X., +, JSYST Sept. 2020 3117-3128
- An Adaptive Grid Frequency Support Mechanism for Energy Management in Cloud Data Centers. *Kaur*, K., +, *JSYST March 2020 1195-1205*
- An Efficient Elliptic Curve Cryptography-Based Without Pairing KPABE for Internet of Things. Sowjanya, K., +, JSYST June 2020 2154-2163
- Bio-Inspired Heuristics for VM Consolidation in Cloud Data Centers. Wang, J.V., +, JSYST March 2020 152-163
- Cache-Aware Computation Offloading in IoT Systems. Wei, H., +, JSYST March 2020 61-72
- Campus Edge Computing Network Based on IoT Street Lighting Nodes. Chang, Y., +, JSYST March 2020 164-171
- ChainSDI: A Software-Defined Infrastructure for Regulation-Compliant Home-Based Healthcare Services Secured by Blockchains. *Li*, *P*, +, *JSYST June 2020 2042-2053*
- Computation and Sensor Offloading for Cloud-Based Infrastructure-Assisted Autonomous Vehicles. Kong, P., JSYST Sept. 2020 3360-3370
- Efficient Ranked Multi-Keyword Retrieval With Privacy Protection for Multiple Data Owners in Cloud Computing. Sun, J., +, JSYST June 2020 1728-1739
- Energy-Efficient IoT-Fog-Cloud Architectural Paradigm for Real-Time Wildfire Prediction and Forecasting. Kaur, H., +, JSYST June 2020 2003-2011
- Ephemeral-Cyber-Physical System: A Cloud-Like CPS Using Shared Devices in Open IoT. Noguchi, H., +, JSYST Dec. 2020 5176-5186
- Fast Switching With VM Migration in 5G Cloud Radio Access Networks. Wang, Y., +, JSYST March 2020 477-488
- Hierarchical Edge-Cloud SDN Controller System With Optimal Adaptive Resource Allocation for Load-Balancing. *Lin, F.P.*, +, *JSYST March 2020* 265-276
- Improved Proxy Re-Encryption With Delegatable Verifiability. *Zhan, Y.*, +, JSYST March 2020 592-602
- Improving Security and Privacy Attribute Based Data Sharing in Cloud Computing. Zhang, L., +, JSYST March 2020 387-397
- Intelligent Energy-Saving Supervision System of Urban Buildings Based on the Internet of Things: A Case Study. Xing, L., +, JSYST Sept. 2020 4252-4261
- Loosely Coupled Cloud Robotic Framework for QoS-Driven Resource Allocation-Based Web Service Composition. *Xie, Y., +, JSYST March 2020 1245-1256*
- Microscale Particulate Matter Monitoring With Reliable Event Transport in Urban Environments. *Yang*, T., +, *JSYST June 2020 3057-3060*
- Microservice-Based Architecture for an Energy Management System. *Lyu*, Z., +, *JSYST Dec.* 2020 5061-5072
- Multigranular Wavelet Decomposition-Based Support Vector Regression and Moving Average Method for Service-Time Prediction on Web Map Service Platforms. *Dong, G.*, +, *JSYST Sept. 2020 3653-3664*
- Near-Optimal Multicast Tree Construction in Leaf-Spine Data Center Networks. Luo, S., +, JSYST June 2020 2581-2584
- Remote Data Checking With a Designated Verifier in Cloud Storage. *Yan*, H., +, *JSYST June 2020 1788-1797*
- Traffic Control for RDMA-Enabled Data Center Networks: A Survey. *Guo*, Z., +, *JSYST March 2020 677-688*
- VTracer: When Online Vehicle Trajectory Compression Meets Mobile Edge Computing. Chen, C., +, JSYST June 2020 1635-1646

Clouds

- A Practicable Copula-Based Approach for Power Forecasting of Small-Scale Photovoltaic Systems. *Rajabalizadeh*, S., +, JSYST Dec. 2020 4911-4918
- Optimizing the Ground Network of Optical MEO Satellite Communication Systems. *Lyras, N.K.*, +, *JSYST Sept. 2020 3968-3976*

30 IEEE SYSTEMS JOURNAL

Clustering algorithms

Transient Instability Mitigation via Repetitive Corrective Actions Based Upon the Real-Time Macrocoherency Evaluation. Babu, G.V.N.Y., +, JSYST Dec. 2020 5084-5095

Coal

Optimized Fuzzy Logic-Based Fire Monitoring in Underground Coal Mines: Binary Particle Swarm Optimization Approach. *Muduli, L.*, +, *JSYST June* 2020 3039-3046

Cochannel interference

Association, Blockage, and Handoffs in IEEE 802.11ad-Based 60-GHz Picocells—A Closer Look. *Joshi, K.C.*, +, *JSYST June 2020 2144-2153*

Multiobjective Precoder Design for Coexisting Wireless Energy Transfer and Information Transmission Systems. *Zhang, H.*, +, *JSYST March 2020 445-456*

Cogeneration

A Two-Stage Mathematical Programming Approach for the Solution of Combined Heat and Power Economic Dispatch. *Moradi-Dalvand, M.*, +, *JSYST June 2020 2873-2881*

Cyber-Attacks in a Looped Energy-Water Nexus: An Inoculated Sub-Observer-Based Approach. *Khalid, H.M.*, +, *JSYST June 2020 2054-2065*

Optimal CHP Planning in Integrated Energy Systems Considering Network Charges. Wang, H., +, JSYST June 2020 2684-2693

Probabilistic Optimal Dynamic Planning of Onsite Solar Generation for Residential Energy Hubs. *Senemar*, S., +, *JSYST March 2020 832-841*

Cognitive radar

Adaptive OFDM Waveform Design for Cognitive Radar in Signal-Dependent Clutter. Karimi, V., +, JSYST Sept. 2020 3630-3640

Cooperative Sensing Scheme for Acquisition of Rotational Synchronization of Radar. Lee, J., +, JSYST June 2020 3061-3064

Joint Subarray Selection and Power Allocation for Cognitive Target Tracking in Large-Scale MIMO Radar Networks. Zhang, H., +, JSYST June 2020 2569-2580

Cognitive radio

A Contract Theory Approach-Based Scheme to Encourage Secondary Users for Cooperative Sensing in Cognitive Radio Networks. *Gupta, N.*, +, *JSYST June 2020 2400-2410*

A Robust Hyperbolic Tangent-Based Energy Detector With Gaussian and Non-Gaussian Noise Environments in Cognitive Radio System. *Qu, H.*, +, *JSYST Sept. 2020 3161-3172*

Artificial-Noise-Aided Energy-Efficient Secure Beamforming for Multi-Eavesdroppers in Cognitive Radio Networks. *Chen, P., +, JSYST Sept. 2020 3801-3812*

Bayesian-Inference-Based Sliding Window Trust Model Against Probabilistic SSDF Attack in Cognitive Radio Networks. Fu, Y, +, JSYST June 2020 1764-1775

Cognitive Radio Spectrum Sensing Under Joint TX/RX I/Q Imbalance and Uncalibrated Receiver. *Jalali*, F., +, *JSYST March* 2020 105-112

Cooperative Sensing Scheme for Acquisition of Rotational Synchronization of Radar. Lee, J., +, JSYST June 2020 3061-3064

Decentralized Learning for Opportunistic Spectrum Access: Multiuser Restless Multiarmed Bandit Formulation. *Agrawal*, H., +, *JSYST June 2020* 2485-2406

Distributed Learning and Coordination in Cognitive Infrastructureless Networks of Unknown Size. *Kumar*, R., +, *JSYST June 2020 2085-2096*

Energy-Efficient GCSA Medium Access Protocol for Infrastructure-Based Cognitive Radio Networks. Syed, T.S., +, JSYST March 2020 288-297

Novel Algorithms for Blind Sensing of Signals With Variable Bandwidths in Cognitive Radio. De, P., JSYST Sept. 2020 4272-4283

Residual Energy Maximization in Cognitive Radio Networks With Q-Routing. Paul, A., +, JSYST Sept. 2020 3791-3800

Robust Secure Beamforming and Power Splitting for Millimeter-Wave Cognitive Satellite-Terrestrial Networks With SWIPT. *Yan, Y.*, +, *JSYST Sept.* 2020 3233-3244

Spectrum-Occupancy Aware Cooperative Spectrum Sensing Using Adaptive Detection. Al-Jarrah, M.A., +, JSYST June 2020 2225-2236

Sum-Throughput Maximization of Secondary Users in an In-Band Full-Duplex Cognitive Wireless Powered Communication Network. *Jafari*, R., +, *JSYST June* 2020 2109-2120

Throughput Maximization for Cognitive Radio With Wirelessly Powered Primary Users. Sun, M., +, JSYST June 2020 2432-2442

Collision avoidance

Computation and Sensor Offloading for Cloud-Based Infrastructure-Assisted Autonomous Vehicles. Kong, P., JSYST Sept. 2020 3360-3370

Cooperative Dynamic Fuzzy Perimeter Surveillance: Modeling and Fluid-Based Framework. Wu, J., +, JSYST Dec. 2020 5210-5220

Formation Obstacle Avoidance: A Fluid-Based Solution. Wu, J., +, JSYST March 2020 1479-1490

Globally Stable Formation Control of Nonholonomic Multiagent Systems With Bearing-Only Measurement. Luo, X., +, JSYST June 2020 2901-2912

Integration Design of Sortie Scheduling for Carrier Aircrafts Based on Hybrid Flexible Flowshop. *Liu*, *J.*, +, *JSYST March 2020 1503-1511*

Path Planning for Autonomous Underwater Vehicles With Simultaneous Arrival in Ocean Environment. *Yao*, P., +, *JSYST Sept. 2020 3185-3193*

Research on Cooperative Trajectory Planning and Tracking Problem for Multiple Carrier Aircraft on the Deck. *Liu, J.*, +, *JSYST June 2020 3027-3038*

Combinatorial mathematics

Network Slice Admission Model: Tradeoff Between Monetization and Rejections. Challa, R., +, JSYST March 2020 657-660

Toward a More Reliable System for Contingency Selection in Static Security Analysis of Electric Power Systems. da Silva, J.M., +, JSYST March 2020 1183-1194

Combined cycle power stations

Cyber-Attacks in a Looped Energy-Water Nexus: An Inoculated Sub-Observer-Based Approach. *Khalid, H.M.*, +, *JSYST June 2020 2054-2065*

Communication complexity

Distributed Elections Using Site-Push Majority Winner Monitoring. Chaturvedi, K., +, JSYST June 2020 1682-1691

Energy-Efficient Resource Allocation in SWIPT Cooperative Wireless Networks. *Guo*, S., +, *JSYST Sept. 2020 4131-4142*

Near-Optimal Detection of Monobit Digitized UWB Signals in the Presence of Noise and Strong Intersymbol Interference. *Khani, H.*, +, *JSYST June* 2020 2311-2322

Partial-Fixed Interference Alignment in Multiuser Interference Channel. Chen, X., +, JSYST June 2020 2303-2310

Throughput Maximization for Cognitive Radio With Wirelessly Powered Primary Users. Sun, M., +, JSYST June 2020 2432-2442

Uplink Low-Power Scheduling for Delay-Bounded Industrial Wireless Networks Based on Imperfect Power-Domain NOMA. *Xu, C.*, +, *JSYST June* 2020 2443-2454

Communication system security

Artificial Noise Hopping: A Practical Secure Transmission Technique With Experimental Analysis for Millimeter Wave Systems. *Ju, Y.*, +, *JSYST Dec.* 2020 5121-5132

Compensation

Energy-Efficient Resource Allocation for Dynamic Priority-Based Vehicular Mobile-Health Communications. Fan, B., +, JSYST June 2020 2097-2108 Measurement Errors and Delays on Wide-Area Control Based on IEEE Std C37.118.1-2011: Impact and Compensation. Zacharia, L., +, JSYST March 2020 422-432

Complex networks

Complex Network-Based Transmission Network Vulnerability Assessment Using Adjacent Graphs. Zang, T., +, JSYST March 2020 572-581

Minimal Driver Nodes for Structural Controllability of Large-Scale Dynamical Systems: Node Classification. *Doostmohammadian, M., JSYST Sept.* 2020 4209-4216

Opinion Maximization Through Unknown Influence Power in Social Networks Under Weighted Voter Model. *He, Q.*, +, *JSYST June 2020 1874-1885*

Performance Comparison of Nonlinear Kalman Filters in Epidemic Tracking on Networks. Wang, W., +, JSYST Dec. 2020 5475-5485

Probabilistic Stability of Traffic Load Balancing on Wireless Complex Networks. *Moutsinas, G.*, +, *JSYST June 2020 2551-2556*

Complex systems

Process Heuristics: Extraction, Analysis, and Repository Considerations. Fillingim, K.B., +, JSYST Dec. 2020 5148-5159

Complexity theory

Iterative Sub-Band and Power Allocation in Downlink Multiband NOMA. Goswami, D., +, JSYST Dec. 2020 5199-5209

Performance Analysis of Software-Defined Multihop Wireless Sensor Networks. *Jurado-Lasso, F.F.*, +, *JSYST Dec. 2020 4653-4662*

Process Heuristics: Extraction, Analysis, and Repository Considerations. Fillingim, K.B., +, JSYST Dec. 2020 5148-5159

Use of Patterns for Know-How Reuse in a Model-Based Systems Engineering Framework. Wu, Q., +, JSYST Dec. 2020 4765-4776

Compressed sensing

Energy-Efficient Design of MI Communication-Based 3-D Non-Conventional WSNs. Yadav, S., +, JSYST June 2020 2585-2588

Reweighted Compressed Sensing-Based Smart Grids Topology Reconstruction With Application to Identification of Power Line Outage. *Huang, K.*, +, *JSYST Sept. 2020 4329-4339*

Computational complexity

A Flexible Multicarrier Scheme Based on the Discrete Orthogonal Stockwell Transform. Colen, G.R., +, JSYST Dec. 2020 5284-5295

Adaptive Traffic Management and Energy Cooperation in Renewable-Energy-Powered Cellular Networks. Lee, H., +, JSYST March 2020 132-143

CB-PS: An Efficient Short-Certificate-Based Proxy Signature Scheme for UAVs. Verma, G.K., +, JSYST March 2020 621-632

Computation and Sensor Offloading for Cloud-Based Infrastructure-Assisted Autonomous Vehicles. Kong, P., JSYST Sept. 2020 3360-3370

Connected Target ε-probability Coverage in WSNs With Directional Probabilistic Sensors. Xu, X., +, JSYST Sept. 2020 3399-3409

Cyber-Social Systems: Modeling, Inference, and Optimal Design. *Doostmo-hammadian*, M., +, JSYST March 2020 73-83

Distributed Learning and Coordination in Cognitive Infrastructureless Networks of Unknown Size. Kumar, R., +, JSYST June 2020 2085-2096

Market-Driven Stochastic Resource Allocation Framework for Wireless Network Virtualization. *Gomez, M.M.*, +, *JSYST March 2020 489-499*

Minimal Driver Nodes for Structural Controllability of Large-Scale Dynamical Systems: Node Classification. *Doostmohammadian, M., JSYST Sept.* 2020 4209-4216

Modified Power Reserve Management Solution in Power System Considering Frequency Constraints. *Hosseini, S.A.*, +, *JSYST March 2020 1125-1134*

Near-Optimal Multicast Tree Construction in Leaf-Spine Data Center Networks. Luo, S., +, JSYST June 2020 2581-2584

On the Optimization of User Association and Resource Allocation in Het-Nets With mm-Wave Base Stations. *Chaieb, C.*, +, *JSYST Sept. 2020 3957-3967*

Opinion Maximization Through Unknown Influence Power in Social Networks Under Weighted Voter Model. *He, Q.*, +, *JSYST June 2020 1874-1885*

Reconfigurable Architecture of UFMC Transmitter for 5G and Its FPGA Prototype. Kumar, V., +, JSYST March 2020 28-38

Computational efficiency

SimProxy Decision Support System: A Neural Network Proxy Applied to Reservoir and Surface Integrated Optimization. *Kohler, M.*, +, *JSYST Dec.* 2020 5111-5120

Computational modeling

Modeling and Decision-Making Methods for a Class of Cyber–Physical Systems Based on Modified Hybrid Stochastic Timed Petri Net. *Cao, R.*, +, *JSYST Dec. 2020 4684-4693*

Navigation of a Network of Aerial Drones for Monitoring a Frontier of a Moving Environmental Disaster Area. Savkin, A.V., +, JSYST Dec. 2020 4746-4749

SimProxy Decision Support System: A Neural Network Proxy Applied to Reservoir and Surface Integrated Optimization. *Kohler, M.*, +, *JSYST Dec.* 2020 5111-5120

Toward Energy-Oriented Optimization for Green Communication in Sensor Enabled IoT Environments. *Kumar*, S., +, *JSYST Dec.* 2020 4663-4673

Computer aided instruction

A Context-Aware Augmentative and Alternative Communication System for School Children With Intellectual Disabilities. *Chan, R.Y.*, +, *JSYST March* 2020 208-219

Experiential Systems Engineering Education Concept Using Stratospheric Balloon Missions. *Golkar, A., JSYST June 2020 1558-1567*

Computer architecture

A Model-Based Systems Engineering Approach for the Efficient Specification of Test Rig Architectures for Flight Control Computers. *Liscouet-Hanke*, S., +, *JSYST Dec.* 2020 5441-5450

Cost-Effective Migration Toward Virtualized C-RAN With Scalable Fronthaul Design. *Masoudi*, M., +, JSYST Dec. 2020 5100-5110

Microservice-Based Architecture for an Energy Management System. *Lyu*, Z., +, *JSYST Dec.* 2020 5061-5072

Computer centers

An Adaptive Grid Frequency Support Mechanism for Energy Management in Cloud Data Centers. *Kaur, K., +, JSYST March 2020 1195-1205*

Bio-Inspired Heuristics for VM Consolidation in Cloud Data Centers. Wang, J.V., +, JSYST March 2020 152-163

Near-Optimal Multicast Tree Construction in Leaf-Spine Data Center Networks. Luo, S., +, JSYST June 2020 2581-2584

Topology-Aware Data Placement Strategy for Fault-Tolerant Storage Systems. Xia, J., +, JSYST Sept. 2020 4296-4307

Traffic Control for RDMA-Enabled Data Center Networks: A Survey. *Guo*, Z., +, *JSYST March 2020 677-688*

Computer crime

Autonomic Intrusion Detection and Response Using Big Data. Vieira, K., +, JSYST June 2020 1984-1991

Brief Survey on Attack Detection Methods for Cyber-Physical Systems. *Tan*, S., +, *JSYST Dec.* 2020 5329-5339

Computer network management

A Smart Optimization of Fault Diagnosis in Electrical Grid Using Distributed Software-Defined IoT System. *Al Mhdawi, A.K.*, +, *JSYST June 2020* 2780-2790

A Software-Defined Management System for IP-Enabled WSNs. *Jura-do-Lasso, F.F.*, +, *JSYST June 2020 2335-2346*

Adaptive and Stable Delay Control for Combating Bufferbloat: Theory and Algorithms. Ye, J., +, JSYST March 2020 1285-1296

An Actor-Critic Deep Reinforcement Learning Approach for Transmission Scheduling in Cognitive Internet of Things Systems. *Yang, H.*, +, *JSYST March 2020 51-60*

DAISY: A Detection and Mitigation System Against Denial-of-Service Attacks in Software-Defined Networks. *Imran, M.*, +, *JSYST June 2020 1933-1944*

SDNMM—A Generic SDN-Based Modular Management System for Wireless Sensor Networks. *Ndiaye*, *M.*, +, *JSYST June 2020 2347-2357*

Computer network reliability

A Smart Optimization of Fault Diagnosis in Electrical Grid Using Distributed Software-Defined IoT System. *Al Mhdawi, A.K.*, +, *JSYST June 2020* 2780, 2790

Near-Optimal Multicast Tree Construction in Leaf-Spine Data Center Networks. Luo, S., +, JSYST June 2020 2581-2584

Topology-Aware Data Placement Strategy for Fault-Tolerant Storage Systems. Xia, J., +, JSYST Sept. 2020 4296-4307

Computer network security

A Lightweight ECC-Based Authentication Scheme for Internet of Things (IoT). *Hammi, B.*, +, *JSYST Sept. 2020 3440-3450*

A Lightweight Mutual Authentication for Smart Grid Neighborhood Area Network Communications Based on Physically Unclonable Function. *Kaveh, M.*, +, *JSYST Sept. 2020 4535-4544*

A Secure End-to-End Verifiable Internet-Voting System Using Identity-Based Blind Signature. *Kumar*; M., +, *JSYST June* 2020 2032-2041

A Secure Three-Factor User Authentication Protocol With Forward Secrecy for Wireless Medical Sensor Network Systems. *Li*, *X*., +, *JSYST March* 2020 39-50

Analyzing NDN NACK on Interest Flooding Attack via SIS Epidemic Model. Wang, K., +, JSYST June 2020 1862-1873

DAISY: A Detection and Mitigation System Against Denial-of-Service Attacks in Software-Defined Networks. *Imran, M.*, +, *JSYST June 2020 1933-1944*

- Efficient and Provably Secure Certificateless Parallel Key-Insulated Signature Without Pairing for IIoT Environments. *Xiong, H.*, +, *JSYST March* 2020 310-320
- Intrusion-Detector-Dependent Frequency Regulation for Microgrids Under Denial-of-Service Attacks. *Liu, S., +, JSYST June 2020 2593-2596*
- Moving Target Defense Mechanism for Side-Channel Attacks. *Vuppala, S.*, +, *JSYST June 2020 1810-1819*
- Resist Interest Flooding Attacks via Entropy–SVM and Jensen–Shannon Divergence in Information-Centric Networking. Zhi, T., +, JSYST June 2020 1776-1787
- Secure Distribution of Protected Content in Information-Centric Networking. Bilal, M., +, JSYST June 2020 1921-1932
- SMS–A Security Management System for Steam Turbines Using a Multisensor Array. Kordestani, M., +, JSYST Sept. 2020 3813-3824

Computer security

Data-Driven Vulnerability Exploration for Design Phase System Analysis. *Bakirtzis, G.*, +, *JSYST Dec. 2020 4864-4873*

Computer vision

- System Integration of Sensor-Fusion Localization Tasks Using Vision-Based Driving Lane Detection and Road-Marker Recognition. *Lin, C.*, +, *JSYST Sept. 2020 4523-4534*
- Visual Perception for Multiple Human–Robot Interaction From Motion Behavior. Benli, E., +, JSYST June 2020 2937-2948

Computerized monitoring

A Safety System for Human Radiation Protection and Guidance in Extreme Environmental Conditions. *Adamidi, E.S.*, +, *JSYST March 2020 1384-1394*

Concave programming

- A Two-Stage Mathematical Programming Approach for the Solution of Combined Heat and Power Economic Dispatch. *Moradi-Dalvand, M.*, +, *JSYST June 2020 2873-2881*
- Artificial-Noise-Aided Energy-Efficient Secure Beamforming for Multi-Eavesdroppers in Cognitive Radio Networks. *Chen, P.*, +, *JSYST Sept. 2020 3801-3812*
- Efficient and Risk-Aware Control of Electricity Distribution Grids. *Liberati*, F, +, JSYST Sept. 2020 3586-3597
- Energy-Efficient Resource Allocation in SWIPT Cooperative Wireless Networks. Guo, S., +, JSYST Sept. 2020 4131-4142
- Increasing the Lifetime of Underwater Acoustic Sensor Networks: Difference Convex Approach. *Mohammadi*, Z., +, JSYST Sept. 2020 3214-3224
- Joint Beamforming and Relay Selection in AF Two-Way Relay Networks With Energy Transfer. *Tian, M., +, JSYST June 2020 2597-2600*
- Joint Subarray Selection and Power Allocation for Cognitive Target Tracking in Large-Scale MIMO Radar Networks. Zhang, H., +, JSYST June 2020 2569-2580
- Joint Trajectory Design, Tx Power Allocation, and Rx Power Splitting for UAV-Enabled Multicasting SWIPT Systems. *Kang, J.*, +, *JSYST Sept.* 2020 3740-3743
- Low Probability of Intercept-Based Optimal Power Allocation Scheme for an Integrated Multistatic Radar and Communication System. Shi, C., +, JSYST March 2020 983-994
- Multiobjective Precoder Design for Coexisting Wireless Energy Transfer and Information Transmission Systems. *Zhang, H.*, +, *JSYST March 2020* 445-456
- Robust Power Control for Clustering-Based Vehicle-to-Vehicle Communication. Liu, Z., +, JSYST June 2020 2557-2568
- Robust Secure Beamforming and Power Splitting for Millimeter-Wave Cognitive Satellite-Terrestrial Networks With SWIPT. *Yan, Y.*, +, *JSYST Sept.* 2020 3233-3244

Concurrency control

An MDE-Based Tool for Early Analysis of UML2.0/PSM Atomic and Composite Components. *Rouis, T.S.*, +, *JSYST June 2020 1647-1657*

Condition monitoring

Health Monitoring for Cyber Physical Systems. Shangguan, L., +, JSYST March 2020 1457-1467

Consumer behavior

Understanding Risks and Opportunities of Autonomous Vehicle Technology Adoption Through Systems Dynamic Scenario Modeling—The American Insurance Industry. *Liu, C.*, +, *JSYST March 2020 1365-1374*

Containers

Microservice-Based Architecture for an Energy Management System. *Lyu*, Z., +, *JSYST Dec. 2020 5061-5072*

Context modeling

Modeling Social Contagion and Information Diffusion in Complex Socio-Technical Systems. *Muhlmeyer, M.*, +, *JSYST Dec. 2020 5187-5198* Use of Patterns for Know-How Reuse in a Model-Based Systems Engineering Framework. *Wu, Q.*, +, *JSYST Dec. 2020 4765-4776*

Contracts

Toward a Theory of Systems Engineering Processes: A Principal—Agent Model of a One-Shot, Shallow Process. Safarkhani, S., +, JSYST Sept. 2020 3277-3288

Control engineering computing

- A Novel Control-Performance-Oriented Data-Driven Fault Classification Approach. Liu, T., +, JSYST June 2020 1830-1839
- An Intelligent Elevator Development and Management System. Van, L., +, JSYST June 2020 3015-3026
- CB-PS: An Efficient Short-Certificate-Based Proxy Signature Scheme for UAVs. Verma, G.K., +, JSYST March 2020 621-632
- Cyber-Attacks in a Looped Energy-Water Nexus: An Inoculated Sub-Observer-Based Approach. Khalid, H.M., +, JSYST June 2020 2054-2065
- FPGA-Based Design Optimization in Autonomous Robot Systems for Inspection of Civil Infrastructure. *Lins, R.G.*, +, *JSYST June 2020 2961-2964*
- Improving Microgrid Low-Voltage Ride-Through Capacity Using Neural Control. *Djilali*, L., +, *JSYST June 2020 2825-2836*
- Secure Consensus Control of Multiagent Cyber-Physical Systems With Uncertain Nonlinear Models. *Rezaee, H., +, JSYST Sept. 2020 3539-3546*

Control nonlinearities

Local Controllability, Trajectory Planning, and Stabilization of a Two-Agent Underactuated Microrobotic System. *Fruchard, M.*, +, *JSYST June 2020* 2892-2900

Control system security

Secure Consensus Control of Multiagent Cyber-Physical Systems With Uncertain Nonlinear Models. *Rezaee, H.*, +, *JSYST Sept. 2020 3539-3546*

Control system synthesis

- A Hybrid Photovoltaic-Fuel Cell-Based Single-Stage Grid Integration With Lyapunov Control Scheme. *Priyadarshi*, *N.*, +, *JSYST Sept. 2020 3334-3347*
- A New MIMO ORC Architecture for Power Oscillation Damping Using Remote Feedback Signals Under Intermittent Observations. *Yogarathinam*, A., +, JSYST March 2020 939-949
- An Experimental Estimation of Hybrid ANFIS–PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, *N.*, +, *JSYST March* 2020 1218-1229
- Decentralized Output-Feedback-Based Robust LQR V-f Controller for PV-Battery Microgrid Including Generation Uncertainties. Sen, S., +, JSYST Sept. 2020 4418-4429
- Flexible Control Structure for Enhancement of Scalability in DC Microgrids. Ko, B., +, JSYST Sept. 2020 4591-4601
- Fuzzy-Observer-Based Predictive Stabilization of DC Microgrids With Power Buffers Through an Imperfect 5G Network. *Vafamand*, N., +, *JSYST Sept.* 2020 4025-4035
- Global Fault-Tolerant Sampled-Data Control for Large-Scale Switched Time-Delay Nonlinear Systems. He, W., +, JSYST June 2020 1549-1557
- Globally Stable Formation Control of Nonholonomic Multiagent Systems With Bearing-Only Measurement. *Luo*, *X.*, +, *JSYST June 2020 2901-2912*
- Hierarchical Edge-Cloud SDN Controller System With Optimal Adaptive Resource Allocation for Load-Balancing. *Lin, F.P.*, +, *JSYST March 2020* 265-276
- Improving Power Systems Transient Stability by Coordinated Control of Energy Storage Systems and Synchronous Generators in Presence of Measurement Noise. Rostami, M., +, JSYST March 2020 1088-1097

- Local Controllability, Trajectory Planning, and Stabilization of a Two-Agent Underactuated Microrobotic System. *Fruchard, M.*, +, *JSYST June 2020 2892-2900*
- Multilevel Inverter (MLI)-Based Stand-Alone Photovoltaic System: Modeling, Analysis, and Control. Kumar, N., +, JSYST March 2020 909-915
- Neuroadaptive Sliding Mode Formation Control of Autonomous Underwater Vehicles With Uncertain Dynamics. Wang, J., +, JSYST Sept. 2020 3325-3333
- Optimal Connected Cruise Control With Arbitrary Communication Delays. Wang, Z., +, JSYST June 2020 2913-2924
- Recursive Smooth Variable Structure Filter for Estimation Processes in Direct Power Control Scheme Under Balanced and Unbalanced Power Grid. AlShabi, M., +, JSYST March 2020 971-982
- Robust Nonlinear State Feedback Control of Bidirectional Interlink Power Converters in Grid-Connected Hybrid Microgrids. *Zolfaghari, M.*, +, *JSYST March 2020 1117-1124*
- Robust Voltage Control in Inverter-Interfaced Microgrids Under Plug-and-Play Functionalities. Zarei, A., +, JSYST June 2020 2813-2824
- Sampled-Data Decentralized Output Feedback Control for a Class of Switched Large-Scale Stochastic Nonlinear Systems. *Li*, S., +, *JSYST June* 2020 1602-1610
- Toward a Robust Design of an Aileron Electromechanical Actuator: Sensitivity Analysis and Parametric Tolerancing Using a Variational Approach. Siala, H., +, JSYST Sept. 2020 3977-3986
- Voltage/Current Large Transient Suppression in DC Microgrids Using Local Information and Active Stabilizing Capability. *Azimi, S.M.*, +, *JSYST March 2020 1109-1116*

Control systems

- A Model-Based Systems Engineering Approach for the Efficient Specification of Test Rig Architectures for Flight Control Computers. *Liscouet-Hanke*, S., +, *JSYST Dec.* 2020 5441-5450
- An Enhanced Motorway Control System for Mixed Manual/Automated Traffic Flow. Li, D., +, JSYST Dec. 2020 4726-4734
- Brief Survey on Attack Detection Methods for Cyber-Physical Systems. *Tan, S., +, JSYST Dec. 2020 5329-5339*
- Containment Control of Linear Multiagent Systems With Stochastic Disturbances via Event-Triggered Strategies. Zou, W., +, JSYST Dec. 2020 4810-4819

Controllability

Minimal Driver Nodes for Structural Controllability of Large-Scale Dynamical Systems: Node Classification. *Doostmohammadian, M., JSYST Sept.* 2020 4209-4216

Controller area networks

Comparative Analysis of Communication Assisted Grid Synchronization Methods in Microgrids. S., N., +, JSYST March 2020 1007-1014

Convergence

A Decomposition-Based Local Search for Large-Scale Many-Objective Vehicle Routing Problems With Simultaneous Delivery and Pickup and Time Windows. *Zhou, Y., +, JSYST Dec. 2020 5253-5264*

Convergence of numerical methods

Transmission–Distribution Cosimulation: Analytical Methods for Iterative Coupling. Krishnamoorthy, G., +, JSYST June 2020 2633-2642

Convex programming

- A Distributed Convex Relaxation Approach to Solve the Power Flow Problem. *Manshadi*, S.D., +, JSYST March 2020 803-812
- An Optimal Multivariable Constrained Nonlinear (MVCNL) Stochastic Microgrid Planning and Operation Problem With Renewable Penetration. Kumar, M., +, JSYST Sept. 2020 4143-4154
- Equilibrium Analysis of Electricity Market With Demand Response Exchange to Counterbalance Bid Deviations of Renewable Generators. Wang, X., +, JSYST June 2020 2713-2724
- Increasing the Lifetime of Underwater Acoustic Sensor Networks: Difference Convex Approach. *Mohammadi, Z.*, +, *JSYST Sept. 2020 3214-3224*
- Joint Beamforming and Relay Selection in AF Two-Way Relay Networks With Energy Transfer. *Tian, M.*, +, *JSYST June 2020 2597-2600*
- Joint Trajectory Design, Tx Power Allocation, and Rx Power Splitting for UAV-Enabled Multicasting SWIPT Systems. *Kang, J.*, +, *JSYST Sept.* 2020 3740-3743

- Optimizing Efficient Energy Transmission on a SWIPT Interference Channel Under Linear/Nonlinear EH Models. *Tuan, P.V.*, +, *JSYST March 2020* 457-468
- Robust Power Control for Clustering-Based Vehicle-to-Vehicle Communication. Liu, Z., +, JSYST June 2020 2557-2568
- Robust Secure Beamforming and Power Splitting for Millimeter-Wave Cognitive Satellite-Terrestrial Networks With SWIPT. *Yan, Y.*, +, *JSYST Sept.* 2020 3233-3244
- Sum-Throughput Maximization of Secondary Users in an In-Band Full-Duplex Cognitive Wireless Powered Communication Network. *Jafari*, R., +, *JSYST June* 2020 2109-2120

Convolutional codes

Chaos-Based Anytime-Reliable Coded Communications. *Tarable, A.*, +, *JSYST June 2020 2214-2224*

Convolutional neural networks

- A New Combinatory Approach for Wind Power Forecasting. *Abedinia, O.*, +, *JSYST Sept. 2020 4614-4625*
- A Pipeline Leak Classification and Location Estimation System With Convolutional Neural Networks. Cai, Y., +, JSYST Sept. 2020 3072-3081

Cooling

Quantifying the System-Level Resilience of Thermal Power Generation to Extreme Temperatures and Water Scarcity. *Zhou, Y.*, +, *JSYST March 2020 749-759*

Cooperative communication

- A Contract Theory Approach-Based Scheme to Encourage Secondary Users for Cooperative Sensing in Cognitive Radio Networks. *Gupta*, *N.*, +, *JSYST June 2020 2400-2410*
- Artificial-Noise-Aided Energy-Efficient Secure Beamforming for Multi-Eavesdroppers in Cognitive Radio Networks. *Chen, P.*, +, *JSYST Sept. 2020 3801-3812*
- Bayesian-Inference-Based Sliding Window Trust Model Against Probabilistic SSDF Attack in Cognitive Radio Networks. Fu, Y, +, JSYST June 2020 1764-1775
- Cooperative Communication and Energy-Harvesting-Enabled Energy-Efficient Design of MI-Based Clustered Nonconventional WSNs. *Prasanna*, A.L., +, JSYST June 2020 2293-2302
- Cooperative Sensing Scheme for Acquisition of Rotational Synchronization of Radar. Lee, J., +, JSYST June 2020 3061-3064
- Cooperative Space Shift Keying Media-Based Modulation With Hybrid Relaying. *Yarkin, F.*, +, *JSYST March 2020 500-509*
- Cost-Benefit Tradeoff of Byzantine Attack in Cooperative Spectrum Sensing. Wu, J., +, JSYST June 2020 2532-2543
- Covert Communications in D2D Underlaying Cellular Networks With Power Domain NOMA. *Jiang, Y.*, +, *JSYST Sept. 2020 3717-3728*
- D2D-Enabled User Cooperation in Massive MIMO. *Liu*, Y, +, *JSYST Sept.* 2020 4406-4417
- Delay-Optimal Cooperation Policy in a Slotted Aloha Full-Duplex Wireless Network: Static Approach. *Vaezi*, K., +, *JSYST June 2020 2257-2268*
- Energy-Efficient Adaptive Sectorization for 5G Green Wireless Communication Systems. *Jain, P., +, JSYST June 2020 2382-2391*
- Energy-Efficient Resource Allocation in SWIPT Cooperative Wireless Networks. Guo, S., +, JSYST Sept. 2020 4131-4142
- Joint Beamforming and Relay Selection in AF Two-Way Relay Networks With Energy Transfer. *Tian, M., +, JSYST June 2020 2597-2600*
- Novel Algorithms for Blind Sensing of Signals With Variable Bandwidths in Cognitive Radio. De, P., JSYST Sept. 2020 4272-4283
- Performance Analysis of a Mixed Cooperative PLC–VLC System for Indoor Communication Systems. *Jani, M., +, JSYST March 2020 469-476*
- Performance Evaluation of In-Band Full-Duplex System Using One-Time-Slot Two-Way Relay. *Chang, K.*, +, *JSYST March 2020 510-519*
- QoS-Aware Cross-Layer Optimization of Hybrid DSL-LTE Access Networks. Chuah, T.C., +, JSYST June 2020 2175-2186
- Securing Untrusted Full-Duplex Relay Channels in the Presence of Multiple External Cluster-Based Eavesdroppers. *Mabrouk, A.*, +, *JSYST March* 2020 665-668
- Spectrum-Occupancy Aware Cooperative Spectrum Sensing Using Adaptive Detection. Al-Jarrah, M.A., +, JSYST June 2020 2225-2236

34 IEEE SYSTEMS JOURNAL

Cooperative systems

A Cyber-Physical Cooperative Hierarchical Control Strategy for Islanded Microgrid Facing With Random Communication Failure. *Zhang, B.*, +, *JSYST June 2020 2849-2860*

Crowd-Based Cooperative Task Allocation via Multicriteria Optimization and Decision-Making. Zhao, L., +, JSYST Sept. 2020 3904-3915

Correlation

A Practicable Copula-Based Approach for Power Forecasting of Small-Scale Photovoltaic Systems. *Rajabalizadeh, S., +, JSYST Dec. 2020 4911-4918*

Protection of Converter-Interfaced Microgrids Using Modified Short-Time Correlation Transform. *Allahdadi, K.*, +, *JSYST Dec. 2020 5172-5175*

Cost reduction

Control of Parallel ULTC Transformers in Active Distribution Systems. *Pouladi, A.*, +, *JSYST March 2020 960-970*

Fast Resource Scheduling for Distribution Systems Enabled With Discrete Control Devices. *Nouri*, A., +, *JSYST Sept.* 2020 3767-3778

Joint Energy-QoE Efficient Content Delivery Networks Using Real-Time Energy Management. Goudarzi, P., +, JSYST March 2020 927-938

Optimal CHP Planning in Integrated Energy Systems Considering Network Charges. Wang, H., +, JSYST June 2020 2684-2693

Cost-benefit analysis

Cost-Benefit Tradeoff of Byzantine Attack in Cooperative Spectrum Sensing. Wu, J., +, JSYST June 2020 2532-2543

Value Uncertainty Analysis in Architecture and Trade Studies. *Maier, M.W.*, +, *JSYST Dec.* 2020 5417-5428

Costing

Cable Connection Optimization for Onshore Wind Farms Considering Restricted Area and Topography. Li, J., +, JSYST Sept. 2020 3082-3092

Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur*, R., +, *JSYST March 2020 729-737*

Optimal CHP Planning in Integrated Energy Systems Considering Network Charges. Wang, H., +, JSYST June 2020 2684-2693

Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets. *Oikonomou, K.*, +, *JSYST Sept. 2020* 3729-3739

Covariance analysis

Covariance Analysis of LAV Robust Dynamic State Estimation in Power Systems. Sun, L., +, JSYST June 2020 2801-2812

Multiobjective Precoder Design for Coexisting Wireless Energy Transfer and Information Transmission Systems. *Zhang, H.*, +, *JSYST March 2020* 445-456

Covariance matrices

Asymptotic Analysis of Full-Duplex Large-Scale MIMO Systems With Low-Resolution ADCs/DACs Over Rician Fading Channels. *Dai*, *J*., +, *JSYST Dec.* 2020 4832-4841

D2D-Enabled User Cooperation in Massive MIMO. *Liu*, Y, +, *JSYST Sept.* 2020 4406-4417

Crack detection

FPGA-Based Design Optimization in Autonomous Robot Systems for Inspection of Civil Infrastructure. *Lins, R.G.*, +, *JSYST June 2020 2961-2964*

Critical infrastructures

Cybersecurity Vulnerability Mitigation Framework Through Empirical Paradigm (CyFEr): Prioritized Gap Analysis. *Gourisetti, S.N.G.*, +, *JSYST June 2020 1897-1908*

Risk Analysis of Cyber-Physical Systems by GTST-MLD. Di Maio, F., +, JSYST March 2020 1333-1340

Crude oil

Quantum-Inspired Genetic Programming Algorithm for the Crude Oil Scheduling of a Real-World Refinery. *Pereira*, C.S., +, JSYST Sept. 2020 3926-3937

Cryptocurrencies

Toward Characterizing Blockchain-Based Cryptocurrencies for Highly Accurate Predictions. Saad, M., +, JSYST March 2020 321-332

Cryptographic protocols

A Lightweight Privacy-Preserving Authentication Protocol for VANETs. *Li*, *X*, +, *JSYST Sept. 2020 3547-3557*

A New Privacy-Enhanced Technology for Fair Matchmaking With Identity Linked Wishes. *Horne, D.*, +, *JSYST March 2020 298-309*

A Novel Privacy-Preserving Authentication Scheme for V2G Networks. Su, Y., +, JSYST June 2020 1963-1971

A Provably Secure and Efficient Identity-Based Anonymous Authentication Scheme for Mobile Edge Computing. *Jia, X.*, +, *JSYST March 2020 560*-571

A Public Auditing Protocol for Cloud Storage System With Intrusion-Resilience. *Ding*, R., +, *JSYST March* 2020 633-644

A Secure Three-Factor User Authentication Protocol With Forward Secrecy for Wireless Medical Sensor Network Systems. *Li*, *X*., +, *JSYST March* 2020 39-50

Insider Attack Protection: Lightweight Password-Based Authentication Techniques Using ECC. *Rajamanickam, S.*, +, *JSYST June 2020 1972-1083*

Lightweight Secure Message Broadcasting Protocol for Vehicle-to-Vehicle Communication. *Limbasiya*, T., +, *JSYST March* 2020 520-529

Remote Data Checking With a Designated Verifier in Cloud Storage. *Yan*, H., +, *JSYST June 2020 1788-1797*

Cryptography

A Dynamic Membership Data Aggregation (DMDA) Protocol for Smart Grid. Song, J., +, JSYST March 2020 900-908

A Lattice Signcrypted Secured Localization in Wireless Sensor Networks. Kumar, G., +, JSYST Sept. 2020 3949-3956

A Robust Synchronization-Based Chaotic Secure Communication Scheme With Double-Layered and Multiple Hybrid Networks. *Zhou, L.*, +, *JSYST June 2020 2508-2519*

Agent Pseudonymous Authentication-Based Conditional Privacy Preservation: An Emergent Intelligence Technique. *Chavhan, S.*, +, *JSYST Dec.* 2020 5233-5244

Cyber-Attack Resilient Design of Wide-Area PSS Considering Practical Communication Constraints. *Prakash, T.*, +, *JSYST June 2020 2012-2022*

Efficient Obfuscation for Encrypted Identity-Based Signatures in Wireless Body Area Networks. *Zhang, Y.*, +, *JSYST Dec. 2020 5320-5328*

Efficient Ranked Multi-Keyword Retrieval With Privacy Protection for Multiple Data Owners in Cloud Computing. Sun, J., +, JSYST June 2020 1728-1739

Improved Proxy Re-Encryption With Delegatable Verifiability. *Zhan, Y.*, +, JSYST March 2020 592-602

Improving Security and Privacy Attribute Based Data Sharing in Cloud Computing. Zhang, L., +, JSYST March 2020 387-397

Lightweight Privacy-Preserving Scheme in Wi-Fi Fingerprint-Based Indoor Localization. Zhang, G., +, JSYST Sept. 2020 4638-4647

Moving Target Defense Mechanism for Side-Channel Attacks. *Vuppala, S.*, +, *JSYST June 2020 1810-1819*

Secure Distribution of Protected Content in Information-Centric Networking. Bilal, M., +, JSYST June 2020 1921-1932

Curing

Analyzing NDN NACK on Interest Flooding Attack via SIS Epidemic Model. Wang, K., +, JSYST June 2020 1862-1873

Current measurement

Fault Detection for Low-Voltage Residential Distribution Systems With Low-Frequency Measured Data. *Shafiei*, M., +, *JSYST Dec.* 2020 5265-5273

Cyber-physical systems

A Stochastic Model of Cascading Failure Dynamics in Cyber-Physical Power Systems. *Gao*, X., +, *JSYST Sept. 2020 4626-4637*

Brief Survey on Attack Detection Methods for Cyber-Physical Systems. *Tan, S., +, JSYST Dec. 2020 5329-5339*

Data-Driven Vulnerability Exploration for Design Phase System Analysis. Bakirtzis, G., +, JSYST Dec. 2020 4864-4873

Energy-Aware Connectivity Restoration Mechanism for Cyber-Physical Systems of Networked Sensors and Robots. *Baroudi, U.*, +, *JSYST Sept.* 2020 3093-3104

Health Monitoring for Cyber Physical Systems. Shangguan, L., +, JSYST March 2020 1457-1467

Modeling and Vulnerability Analysis of Cyber-Physical Power Systems Based on Community Theory. Pan, H., +, JSYST Sept. 2020 3938-3948

Probabilistic Inference of Fault Condition of Cyber-Physical Systems Under Uncertainty. *Tao*, X., +, *JSYST Sept. 2020 3256-3266*

Secure Consensus Control of Multiagent Cyber-Physical Systems With Uncertain Nonlinear Models. *Rezaee, H., +, JSYST Sept. 2020 3539-3546*

Cyber-physical systems

Modeling and Decision-Making Methods for a Class of Cyber–Physical Systems Based on Modified Hybrid Stochastic Timed Petri Net. *Cao, R.*, +, *JSYST Dec. 2020 4684-4693*

D

Damping

A New MIMO ORC Architecture for Power Oscillation Damping Using Remote Feedback Signals Under Intermittent Observations. *Yogarathinam, A.*, +, *JSYST March 2020 939-949*

Adaptive Interconnection and Damping Assignment Passivity-Based Control of Interlinking Converter in Hybrid AC/DC Grids. *Azimi, S.M.*, +, *JSYST Dec.* 2020 4718-4725

Mitigation of Power and Frequency Instability to Improve Load Sharing Among Distributed Inverters in Microgrid Systems. *Firdaus, A.*, +, *JSYST March 2020 1024-1033*

Systematized Active Power Control of PMSG-Based Wind-Driven Generators. Ramachandran, V., +, JSYST March 2020 708-717

Data acquisition

A Safety System for Human Radiation Protection and Guidance in Extreme Environmental Conditions. *Adamidi, E.S.*, +, *JSYST March 2020 1384-1394*

Determining Impact of Lightning Strike Location on Failures in Transmission Network Elements Using Fuzzy Decision-Making. *Petrovic, I.*, +, *JSYST June 2020 2665-2675*

Intelligent Energy-Saving Supervision System of Urban Buildings Based on the Internet of Things: A Case Study. Xing, L., +, JSYST Sept. 2020 4252-4261

Microscale Particulate Matter Monitoring With Reliable Event Transport in Urban Environments. *Yang*, T., +, *JSYST June* 2020 3057-3060

Data aggregation

An Efficient Privacy-Friendly Hop-by-Hop Data Aggregation Scheme for Smart Grids. *Gope, P.*, +, *JSYST March 2020 343-352*

Data analysis

A Multidimensional Holistic Framework for the Security of Distributed Energy and Control Systems. Saleem, D., +, JSYST March 2020 17-27

ASIS: Autonomous Seismic Imaging System With In Situ Data Analytics and Renewable Energy. Clemente, J., +, JSYST March 2020 1277-1284

Practical Privacy-Preserving Frequent Itemset Mining on Supermarket Transactions. Ma, C., +, JSYST June 2020 1992-2002

Utility-Driven Data Analytics on Uncertain Data. Gan, W., +, JSYST Sept. 2020 4442-4453

Data assimilation

An Enhanced Motorway Control System for Mixed Manual/Automated Traffic Flow. Li, D., +, JSYST Dec. 2020 4726-4734

Data communication

Orthogonal Chirp Division Multiplexing for Baseband Data Communication Systems. De M. B. A. Dib, L., +, JSYST June 2020 2164-2174

PLC Systems Under the Presence of a Malicious Wireless Communication Device: Physical Layer Security Analyses. *Camponogara*, A., +, *JSYST Dec.* 2020 4901-4910

Data compression

Energy-Efficient Design of MI Communication-Based 3-D Non-Conventional WSNs. *Yadav*, S., +, *JSYST June 2020 2585-2588*

VTracer: When Online Vehicle Trajectory Compression Meets Mobile Edge Computing. Chen, C., +, JSYST June 2020 1635-1646

Data integrity

A Public Auditing Protocol for Cloud Storage System With Intrusion-Resilience. *Ding, R.*, +, *JSYST March 2020 633-644*

An Elliptic Curve-Based Scalable Data Aggregation Scheme for Smart Grid. Chen, Y., +, JSYST June 2020 2066-2077

Remote Data Checking With a Designated Verifier in Cloud Storage. *Yan*, H., +, *JSYST June 2020 1788-1797*

Data mining

A Dynamic Membership Data Aggregation (DMDA) Protocol for Smart Grid. Song, J., +, JSYST March 2020 900-908

A PMU-Based Data-Driven Approach for Classifying Power System Events Considering Cyberattacks. Ma, R., +, JSYST Sept. 2020 3558-3569

A Temporal Recommendation Mechanism Based on Signed Network of User Interest Changes. Chen, J., +, JSYST March 2020 244-252

Practical Privacy-Preserving Frequent Itemset Mining on Supermarket Transactions. Ma, C., +, JSYST June 2020 1992-2002

Utility-Driven Data Analytics on Uncertain Data. Gan, W., +, JSYST Sept. 2020 4442-4453

Data models

A Theory for Optimizing Insecure Internetwork Connections. Das, P., +, JSYST Dec. 2020 4842-4853

Data-Driven Vulnerability Exploration for Design Phase System Analysis. Bakirtzis, G., +, JSYST Dec. 2020 4864-4873

Fault Detection for Low-Voltage Residential Distribution Systems With Low-Frequency Measured Data. Shafiei, M., +, JSYST Dec. 2020 5265-5273

Midterm Load Forecasting: A Multistep Approach Based on Phase Space Reconstruction and Support Vector Machine. *Li*, G., +, *JSYST Dec.* 2020 4967-4977

Modeling Social Contagion and Information Diffusion in Complex Socio-Technical Systems. *Muhlmeyer, M.*, +, *JSYST Dec. 2020 5187-5198*

Data privacy

A Dynamic Membership Data Aggregation (DMDA) Protocol for Smart Grid. Song, J., +, JSYST March 2020 900-908

A Lightweight ECC-Based Authentication Scheme for Internet of Things (IoT). *Hammi*, B., +, *JSYST Sept. 2020 3440-3450*

A Lightweight Privacy-Preserving Authentication Protocol for VANETs. *Li*, *X*., +, *JSYST Sept.* 2020 3547-3557

A New Privacy-Enhanced Technology for Fair Matchmaking With Identity Linked Wishes. *Horne, D.*, +, *JSYST March 2020 298-309*

A Novel Privacy-Preserving Authentication Scheme for V2G Networks. Su, Y, +, JSYST June 2020 1963-1971

A Provably Secure and Efficient Identity-Based Anonymous Authentication Scheme for Mobile Edge Computing. *Jia, X.*, +, *JSYST March 2020 560-571*

An Efficient Elliptic Curve Cryptography-Based Without Pairing KPABE for Internet of Things. Sowjanya, K., +, JSYST June 2020 2154-2163

An Efficient Privacy-Friendly Hop-by-Hop Data Aggregation Scheme for Smart Grids. *Gope, P.*, +, *JSYST March 2020 343-352*

An Elliptic Curve-Based Scalable Data Aggregation Scheme for Smart Grid. Chen, Y., +, JSYST June 2020 2066-2077

Anonymous Aggregate Encryption Scheme for Industrial Internet of Things. Deng, L., JSYST Sept. 2020 3999-4006

Efficient Ranked Multi-Keyword Retrieval With Privacy Protection for Multiple Data Owners in Cloud Computing. Sun, J., +, JSYST June 2020 1728-1739

Improved Proxy Re-Encryption With Delegatable Verifiability. *Zhan, Y.*, +, JSYST March 2020 592-602

Improving Security and Privacy Attribute Based Data Sharing in Cloud Computing. Zhang, L., +, JSYST March 2020 387-397

Lightweight Privacy-Preserving Scheme in Wi-Fi Fingerprint-Based Indoor Localization. Zhang, G., +, JSYST Sept. 2020 4638-4647

Practical Privacy-Preserving Frequent Itemset Mining on Supermarket Transactions. Ma, C., +, JSYST June 2020 1992-2002

SieveDroid: Intercepting Undesirable Private-Data Transmissions in Android Applications. *Huang, J.*, +, *JSYST March 2020 375-386*

Data visualization

Creating Power System Network Layouts: A Fast Parallel Algorithm. *Olauson*, J., +, JSYST Sept. 2020 3687-3694

Systems Engineers' Effectiveness in an Organization: Text and Visual Analytics Approach. Zavala, A., +, JSYST Dec. 2020 5049-5060

Venue2Vec: An Efficient Embedding Model for Fine-Grained User Location Prediction in Geo-Social Networks. Xu, S., +, JSYST June 2020 1740-1751

36 IEEE SYSTEMS JOURNAL

DC motors

A Novel Control-Performance-Oriented Data-Driven Fault Classification Approach. Liu, T., +, JSYST June 2020 1830-1839

Decentralized control

- Decentralized Output-Feedback-Based Robust LQR V-f Controller for PV-Battery Microgrid Including Generation Uncertainties. Sen, S., +, JSYST Sept. 2020 4418-4429
- Global Fault-Tolerant Sampled-Data Control for Large-Scale Switched Time-Delay Nonlinear Systems. He, W., +, JSYST June 2020 1549-1557
- Improving Power Systems Transient Stability by Coordinated Control of Energy Storage Systems and Synchronous Generators in Presence of Measurement Noise. *Rostami, M.*, +, *JSYST March 2020 1088-1097*
- Sampled-Data Decentralized Output Feedback Control for a Class of Switched Large-Scale Stochastic Nonlinear Systems. *Li*, S., +, *JSYST June* 2020 1602-1610

Decision making

- A Functional Resonance Analysis Method Driven Resilience Quantification for Socio-Technical Systems. *Bellini*, E., +, *JSYST March* 2020 1234-1244
- A Multicriteria Trading System Based on Singular Spectrum Analysis Trading Rules. Leles, M.C.R., +, JSYST March 2020 1468-1478
- Additive Manufacturing Evaluation Tool for Design Studies. *Garzaniti*, N., +, *JSYST Sept.* 2020 4382-4393
- An Actor-Critic Deep Reinforcement Learning Approach for Transmission Scheduling in Cognitive Internet of Things Systems. *Yang, H.*, +, *JSYST March* 2020 51-60
- An Information Theoretic Approach to Platform Technology Selection to Aid Influence Operations. *Hartong, M.W.*, +, *JSYST Dec. 2020 5308-5319*
- Bee-Inspired Evaluation Algorithm Leads to Improved Decision Making in Groups. Sturgis, M., +, JSYST March 2020 1427-1434
- Crowd-Based Cooperative Task Allocation via Multicriteria Optimization and Decision-Making. Zhao, L., +, JSYST Sept. 2020 3904-3915
- Determining Impact of Lightning Strike Location on Failures in Transmission Network Elements Using Fuzzy Decision-Making. *Petrovic, I.*, +, *JSYST June 2020 2665-2675*
- Development of an Ensemble Decision Tree-Based Power System Dynamic Security State Predictor. *Mukherjee*, R., +, *JSYST Sept. 2020 3836-3843*
- Disclose or Exploit? A Game-Theoretic Approach to Strategic Decision Making in Cyber-Warfare. Chen, H., +, JSYST Sept. 2020 3779-3790
- Modeling and Decision-Making Methods for a Class of Cyber–Physical Systems Based on Modified Hybrid Stochastic Timed Petri Net. *Cao, R.*, +, *JSYST Dec. 2020 4684-4693*
- Probabilistic Inference of Fault Condition of Cyber-Physical Systems Under Uncertainty. *Tao*, X., +, *JSYST Sept. 2020 3256-3266*
- Probabilistic Optimal Dynamic Planning of Onsite Solar Generation for Residential Energy Hubs. *Senemar, S., +, JSYST March 2020 832-841*
- Process Heuristics: Extraction, Analysis, and Repository Considerations. Fillingim, K.B., +, JSYST Dec. 2020 5148-5159
- Reliability Evaluation in Microgrids With Non-Exponential Failure Rates of Power Units. *Peyghami, S.*, +, *JSYST June 2020 2861-2872*
- Weight Induced Norm Approach to Group Decision Making for Multiobjective Optimization Problems in Systems Engineering. *Chiu, W.*, +, *JSYST June 2020 1580-1591*

Decision theory

- A Novel Hybrid Framework for Co-Optimization of Power and Natural Gas Networks Integrated With Emerging Technologies. *Mirzaei, M.A.*, +, *JSYST Sept. 2020 3598-3608*
- Online Planning for Multiagent Situational Information Gathering in the Markov Environment. Zhou, X., +, JSYST June 2020 1798-1809

Decision trees

Development of an Ensemble Decision Tree-Based Power System Dynamic Security State Predictor. *Mukherjee*, R., +, *JSYST Sept. 2020 3836-3843*

Decode and forward communication

- End-to-End Distortion Analysis of Nonorthogonal Layered Coding Over Relay-Assisted Networks. *Padidar, P.*, +, *JSYST Sept. 2020 4466-4476*
- End-to-End Performance Analysis With Decode-and-Forward Relays in Multihop Wireless Systems Over\$\alpha\$- η- μ Fading Channels. Salameh, H.A.B., +, JSYST March 2020 84-92

- Energy-Efficient Resource Allocation in SWIPT Cooperative Wireless Networks. *Guo*, S., +, *JSYST Sept. 2020 4131-4142*
- On Secure Mixed RF-FSO Decode-and-Forward Relaying Systems With Energy Harvesting. Saber, M.J., +, JSYST Sept. 2020 4402-4405
- Performance Analysis of a Mixed Cooperative PLC–VLC System for Indoor Communication Systems. *Jani, M.*, +, *JSYST March 2020 469-476*
- Performance of Wireless Powered DF Relay System Under Nakagami-mFading: Relay Assists Energy-Constrained Source. Kumar, P., +, JSYST June 2020 2497-2507

Decoding

- Chaos-Based Anytime-Reliable Coded Communications. *Tarable, A.*, +, *JSYST June 2020 2214-2224*
- Deep Learning-Based MIMO-NOMA With Imperfect SIC Decoding. *Kang*, *J.*, +, *JSYST Sept. 2020 3414-3417*
- End-to-End Distortion Analysis of Nonorthogonal Layered Coding Over Relay-Assisted Networks. *Padidar, P., +, JSYST Sept. 2020 4466-4476*
- Joint Position, Decoding Order, and Power Allocation Optimization in UAV-Based NOMA Downlink Communications. *Hu, D.*, +, *JSYST June 2020* 2949-2960
- Legitimate Surveillance With Battery-Aided Wireless Powered Full-Duplex Monitor. Xu, D., JSYST Dec. 2020 5229-5232
- Multiuser Variable Rate GO-OFDMA Architecture and Its FPGA Prototype. Palisetty, R., +, JSYST June 2020 2455-2463
- Shortest Uplink Scheduling for NOMA-Based Industrial Wireless Networks. Xu, C., +, JSYST Dec. 2020 5384-5395

Delay effects

An Improvized Coordinated Voltage Control Scheme for Better Utilization of Regulating Devices During Various Operating Conditions of a Distribution System. *Gururaj, M.V.*, +, *JSYST Dec.* 2020 4891-4900

Delay tolerant networks

Resource Optimization Protocol Based on Multicommunity Model for Intermittently Connected Mobile Networks. Wang, T., +, JSYST March 2020 410-421

Delays

- A Decomposition-Based Local Search for Large-Scale Many-Objective Vehicle Routing Problems With Simultaneous Delivery and Pickup and Time Windows. *Zhou, Y., +, JSYST Dec. 2020 5253-5264*
- Adaptive and Stable Delay Control for Combating Bufferbloat: Theory and Algorithms. *Ye, J.*, +, *JSYST March 2020 1285-1296*
- Cyber-Attack Resilient Design of Wide-Area PSS Considering Practical Communication Constraints. *Prakash*, T., +, *JSYST June* 2020 2012-2022
- Cyber-Attacks in a Looped Energy-Water Nexus: An Inoculated Sub-Observer-Based Approach. Khalid, H.M., +, JSYST June 2020 2054-2065
- Distributed Estimation in Multimissile Cyber-Physical Systems With Time Delay. *Abdelmawgoud*, A., +, *JSYST March* 2020 1491-1502
- Disturbance-Observer-Based Frequency Regulation Scheme for Low-Inertia Microgrid Systems. *Sharma, D.*, +, *JSYST March 2020 782-792*
- Fairness Enhancement for Opportunistic Interference Alignment Algorithm With Low Latency Communications. *Lu*, *H*., +, *JSYST Dec. 2020 5002-5012*
- Fuzzy-Observer-Based Predictive Stabilization of DC Microgrids With Power Buffers Through an Imperfect 5G Network. *Vafamand, N.*, +, *JSYST Sept. 2020 4025-4035*
- Global Fault-Tolerant Sampled-Data Control for Large-Scale Switched Time-Delay Nonlinear Systems. He, W., +, JSYST June 2020 1549-1557
- Optimal Connected Cruise Control With Arbitrary Communication Delays. Wang, Z., +, JSYST June 2020 2913-2924
- Performance Analysis of Priority-Based Access Class Barring Scheme for Massive MTC Random Access. Sim, Y., +, JSYST Dec. 2020 5245-5252

Demand side management

- A Game Theoretic Model for the Multiperiodic Smart Grid Demand Response Problem. *Belhaiza*, S., +, *JSYST March 2020 1147-1158*
- A Novel Hybrid Framework for Co-Optimization of Power and Natural Gas Networks Integrated With Emerging Technologies. *Mirzaei, M.A.*, +, *JSYST Sept. 2020 3598-3608*
- Active Distribution Network Operation: A Market-Based Approach. Zubo, R.H.A., +, JSYST March 2020 1405-1416

Equilibrium Analysis of Electricity Market With Demand Response Exchange to Counterbalance Bid Deviations of Renewable Generators. *Wang, X.*, +, *JSYST June 2020 2713-2724*

Local Estimation of Critical and Off-Peak Periods for Grid-Friendly Flexible Load Management. *Guzman, C.*, +, *JSYST Sept. 2020 4262-4271*

Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets. *Oikonomou, K.*, +, *JSYST Sept. 2020* 3729-3739

Optimal Planning and Operational Strategy of a Residential Microgrid With Demand Side Management. *Bhamidi*, L., +, JSYST June 2020 2624-2632

Demodulation

An Online Bearing Fault Diagnosis Technique via Improved Demodulation Spectrum Analysis Under Variable Speed Conditions. *Liu, D.*, +, *JSYST June 2020 2323-2334*

Desalination

Cyber-Attacks in a Looped Energy-Water Nexus: An Inoculated Sub-Observer-Based Approach. Khalid, H.M., +, JSYST June 2020 2054-2065

Design Optimization of RES-Based Desalination Systems Cooperating With Smart Grids. *Malisovas, A.*, +, *JSYST Dec. 2020 4706-4717*

Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets. *Oikonomou, K.*, +, *JSYST Sept. 2020* 3729-3739

Design engineering

Additive Manufacturing Evaluation Tool for Design Studies. *Garzaniti*, N., +, *JSYST Sept. 2020 4382-4393*

An Agent-Based Model of Miscommunication in Complex System Engineering Organizations. Meluso, J., +, JSYST Sept. 2020 3463-3474

Bioanalytical Device Design With Model-Based Systems Engineering Tools. Evin, E., +, JSYST Sept. 2020 3139-3149

Model-Based Design of Complex Aeronautical Systems Through Digital Twin and Thread Concepts. *Bachelor*, G., +, JSYST June 2020 1568-1579

Design methodolgy

Process Heuristics: Extraction, Analysis, and Repository Considerations. Fillingim, K.B., +, JSYST Dec. 2020 5148-5159

Design optimization

Design Optimization of RES-Based Desalination Systems Cooperating With Smart Grids. Malisovas, A., +, JSYST Dec. 2020 4706-4717

Detectors

An Enhanced Motorway Control System for Mixed Manual/Automated Traffic Flow. Li, D., +, JSYST Dec. 2020 4726-4734

Brief Survey on Attack Detection Methods for Cyber-Physical Systems. *Tan, S., +, JSYST Dec. 2020 5329-5339*

Device-to-device communication

Autonomous Resource Slicing for Virtualized Vehicular Networks With D2D Communications Based on Deep Reinforcement Learning. Sun, G., +, JSYST Dec. 2020 4694-4705

Diesel-electric generators

Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur*, R., +, *JSYST March* 2020 729-737

Differential equations

Polynomial Chaos Expansion for Parametric Problems in Engineering Systems: A Review. Shen, D., +, JSYST Sept. 2020 4500-4514

Differential games

Simultaneous Benefit Maximization of Conflicting Opinions: Modeling and Analysis. *Yang, L., +, JSYST June 2020 1623-1634*

Digital signatures

A Lightweight Certificateless Aggregation Signature Scheme With Provably Security in the Standard Model. *Deng, L.*, +, *JSYST Sept. 2020 4242-4251*

A Novel Privacy-Preserving Authentication Scheme for V2G Networks. Su, Y, +, JSYST June 2020 1963-1971

Anonymous Aggregate Encryption Scheme for Industrial Internet of Things. Deng, L., JSYST Sept. 2020 3999-4006

CB-PS: An Efficient Short-Certificate-Based Proxy Signature Scheme for UAVs. Verma, G.K., +, JSYST March 2020 621-632

Efficient and Provably Secure Certificateless Parallel Key-Insulated Signature Without Pairing for IIoT Environments. *Xiong, H.*, +, *JSYST March* 2020 310-320

Improved Proxy Re-Encryption With Delegatable Verifiability. *Zhan, Y.*, +, JSYST March 2020 592-602

White-Box Implementation of Shamir's Identity-Based Signature Scheme. Feng, O., +, JSYST June 2020 1820-1829

Digital subscriber lines

QoS-Aware Cross-Layer Optimization of Hybrid DSL-LTE Access Networks. Chuah, T.C., +, JSYST June 2020 2175-2186

Directed graphs

Critical Nodes Identification of Complex Power Systems Based on Electric Cactus Structure. Yang, D., +, JSYST Sept. 2020 4477-4488

Minimal Driver Nodes for Structural Controllability of Large-Scale Dynamical Systems: Node Classification. Doostmohammadian, M., JSYST Sept. 2020 4209-4216

Opinion Maximization Through Unknown Influence Power in Social Networks Under Weighted Voter Model. *He, Q.*, +, *JSYST June 2020 1874-1885*

Direction-of-arrival estimation

Robust Directional Modulation Design for Secrecy Rate Maximization in Multiuser Networks. *Gui, L.*, +, *JSYST Sept. 2020 3150-3160*

Disasters

An Improved Rapid-Source Parameter Determination System (AQUA) for Giant Earthquakes. *Kimura*, H., +, *JSYST Sept.* 2020 3451-3462

Deployment of Drone-Based Small Cells for Public Safety Communication System. *Ali*, *K*., +, *JSYST June 2020 2882-2891*

Electrical Power System Resilience Assessment: A Comprehensive Approach. Sabouhi, H., +, JSYST June 2020 2643-2652

Energy-Efficient IoT-Fog-Cloud Architectural Paradigm for Real-Time Wildfire Prediction and Forecasting. *Kaur*; H., +, *JSYST June 2020 2003-2011*

Metanetwork Framework for Performance Analysis of Disaster Management System-of-Systems. Fan, C., +, JSYST March 2020 1265-1276

Multicriteria UAV Base Stations Placement for Disaster Management. Akram, T., +, JSYST Sept. 2020 3475-3482

Discrete Fourier transforms

Orthogonal Chirp Division Multiplexing for Baseband Data Communication Systems. De M. B. A. Dib, L., +, JSYST June 2020 2164-2174

PMU-Assisted Zone-3 Protection Scheme for PV Integrated Power Systems Immune to Interharmonics. *Prakash, T.*, +, *JSYST Sept. 2020 3267-3276*

Discrete time systems

Optimal Connected Cruise Control With Arbitrary Communication Delays. Wang, Z., +, JSYST June 2020 2913-2924

Discrete wavelet transforms

Discrete-Wavelet-Transform and Stockwell-Transform-Based Statistical Parameters Estimation for Fault Analysis in Grid-Connected Wind Power System. *Mukherjee*, N., +, *JSYST Sept. 2020 4320-4328*

Fault Detection, Classification, and Location by Static Switch in Microgrids Using Wavelet Transform and Taguchi-Based Artificial Neural Network. Hong, Y., +, JSYST June 2020 2725-2735

Diseases

Heterogeneous System-on-Chip-Based Lattice-Boltzmann Visual Simulation System. Zhai, X., +, JSYST June 2020 1592-1601

Dispersive channels

A Novel Receiver Design of Nonorthogonal FDM Systems in Underwater Acoustics Communication. *Anwar, S., +, JSYST Sept. 2020 3875-3884*

Distance measurement

Globally Stable Formation Control of Nonholonomic Multiagent Systems With Bearing-Only Measurement. *Luo*, X., +, *JSYST June 2020 2901-2912*

Distortion

A Theory for Optimizing Insecure Internetwork Connections. Das, P., +, JSYST Dec. 2020 4842-4853

Joint Optimization of Power and Fronthaul Compression for Data and Pilot Signals in Uplink C-RANs. Yu, H., +, JSYST Dec. 2020 4990-5001

Distributed algorithms

Distributed Learning and Coordination in Cognitive Infrastructureless Networks of Unknown Size. Kumar, R., +, JSYST June 2020 2085-2096

Distributed control

Cyber-Attacks in a Looped Energy-Water Nexus: An Inoculated Sub-Observer-Based Approach. Khalid, H.M., +, JSYST June 2020 2054-2065

- Distributed Estimation in Multimissile Cyber-Physical Systems With Time Delay. *Abdelmawgoud*, A., +, *JSYST March* 2020 1491-1502
- Distributed Hierarchical Control for Optimal Power Dispatch in Multiple DC Microgrids. *Babazadeh-Dizaji*, R., +, *JSYST March* 2020 1015-1023
- Optimal Connected Cruise Control With Arbitrary Communication Delays. Wang, Z., +, JSYST June 2020 2913-2924

Distributed power generation

- A Coordinated Real-Time Voltage Control Approach for Increasing the Penetration of Distributed Generation. *Othman, M.M.*, +, *JSYST March 2020* 699-707
- A Cyber-Physical Cooperative Hierarchical Control Strategy for Islanded Microgrid Facing With Random Communication Failure. *Zhang, B.*, +, *JSYST June 2020 2849-2860*
- A Mixed Integer Nonlinear Program Based Power Load Estimator for Distribution Grid. *Yang, Y., +, JSYST March 2020 842-851*
- A Multidimensional Holistic Framework for the Security of Distributed Energy and Control Systems. Saleem, D., +, JSYST March 2020 17-27
- A New Model for Reconfiguration and Distributed Generation Allocation in Distribution Network Considering Power Quality Indices and Network Losses. *Moghaddam, M.J.H.*, +, *JSYST Sept. 2020 3530-3538*
- A Novel Control Method Based on Droop for Cooperation of Flywheel and Battery Energy Storage Systems in Islanded Microgrids. *Khodadoost Arani*, A.A., +, JSYST March 2020 1080-1087
- A Novel SCL Configuration Method for Modeling Microgrids With IEC 61850. *Aftab, M.A.*, +, *JSYST June 2020 2676-2683*
- A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926
- Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG. *Gheisarnejad*, M., +, JSYST March 2020 1058-1068
- Allocation of Renewables, Switches, and Relays Considering Relays Actual Operation Time. Fatemi, S.S., +, JSYST March 2020 950-959
- An Algorithm for Detection of Fault, Islanding, and Power Swings in DG-Equipped Radial Distribution Networks. *Ebrahim, M.A.*, +, *JSYST Sept. 2020 3893-3903*
- An Intelligent Detection of High-Impedance Faults for Distribution Lines Integrated With Distributed Generators. *Chaitanya, B.K.*, +, *JSYST March* 2020 870-879
- An Optimal Multivariable Constrained Nonlinear (MVCNL) Stochastic Microgrid Planning and Operation Problem With Renewable Penetration. Kumar, M., +, JSYST Sept. 2020 4143-4154
- Combined Impact of Network Reconfiguration and Volt-VAR Control Devices on Energy Savings in the Presence of Distributed Generation. Pamshetti, V.B., +, JSYST March 2020 995-1006
- Comparative Analysis of Communication Assisted Grid Synchronization Methods in Microgrids. S., N., +, JSYST March 2020 1007-1014
- Control of Parallel ULTC Transformers in Active Distribution Systems. *Pouladi*, A., +, *JSYST March* 2020 960-970
- Decentralized Output-Feedback-Based Robust LQR V-f Controller for PV-Battery Microgrid Including Generation Uncertainties. Sen, S., +, JSYST Sept. 2020 4418-4429
- Detection and Mitigation of Cyber-Attacks on AGC Systems of Low Inertia Power Grid. Roy, S.D., +, JSYST June 2020 2023-2031
- Distributed Hierarchical Control for Optimal Power Dispatch in Multiple DC Microgrids. *Babazadeh-Dizaji, R.*, +, *JSYST March 2020 1015-1023*
- Disturbance-Observer-Based Frequency Regulation Scheme for Low-Inertia Microgrid Systems. Sharma, D., +, JSYST March 2020 782-792
- Energy Storage Systems Architecture Optimization for Grid Resilience With High Penetration of Distributed Photovoltaic Generation. *Confrey, J.*, +, *JSYST March 2020 1135-1146*
- Fault Detection, Classification, and Location by Static Switch in Microgrids Using Wavelet Transform and Taguchi-Based Artificial Neural Network. Hong, Y., +, JSYST June 2020 2725-2735
- Flexible Control Structure for Enhancement of Scalability in DC Microgrids. Ko, B., +, JSYST Sept. 2020 4591-4601

- Fuzzy-Observer-Based Predictive Stabilization of DC Microgrids With Power Buffers Through an Imperfect 5G Network. Vafamand, N., +, JSYST Sept. 2020 4025-4035
- Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator. Kumar, V.N., +, JSYST Sept. 2020 4308-4319
- Improvement in Recloser–Fuse Coordination Technique Based on Modification Factor. *Makwana, Y.M.*, +, *JSYST June 2020 2770-2779*
- Improving Microgrid Low-Voltage Ride-Through Capacity Using Neural Control. *Djilali*, L., +, *JSYST June 2020 2825-2836*
- Increment-Exchange-Based Decentralized Multiobjective Optimal Power Flow for Active Distribution Grids. *Lu, W.*, +, *JSYST Sept. 2020 3695-3704*
- Intrusion-Detector-Dependent Frequency Regulation for Microgrids Under Denial-of-Service Attacks. *Liu, S., +, JSYST June 2020 2593-2596*
- Islanding Detection of Distributed Generation Based on Parallel Inductive Impedance Switching. *Rostami*, A., +, JSYST March 2020 813-823
- Local Measurements-Based Backup Protection for DC Microgrids Using Sequential Analyzing Technique. *Meghwani, A.*, +, *JSYST March 2020 1159-1170*
- Mitigation of Power and Frequency Instability to Improve Load Sharing Among Distributed Inverters in Microgrid Systems. *Firdaus, A.*, +, *JSYST March 2020 1024-1033*
- Moth Search Optimization for Optimal DERs Integration in Conjunction to OLTC Tap Operations in Distribution Systems. Singh, P., +, JSYST March 2020 880-888
- Multiobjective Multiscenario Under-Frequency Load Shedding in a Standalone Power System. *Hong, Y., +, JSYST June 2020 2759-2769*
- Multiobjective Optimization Technique for Mitigating Unbalance and Improving Voltage Considering Higher Penetration of Electric Vehicles and Distributed Generation. *Islam, M.R.*, +, *JSYST Sept. 2020 3676-3686*
- Novel Change Detection and Fault Classification Scheme for AC Microgrids. *Jarrahi, M.A.*, +, *JSYST Sept. 2020 3987-3998*
- Optimal Planning and Operational Strategy of a Residential Microgrid With Demand Side Management. *Bhamidi, L., +, JSYST June 2020 2624-2632*
- PMUs Enabled Tellegen's Theorem-Based Fault Identification Method for Unbalanced Active Distribution Network Using RTDS. *Bansal, Y.*, +, *JSYST Sept. 2020 4567-4578*
- Power Output Smoothing for Renewable Energy System: Planning, Algorithms, and Analysis. *Chen, X., +, JSYST March 2020 1034-1045*
- Priority-Based Scheduling of Energy Exchanges Between Cooperative Microgrids in Risk-Averse Environment. *Lahon, R.*, +, *JSYST March 2020* 1098-1108
- Probabilistic Model for Microgrids Optimal Energy Management Considering AC Network Constraints. *Javidsharifi, M.*, +, *JSYST June 2020 2703-2712*
- Reliability Evaluation in Microgrids With Non-Exponential Failure Rates of Power Units. *Peyghami, S.*, +, *JSYST June 2020 2861-2872*
- Robust Nonlinear State Feedback Control of Bidirectional Interlink Power Converters in Grid-Connected Hybrid Microgrids. *Zolfaghari, M.*, +, *JSYST March 2020 1117-1124*
- Robust Power System State Estimation Using *t*-Distribution Noise Model. Chen, T., +, JSYST March 2020 771-781
- Robust Voltage Control in Inverter-Interfaced Microgrids Under Plug-and-Play Functionalities. Zarei, A., +, JSYST June 2020 2813-2824
- Simplified Modeling and HIL Validation of Solar PVs and Storage-Based Islanded Microgrid With Generation Uncertainties. Sen, S., +, JSYST June 2020 2653-2664
- Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. Manohar, M., +, JSYST Sept. 2020 3430-3439
- Transmission–Distribution Cosimulation: Analytical Methods for Iterative Coupling. *Krishnamoorthy, G.*, +, *JSYST June 2020 2633-2642*
- Voltage/Current Large Transient Suppression in DC Microgrids Using Local Information and Active Stabilizing Capability. Azimi, S.M., +, JSYST March 2020 1109-1116

Distributed processing

Coordinated Hybrid Precoding Design in Millimeter Wave Fog-RAN. *Hao*, W., +, *JSYST March* 2020 673-676

Distributed sensors

Smart Home Monitoring System via Footstep-Induced Vibrations. *Li*, F., +, JSYST Sept. 2020 3383-3389

Distribution networks

Active Distribution Network Operation: A Market-Based Approach. Zubo, R.H.A., +, JSYST March 2020 1405-1416

An Efficient Privacy-Friendly Hop-by-Hop Data Aggregation Scheme for Smart Grids. Gope, P., +, JSYST March 2020 343-352

Computational Tools for Modeling and Analysis of Power Generation and Transmission Systems of the Smart Grid. *Mahmud*, K., +, *JSYST Sept.* 2020 3641-3652

Local Estimation of Critical and Off-Peak Periods for Grid-Friendly Flexible Load Management. *Guzman, C.*, +, *JSYST Sept. 2020 4262-4271*

Moth Search Optimization for Optimal DERs Integration in Conjunction to OLTC Tap Operations in Distribution Systems. Singh, P., +, JSYST March 2020 880-888

Multiobjective Optimization Technique for Mitigating Unbalance and Improving Voltage Considering Higher Penetration of Electric Vehicles and Distributed Generation. *Islam, M.R.*, +, *JSYST Sept. 2020 3676-3686*

Transmission–Distribution Cosimulation: Analytical Methods for Iterative Coupling. *Krishnamoorthy, G.*, +, *JSYST June 2020 2633-2642*

Diversity reception

Effect of Doppler Shift on the Performance of Multicell Full-Duplex Massive MIMO Networks. Dai, J., +, JSYST June 2020 2421-2431

End-to-End Performance Analysis With Decode-and-Forward Relays in Multihop Wireless Systems Over\$\alpha\$- η - μ Fading Channels. Salameh, H.A.B., +, JSYST March 2020 84-92

Performance Analysis of Impaired SWIPT NOMA Relaying Networks Over Imperfect Weibull Channels. *Li*, *X*., +, *JSYST March* 2020 669-672

Performance of Opportunistic Receiver Beam Selection in Multiaperture OWC Systems Over Foggy Channels. *Rahman, Z.*, +, *JSYST Sept. 2020* 4036-4046

Random Pattern Multiplexing for Random Access in IoT-Oriented Satellite Networks. Zhao, B., +, JSYST Sept. 2020 4089-4100

Transmit Antenna Selection for Full-Duplex Spatial Modulation Multiple-Input Multiple-Output System. Van Nguyen, L., +, JSYST Dec. 2020 4777-4785

User-Centric MIMO Techniques for Indoor Visible Light Communication Systems. Chen, C., +, JSYST Sept. 2020 3202-3213

Domestic appliances

MiND: Mind Networked Device Architecture for Attention-Gated Ambient Assisted Living Systems. *Mukherjee*, A., +, *JSYST March* 2020 1325-1332

Doppler effect

WiFlowCount: Device-Free People Flow Counting by Exploiting Doppler Effect in Commodity WiFi. Zhou, R., +, JSYST Dec. 2020 4919-4930

Doppler shift

Effect of Doppler Shift on the Performance of Multicell Full-Duplex Massive MIMO Networks. Dai, J., +, JSYST June 2020 2421-2431

Robust Power Control for Clustering-Based Vehicle-to-Vehicle Communication. Liu, Z., +, JSYST June 2020 2557-2568

Downlink

Asymptotic Analysis of Full-Duplex Large-Scale MIMO Systems With Low-Resolution ADCs/DACs Over Rician Fading Channels. *Dai, J.*, +, *JSYST Dec. 2020 4832-4841*

Energy Efficiency for MISO-OFDMA-Based User-Relay Assisted Cellular Networks. *Basturk, I.*, +, *JSYST Dec. 2020 5274-5283*

Iterative Sub-Band and Power Allocation in Downlink Multiband NOMA. Goswami, D., +, JSYST Dec. 2020 5199-5209

Driver information systems

System Integration of Sensor-Fusion Localization Tasks Using Vision-Based Driving Lane Detection and Road-Marker Recognition. *Lin, C.*, +, *JSYST Sept. 2020 4523-4534*

Drones

Navigation of a Network of Aerial Drones for Monitoring a Frontier of a Moving Environmental Disaster Area. Savkin, A.V., +, JSYST Dec. 2020 4746-4749

Dynamics

Dynamic User Association for Resilient Backhauling in Satellite-Terrestrial Integrated Networks. *Dai, C.*, +, *JSYST Dec. 2020 5025-5036*

 \mathbf{E}

Earth Observing System

Expectation and SAA Models and Algorithms for Scheduling of Multiple Earth Observation Satellites Under the Impact of Clouds. *Wang, J.*, +, *JSYST Dec. 2020 5451-5462*

Earthing

Local Measurements-Based Backup Protection for DC Microgrids Using Sequential Analyzing Technique. *Meghwani*, A., +, *JSYST March 2020* 1159-1170

Earthquakes

An Improved Rapid-Source Parameter Determination System (AQUA) for Giant Earthquakes. *Kimura*, *H.*, +, *JSYST Sept. 2020 3451-3462*

ASIS: Autonomous Seismic Imaging System With *In Situ* Data Analytics and Renewable Energy. *Clemente*, *J.*, +, *JSYST March 2020 1277-1284*

Eavesdropping

Artificial Noise Hopping: A Practical Secure Transmission Technique With Experimental Analysis for Millimeter Wave Systems. *Ju, Y.*, +, *JSYST Dec.* 2020 5121-5132

Econophysics

Value Uncertainty Analysis in Architecture and Trade Studies. *Maier, M.W.*, +, *JSYST Dec.* 2020 5417-5428

Educational courses

Experiential Systems Engineering Education Concept Using Stratospheric Balloon Missions. Golkar, A., JSYST June 2020 1558-1567

Educational institutions

Experiential Systems Engineering Education Concept Using Stratospheric Balloon Missions. *Golkar, A., JSYST June 2020 1558-1567*

Eigenvalues and eigenfunctions

Mitigation of Power and Frequency Instability to Improve Load Sharing Among Distributed Inverters in Microgrid Systems. *Firdaus, A.*, +, *JSYST March 2020 1024-1033*

Spectral Graph Analysis of the Geometry of Power Flows in Transmission Networks. *Retiere, N.*, +, *JSYST June 2020 2736-2747*

Spotting Key Members in Networks: Clustering-Embedded Eigenvector Centrality. Carrizosa, E., +, JSYST Sept. 2020 3916-3925

Electric current control

An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, N., +, *JSYST March 2020 1218-1229*

Comparative Analysis of Communication Assisted Grid Synchronization Methods in Microgrids. S., N., +, JSYST March 2020 1007-1014

Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator. *Kumar*; V.N., +, JSYST Sept. 2020 4308-4319

Systematized Active Power Control of PMSG-Based Wind-Driven Generators. Ramachandran, V., +, JSYST March 2020 708-717

Voltage/Current Large Transient Suppression in DC Microgrids Using Local Information and Active Stabilizing Capability. Azimi, S.M., +, JSYST March 2020 1109-1116

Electric fuses

Improvement in Recloser–Fuse Coordination Technique Based on Modification Factor. *Makwana, Y.M.*, +, *JSYST June 2020 2770-2779*

Electric impedance

Detection and Experimental Validation of High Impedance Arc Fault in Distribution System Using Empirical Mode Decomposition. *Lala, H.*, +, *JSYST Sept. 2020 3494-3505*

Islanding Detection of Distributed Generation Based on Parallel Inductive Impedance Switching. *Rostami, A.*, +, *JSYST March 2020 813-823*

Local Measurements-Based Backup Protection for DC Microgrids Using Sequential Analyzing Technique. *Meghwani*, A., +, *JSYST March 2020* 1159-1170

Electric noise measurement

A Mixed Integer Nonlinear Program Based Power Load Estimator for Distribution Grid. *Yang*, Y., +, *JSYST March 2020 842-851*

Electric vehicle charging

Bidirectional Charging in V2G Systems: An In-Cell Variation Analysis of Vehicle Batteries. *Khalid, H.M.*, +, *JSYST Sept. 2020 3665-3675*

Integrated Utility-Transit Model for Optimal Configuration of Battery Electric Bus Systems. *El-Taweel, N.A.*, +, *JSYST March 2020 738-748*

Optimal Scheduling of EV Charging at a Solar Power-Based Charging Station. Kabir, M.E., +, JSYST Sept. 2020 4221-4231

System Design and Realization of a Solar-Powered Electric Vehicle Charging Station. Shariff, S.M., +, JSYST June 2020 2748-2758

Electric vehicles

An Adaptive Grid Frequency Support Mechanism for Energy Management in Cloud Data Centers. Kaur, K., +, JSYST March 2020 1195-1205

Improved Performance of Flywheel Fast Charging System (FFCS) Using Enhanced Artificial Immune System (EAIS). *Gabbar, H.A.*, +, *JSYST March 2020 824-831*

Multiobjective Optimization Technique for Mitigating Unbalance and Improving Voltage Considering Higher Penetration of Electric Vehicles and Distributed Generation. *Islam, M.R.*, +, *JSYST Sept. 2020 3676-3686*

Electrocardiography

A Multistage Deep Residual Network for Biomedical Cyber-Physical Systems. *Pandey, A.*, +, *JSYST June 2020 1953-1962*

Electroencephalography

A Multistage Deep Residual Network for Biomedical Cyber-Physical Systems. *Pandey, A.*, +, *JSYST June 2020 1953-1962*

MiND: Mind Networked Device Architecture for Attention-Gated Ambient Assisted Living Systems. Mukherjee, A., +, JSYST March 2020 1325-1332

Electromagnetic induction

Energy-Efficient Design of MI Communication-Based 3-D Non-Conventional WSNs. Yadav, S., +, JSYST June 2020 2585-2588

Electromagnetic interference

Energy-Efficient Resource Allocation for Dynamic Priority-Based Vehicular Mobile-Health Communications. Fan, B., +, JSYST June 2020 2097-2108

Electromagnetic wave scattering

Artificial Noisy MIMO Systems Under Correlated Scattering Rayleigh Fading—A Physical Layer Security Approach. *Liu, Y.*, +, *JSYST June 2020* 2121-2132

Electromechanical actuators

Toward a Robust Design of an Aileron Electromechanical Actuator: Sensitivity Analysis and Parametric Tolerancing Using a Variational Approach. Siala, H., +, JSYST Sept. 2020 3977-3986

Embedded systems

A Model for the Build-Versus-Buy Decision in Developing Embedded Systems. Fowler, K.R., +, JSYST March 2020 1317-1324

A Study of the Build-Versus-Buy Decision in Developing Embedded Systems. Fowler, K.R., +, JSYST March 2020 1309-1316

Emergency management

Deployment of Drone-Based Small Cells for Public Safety Communication System. *Ali*, K., +, *JSYST June 2020 2882-2891*

Metanetwork Framework for Performance Analysis of Disaster Management System-of-Systems. Fan, C., +, JSYST March 2020 1265-1276

Multicriteria UAV Base Stations Placement for Disaster Management. Akram, T., +, JSYST Sept. 2020 3475-3482

Emergency services

Deployment of Drone-Based Small Cells for Public Safety Communication System. *Ali*, K., +, *JSYST June 2020 2882-2891*

EMTF

Protection Coordination for Assembly HVDC Breakers for HVDC Multiterminal Grids Using Wavelet Transform. *Mitra*, B., +, *JSYST March 2020* 1069-1079

Energy conservation

Cache-Aware Computation Offloading in IoT Systems. Wei, H., +, JSYST March 2020 61-72

Combined Impact of Network Reconfiguration and Volt-VAR Control Devices on Energy Savings in the Presence of Distributed Generation. Pamshetti, V.B., +, JSYST March 2020 995-1006

Cooperative Communication and Energy-Harvesting-Enabled Energy-Efficient Design of MI-Based Clustered Nonconventional WSNs. *Prasanna*, A.L., +, JSYST June 2020 2293-2302

Energy Efficiency Versus Reliability Tradeoff Improvement in Low-Power Wireless Communications. Zogovic, N., JSYST Sept. 2020 3173-3184

Energy-Efficient Adaptive Sectorization for 5G Green Wireless Communication Systems. *Jain, P.,+, JSYST June 2020 2382-2391*

Energy-Efficient Design of MI Communication-Based 3-D Non-Conventional WSNs. Yadav, S., +, JSYST June 2020 2585-2588

Energy-Efficient GCSA Medium Access Protocol for Infrastructure-Based Cognitive Radio Networks. Syed, T.S., +, JSYST March 2020 288-297

Energy-Efficient IoT-Fog-Cloud Architectural Paradigm for Real-Time Wildfire Prediction and Forecasting. *Kaur, H.*, +, *JSYST June 2020 2003-2011*

Energy-Efficient Joint Scheduling and Resource Management for UAV-Enabled Multicell Networks. *Yang, H.*, +, *JSYST March 2020 363-374*

Energy-Efficient Resource Allocation for Dynamic Priority-Based Vehicular Mobile-Health Communications. Fan, B., +, JSYST June 2020 2097-2108

Energy-Efficient Resource Allocation in SWIPT Cooperative Wireless Networks. Guo, S., +, JSYST Sept. 2020 4131-4142

Intelligent Energy-Saving Supervision System of Urban Buildings Based on the Internet of Things: A Case Study. Xing, L., +, JSYST Sept. 2020 4252-4261

MEGAN: Multipurpose Energy-Efficient, Adaptable, and Low-Cost Wireless Sensor Node for the Internet of Things. *Misra, S.*, +, *JSYST March* 2020 144-151

Optimal CHP Planning in Integrated Energy Systems Considering Network Charges. Wang, H., +, JSYST June 2020 2684-2693

Optimizing Design Parameters for Relay-Aided Massive MIMO Systems. El-Mashed, M.G., JSYST June 2020 2249-2256

Optimizing Efficient Energy Transmission on a SWIPT Interference Channel Under Linear/Nonlinear EH Models. *Tuan, P.V.*, +, *JSYST March 2020*

Robust Optimization for Energy Efficiency in MIMO Two-Way Relay Networks With SWIPT. *Li*, *Q*., +, *JSYST March 2020 196-207*

Energy consumption

Adaptive Traffic Management and Energy Cooperation in Renewable-Energy-Powered Cellular Networks. *Lee, H., +, JSYST March 2020 132-143* Combined Impact of Network Reconfiguration and Volt-VAR Control

Devices on Energy Savings in the Presence of Distributed Generation. Pamshetti, V.B., +, JSYST March 2020 995-1006

Cooperative Communication and Energy-Harvesting-Enabled Energy-Efficient Design of MI-Based Clustered Nonconventional WSNs. *Prasanna*, A.L., +, JSYST June 2020 2293-2302

Energy-Efficient Barrier Lifetime Prolonging Scheme Based on Repairing in Directional Sensor Networks. Fan, X., +, JSYST Dec. 2020 4943-4954

Energy-Efficient Design of MI Communication-Based 3-D Non-Conventional WSNs. Yadav, S., +, JSYST June 2020 2585-2588

Green Computing in Underwater Wireless Sensor Networks Pressure Centric Energy Modeling. Khasawneh, A.M., +, JSYST Dec. 2020 4735-4745

Integrated Utility-Transit Model for Optimal Configuration of Battery Electric Bus Systems. *El-Taweel, N.A.*, +, *JSYST March 2020 738-748*

Intelligent Energy-Saving Supervision System of Urban Buildings Based on the Internet of Things: A Case Study. Xing, L., +, JSYST Sept. 2020 4252-4261

Joint Task Offloading, CNN Layer Scheduling, and Resource Allocation in Cooperative Computing System. *Chai, R.*, +, *JSYST Dec. 2020 5350-5361* Online Power Management for Latency-Sensitive Bluetooth Low-Energy Beacons. *Chen, D.*, +, *JSYST June 2020 2411-2420*

Performance Analysis of Software-Defined Multihop Wireless Sensor Networks. *Jurado-Lasso*, F.F., +, *JSYST Dec.* 2020 4653-4662

Toward Energy-Oriented Optimization for Green Communication in Sensor Enabled IoT Environments. *Kumar, S.*, +, *JSYST Dec. 2020 4663-4673*

Energy efficiency

Learning-Based Resource Management for SWIPT. *Lee, K.*, +, *JSYST Dec.* 2020 4750-4753

Energy harvesting

- A Novel Energy Supply Strategy for Stable Sensor Data Delivery in Wireless Sensor Networks. *Jin, Y.*, +, *JSYST Sept. 2020 3418-3429*
- Cooperative Communication and Energy-Harvesting-Enabled Energy-Efficient Design of MI-Based Clustered Nonconventional WSNs. *Prasanna*, A.L., +, JSYST June 2020 2293-2302
- EHLinQ: Distributed Scheduler for D2D Communication With RF Energy Harvesting. Lee, H., +, JSYST June 2020 2281-2292
- Energy Efficiency Evaluation for Downlink Full-Duplex Nonlinear MU-MI-MO-OFDM System With Self-Energy Recycling. *Shaikh, M.H.N.*, +, *JSYST Sept. 2020 3313-3324*
- Joint Trajectory Design, Tx Power Allocation, and Rx Power Splitting for UAV-Enabled Multicasting SWIPT Systems. *Kang, J.*, +, *JSYST Sept.* 2020 3740-3743
- Learning-Based Resource Management for SWIPT. Lee, K., +, JSYST Dec. 2020 4750-4753
- Legitimate Surveillance With Battery-Aided Wireless Powered Full-Duplex Monitor. Xu, D., JSYST Dec. 2020 5229-5232
- MEGAN: Multipurpose Energy-Efficient, Adaptable, and Low-Cost Wireless Sensor Node for the Internet of Things. *Misra*, S., +, *JSYST March* 2020 144-151
- Multiobjective Precoder Design for Coexisting Wireless Energy Transfer and Information Transmission Systems. Zhang, H., +, JSYST March 2020 445-456
- Novel Energy-Harvesting AF Relaying Schemes With Channel Estimation Errors. *Zhou, Y.*, +, *JSYST March 2020 333-342*
- On Communication Performance in Energy Harvesting WSNs Under a Cooperative Jamming Attack. Vo. V.N., +, JSYST Dec. 2020 4955-4966
- On Secure Mixed RF-FSO Decode-and-Forward Relaying Systems With Energy Harvesting. Saber, M.J., +, JSYST Sept. 2020 4402-4405
- Outage Probability and Throughput of Multirelay SWIPT-WPCN Networks With Nonlinear EH Model and Imperfect CSI. *Jiang, R.*, +, *JSYST March* 2020 1206-1217
- Performance Analysis of Impaired SWIPT NOMA Relaying Networks Over Imperfect Weibull Channels. *Li*, *X*., +, *JSYST March 2020 669-672*
- Residual Energy Maximization in Cognitive Radio Networks With Q-Routing. *Paul*, A., +, *JSYST Sept. 2020 3791-3800*

Energy management

- An Adaptive Grid Frequency Support Mechanism for Energy Management in Cloud Data Centers. Kaur, K., +, JSYST March 2020 1195-1205
- Joint Energy-QoE Efficient Content Delivery Networks Using Real-Time Energy Management. *Goudarzi, P.*, +, *JSYST March 2020 927-938*
- Load Disaggregation Using One-Directional Convolutional Stacked Long Short-Term Memory Recurrent Neural Network. Quek, Y.T., +, JSYST March 2020 1395-1404
- Local Estimation of Critical and Off-Peak Periods for Grid-Friendly Flexible Load Management. *Guzman, C.*, +, *JSYST Sept. 2020 4262-4271*
- Microservice-Based Architecture for an Energy Management System. Lyu, Z., +, JSYST Dec. 2020 5061-5072Probabilistic Model for Microgrids Optimal Energy Management Considering AC Network Constraints. Javidsharifi, M., +, JSYST June 2020 2703-2712

Energy storage

- A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926
- A Robust Coordinated Expansion Planning Model For Wind Farm-Integrated Power Systems With Flexibility Sources Using Affine Policies. Dehghan, S., +, JSYST Sept. 2020 4110-4118
- Efficient and Risk-Aware Control of Electricity Distribution Grids. *Liberati*, F., +, JSYST Sept. 2020 3586-3597
- Energy Storage Systems Architecture Optimization for Grid Resilience With High Penetration of Distributed Photovoltaic Generation. *Confrey, J.*, +, *JSYST March 2020 1135-1146*

- Improving Power Systems Transient Stability by Coordinated Control of Energy Storage Systems and Synchronous Generators in Presence of Measurement Noise. *Rostami, M.*, +, *JSYST March 2020 1088-1097*
- Optimal Coordinated Expansion Planning of Transmission and Electrical Energy Storage Systems Under Physical Intentional Attacks. *Nemati, H.*, +, JSYST March 2020 793-802
- Power Output Smoothing for Renewable Energy System: Planning, Algorithms, and Analysis. *Chen, X., +, JSYST March 2020 1034-1045*
- Probabilistic Model for Microgrids Optimal Energy Management Considering AC Network Constraints. *Javidsharifi, M.*, +, *JSYST June 2020 2703-2712*
- Robust Optimization-Based Energy Storage Operation for System Congestion Management. Yan, X., +, JSYST June 2020 2694-2702
- Spatio-Temporal Value of Energy Storage in Transmission Networks. *Khatami, R.*, +, *JSYST Sept. 2020 3855-3864*
- Two-Mode Adaptive Schemes for VAR Control With Solar Power and Energy Storage. *Doan, S., +, JSYST March 2020 889-899*

Engineering education

Experiential Systems Engineering Education Concept Using Stratospheric Balloon Missions. Golkar, A., JSYST June 2020 1558-1567

Entropy

- Importance Sampling Using Multilabel Radial Basis Classification for Composite Power System Reliability Evaluation. *Urgun*, D., +, *JSYST June* 2020 2791-2800
- Resist Interest Flooding Attacks via Entropy–SVM and Jensen–Shannon Divergence in Information-Centric Networking. Zhi, T., +, JSYST June 2020 1776-1787

Environmental monitoring (geophysics)

ASIS: Autonomous Seismic Imaging System With *In Situ* Data Analytics and Renewable Energy. *Clemente*, *J.*, +, *JSYST March 2020 1277-1284*

Environmental science computing

- Energy-Efficient IoT-Fog-Cloud Architectural Paradigm for Real-Time Wildfire Prediction and Forecasting. Kaur, H., +, JSYST June 2020 2003-2011
- Information-Based Hierarchical Planning for a Mobile Sensing Network in Environmental Mapping. *Li*, *T*, +, *JSYST June 2020 1692-1703*
- Microscale Particulate Matter Monitoring With Reliable Event Transport in Urban Environments. *Yang*, T., +, *JSYST June 2020 3057-3060*

Equalizers

- A Novel Receiver Design of Nonorthogonal FDM Systems in Underwater Acoustics Communication. *Anwar*, S., +, *JSYST Sept. 2020 3875-3884*
- Performance Analysis of Precoded Wireless OFDM With Carrier Frequency Offset. Kalbat, F., +, JSYST June 2020 2237-2248

Equivalent circuits

Fast Wireless Power Transfer for Multiple Receivers in Linear Topology. Lee, K., +, JSYST March 2020 649-652

Error analysis

A Lattice Signcrypted Secured Localization in Wireless Sensor Networks. Kumar, G., +, JSYST Sept. 2020 3949-3956

Error statistics

- A Novel Receiver Design of Nonorthogonal FDM Systems in Underwater Acoustics Communication. *Anwar, S., +, JSYST Sept. 2020 3875-3884*
- Adaptive Narrow-Band Interference Suppression and Performance Evaluation Based on Code-Aided in GNSS Inter-Satellite Links. Wang, H., +, JSYST March 2020 538-547
- Bridging the Gap Between CP-OFDM and ZP-OFDM for the Provision of Ultra-Low Latency Services in 5G. *Ayadi*, R., +, *JSYST March 2020 603-612*
- Chaos-Based Anytime-Reliable Coded Communications. *Tarable, A.*, +, *JSYST June 2020 2214-2224*
- Cooperative Space Shift Keying Media-Based Modulation With Hybrid Relaying. Yarkin, F., +, JSYST March 2020 500-509
- Covert Communications in D2D Underlaying Cellular Networks With Power Domain NOMA. *Jiang, Y.*, +, *JSYST Sept. 2020 3717-3728*
- Design Precoded Space-Time-Frequency 4 × 1 and 4 × 2 OFDM Architectures in Frequency-Selective Fading Channels. *Yeh, H., JSYST March 2020* 277-287

- Downlink NOMA Networks With Hybrid Long-Packet and Short-Packet Communications in Flat Rayleigh Fading Channels. *Lai*, X., +, *JSYST Sept.* 2020 3410-3413
- End-to-End Performance Analysis With Decode-and-Forward Relays in Multihop Wireless Systems Over\$\alpha\$- η- μ Fading Channels. Salameh, H.A.B., +, JSYST March 2020 84-92
- Expanded Multiband Super-Nyquist CAP Modulation for Highly Bandlimited Organic Visible Light Communications. *Chvojka, P.*, +, *JSYST June* 2020 2544-2550
- Near-Optimal Detection of Monobit Digitized UWB Signals in the Presence of Noise and Strong Intersymbol Interference. *Khani, H.*, +, *JSYST June* 2020 2311-2322
- Novel Energy-Harvesting AF Relaying Schemes With Channel Estimation Errors. Zhou, Y., +, JSYST March 2020 333-342
- On Secure Mixed RF-FSO Decode-and-Forward Relaying Systems With Energy Harvesting. Saber, M.J., +, JSYST Sept. 2020 4402-4405
- Performance Analysis of Precoded Wireless OFDM With Carrier Frequency Offset. Kalbat, F., +, JSYST June 2020 2237-2248
- Performance of Opportunistic Receiver Beam Selection in Multiaperture OWC Systems Over Foggy Channels. *Rahman, Z.*, +, *JSYST Sept. 2020* 4036-4046
- Performance of Wireless Powered DF Relay System Under Nakagami-mFading: Relay Assists Energy-Constrained Source. Kumar, P., +, JSYST June 2020 2497-2507
- Time-Dependent Bit Error Rate Analysis for Smart Utility Networks in the Presence of WLAN Interferers. *Gouissem, A.*, +, *JSYST June 2020 2133-2143*

Estimation

A Pipeline Leak Classification and Location Estimation System With Convolutional Neural Networks. *Cai, Y., +, JSYST Sept. 2020 3072-3081* Performance Analysis of Priority-Based Access Class Barring Scheme for Massive MTC Random Access. *Sim, Y., +, JSYST Dec. 2020 5245-5252*

Euclidean distance

Anticomplementary Triangles for Efficient Coverage in Sensor Network-Based IoT. Shivhare, A., +, JSYST Dec. 2020 4854-4863

Event detection

Anticomplementary Triangles for Efficient Coverage in Sensor Network-Based IoT. Shivhare, A., +, JSYST Dec. 2020 4854-4863

Evolutionary computation

- A Temporal Recommendation Mechanism Based on Signed Network of User Interest Changes. Chen, J., +, JSYST March 2020 244-252
- Improved Teaching Learning-Based QoS-Aware Services Composition for Internet of Things. *Khanouche, M.E.*, +, *JSYST Sept. 2020 4155-4164*
- Joint Energy-QoE Efficient Content Delivery Networks Using Real-Time Energy Management. *Goudarzi*, P., +, JSYST March 2020 927-938
- Multiobjective Optimization Technique for Mitigating Unbalance and Improving Voltage Considering Higher Penetration of Electric Vehicles and Distributed Generation. *Islam, M.R.*, +, *JSYST Sept. 2020 3676-3686*

Expectation-maximization algorithms

- A Multilevel Fusion System for Multirobot 3-D Mapping Using Heterogeneous Sensors. *Yue*, Y., +, JSYST March 2020 1341-1352
- Application of the Mixture of Lognormal Distribution to Represent the First-Order Statistics of Wireless Channels. *Das*, *S.*, +, *JSYST Sept. 2020 4394-4401*

Expert systems

Determining Impact of Lightning Strike Location on Failures in Transmission Network Elements Using Fuzzy Decision-Making. *Petrovic, I.*, +, *JSYST June 2020 2665-2675*

F

Fading channels

- Application of the Mixture of Lognormal Distribution to Represent the First-Order Statistics of Wireless Channels. *Das, S.*, +, *JSYST Sept. 2020* 4394-4401
- Cross PHY/APP Layer User Grouping and Power Allocation for Uplink Multiantenna NOMA Video Communication Systems. *Tseng, S.*, +, *JSYST Sept. 2020 3351-3359*

- Design Precoded Space-Time-Frequency 4×1 and 4×2 OFDM Architectures in Frequency-Selective Fading Channels. *Yeh, H., JSYST March 2020 277-287*
- Location-Aided mMIMO Channel Tracking and Hybrid Beamforming for High-Speed Railway Communications: An Angle-Domain Approach. *Xu*, *K.*, +, *JSYST March 2020 93-104*
- Performance Analysis of a Mixed Cooperative PLC–VLC System for Indoor Communication Systems. *Jani, M., +, JSYST March 2020 469-476*
- Performance Analysis of Precoded Wireless OFDM With Carrier Frequency Offset. *Kalbat, F., +, JSYST June 2020 2237-2248*
- Resolution Limit of Positioning Error for Range-Free Localization Schemes. Gui, L., +, JSYST June 2020 2980-2989
- Robust OFDM-Based Synchronization Against Very High Fractional CFO and Time-Varying Fading. Chang, K., +, JSYST Sept. 2020 4047-4058

Failure analysis

- A Graph-Based Model for Transmission Network Vulnerability Analysis. *Yang, S.*, +, *JSYST March 2020 1447-1456*
- A Stochastic Model of Cascading Failure Dynamics in Cyber-Physical Power Systems. *Gao*, X., +, *JSYST Sept. 2020 4626-4637*
- Energy Storage Systems Architecture Optimization for Grid Resilience With High Penetration of Distributed Photovoltaic Generation. *Confrey, J.*, +, *JSYST March 2020 1135-1146*
- Probabilistic Study of Undervoltage Load Shedding Scheme to Mitigate the Impact of Protection System Hidden Failures. *Pal, D., +, JSYST March 2020 862-869*
- Reliability Evaluation in Microgrids With Non-Exponential Failure Rates of Power Units. *Peyghami*, S., +, *JSYST June 2020 2861-2872*

Fans

Energy-Efficient Barrier Lifetime Prolonging Scheme Based on Repairing in Directional Sensor Networks. Fan, X., +, JSYST Dec. 2020 4943-4954

Fast Fourier transforms

- Adaptive Narrow-Band Interference Suppression and Performance Evaluation Based on Code-Aided in GNSS Inter-Satellite Links. *Wang, H.*, +, *JSYST March 2020 538-547*
- Islanding Detection of Distributed Generation Based on Parallel Inductive Impedance Switching. *Rostami*, A., +, JSYST March 2020 813-823
- Reconfigurable Architecture of UFMC Transmitter for 5G and Its FPGA Prototype. *Kumar, V., +, JSYST March 2020 28-38*

Fault currents

- Fault Detection for Low-Voltage Residential Distribution Systems With Low-Frequency Measured Data. *Shafiei, M.*, +, *JSYST Dec. 2020 5265*-5273
- Fault Detection, Classification, and Location by Static Switch in Microgrids Using Wavelet Transform and Taguchi-Based Artificial Neural Network. Hong, Y, +, JSYST June 2020 2725-2735
- Protection of Converter-Interfaced Microgrids Using Modified Short-Time Correlation Transform. *Allahdadi, K.*, +, *JSYST Dec. 2020 5172-5175*

Fault detection

- A New Distributed Fault Detection Method for Wireless Sensor Networks. Gharamaleki, M.M., +, JSYST Dec. 2020 4883-4890
- Fault Detection for Low-Voltage Residential Distribution Systems With Low-Frequency Measured Data. *Shafiei*, M., +, *JSYST Dec. 2020 5265*-5273
- Protection of Converter-Interfaced Microgrids Using Modified Short-Time Correlation Transform. *Allahdadi, K.*, +, *JSYST Dec. 2020 5172-5175*

Fault diagnosis

- A High-Accuracy Least-Time-Domain Mixture Features Machine-Fault Diagnosis Based on Wireless Sensor Network. Du, C., +, JSYST Sept. 2020 4101-4109
- A New Hybrid Fault Prognosis Method for MFS Systems Based on Distributed Neural Networks and Recursive Bayesian Algorithm. *Kordestani, M.*, +. *JSYST Dec.* 2020 5407-5416
- A Novel Control-Performance-Oriented Data-Driven Fault Classification Approach. Liu, T., +, JSYST June 2020 1830-1839
- A Smart Optimization of Fault Diagnosis in Electrical Grid Using Distributed Software-Defined IoT System. *Al Mhdawi, A.K.*, +, *JSYST June 2020 2780-2790*

- An Online Bearing Fault Diagnosis Technique via Improved Demodulation Spectrum Analysis Under Variable Speed Conditions. *Liu, D.*, +, *JSYST June 2020 2323-2334*
- Detection and Experimental Validation of High Impedance Arc Fault in Distribution System Using Empirical Mode Decomposition. *Lala, H.*, +, *JSYST Sept. 2020 3494-3505*
- Detection and Location of Bias Load Injection Attack in Smart Grid via Robust Adaptive Observer. Wang, X., +, JSYST Sept. 2020 4454-4465
- Discrete-Wavelet-Transform and Stockwell-Transform-Based Statistical Parameters Estimation for Fault Analysis in Grid-Connected Wind Power System. *Mukherjee*, N., +, *JSYST Sept. 2020 4320-4328*
- Fault-Tolerant GNSS/SINS/DVL/CNS Integrated Navigation and Positioning Mechanism Based on Adaptive Information Sharing Factors. Xiong, H., +, JSYST Sept. 2020 3744-3754
- Health Monitoring for Cyber Physical Systems. Shangguan, L., +, JSYST March 2020 1457-1467
- Local Measurements-Based Backup Protection for DC Microgrids Using Sequential Analyzing Technique. *Meghwani, A.*, +, *JSYST March 2020* 1159-1170
- Novel Change Detection and Fault Classification Scheme for AC Microgrids. *Jarrahi*, M.A., +, *JSYST Sept.* 2020 3987-3998
- PMUs Enabled Tellegen's Theorem-Based Fault Identification Method for Unbalanced Active Distribution Network Using RTDS. *Bansal, Y.*, +, *JSYST Sept. 2020 4567-4578*
- Probabilistic Inference of Fault Condition of Cyber-Physical Systems Under Uncertainty. *Tao*, X., +, *JSYST Sept. 2020 3256-3266*
- Protection Coordination for Assembly HVDC Breakers for HVDC Multiterminal Grids Using Wavelet Transform. *Mitra*, B., +, *JSYST March 2020* 1069-1079
- Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. *Manohar, M.*, +, *JSYST Sept. 2020 3430-3439*

Fault location

- An Algorithm for Detection of Fault, Islanding, and Power Swings in DG-Equipped Radial Distribution Networks. *Ebrahim, M.A.*, +, *JSYST Sept. 2020 3893-3903*
- Fault Detection, Classification, and Location by Static Switch in Microgrids Using Wavelet Transform and Taguchi-Based Artificial Neural Network. Hong, Y, +, JSYST June 2020 2725-2735
- Protection of High-Voltage DC Grids Using Traveling-Wave Frequency Characteristics. Saleh, K.A., +, JSYST Sept. 2020 4284-4295

Fault tolerance

- A New Distributed Fault Detection Method for Wireless Sensor Networks. Gharamaleki, M.M., +, JSYST Dec. 2020 4883-4890
- Fault-Tolerant GNSS/SINS/DVL/CNS Integrated Navigation and Positioning Mechanism Based on Adaptive Information Sharing Factors. *Xiong*, H., +, JSYST Sept. 2020 3744-3754
- Local Measurements-Based Backup Protection for DC Microgrids Using Sequential Analyzing Technique. *Meghwani*, A., +, *JSYST March* 2020 1159-1170

Fault tolerant computing

Topology-Aware Data Placement Strategy for Fault-Tolerant Storage Systems. Xia, J., +, JSYST Sept. 2020 4296-4307

Fault tolerant control

- Comparative Analysis of Communication Assisted Grid Synchronization Methods in Microgrids. S., N., +, JSYST March 2020 1007-1014
- Global Fault-Tolerant Sampled-Data Control for Large-Scale Switched Time-Delay Nonlinear Systems. He, W., +, JSYST June 2020 1549-1557

Fault tolerant systems

A New Distributed Fault Detection Method for Wireless Sensor Networks. Gharamaleki, M.M., +, JSYST Dec. 2020 4883-4890

Fault tree

Dynamic Fault Tree Generation for Safety-Critical Systems Within a Systems Engineering Approach. *Baklouti, A.*, +, *JSYST March 2020 1512-1522*

Faulting

An Improved Rapid-Source Parameter Determination System (AQUA) for Giant Earthquakes. *Kimura*, *H*., +, *JSYST Sept. 2020 3451-3462*

FCC

A Model-Based Systems Engineering Approach for the Efficient Specification of Test Rig Architectures for Flight Control Computers. *Liscouet-Hanke*, S., +, JSYST Dec. 2020 5441-5450

Feature extraction

- A High-Accuracy Least-Time-Domain Mixture Features Machine-Fault Diagnosis Based on Wireless Sensor Network. *Du, C.*, +, *JSYST Sept. 2020* 4101-4109
- Adaptive OFDM Waveform Design for Cognitive Radar in Signal-Dependent Clutter. Karimi, V., +, JSYST Sept. 2020 3630-3640
- Birds of a *Feature:* Intrafamily Clustering for Version Identification of Packed Malware. *Park, L.H.*, +, *JSYST Sept. 2020 4545-4556*
- Resist Interest Flooding Attacks via Entropy–SVM and Jensen–Shannon Divergence in Information-Centric Networking. Zhi, T., +, JSYST June 2020 1776-1787
- WiFi Fingerprinting Indoor Localization Using Local Feature-Based Deep LSTM. Chen, Z., +, JSYST June 2020 3001-3010

Feedback

- A New MIMO ORC Architecture for Power Oscillation Damping Using Remote Feedback Signals Under Intermittent Observations. *Yogarathinam*, A., +, JSYST March 2020 939-949
- Decentralized Output-Feedback-Based Robust LQR V-f Controller for PV-Battery Microgrid Including Generation Uncertainties. Sen, S., +, JSYST Sept. 2020 4418-4429
- Deep RNN-Based Channel Tracking for Wireless Energy Transfer System. Kang, J., +, JSYST Sept. 2020 4340-4343
- Detection and Mitigation of Cyber-Attacks on AGC Systems of Low Inertia Power Grid. Roy, S.D., +, JSYST June 2020 2023-2031
- Global Fault-Tolerant Sampled-Data Control for Large-Scale Switched Time-Delay Nonlinear Systems. He, W., +, JSYST June 2020 1549-1557
- Optimal Connected Cruise Control With Arbitrary Communication Delays. Wang, Z., +, JSYST June 2020 2913-2924
- Recursive Smooth Variable Structure Filter for Estimation Processes in Direct Power Control Scheme Under Balanced and Unbalanced Power Grid. AlShabi, M., +, JSYST March 2020 971-982
- Sampled-Data Decentralized Output Feedback Control for a Class of Switched Large-Scale Stochastic Nonlinear Systems. *Li*, *S*., +, *JSYST June* 2020 1602-1610

Feedforward neural networks

Deep RNN-Based Channel Tracking for Wireless Energy Transfer System. Kang, J., +, JSYST Sept. 2020 4340-4343

Femtocellular radio

- Coordinated Hybrid Precoding Design in Millimeter Wave Fog-RAN. *Hao*, W., +, JSYST March 2020 673-676
- Procurement-Based User Association for LTE-Advanced HetNets. *Kumar*, S., +, *JSYST Sept. 2020 3194-3201*
- WmA-MiFN: A Weighted Majority and Auction Game Based Green Ultra-Dense Micro-Femtocell Network System. *Mukherjee*, A., +, *JSYST March* 2020 353-362

Field programmable gate arrays

- FPGA-Based Design Optimization in Autonomous Robot Systems for Inspection of Civil Infrastructure. *Lins, R.G.,* +, *JSYST June 2020 2961*-2064
- Multiuser Variable Rate GO-OFDMA Architecture and Its FPGA Prototype. Palisetty, R., +, JSYST June 2020 2455-2463
- Reconfigurable Architecture of UFMC Transmitter for 5G and Its FPGA Prototype. *Kumar, V., +, JSYST March 2020 28-38*

File organization

Traffic Control for RDMA-Enabled Data Center Networks: A Survey. *Guo*, Z., +, *JSYST March 2020 677-688*

Filtering theory

- An Online Bearing Fault Diagnosis Technique via Improved Demodulation Spectrum Analysis Under Variable Speed Conditions. *Liu, D.*, +, *JSYST June 2020 2323-2334*
- Fault-Tolerant GNSS/SINS/DVL/CNS Integrated Navigation and Positioning Mechanism Based on Adaptive Information Sharing Factors. Xiong, H., +, JSYST Sept. 2020 3744-3754

Local Estimation of Critical and Off-Peak Periods for Grid-Friendly Flexible Load Management. *Guzman, C.*, +, *JSYST Sept. 2020 4262-4271*

Financial data processing

E-WACGAN: Enhanced Generative Model of Signaling Data Based on WGAN-GP and ACGAN. Jin, O., +, JSYST Sept. 2020 3289-3300

Toward Characterizing Blockchain-Based Cryptocurrencies for Highly Accurate Predictions. Saad, M., +, JSYST March 2020 321-332

Financial management

Classification Methods Applied to Credit Scoring With Collateral. *Teles, G.*, +, *JSYST Sept. 2020 4557-4566*

Finite state machines

A Novel Effectiveness Evaluation Method Based on Simultaneous Probabilistic Finite-State Machines. Nan, Y., +, JSYST June 2020 1611-1622

MQry: Elastic Validity Region for Querying Mobile Point-of-Interests in Infrastructure-Less Networks. *Jung, B.*, +, *JSYST June 2020 1852-1861*

Firewalls

Adversarial-Example Attacks Toward Android Malware Detection System. Li, H., +, JSYST March 2020 653-656

Flexible manufacturing systems

Architecting Ubiquitous Communication and Collaborative-Automation-Based Machine Network Systems for Flexible Manufacturing. *Meng*, Z., +, *JSYST March* 2020 113-123

Flywheels

A Novel Control Method Based on Droop for Cooperation of Flywheel and Battery Energy Storage Systems in Islanded Microgrids. *Khodadoost Arani, A.A.*, +, *JSYST March 2020 1080-1087*

An Adaptive Grid Frequency Support Mechanism for Energy Management in Cloud Data Centers. *Kaur, K.*, +, *JSYST March 2020 1195-1205*

Improved Performance of Flywheel Fast Charging System (FFCS) Using Enhanced Artificial Immune System (EAIS). Gabbar, H.A., +, JSYST March 2020 824-831

Forecasting

A Practicable Copula-Based Approach for Power Forecasting of Small-Scale Photovoltaic Systems. *Rajabalizadeh*, S., +, JSYST Dec. 2020 4911-4918

Development and Validation of Artificial Neural Network-Based Tools for Forecasting of Power System Inertia With Wind Farms Penetration. *Paidi*, *E.S.N.R.*, +, *JSYST Dec.* 2020 4978-4989

Midterm Load Forecasting: A Multistep Approach Based on Phase Space Reconstruction and Support Vector Machine. *Li*, G., +, *JSYST Dec. 2020* 4967-4977

Formal specification

An MDE-Based Tool for Early Analysis of UML2.0/PSM Atomic and Composite Components. *Rouis, T.S.*, +, *JSYST June 2020 1647-1657*

Design Ontology in a Case Study for Cosimulation in a Model-Based Systems Engineering Tool-Chain. Lu, J., +, JSYST March 2020 1297-1308

Formal verification

Design Ontology in a Case Study for Cosimulation in a Model-Based Systems Engineering Tool-Chain. Lu, J., +, JSYST March 2020 1297-1308

Efficient Population of the Verification Tradespace Using Bayesian Inference. Farkhondehmaal, F., +, JSYST Sept. 2020 3225-3232

Fourier transforms

An Online Bearing Fault Diagnosis Technique via Improved Demodulation Spectrum Analysis Under Variable Speed Conditions. *Liu, D.*, +, *JSYST June 2020 2323-2334*

Detection of False Data Injection Attacks in Smart Grids Based on Graph Signal Processing. Drayer, E., +, JSYST June 2020 1886-1896

Fractal

Study on Base Station Topology in National Cellular Networks: Take Advantage of Alpha Shapes, Betti Numbers, and Euler Characteristics. *Chen, Y.*, +, *JSYST June 2020 2202-2213*

Fraud

E-WACGAN: Enhanced Generative Model of Signaling Data Based on WGAN-GP and ACGAN. *Jin, Q.*, +, *JSYST Sept. 2020 3289-3300*

Free-space optical communication

Expanded Multiband Super-Nyquist CAP Modulation for Highly Bandlimited Organic Visible Light Communications. *Chvojka, P.*, +, *JSYST June* 2020 2544-2550

On Secure Mixed RF-FSO Decode-and-Forward Relaying Systems With Energy Harvesting. Saber, M.J., +, JSYST Sept. 2020 4402-4405

Performance Analysis of a Mixed Cooperative PLC–VLC System for Indoor Communication Systems. *Jani, M.,* +, *JSYST March 2020 469-476*

Performance of Opportunistic Receiver Beam Selection in Multiaperture OWC Systems Over Foggy Channels. *Rahman, Z.*, +, *JSYST Sept. 2020* 4036-4046

User-Centric MIMO Techniques for Indoor Visible Light Communication Systems. *Chen, C.*, +, *JSYST Sept. 2020 3202-3213*

Frequency allocation

An Analytical View of ASE for Multicell OFDMA Networks Based on Frequency-Reuse Scheme. *Ghosh, J., +, JSYST March 2020 645-648*

Probabilistic Stability of Traffic Load Balancing on Wireless Complex Networks. *Moutsinas, G.*, +, *JSYST June 2020 2551-2556*

WmA-MiFN: A Weighted Majority and Auction Game Based Green Ultra-Dense Micro-Femtocell Network System. *Mukherjee*, A., +, *JSYST March* 2020 353-362

Frequency control

Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG. *Gheisarnejad*, M., +, JSYST March 2020 1058-1068

Application of Bang–Bang Controller to Emulate Primary Frequency Response in DFIGs. *Toulabi*, *M*., +, *JSYST June 2020 2615-2623*

Disturbance-Observer-Based Frequency Regulation Scheme for Low-Inertia Microgrid Systems. Sharma, D., +, JSYST March 2020 782-792

Enhanced Active and Reactive Power Sharing in Islanded Microgrids. Parvizimosaed, M., +, JSYST Dec. 2020 5037-5048

Intrusion-Detector-Dependent Frequency Regulation for Microgrids Under Denial-of-Service Attacks. *Liu*, S., +, *JSYST June 2020 2593-2596*

Frequency division multiple access

An Analytical View of ASE for Multicell OFDMA Networks Based on Frequency-Reuse Scheme. Ghosh, J., +, JSYST March 2020 645-648

Multiuser Variable Rate GO-OFDMA Architecture and Its FPGA Prototype. Palisetty, R., +, JSYST June 2020 2455-2463

Frequency division multiplexing

A Flexible Multicarrier Scheme Based on the Discrete Orthogonal Stockwell Transform. Colen, G.R., +, JSYST Dec. 2020 5284-5295

A Novel Receiver Design of Nonorthogonal FDM Systems in Underwater Acoustics Communication. *Anwar, S., +, JSYST Sept. 2020 3875-3884*

Frequency estimation

An Online Bearing Fault Diagnosis Technique via Improved Demodulation Spectrum Analysis Under Variable Speed Conditions. *Liu, D.*, +, *JSYST June 2020 2323-2334*

Frequency measurement

Disturbance-Observer-Based Frequency Regulation Scheme for Low-Inertia Microgrid Systems. *Sharma*, D., +, *JSYST March* 2020 782-792

Frequency modulation

An Online Bearing Fault Diagnosis Technique via Improved Demodulation Spectrum Analysis Under Variable Speed Conditions. *Liu, D.*, +, *JSYST June 2020 2323-2334*

Frequency response

Application of Bang–Bang Controller to Emulate Primary Frequency Response in DFIGs. *Toulabi*, M., +, *JSYST June 2020 2615-2623*

Multiobjective Multiscenario Under-Frequency Load Shedding in a Standalone Power System. *Hong, Y., +, JSYST June 2020 2759-2769*

Frequency shift keying

Performance of Wireless Powered DF Relay System Under Nakagami-mFading: Relay Assists Energy-Constrained Source. Kumar, P., +, JSYST June 2020 2497-2507

Frequency stability

Application of Bang–Bang Controller to Emulate Primary Frequency Response in DFIGs. *Toulabi*, M., +, *JSYST June 2020 2615-2623*

Frequency-domain analysis

Low-Complexity Reconfigurable and Intelligent Ultrawideband Angular Sensing. *Joshi, H., +, JSYST Dec. 2020 4931-4942*

Simplified Modeling and HIL Validation of Solar PVs and Storage-Based Islanded Microgrid With Generation Uncertainties. Sen, S., +, JSYST June 2020 2653-2664

Fuel cells

Voltage/Current Large Transient Suppression in DC Microgrids Using Local Information and Active Stabilizing Capability. Azimi, S.M., +, JSYST March 2020 1109-1116

Fuzzy control

Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG. *Gheisarnejad*, M., +, JSYST March 2020 1058-1068

Fuzzy-Observer-Based Predictive Stabilization of DC Microgrids With Power Buffers Through an Imperfect 5G Network. *Vafamand*, N., +, *JSYST Sept.* 2020 4025-4035

Fuzzy logic

Determining Impact of Lightning Strike Location on Failures in Transmission Network Elements Using Fuzzy Decision-Making. *Petrovic, I.*, +, *JSYST June 2020 2665-2675*

High-Fidelity Hexarot Simulation-Based Motion Platform Using Fuzzy Incremental Controller and Model Predictive Control-Based Motion Cueing Algorithm. *Qazani, M.R.C., +, JSYST Dec. 2020 5073-5083*

Optimized Fuzzy Logic-Based Fire Monitoring in Underground Coal Mines: Binary Particle Swarm Optimization Approach. *Muduli, L.*, +, *JSYST June* 2020 3039-3046

Fuzzy neural networks

An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi, N.*, +, *JSYST March 2020 1218-1229*

Fuzzy reasoning

An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, *N.*, +, *JSYST March 2020 1218-1229*

Fuzzy set theory

Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG. *Gheisarnejad*, M., +, JSYST March 2020 1058-1068

Determining Impact of Lightning Strike Location on Failures in Transmission Network Elements Using Fuzzy Decision-Making. *Petrovic, I.*, +, *JSYST June 2020 2665-2675*

Fuzzy-Based 3-D Stream Traffic Lightweighting Over Mobile P2P Network. Zhang, C., +, JSYST June 2020 1840-1851

Optimized Fuzzy Logic-Based Fire Monitoring in Underground Coal Mines: Binary Particle Swarm Optimization Approach. *Muduli, L.*, +, *JSYST June* 2020 3039-3046

G

Game theory

A Game Theoretic Model for the Multiperiodic Smart Grid Demand Response Problem. *Belhaiza*, S., +, JSYST March 2020 1147-1158

Deployment of Drone-Based Small Cells for Public Safety Communication System. *Ali*, K., +, *JSYST June 2020 2882-2891*

Disclose or Exploit? A Game-Theoretic Approach to Strategic Decision Making in Cyber-Warfare. Chen, H., +, JSYST Sept. 2020 3779-3790

Energy-Efficient Joint Scheduling and Resource Management for UAV-Enabled Multicell Networks. Yang, H., +, JSYST March 2020 363-374

Equilibrium Analysis of Electricity Market With Demand Response Exchange to Counterbalance Bid Deviations of Renewable Generators. *Wang, X.*, +, *JSYST June 2020 2713-2724*

Joint Energy-QoE Efficient Content Delivery Networks Using Real-Time Energy Management. *Goudarzi*, P., +, JSYST March 2020 927-938

Market-Driven Stochastic Resource Allocation Framework for Wireless Network Virtualization. *Gomez, M.M.*, +, *JSYST March 2020 489-499*

Multiobjective Precoder Design for Coexisting Wireless Energy Transfer and Information Transmission Systems. *Zhang, H.*, +, *JSYST March 2020 445-456*

Optimal Scheduling of EV Charging at a Solar Power-Based Charging Station. Kabir, M.E., +, JSYST Sept. 2020 4221-4231

ORCID: Opportunistic Reconnectivity for Network Management in the Presence of Dumb Nodes in Wireless Sensor Networks. *Roy, A.*, +, *JSYST March 2020 9-16*

Traffic-Aware Multiple Association in Ultradense Networks: A State-Based Potential Game. Wang, X., +, JSYST Sept. 2020 4356-4367

WmA-MiFN: A Weighted Majority and Auction Game Based Green Ultra-Dense Micro-Femtocell Network System. *Mukherjee*, A., +, *JSYST March* 2020 353-362

Games

Intelligent Residential Energy Management System Using Deep Reinforcement Learning. Mathew, A., +, JSYST Dec. 2020 5362-5372

Gamma distribution

Application of the Mixture of Lognormal Distribution to Represent the First-Order Statistics of Wireless Channels. *Das, S.,* +, *JSYST Sept. 2020* 4394-4401

Performance of Opportunistic Receiver Beam Selection in Multiaperture OWC Systems Over Foggy Channels. *Rahman, Z.*, +, *JSYST Sept. 2020* 4036-4046

Gaussian channels

End-to-End Distortion Analysis of Nonorthogonal Layered Coding Over Relay-Assisted Networks. *Padidar, P., +, JSYST Sept. 2020 4466-4476*

Gaussian distribution

Fault Detection for Low-Voltage Residential Distribution Systems With Low-Frequency Measured Data. Shafiei, M., +, JSYST Dec. 2020 5265-5273

Gaussian noise

A Robust Hyperbolic Tangent-Based Energy Detector With Gaussian and Non-Gaussian Noise Environments in Cognitive Radio System. *Qu, H.*, +, *JSYST Sept. 2020 3161-3172*

Gaussian processes

Echo State Network and Echo State Gaussian Process for Non-Line-of-Sight Target Tracking. *Yang, X.*, +, *JSYST Sept. 2020 3885-3892*

Information-Based Hierarchical Planning for a Mobile Sensing Network in Environmental Mapping. *Li*, *T*., +, *JSYST June 2020 1692-1703*

Mitigation Techniques for Impulsive Noise With Memory Modeled by a Two State Markov-Gaussian Process. *Alam, M.S.*, +, *JSYST Sept. 2020* 4079-4088

Robust Power System State Estimation Using *t*-Distribution Noise Model. *Chen, T.*, +, *JSYST March 2020 771-781*

Generator

Enhanced Active and Reactive Power Sharing in Islanded Microgrids. Parvizimosaed, M., +, JSYST Dec. 2020 5037-5048

Transient Instability Mitigation via Repetitive Corrective Actions Based Upon the Real-Time Macrocoherency Evaluation. Babu, G.V.N.Y., +, JSYST Dec. 2020 5084-5095

Voltage Stability Constrained OPF in Multi-Micro-Grid Considering Demand Response Programs. *Nojavan, M.*, +, *JSYST Dec.* 2020 5221-5228

Genetic algorithms

A Novel Control Method Based on Droop for Cooperation of Flywheel and Battery Energy Storage Systems in Islanded Microgrids. *Khodadoost Arani, A.A.*, +, *JSYST March 2020 1080-1087*

A Variable Neighborhood Search-Based Hybrid Multiobjective Evolutionary Algorithm for HazMat Heterogeneous Vehicle Routing Problem With Time Windows. *Jiang, P.*, +, *JSYST Sept. 2020 4344-4355*

Delay- and Interference-Aware Routing for Wireless Mesh Network. *Chai*, Y., +, JSYST Sept. 2020 4119-4130

Highly Accurate Directional Overcurrent Coordination via Combination of Rosen's Gradient Projection—Complex Method With GA-PSO Algorithm. Darabi, A., +, JSYST March 2020 1171-1182

Improved Bacterial Foraging Algorithm for Cell Formation and Product Scheduling Considering Learning and Forgetting Factors in Cellular Manufacturing Systems. Wang, J., +, JSYST June 2020 3047-3056

Integration Design of Sortie Scheduling for Carrier Aircrafts Based on Hybrid Flexible Flowshop. *Liu*, *J.*, +, *JSYST March 2020 1503-1511*

Modified Power Reserve Management Solution in Power System Considering Frequency Constraints. *Hosseini*, S.A., +, JSYST March 2020 1125-1134

Quantum-Inspired Genetic Programming Algorithm for the Crude Oil Scheduling of a Real-World Refinery. *Pereira, C.S.*, +, *JSYST Sept. 2020* 3926-3937

Geometry

Outage Probability in the Uplink of Multitier Millimeter Wave Cellular Networks. *Onireti*, O., +, *JSYST June* 2020 2520-2531

Relay-Aided Outdoor-to-Indoor Communication in Millimeter-Wave Cellular Networks. *Ntontin. K.*. +, *JSYST June 2020 2473-2484*

Geophysical image processing

ASIS: Autonomous Seismic Imaging System With *In Situ* Data Analytics and Renewable Energy. *Clemente, J., +, JSYST March 2020 1277-1284*

Geophysical techniques

An Improved Rapid-Source Parameter Determination System (AQUA) for Giant Earthquakes. *Kimura*, *H.*, +, *JSYST Sept. 2020 3451-3462*

Gesture recognition

Visual Perception for Multiple Human–Robot Interaction From Motion Behavior. Benli, E., +, JSYST June 2020 2937-2948

Global Positioning System

System Integration of Sensor-Fusion Localization Tasks Using Vision-Based Driving Lane Detection and Road-Marker Recognition. *Lin, C.*, +, *JSYST Sept. 2020 4523-4534*

VTracer: When Online Vehicle Trajectory Compression Meets Mobile Edge Computing. Chen, C., +, JSYST June 2020 1635-1646

Goods distribution

A Variable Neighborhood Search-Based Hybrid Multiobjective Evolutionary Algorithm for HazMat Heterogeneous Vehicle Routing Problem With Time Windows. *Jiang, P.*, +, *JSYST Sept. 2020 4344-4355*

Government data processing

A Secure End-to-End Verifiable Internet-Voting System Using Identity-Based Blind Signature. *Kumar, M.*, +, *JSYST June 2020 2032-2041*

Distributed Elections Using Site-Push Majority Winner Monitoring. Chaturvedi, K., +, JSYST June 2020 1682-1691

Gradient methods

Highly Accurate Directional Overcurrent Coordination via Combination of Rosen's Gradient Projection—Complex Method With GA-PSO Algorithm. Darabi, A., +, JSYST March 2020 1171-1182

Graph coloring

Content Placement in Cache Networks Using Graph Coloring. *Javedankherad, M.*, +, *JSYST Sept. 2020 3129-3138*

The Allocation and Reuse Scheme of Physical Cell Identifications Based on Maximum Degree First Coloring Algorithm. *Liu, M.*, +, *JSYST March* 2020 582-591

Graph theory

A Graph-Based Model for Transmission Network Vulnerability Analysis. Yang, S., +, JSYST March 2020 1447-1456

A Graph-Theoretic Approach to Capacity Benefit Margin Calculation for Large Multiarea Power Systems. *Mohammed, O.O.*, +, *JSYST March 2020* 1230-1233

A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926

Complex Network-Based Transmission Network Vulnerability Assessment Using Adjacent Graphs. Zang, T., +, JSYST March 2020 572-581

Containment Control of Linear Multiagent Systems With Stochastic Disturbances via Event-Triggered Strategies. Zou, W., +, JSYST Dec. 2020 4810-4819

Cyber-Social Systems: Modeling, Inference, and Optimal Design. *Doostmo-hammadian*, M., +, JSYST March 2020 73-83

Detection of False Data Injection Attacks in Smart Grids Based on Graph Signal Processing. Drayer, E., +, JSYST June 2020 1886-1896

Globally Stable Formation Control of Nonholonomic Multiagent Systems With Bearing-Only Measurement. *Luo*, X., +, *JSYST June 2020 2901-2912*

Path-Based Distribution Feeder Reconfiguration for Optimization of Losses and Reliability. *Jose, J.*, +, *JSYST March 2020 1417-1426*

Reliability Evaluation and Reliability-Based Optimal Design for Wireless Sensor Networks. *Xiang, S., +, JSYST June 2020 1752-1763*

Reweighted Compressed Sensing-Based Smart Grids Topology Reconstruction With Application to Identification of Power Line Outage. *Huang, K.*, +, *JSYST Sept. 2020 4329-4339*

Simulating Systems-of-Systems With Agent-Based Modeling: A Systematic Literature Review. Silva, R.d.A., +, JSYST Sept. 2020 3609-3617

Spectral Graph Analysis of the Geometry of Power Flows in Transmission Networks. *Retiere*, N., +, JSYST June 2020 2736-2747

Toward Greater Intelligence in Route Planning: A Graph-Aware Deep Learning Approach. Zhuang, Z., +, JSYST June 2020 1658-1669

Graphics processing units

Heterogeneous System-on-Chip-Based Lattice-Boltzmann Visual Simulation System. Zhai, X., +, JSYST June 2020 1592-1601

Greedy algorithms

Duration-Sensitive Task Allocation for Mobile Crowd Sensing. Lai, C., +, JSYST Sept. 2020 4430-4441

Information-Based Hierarchical Planning for a Mobile Sensing Network in Environmental Mapping. *Li*, *T*, +, *JSYST June 2020 1692-1703*

Network Slice Admission Model: Tradeoff Between Monetization and Rejections. Challa, R., +, JSYST March 2020 657-660

Green computing

Toward Energy-Oriented Optimization for Green Communication in Sensor Enabled IoT Environments. *Kumar, S., +, JSYST Dec. 2020 4663-4673*

Green products

Toward Energy-Oriented Optimization for Green Communication in Sensor Enabled IoT Environments. *Kumar*; S., +, *JSYST Dec.* 2020 4663-4673

Grey systems

Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. Kaur; R., +, JSYST March 2020 729-737

н

H^{∞} control

A Novel Control-Performance-Oriented Data-Driven Fault Classification Approach. Liu, T., +, JSYST June 2020 1830-1839

Handicapped aids

A Context-Aware Augmentative and Alternative Communication System for School Children With Intellectual Disabilities. *Chan, R.Y.*, +, *JSYST March* 2020 208-219

Visual Perception for Multiple Human–Robot Interaction From Motion Behavior. Benli, E., +, JSYST June 2020 2937-2948

Hardware

A New Distributed Fault Detection Method for Wireless Sensor Networks. Gharamaleki, M.M., +, JSYST Dec. 2020 4883-4890

Artificial Noise Hopping: A Practical Secure Transmission Technique With Experimental Analysis for Millimeter Wave Systems. *Ju, Y.*, +, *JSYST Dec.* 2020 5121-5132

Low-Complexity Reconfigurable and Intelligent Ultrawideband Angular Sensing. *Joshi, H.*, +, *JSYST Dec. 2020 4931-4942*

RF Chain Reduction for MIMO Systems: A Hardware Prototype. *Gong, T.*, +, *JSYST Dec. 2020 5296-5307*

Hardware-in-the loop simulation

Local Measurements-Based Backup Protection for DC Microgrids Using Sequential Analyzing Technique. *Meghwani*, A., +, *JSYST March 2020* 1159-1170

Harmonic distortion

A Hybrid Photovoltaic-Fuel Cell-Based Single-Stage Grid Integration With Lyapunov Control Scheme. *Priyadarshi*, N., +, *JSYST Sept.* 2020 3334-3342

Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG. *Gheisarnejad*, M., +, JSYST March 2020 1058-1068

Discrete-Wavelet-Transform and Stockwell-Transform-Based Statistical Parameters Estimation for Fault Analysis in Grid-Connected Wind Power System. *Mukherjee*, N., +, *JSYST Sept. 2020 4320-4328*

Multilevel Inverter (MLI)-Based Stand-Alone Photovoltaic System: Modeling, Analysis, and Control. Kumar, N., +, JSYST March 2020 909-915

Harmonics suppression

Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator. *Kumar, V.N.*, +, *JSYST Sept. 2020 4308-4319*

Hazardous materials

A Variable Neighborhood Search-Based Hybrid Multiobjective Evolutionary Algorithm for HazMat Heterogeneous Vehicle Routing Problem With Time Windows. *Jiang, P.*, +, *JSYST Sept. 2020 4344-4355*

Health care

A Secure Three-Factor User Authentication Protocol With Forward Secrecy for Wireless Medical Sensor Network Systems. *Li*, *X*., +, *JSYST March* 2020 39-50

ChainSDI: A Software-Defined Infrastructure for Regulation-Compliant Home-Based Healthcare Services Secured by Blockchains. *Li*, *P*, +, *JSYST June 2020 2042-2053*

Edge Computing-Based Mobile Health System: Network Architecture and Resource Allocation. *Lin, D.*, +, *JSYST June 2020 1716-1727*

Energy-Efficient Resource Allocation for Dynamic Priority-Based Vehicular Mobile-Health Communications. Fan, B., +, JSYST June 2020 2097-2108

Health Monitoring for Cyber Physical Systems. Shangguan, L., +, JSYST March 2020 1457-1467

PFCBAS: Pairing Free and Provable Certificate-Based Aggregate Signature Scheme for the e-Healthcare Monitoring System. *Verma, G.K.*, +, *JSYST June 2020 1704-1715*

Hemodynamics

Heterogeneous System-on-Chip-Based Lattice-Boltzmann Visual Simulation System. Zhai, X., +, JSYST June 2020 1592-1601

Heuristic algorithms

Expectation and SAA Models and Algorithms for Scheduling of Multiple Earth Observation Satellites Under the Impact of Clouds. *Wang, J.*, +, *JSYST Dec. 2020 5451-5462*

Performance Analysis of Priority-Based Access Class Barring Scheme for Massive MTC Random Access. Sim, Y., +, JSYST Dec. 2020 5245-5252

Hierarchical systems

A Cyber-Physical Cooperative Hierarchical Control Strategy for Islanded Microgrid Facing With Random Communication Failure. *Zhang, B.*, +, *JSYST June 2020 2849-2860*

Higher order statistics

Novel Energy-Harvesting AF Relaying Schemes With Channel Estimation Errors. *Zhou, Y.*, +, *JSYST March 2020 333-342*

Robust Optimization-Based Energy Storage Operation for System Congestion Management. *Yan, X.*, +, *JSYST June 2020 2694-2702*

Hilbert transforms

An Intelligent Detection of High-Impedance Faults for Distribution Lines Integrated With Distributed Generators. *Chaitanya, B.K.*, +, *JSYST March* 2020 870-879

An Online Bearing Fault Diagnosis Technique via Improved Demodulation Spectrum Analysis Under Variable Speed Conditions. *Liu, D.*, +, *JSYST June 2020 2323-2334*

Detection and Experimental Validation of High Impedance Arc Fault in Distribution System Using Empirical Mode Decomposition. *Lala, H.*, +, *JSYST Sept. 2020 3494-3505*

Home appliances

Intelligent Residential Energy Management System Using Deep Reinforcement Learning. *Mathew, A.*, +, *JSYST Dec. 2020 5362-5372*

Home networks

Smart Home Monitoring System via Footstep-Induced Vibrations. *Li*, F, +, *JSYST Sept. 2020 3383-3389*

Human computer interaction

A Context-Aware Augmentative and Alternative Communication System for School Children With Intellectual Disabilities. *Chan, R.Y.*, +, *JSYST March* 2020 208-219

Human-robot interaction

Visual Perception for Multiple Human–Robot Interaction From Motion Behavior. Benli, E., +, JSYST June 2020 2937-2948

HVDC power converters

Protection Coordination for Assembly HVDC Breakers for HVDC Multiterminal Grids Using Wavelet Transform. *Mitra*, B., +, *JSYST March 2020* 1069-1079

HVDC power transmission

Protection Coordination for Assembly HVDC Breakers for HVDC Multiterminal Grids Using Wavelet Transform. *Mitra*, B., +, *JSYST March* 2020 1069-1070

Protection of High-Voltage DC Grids Using Traveling-Wave Frequency Characteristics. Saleh, K.A., +, JSYST Sept. 2020 4284-4295

Hybrid electric vehicles

System Design and Realization of a Solar-Powered Electric Vehicle Charging Station. Shariff, S.M., +, JSYST June 2020 2748-2758

Hybrid power systems

A Hybrid Photovoltaic-Fuel Cell-Based Single-Stage Grid Integration With Lyapunov Control Scheme. *Priyadarshi*, *N.*, +, *JSYST Sept.* 2020 3334-3342

An Improved Current Balancing Technique of Two-Winding IG Suitable for Wind-PV-Based Grid-Isolated Hybrid Generation System. *Chatterjee, A.*, +, *JSYST Dec. 2020 4874-4882*

Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur, R.*, +, *JSYST March 2020 729-737*

Model Predictive for Reactive Power Scheduling Control Strategy for PV—Battery Hybrid System in Competitive Energy Market. *Lupangu, C.*, +, *JSYST Sept. 2020 4071-4078*

Optimal Charge/Discharge Scheduling of Battery Storage Interconnected With Residential PV System. *Kapoor, A., +, JSYST Sept. 2020 3825-3835*

Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. Manohar, M., +, JSYST Sept. 2020 3430-3439

Hysteresis

An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, N., +, *JSYST March 2020 1218-1229*

I

IEC standards

A Novel SCL Configuration Method for Modeling Microgrids With IEC 61850. *Aftab, M.A.*, +, *JSYST June 2020 2676-2683*

IEEE standards

A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926

Detection and Location of Bias Load Injection Attack in Smart Grid via Robust Adaptive Observer. Wang, X., +, JSYST Sept. 2020 4454-4465

Development of an Ensemble Decision Tree-Based Power System Dynamic Security State Predictor. *Mukherjee*, R., +, *JSYST Sept. 2020 3836-3843*

Optimal Control Methods for Photovoltaic Enabled Grid With Abnormal Power Loads. Yang, Y., +, JSYST March 2020 852-861

PMU-Assisted Zone-3 Protection Scheme for PV Integrated Power Systems Immune to Interharmonics. Prakash, T., +, JSYST Sept. 2020 3267-3276

Robust Power System State Estimation Using t-Distribution Noise Model. Chen, T., +, JSYST March 2020 771-781

Spatio-Temporal Value of Energy Storage in Transmission Networks. *Khatami*, R., +, *JSYST Sept. 2020 3855-3864*

IIR filters

Adaptive Narrow-Band Interference Suppression and Performance Evaluation Based on Code-Aided in GNSS Inter-Satellite Links. Wang, H., +, JSYST March 2020 538-547

Image classification

Multicriteria UAV Base Stations Placement for Disaster Management. Akram, T., +, JSYST Sept. 2020 3475-3482

Image color analysis

Simultaneous Heterogeneous Sensor Localization, Joint Tracking, and Upper Extremity Modeling for Stroke Rehabilitation. *Chen, J.*, +, *JSYST Sept. 2020 3570-3581*

Image filtering

Computation and Sensor Offloading for Cloud-Based Infrastructure-Assisted Autonomous Vehicles. Kong, P., JSYST Sept. 2020 3360-3370

Image matching

System Integration of Sensor-Fusion Localization Tasks Using Vision-Based Driving Lane Detection and Road-Marker Recognition. *Lin, C.*, +, *JSYST Sept. 2020 4523-4534*

Image representation

A Novel Control-Performance-Oriented Data-Driven Fault Classification Approach. *Liu*, *T.*, +, *JSYST June 2020 1830-1839*

Image sensors

A Multilevel Fusion System for Multirobot 3-D Mapping Using Heterogeneous Sensors. Yue, Y., +, JSYST March 2020 1341-1352

Impedance

Enhanced Active and Reactive Power Sharing in Islanded Microgrids. Parvizimosaed, M., +, JSYST Dec. 2020 5037-5048

Impedance matching

An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, N., +, *JSYST March* 2020 1218-1229

Importance sampling

Importance Sampling Using Multilabel Radial Basis Classification for Composite Power System Reliability Evaluation. *Urgun*, *D.*, +, *JSYST June* 2020 2791-2800

Impulse noise

A Robust Hyperbolic Tangent-Based Energy Detector With Gaussian and Non-Gaussian Noise Environments in Cognitive Radio System. *Qu, H.*, +, *JSYST Sept. 2020 3161-3172*

Mitigation Techniques for Impulsive Noise With Memory Modeled by a Two State Markov-Gaussian Process. *Alam, M.S.*, +, *JSYST Sept. 2020* 4079-4088

Orthogonal Chirp Division Multiplexing for Baseband Data Communication Systems. *De M. B. A. Dib, L.*, +, *JSYST June 2020 2164-2174*

Performance Analysis of a Mixed Cooperative PLC–VLC System for Indoor Communication Systems. *Jani, M., +, JSYST March 2020 469-476*

Incentive scheme

Toward a Theory of Systems Engineering Processes: A Principal–Agent Model of a One-Shot, Shallow Process. Safarkhani, S., +, JSYST Sept. 2020 3277-3288

Indoor communication

Performance Analysis of a Mixed Cooperative PLC–VLC System for Indoor Communication Systems. *Jani, M.*, +, *JSYST March 2020 469-476*

User-Centric MIMO Techniques for Indoor Visible Light Communication Systems. Chen, C., +, JSYST Sept. 2020 3202-3213

Indoor navigation

BLE Beacons for Indoor Positioning at an Interactive IoT-Based Smart Museum. Spachos, P., +, JSYST Sept. 2020 3483-3493

Lightweight Privacy-Preserving Scheme in Wi-Fi Fingerprint-Based Indoor Localization. Zhang, G., +, JSYST Sept. 2020 4638-4647

Indoor radio

BLE Beacons for Indoor Positioning at an Interactive IoT-Based Smart Museum. Spachos, P., +, JSYST Sept. 2020 3483-3493

Lightweight Privacy-Preserving Scheme in Wi-Fi Fingerprint-Based Indoor Localization. Zhang, G., +, JSYST Sept. 2020 4638-4647

Relay-Aided Outdoor-to-Indoor Communication in Millimeter-Wave Cellular Networks. *Ntontin, K.*, +, *JSYST June 2020 2473-2484*

Smart Home Monitoring System via Footstep-Induced Vibrations. *Li*, F., +, JSYST Sept. 2020 3383-3389

WiFi Fingerprinting Indoor Localization Using Local Feature-Based Deep LSTM. Chen, Z., +, JSYST June 2020 3001-3010

Induction generators

An Improved Current Balancing Technique of Two-Winding IG Suitable for Wind-PV-Based Grid-Isolated Hybrid Generation System. *Chatterjee, A.*, +, *JSYST Dec.* 2020 4874-4882

Inductive power transmission

A Review on the Recent Development in the Design and Optimization of Magnetic Coupling Mechanism of Wireless Power Transmission. *Dai, Z.*, +, *JSYST Sept. 2020 4368-4381*

Fast Wireless Power Transfer for Multiple Receivers in Linear Topology. Lee, K., +, JSYST March 2020 649-652 Outage Probability and Throughput of Multirelay SWIPT-WPCN Networks With Nonlinear EH Model and Imperfect CSI. *Jiang, R.*, +, *JSYST March* 2020 1206-1217

Performance Analysis of Impaired SWIPT NOMA Relaying Networks Over Imperfect Weibull Channels. *Li*, *X*., +, *JSYST March 2020 669-672*

Industrial control

A Multidimensional Holistic Framework for the Security of Distributed Energy and Control Systems. *Saleem, D., +, JSYST March 2020 17-27*

Cyber-Attacks in a Looped Energy-Water Nexus: An Inoculated Sub-Observer-Based Approach. Khalid, H.M., +, JSYST June 2020 2054-2065

Cybersecurity Vulnerability Mitigation Framework Through Empirical Paradigm (CyFEr): Prioritized Gap Analysis. *Gourisetti, S.N.G.*, +, *JSYST June 2020 1897-1908*

Inertial navigation

Fault-Tolerant GNSS/SINS/DVL/CNS Integrated Navigation and Positioning Mechanism Based on Adaptive Information Sharing Factors. *Xiong, H., +, JSYST Sept. 2020 3744-3754*

Inference mechanisms

Probabilistic Inference of Fault Condition of Cyber-Physical Systems Under Uncertainty. *Tao*, X., +, *JSYST Sept. 2020 3256-3266*

Information retrieval

Efficient Ranked Multi-Keyword Retrieval With Privacy Protection for Multiple Data Owners in Cloud Computing. Sun, J., +, JSYST June 2020 1728-1739

Information technology

Anticomplementary Triangles for Efficient Coverage in Sensor Network-Based IoT. Shivhare, A., +, JSYST Dec. 2020 4854-4863

Hybrid Configuration in Information Technology Value Model. Abdurrahman, L., JSYST Sept. 2020 4515-4522

Information theory

A Theory for Optimizing Insecure Internetwork Connections. Das, P., +, JSYST Dec. 2020 4842-4853

Infrared imaging

Visual Perception for Multiple Human–Robot Interaction From Motion Behavior. Benli, E., +, JSYST June 2020 2937-2948

Inspection

FPGA-Based Design Optimization in Autonomous Robot Systems for Inspection of Civil Infrastructure. *Lins, R.G.*, +, *JSYST June 2020 2961-2964*

Probabilistic Study of Undervoltage Load Shedding Scheme to Mitigate the Impact of Protection System Hidden Failures. Pal, D., +, JSYST March 2020 862-869

System Architecture for Real-Time Surface Inspection Using Multiple UAVs. Hoang, V.T., +, JSYST June 2020 2925-2936

Integer programming

A Mixed Integer Nonlinear Program Based Power Load Estimator for Distribution Grid. *Yang*, Y., +, *JSYST March* 2020 842-851

A Robust Coordinated Expansion Planning Model For Wind Farm-Integrated Power Systems With Flexibility Sources Using Affine Policies. Dehghan, S., +, JSYST Sept. 2020 4110-4118

Active Distribution Network Operation: A Market-Based Approach. Zubo, R.H.A., +, JSYST March 2020 1405-1416

Adaptive Traffic Management and Energy Cooperation in Renewable-Energy-Powered Cellular Networks. Lee, H., +, JSYST March 2020 132-143

An Adaptive Grid Frequency Support Mechanism for Energy Management in Cloud Data Centers. *Kaur, K.*, +, *JSYST March 2020 1195-1205*

An MINLP-Based Approach for the Design-for-Control of Resilient Water Supply Systems. *Ulusoy, A.*, +, *JSYST Sept. 2020 4579-4590*

Computation and Sensor Offloading for Cloud-Based Infrastructure-Assisted Autonomous Vehicles. Kong, P., JSYST Sept. 2020 3360-3370

Energy-Efficient Resource Allocation for Dynamic Priority-Based Vehicular Mobile-Health Communications. Fan, B., +, JSYST June 2020 2097-2108 Integrated Utility-Transit Model for Optimal Configuration of Battery Elec-

tric Bus Systems. *El-Taweel, N.A.*, +, *JSYST March 2020 738-748*Network Slice Admission Model: Tradeoff Between Monetization and

Rejections. Challa, R., +, JSYST March 2020 657-660

- On the Optimization of User Association and Resource Allocation in Het-Nets With mm-Wave Base Stations. *Chaieb, C.*, +, *JSYST Sept. 2020 3957*-3967
- Optimal Planning and Operational Strategy of a Residential Microgrid With Demand Side Management. *Bhamidi, L., +, JSYST June 2020 2624-2632*
- Optimal Scheduling of EV Charging at a Solar Power-Based Charging Station. Kabir, M.E., +, JSYST Sept. 2020 4221-4231
- Path-Based Distribution Feeder Reconfiguration for Optimization of Losses and Reliability. *Jose, J.*, +, *JSYST March 2020 1417-1426*
- QoS-Aware Cross-Layer Optimization of Hybrid DSL-LTE Access Networks. Chuah, T.C., +, JSYST June 2020 2175-2186

Integrated circuits

Adaptive Interconnection and Damping Assignment Passivity-Based Control of Interlinking Converter in Hybrid AC/DC Grids. *Azimi, S.M.*, +, *JSYST Dec.* 2020 4718-4725

Intelligent control

An Intelligent Elevator Development and Management System. Van, L., +, JSYST June 2020 3015-3026

Intercarrier interference

- A Novel Receiver Design of Nonorthogonal FDM Systems in Underwater Acoustics Communication. *Anwar, S., +, JSYST Sept. 2020 3875-3884*
- Bridging the Gap Between CP-OFDM and ZP-OFDM for the Provision of Ultra-Low Latency Services in 5G. *Ayadi*, R., +, *JSYST March 2020 603-613*
- Location-Aided mMIMO Channel Tracking and Hybrid Beamforming for High-Speed Railway Communications: An Angle-Domain Approach. *Xu*, *K*., +, *JSYST March 2020 93-104*
- Reconfigurable Architecture of UFMC Transmitter for 5G and Its FPGA Prototype. *Kumar, V., +, JSYST March 2020 28-38*

Interchannel interference

Learning-Based Resource Management for SWIPT. Lee, K., +, JSYST Dec. 2020 4750-4753

Interconnected systems

Engineering Resilient Complex Systems: The Necessary Shift Toward Complexity Science. *Punzo*, G., +, *JSYST Sept. 2020 3865-3874*

Interference

- Fairness Enhancement for Opportunistic Interference Alignment Algorithm With Low Latency Communications. *Lu*, *H*., +, *JSYST Dec. 2020 5002-5012*
- Shortest Uplink Scheduling for NOMA-Based Industrial Wireless Networks. Xu, C., +, JSYST Dec. 2020 5384-5395

Interference cancellation

Transmit Antenna Selection for Full-Duplex Spatial Modulation Multiple-Input Multiple-Output System. Van Nguyen, L., +, JSYST Dec. 2020 4777-4785

Interference suppression

- Adaptive Narrow-Band Interference Suppression and Performance Evaluation Based on Code-Aided in GNSS Inter-Satellite Links. Wang, H., +, JSYST March 2020 538-547
- An Analytical View of ASE for Multicell OFDMA Networks Based on Frequency-Reuse Scheme. Ghosh, J., +, JSYST March 2020 645-648
- Covert Communications in D2D Underlaying Cellular Networks With Power Domain NOMA. *Jiang, Y.*, +, *JSYST Sept. 2020 3717-3728*
- Deep Learning-Based MIMO-NOMA With Imperfect SIC Decoding. *Kang*, *J.*, +, *JSYST Sept. 2020 3414-3417*
- Interplay of Processing and Radio Parameters: A Service-Oriented Performance Study. Alabbasi, A., +, JSYST March 2020 398-409
- Joint Nullspace Projection-Based Interference Mitigation for Full-Duplex Relay-Assisted Multicell Networks. *Fadoul, M.M.*, +, *JSYST June 2020* 2392-2399
- Joint Position, Decoding Order, and Power Allocation Optimization in UAV-Based NOMA Downlink Communications. *Hu, D.*, +, *JSYST June 2020 2949-2960*
- Location-Aided mMIMO Channel Tracking and Hybrid Beamforming for High-Speed Railway Communications: An Angle-Domain Approach. *Xu*, *K.*, +, *JSYST March 2020 93-104*

- Mitigation Techniques for Impulsive Noise With Memory Modeled by a Two State Markov-Gaussian Process. Alam, M.S., +, JSYST Sept. 2020 4079-4088
- Near-Optimal Detection of Monobit Digitized UWB Signals in the Presence of Noise and Strong Intersymbol Interference. *Khani, H.*, +, *JSYST June* 2020 2311-2322
- Novel Algorithms for Blind Sensing of Signals With Variable Bandwidths in Cognitive Radio. De, P., JSYST Sept. 2020 4272-4283
- Random Pattern Multiplexing for Random Access in IoT-Oriented Satellite Networks. Zhao, B., +, JSYST Sept. 2020 4089-4100
- Reconfigurable Architecture of UFMC Transmitter for 5G and Its FPGA Prototype. Kumar, V., +, JSYST March 2020 28-38
- Sum-Throughput Maximization of Secondary Users in an In-Band Full-Duplex Cognitive Wireless Powered Communication Network. *Jafari, R.*, +, *JSYST June 2020 2109-2120*
- Uplink Low-Power Scheduling for Delay-Bounded Industrial Wireless Networks Based on Imperfect Power-Domain NOMA. *Xu, C.*, +, *JSYST June* 2020 2443-2454

Internet

- A Dynamic Membership Data Aggregation (DMDA) Protocol for Smart Grid. Song, J., +, JSYST March 2020 900-908
- A Hierarchical Attention Model for CTR Prediction Based on User Interest. Wang, Q., +, JSYST Sept. 2020 4015-4024
- A Secure End-to-End Verifiable Internet-Voting System Using Identity-Based Blind Signature. *Kumar, M.*, +, *JSYST June 2020 2032-2041*
- A Secure Three-Factor User Authentication Protocol With Forward Secrecy for Wireless Medical Sensor Network Systems. *Li*, *X*., +, *JSYST March* 2020 30-50
- Adaptive and Stable Delay Control for Combating Bufferbloat: Theory and Algorithms. *Ye, J., +, JSYST March 2020 1285-1296*
- An Analytical Model for Information Centric Internet of Things Networks in Opportunistic Scenarios. *Yang, J.*, +, *JSYST March 2020 172-183*
- Analyzing NDN NACK on Interest Flooding Attack via SIS Epidemic Model. Wang, K., +, JSYST June 2020 1862-1873
- Campus Edge Computing Network Based on IoT Street Lighting Nodes. Chang, Y., +, JSYST March 2020 164-171
- Secure Distribution of Protected Content in Information-Centric Networking. Bilal, M., +, JSYST June 2020 1921-1932

Internet of Things

- A Lattice Signcrypted Secured Localization in Wireless Sensor Networks. Kumar, G., +, JSYST Sept. 2020 3949-3956
- A Lightweight ECC-Based Authentication Scheme for Internet of Things (IoT). *Hammi, B., +, JSYST Sept. 2020 3440-3450*
- A Secure Three-Factor User Authentication Protocol With Forward Secrecy for Wireless Medical Sensor Network Systems. *Li*, *X*., +, *JSYST March* 2020 39-50
- A Smart Optimization of Fault Diagnosis in Electrical Grid Using Distributed Software-Defined IoT System. *Al Mhdawi, A.K.*, +, *JSYST June 2020 2780-2790*
- A Software-Defined Management System for IP-Enabled WSNs. *Jura-do-Lasso*, F.F., +, JSYST June 2020 2335-2346
- An Actor-Critic Deep Reinforcement Learning Approach for Transmission Scheduling in Cognitive Internet of Things Systems. *Yang, H.*, +, *JSYST March* 2020 51-60
- An Analytical Model for Information Centric Internet of Things Networks in Opportunistic Scenarios. *Yang, J.*, +, *JSYST March 2020 172-183*
- An Intelligent Elevator Development and Management System. Van, L., +, JSYST June 2020 3015-3026
- Anonymous Aggregate Encryption Scheme for Industrial Internet of Things. Deng, L., JSYST Sept. 2020 3999-4006
- Anticomplementary Triangles for Efficient Coverage in Sensor Network-Based IoT. Shivhare, A., +, JSYST Dec. 2020 4854-4863
- ASIS: Autonomous Seismic Imaging System With *In Situ* Data Analytics and Renewable Energy. *Clemente*, *J.*, +, *JSYST March 2020 1277-1284*
- BLE Beacons for Indoor Positioning at an Interactive IoT-Based Smart Museum. Spachos, P., +, JSYST Sept. 2020 3483-3493

- Cache-Aware Computation Offloading in IoT Systems. Wei, H., +, JSYST March 2020 61-72
- Campus Edge Computing Network Based on IoT Street Lighting Nodes. Chang, Y, +, JSYST March 2020 164-171
- Efficient and Provably Secure Certificateless Parallel Key-Insulated Signature Without Pairing for IIoT Environments. *Xiong, H.*, +, *JSYST March* 2020 310-320
- Efficient Obfuscation for Encrypted Identity-Based Signatures in Wireless Body Area Networks. Zhang, Y., +, JSYST Dec. 2020 5320-5328
- Energy-Efficient IoT-Fog-Cloud Architectural Paradigm for Real-Time Wildfire Prediction and Forecasting. Kaur, H., +, JSYST June 2020 2003-2011
- Ephemeral-Cyber-Physical System: A Cloud-Like CPS Using Shared Devices in Open IoT. Noguchi, H., +, JSYST Dec. 2020 5176-5186
- Improved Teaching Learning-Based QoS-Aware Services Composition for Internet of Things. Khanouche, M.E., +, JSYST Sept. 2020 4155-4164
- Intelligent Energy-Saving Supervision System of Urban Buildings Based on the Internet of Things: A Case Study. Xing, L., +, JSYST Sept. 2020 4252-4261
- Lightweight Privacy-Preserving Scheme in Wi-Fi Fingerprint-Based Indoor Localization. Zhang, G., +, JSYST Sept. 2020 4638-4647
- Location-Aware, Context-Driven QoS for IoT Applications. Ahmad, E., +, JSYST March 2020 232-243
- MEGAN: Multipurpose Energy-Efficient, Adaptable, and Low-Cost Wireless Sensor Node for the Internet of Things. *Misra*, S., +, *JSYST March* 2020 144-151
- Performance Analysis of Software-Defined Multihop Wireless Sensor Networks. *Jurado-Lasso*, F.F., +, JSYST Dec. 2020 4653-4662
- Random Pattern Multiplexing for Random Access in IoT-Oriented Satellite Networks. Zhao, B., +, JSYST Sept. 2020 4089-4100
- SDNMM—A Generic SDN-Based Modular Management System for Wireless Sensor Networks. *Ndiaye*, M., +, JSYST June 2020 2347-2357
- System Architecture for Real-Time Surface Inspection Using Multiple UAVs. Hoang, V.T., +, JSYST June 2020 2925-2936
- Utility-Driven Data Analytics on Uncertain Data. Gan, W., +, JSYST Sept. 2020 4442-4453

Internetworking

A Lightweight Mutual Authentication for Smart Grid Neighborhood Area Network Communications Based on Physically Unclonable Function. Kaveh, M., +, JSYST Sept. 2020 4535-4544

Intersymbol interference

- A Novel Receiver Design of Nonorthogonal FDM Systems in Underwater Acoustics Communication. *Anwar, S., +, JSYST Sept. 2020 3875-3884*
- Nanomachine Localization in a Diffusive Molecular Communication System. Kumar, S., JSYST June 2020 3011-3014
- Near-Optimal Detection of Monobit Digitized UWB Signals in the Presence of Noise and Strong Intersymbol Interference. *Khani, H.*, +, *JSYST June* 2020 2311-2322

Interviews

Systems Engineers' Effectiveness in an Organization: Text and Visual Analytics Approach. Zavala, A., +, JSYST Dec. 2020 5049-5060

Invasive software

- Adversarial-Example Attacks Toward Android Malware Detection System. Li, H., +, JSYST March 2020 653-656
- Birds of a Feature: Intrafamily Clustering for Version Identification of Packed Malware. Park, L.H., +, JSYST Sept. 2020 4545-4556
- SieveDroid: Intercepting Undesirable Private-Data Transmissions in Android Applications. *Huang, J.*, +, *JSYST March 2020 375-386*

Inverse transforms

Reconfigurable Architecture of UFMC Transmitter for 5G and Its FPGA Prototype. *Kumar, V., +, JSYST March 2020 28-38*

Inverter

- A Hybrid Photovoltaic-Fuel Cell-Based Single-Stage Grid Integration With Lyapunov Control Scheme. *Priyadarshi*, N., +, *JSYST Sept. 2020 3334-3342*
- Adaptive Interconnection and Damping Assignment Passivity-Based Control of Interlinking Converter in Hybrid AC/DC Grids. *Azimi, S.M.*, +, *JSYST Dec.* 2020 4718-4725

An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, N., +, *JSYST March* 2020 1218-1229

- An Improved Current Balancing Technique of Two-Winding IG Suitable for Wind-PV-Based Grid-Isolated Hybrid Generation System. *Chatterjee, A.*, +, *JSYST Dec.* 2020 4874-4882
- Combined Impact of Network Reconfiguration and Volt-VAR Control Devices on Energy Savings in the Presence of Distributed Generation. *Pamshetti, V.B.*, +, *JSYST March 2020 995-1006*
- Detection and Mitigation of Cyber-Attacks on AGC Systems of Low Inertia Power Grid. Roy, S.D., +, JSYST June 2020 2023-2031
- Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator. *Kumar*; V.N., +, JSYST Sept. 2020 4308-4319
- Islanding Detection of Distributed Generation Based on Parallel Inductive Impedance Switching. *Rostami*, A., +, *JSYST March* 2020 813-823
- Mitigation of Power and Frequency Instability to Improve Load Sharing Among Distributed Inverters in Microgrid Systems. *Firdaus, A.*, +, *JSYST March 2020 1024-1033*
- Multilevel Inverter (MLI)-Based Stand-Alone Photovoltaic System: Modeling, Analysis, and Control. Kumar, N., +, JSYST March 2020 909-915
- Optimal Control Methods for Photovoltaic Enabled Grid With Abnormal Power Loads. *Yang, Y.*, +, *JSYST March 2020 852-861*
- PV Distributed-MPP Tracking: Total-Cross-Tied Configuration of String-Integrated-Converters to Extract the Maximum Power Under Various PSCs. *Pendem, S.R.*, +, *JSYST March 2020 1046-1057*
- Robust Voltage Control in Inverter-Interfaced Microgrids Under Plug-and-Play Functionalities. Zarei, A., +, JSYST June 2020 2813-2824
- Simplified Modeling and HIL Validation of Solar PVs and Storage-Based Islanded Microgrid With Generation Uncertainties. Sen, S., +, JSYST June 2020 2653-2664

Investments

- A Coordinated Real-Time Voltage Control Approach for Increasing the Penetration of Distributed Generation. *Othman, M.M.*, +, *JSYST March 2020 699-707*
- A Review on the Recent Development in the Design and Optimization of Magnetic Coupling Mechanism of Wireless Power Transmission. *Dai, Z.*, +, *JSYST Sept. 2020 4368-4381*
- Cost-Effective Migration Toward Virtualized C-RAN With Scalable Fronthaul Design. *Masoudi*, M., +, JSYST Dec. 2020 5100-5110
- Optimal CHP Planning in Integrated Energy Systems Considering Network Charges. Wang, H., +, JSYST June 2020 2684-2693
- Probabilistic Optimal Dynamic Planning of Onsite Solar Generation for Residential Energy Hubs. Senemar, S., +, JSYST March 2020 832-841
- Probabilistic Study of Undervoltage Load Shedding Scheme to Mitigate the Impact of Protection System Hidden Failures. *Pal, D., +, JSYST March* 2020 862-869

Invoicing

An Efficient Privacy-Friendly Hop-by-Hop Data Aggregation Scheme for Smart Grids. Gope, P., +, JSYST March 2020 343-352

IP network

- A Software-Defined Management System for IP-Enabled WSNs. *Jura-do-Lasso*, F.F., +, *JSYST June 2020 2335-2346*
- Enhanced Active and Reactive Power Sharing in Islanded Microgrids. Parvizimosaed, M., +, JSYST Dec. 2020 5037-5048

Iterative decoding

Extreme-Learning-Machine-Based Noniterative and Iterative Nonlinearity Mitigation for LED Communication Systems. *Gao, D.*, +, *JSYST Dec.* 2020 4674-4683

Iterative methods

- A Distributed Convex Relaxation Approach to Solve the Power Flow Problem. *Manshadi*, S.D., +, JSYST March 2020 803-812
- An Online Bearing Fault Diagnosis Technique via Improved Demodulation Spectrum Analysis Under Variable Speed Conditions. *Liu, D.*, +, *JSYST June 2020 2323-2334*
- Computation and Sensor Offloading for Cloud-Based Infrastructure-Assisted Autonomous Vehicles. Kong, P., JSYST Sept. 2020 3360-3370

- Coordinated Hybrid Precoding Design in Millimeter Wave Fog-RAN. *Hao*, W., +, *JSYST March 2020 673-676*
- Cross PHY/APP Layer User Grouping and Power Allocation for Uplink Multiantenna NOMA Video Communication Systems. *Tseng, S.*, +, *JSYST Sept. 2020 3351-3359*
- Cross-Layer Network Lifetime Maximization in Underwater Wireless Sensor Networks. Zhou, Y., +, JSYST March 2020 220-231
- Joint Beamforming and Relay Selection in AF Two-Way Relay Networks With Energy Transfer. *Tian, M., +, JSYST June 2020 2597-2600*
- Joint Trajectory Design, Tx Power Allocation, and Rx Power Splitting for UAV-Enabled Multicasting SWIPT Systems. *Kang, J.*, +, *JSYST Sept.* 2020 3740-3743
- Multiobjective Precoder Design for Coexisting Wireless Energy Transfer and Information Transmission Systems. *Zhang, H.*, +, *JSYST March 2020* 445-456
- Nanomachine Localization in a Diffusive Molecular Communication System. Kumar; S., JSYST June 2020 3011-3014
- Optimizing Efficient Energy Transmission on a SWIPT Interference Channel Under Linear/Nonlinear EH Models. *Tuan, P.V.*, +, *JSYST March 2020* 457-468
- Partial-Fixed Interference Alignment in Multiuser Interference Channel. Chen, X., +, JSYST June 2020 2303-2310
- Reweighted Compressed Sensing-Based Smart Grids Topology Reconstruction With Application to Identification of Power Line Outage. *Huang, K.*, +, *JSYST Sept. 2020 4329-4339*
- Robust Optimization for Energy Efficiency in MIMO Two-Way Relay Networks With SWIPT. Li, Q., +, JSYST March 2020 196-207
- Robust Power Control for Clustering-Based Vehicle-to-Vehicle Communication. Liu, Z., +, JSYST June 2020 2557-2568
- Robust Secure Beamforming and Power Splitting for Millimeter-Wave Cognitive Satellite-Terrestrial Networks With SWIPT. *Yan*, *Y*, +, *JSYST Sept.* 2020 3233-3244

J

Jacobian matrices

A Distributed Convex Relaxation Approach to Solve the Power Flow Problem. Manshadi, S.D., +, JSYST March 2020 803-812

Jamming

- Adaptive Jamming Power Control for Untrusted Relay Networks With Imperfect Channel Reciprocity. *Lee, K.*, +, *JSYST Sept. 2020 4217-4220*
- Legitimate Surveillance With Battery-Aided Wireless Powered Full-Duplex Monitor. Xu, D., JSYST Dec. 2020 5229-5232
- On Communication Performance in Energy Harvesting WSNs Under a Cooperative Jamming Attack. Vo, V.N., +, JSYST Dec. 2020 4955-4966
- Securing Untrusted Full-Duplex Relay Channels in the Presence of Multiple External Cluster-Based Eavesdroppers. *Mabrouk, A.*, +, *JSYST March* 2020 665-668

Job shop scheduling

Shortest Uplink Scheduling for NOMA-Based Industrial Wireless Networks. Xu, C., +, JSYST Dec. 2020 5384-5395

K

Kalman filters

- A Robust Visual Person-Following Approach for Mobile Robots in Disturbing Environments. *Pang, L., +, JSYST June 2020 2965-2968*
- An Enhanced Motorway Control System for Mixed Manual/Automated Traffic Flow. Li, D., +, JSYST Dec. 2020 4726-4734
- BLE Beacons for Indoor Positioning at an Interactive IoT-Based Smart Museum. Spachos, P., +, JSYST Sept. 2020 3483-3493
- Fault-Tolerant GNSS/SINS/DVL/CNS Integrated Navigation and Positioning Mechanism Based on Adaptive Information Sharing Factors. *Xiong*, H., +, JSYST Sept. 2020 3744-3754
- Improving Microgrid Low-Voltage Ride-Through Capacity Using Neural Control. *Djilali, L., +, JSYST June 2020 2825-2836*

- Location-Aided mMIMO Channel Tracking and Hybrid Beamforming for High-Speed Railway Communications: An Angle-Domain Approach. *Xu*, *K*., +, *JSYST March 2020 93-104*
- Performance Comparison of Nonlinear Kalman Filters in Epidemic Tracking on Networks. Wang, W., +, JSYST Dec. 2020 5475-5485
- Recursive Smooth Variable Structure Filter for Estimation Processes in Direct Power Control Scheme Under Balanced and Unbalanced Power Grid. AlShabi, M., +, JSYST March 2020 971-982

Kinematics

High-Fidelity Hexarot Simulation-Based Motion Platform Using Fuzzy Incremental Controller and Model Predictive Control-Based Motion Cueing Algorithm. *Qazani, M.R.C., +, JSYST Dec. 2020 5073-5083*

Knapsack problems

Network Slice Admission Model: Tradeoff Between Monetization and Rejections. Challa, R., +, JSYST March 2020 657-660

Knowledge engineering

Use of Patterns for Know-How Reuse in a Model-Based Systems Engineering Framework. Wu, Q., +, JSYST Dec. 2020 4765-4776

Knowledge representation languages

Design Ontology in a Case Study for Cosimulation in a Model-Based Systems Engineering Tool-Chain. Lu, J., +, JSYST March 2020 1297-1308

 \mathbf{L}

Laboratory techniques

Disturbance-Observer-Based Frequency Regulation Scheme for Low-Inertia Microgrid Systems. *Sharma*, D., +, *JSYST March* 2020 782-792

Novel Change Detection and Fault Classification Scheme for AC Microgrids. *Jarrahi*, M.A., +, JSYST Sept. 2020 3987-3998

Large-scale systems

- Engineering Resilient Complex Systems: The Necessary Shift Toward Complexity Science. *Punzo, G.*, +, *JSYST Sept. 2020 3865-3874*
- Health Monitoring for Cyber Physical Systems. Shangguan, L., +, JSYST March 2020 1457-1467
- Ranking Critical Activities in Complex System Development Projects. Srinivasan, S.M., +, JSYST March 2020 1353-1364

Lattice Boltzmann methods

Heterogeneous System-on-Chip-Based Lattice-Boltzmann Visual Simulation System. Zhai, X., +, JSYST June 2020 1592-1601

Learning (artificial intelligence)

- A Hierarchical Attention Model for CTR Prediction Based on User Interest. Wang, Q., +, JSYST Sept. 2020 4015-4024
- A Multidimensional Holistic Framework for the Security of Distributed Energy and Control Systems. Saleem, D., +, JSYST March 2020 17-27
- A Multistage Deep Residual Network for Biomedical Cyber-Physical Systems. Pandey, A., +, JSYST June 2020 1953-1962
- A Robust Visual Person-Following Approach for Mobile Robots in Disturbing Environments. Pang, L., +, JSYST June 2020 2965-2968
- An Actor-Critic Deep Reinforcement Learning Approach for Transmission Scheduling in Cognitive Internet of Things Systems. *Yang, H.*, +, *JSYST March* 2020 51-60
- ASIS: Autonomous Seismic Imaging System With *In Situ* Data Analytics and Renewable Energy. *Clemente, J.*, +, *JSYST March 2020 1277-1284*
- Campus Edge Computing Network Based on IoT Street Lighting Nodes. Chang, Y., +, JSYST March 2020 164-171
- Decentralized Learning for Opportunistic Spectrum Access: Multiuser Restless Multiarmed Bandit Formulation. *Agrawal, H.*, +, *JSYST June 2020 2485-2496*
- Deep Learning-Based MIMO-NOMA With Imperfect SIC Decoding. *Kang*, *J.*, +, *JSYST Sept. 2020 3414-3417*
- Deep RNN-Based Channel Tracking for Wireless Energy Transfer System. Kang, J., +, JSYST Sept. 2020 4340-4343
- Detection and Experimental Validation of High Impedance Arc Fault in Distribution System Using Empirical Mode Decomposition. *Lala, H.*, +, *JSYST Sept. 2020 3494-3505*
- Development of an Ensemble Decision Tree-Based Power System Dynamic Security State Predictor. *Mukherjee*, R., +, *JSYST Sept. 2020 3836-3843*

- Distributed Learning and Coordination in Cognitive Infrastructureless Networks of Unknown Size. Kumar, R., +, JSYST June 2020 2085-2096
- Echo State Network and Echo State Gaussian Process for Non-Line-of-Sight Target Tracking. Yang, X., +, JSYST Sept. 2020 3885-3892
- Improved Teaching Learning-Based QoS-Aware Services Composition for Internet of Things. *Khanouche, M.E.*, +, *JSYST Sept. 2020 4155-4164*
- Improving Microgrid Low-Voltage Ride-Through Capacity Using Neural Control. *Djilali*, L., +, *JSYST June* 2020 2825-2836
- Moving Target Defense Mechanism for Side-Channel Attacks. *Vuppala, S.*, +, *JSYST June 2020 1810-1819*
- On the Optimization of User Association and Resource Allocation in Het-Nets With mm-Wave Base Stations. *Chaieb, C.*, +, *JSYST Sept. 2020 3957-3967*
- Residual Energy Maximization in Cognitive Radio Networks With Q-Routing. Paul, A., +, JSYST Sept. 2020 3791-3800
- Resource Allocation in Wireless Networks With Deep Reinforcement Learning: A Circumstance-Independent Approach. *Lee, H.*, +, *JSYST June 2020 2589-2592*
- Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. *Manohar, M.*, +, *JSYST Sept. 2020 3430-3439*
- SysEvoRecomd: Network Reconstruction by Graph Evolution and Change Learning. Chaturvedi, A., +, JSYST Sept. 2020 4007-4014
- Toward Characterizing Blockchain-Based Cryptocurrencies for Highly Accurate Predictions. Saad, M., +, JSYST March 2020 321-332
- Toward Greater Intelligence in Route Planning: A Graph-Aware Deep Learning Approach. Zhuang, Z., +, JSYST June 2020 1658-1669
- WiFi Fingerprinting Indoor Localization Using Local Feature-Based Deep LSTM. Chen, Z., +, JSYST June 2020 3001-3010

Least mean squares methods

Robust Optimization for Energy Efficiency in MIMO Two-Way Relay Networks With SWIPT. Li, Q., +, JSYST March 2020 196-207

Least squares approximations

- Cross-Layer Network Lifetime Maximization in Underwater Wireless Sensor Networks. Zhou, Y., +, JSYST March 2020 220-231
- Lightweight Privacy-Preserving Scheme in Wi-Fi Fingerprint-Based Indoor Localization. Zhang, G., +, JSYST Sept. 2020 4638-4647

Lens antennas

Rate-Loss Mitigation for a Millimeter-Wave Beamspace MIMO Lens Antenna Array System Using a Hybrid Beam Selection Scheme. Sarker, M.A.L., +, JSYST Sept. 2020 3582-3585

Life cycle costing

A Method to Establish a Trade-Space of System Requirements and Life Cycle Cost. Abdul Rahim, N.B., +, JSYST March 2020 1257-1264

Lifts

An Intelligent Elevator Development and Management System. Van, L., +, JSYST June 2020 3015-3026

Light emitting diodes

- Capacity-Maximized Transmitter Precoding for MU MIMO VLC Systems With Bounded Channel Uncertainties. Zhao, S., +, JSYST Dec. 2020 5144-5147
- Extreme-Learning-Machine-Based Noniterative and Iterative Nonlinearity Mitigation for LED Communication Systems. *Gao, D.*, +, *JSYST Dec.* 2020 4674-4683
- User-Centric MIMO Techniques for Indoor Visible Light Communication Systems. Chen, C., +, JSYST Sept. 2020 3202-3213

Lightning protection

Determining Impact of Lightning Strike Location on Failures in Transmission Network Elements Using Fuzzy Decision-Making. *Petrovic, I.*, +, *JSYST June 2020 2665-2675*

Linear antenna arrays

Location-Aided mMIMO Channel Tracking and Hybrid Beamforming for High-Speed Railway Communications: An Angle-Domain Approach. *Xu*, *K.*, +, *JSYST March 2020 93-104*

Linear matrix inequalities

Robust Voltage Control in Inverter-Interfaced Microgrids Under Plug-and-Play Functionalities. Zarei, A., +, JSYST June 2020 2813-2824

Linear programming

- A Game Theoretic Model for the Multiperiodic Smart Grid Demand Response Problem. *Belhaiza*, S., +, JSYST March 2020 1147-1158
- An Adaptive Grid Frequency Support Mechanism for Energy Management in Cloud Data Centers. *Kaur, K.*, +, *JSYST March 2020 1195-1205*
- Joint Energy-QoE Efficient Content Delivery Networks Using Real-Time Energy Management. *Goudarzi*, P., +, JSYST March 2020 927-938
- Low Probability of Intercept-Based Optimal Power Allocation Scheme for an Integrated Multistatic Radar and Communication System. Shi, C., +, JSYST March 2020 983-994
- Modeling and Vulnerability Analysis of Cyber-Physical Power Systems Based on Community Theory. Pan, H., +, JSYST Sept. 2020 3938-3948
- On the Optimization of User Association and Resource Allocation in Het-Nets With mm-Wave Base Stations. *Chaieb*, C., +, *JSYST Sept. 2020 3957-3967*
- Optimal Coordinated Expansion Planning of Transmission and Electrical Energy Storage Systems Under Physical Intentional Attacks. *Nemati, H., +, JSYST March 2020 793-802*
- Optimal Planning and Operational Strategy of a Residential Microgrid With Demand Side Management. *Bhamidi*, L., +, *JSYST June 2020 2624-2632*
- PMU Placement for Measurement Redundancy Distribution Considering Zero Injection Bus and Contingencies. *Chen, X.*, +, *JSYST Dec. 2020* 5396-5406

Linear quadratic control

- Decentralized Output-Feedback-Based Robust LQR V-f Controller for PV-Battery Microgrid Including Generation Uncertainties. Sen, S., +, JSYST Sept. 2020 4418-4429
- Optimal Connected Cruise Control With Arbitrary Communication Delays. Wang, Z., +, JSYST June 2020 2913-2924
- Robust Nonlinear State Feedback Control of Bidirectional Interlink Power Converters in Grid-Connected Hybrid Microgrids. *Zolfaghari, M.*, +, *JSYST March 2020 1117-1124*

Linear systems

Robust Voltage Control in Inverter-Interfaced Microgrids Under Plug-and-Play Functionalities. Zarei, A., +, JSYST June 2020 2813-2824

Linearization techniques

Improving Microgrid Low-Voltage Ride-Through Capacity Using Neural Control. *Djilali*, L., +, *JSYST June 2020 2825-2836*

Linked Data

Design Ontology in a Case Study for Cosimulation in a Model-Based Systems Engineering Tool-Chain. Lu, J., +, JSYST March 2020 1297-1308

Lithium compounds

Bidirectional Charging in V2G Systems: An In-Cell Variation Analysis of Vehicle Batteries. *Khalid, H.M.*, +, *JSYST Sept. 2020 3665-3675*

Living systems

MiND: Mind Networked Device Architecture for Attention-Gated Ambient Assisted Living Systems. *Mukherjee*, A., +, *JSYST March* 2020 1325-1332

Load (electric)

- Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG. *Gheisarnejad*, M., +, JSYST March 2020 1058-1068
- Optimal Coordinated Expansion Planning of Transmission and Electrical Energy Storage Systems Under Physical Intentional Attacks. *Nemati, H.,* +, *JSYST March 2020 793-802*
- Power Output Smoothing for Renewable Energy System: Planning, Algorithms, and Analysis. *Chen, X., +, JSYST March 2020 1034-1045*

Load flow

- A Distributed Convex Relaxation Approach to Solve the Power Flow Problem. *Manshadi*, S.D., +, JSYST March 2020 803-812
- A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926
- A Stochastic Model of Cascading Failure Dynamics in Cyber-Physical Power Systems. *Gao*, X., +, *JSYST Sept. 2020 4626-4637*
- Active Distribution Network Operation: A Market-Based Approach. Zubo, R.H.A., +, JSYST March 2020 1405-1416
- Detection of False Data Injection Attacks in Smart Grids Based on Graph Signal Processing. Drayer, E., +, JSYST June 2020 1886-1896

Electrical Power System Resilience Assessment: A Comprehensive Approach. Sabouhi, H., +, JSYST June 2020 2643-2652

Importance Sampling Using Multilabel Radial Basis Classification for Composite Power System Reliability Evaluation. *Urgun, D.*, +, *JSYST June* 2020 2791-2800

Increment-Exchange-Based Decentralized Multiobjective Optimal Power Flow for Active Distribution Grids. Lu, W., +, JSYST Sept. 2020 3695-3704

Robust Optimization-Based Energy Storage Operation for System Congestion Management. Yan, X., +, JSYST June 2020 2694-2702

Spectral Graph Analysis of the Geometry of Power Flows in Transmission Networks. *Retiere*, N., +, JSYST June 2020 2736-2747

Load forecasting

Midterm Load Forecasting: A Multistep Approach Based on Phase Space Reconstruction and Support Vector Machine. *Li*, G., +, *JSYST Dec.* 2020 4967-4977

Optimal Charge/Discharge Scheduling of Battery Storage Interconnected With Residential PV System. *Kapoor, A., +, JSYST Sept. 2020 3825-3835*

Load management

Dynamic User Association for Resilient Backhauling in Satellite-Terrestrial Integrated Networks. *Dai*, C., +, *JSYST Dec*. 2020 5025-5036

Local Estimation of Critical and Off-Peak Periods for Grid-Friendly Flexible Load Management. *Guzman, C.*, +, *JSYST Sept. 2020 4262-4271*

Load modeling

Intelligent Residential Energy Management System Using Deep Reinforcement Learning. Mathew, A., +, JSYST Dec. 2020 5362-5372

Midterm Load Forecasting: A Multistep Approach Based on Phase Space Reconstruction and Support Vector Machine. *Li*, G., +, *JSYST Dec. 2020* 4967-4977

Load regulation

An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, *N.*, +, *JSYST March 2020 1218-1229*

Load shedding

Complex Network-Based Transmission Network Vulnerability Assessment Using Adjacent Graphs. Zang, T., +, JSYST March 2020 572-581

Multiobjective Multiscenario Under-Frequency Load Shedding in a Standalone Power System. *Hong, Y., +, JSYST June 2020 2759-2769*

Probabilistic Study of Undervoltage Load Shedding Scheme to Mitigate the Impact of Protection System Hidden Failures. *Pal, D.*, +, *JSYST March* 2020 862-869

Location based services

Location-Aware, Context-Driven QoS for IoT Applications. *Ahmad, E.,* +, *JSYST March 2020 232-243*

Log normal distribution

An Analytical View of ASE for Multicell OFDMA Networks Based on Frequency-Reuse Scheme. Ghosh, J., +, JSYST March 2020 645-648

Application of the Mixture of Lognormal Distribution to Represent the First-Order Statistics of Wireless Channels. Das, S., +, JSYST Sept. 2020 4394-4401

Performance Analysis of a Mixed Cooperative PLC–VLC System for Indoor Communication Systems. *Jani, M., +, JSYST March* 2020 469-476

Study on Base Station Topology in National Cellular Networks: Take Advantage of Alpha Shapes, Betti Numbers, and Euler Characteristics. *Chen, Y.*, +, *JSYST June 2020 2202-2213*

Logic gates

A Theory for Optimizing Insecure Internetwork Connections. Das, P., +, JSYST Dec. 2020 4842-4853

WiFlowCount: Device-Free People Flow Counting by Exploiting Doppler Effect in Commodity WiFi. Zhou, R., +, JSYST Dec. 2020 4919-4930

Logistics

A Decomposition-Based Local Search for Large-Scale Many-Objective Vehicle Routing Problems With Simultaneous Delivery and Pickup and Time Windows. *Zhou, Y.*, +, *JSYST Dec. 2020 5253-5264*

Long Term Evolution

Procurement-Based User Association for LTE-Advanced HetNets. *Kumar*; S., +, *JSYST Sept. 2020 3194-3201*

QoS-Aware Cross-Layer Optimization of Hybrid DSL-LTE Access Networks. Chuah, T.C., +, JSYST June 2020 2175-2186

Robust OFDM-Based Synchronization Against Very High Fractional CFO and Time-Varying Fading. Chang, K., +, JSYST Sept. 2020 4047-4058

Losses

Path-Based Distribution Feeder Reconfiguration for Optimization of Losses and Reliability. *Jose, J.*, +, *JSYST March 2020 1417-1426*

Low earth orbit satellites

Dynamic User Association for Resilient Backhauling in Satellite—Terrestrial Integrated Networks. *Dai*, C., +, *JSYST Dec*. 2020 5025-5036

Lyapunov methods

A Hybrid Photovoltaic-Fuel Cell-Based Single-Stage Grid Integration With Lyapunov Control Scheme. *Priyadarshi*, *N.*, +, *JSYST Sept.* 2020 3334-3342

Cyber-Attacks in a Looped Energy-Water Nexus: An Inoculated Sub-Observer-Based Approach. Khalid, H.M., +, JSYST June 2020 2054-2065

Global Fault-Tolerant Sampled-Data Control for Large-Scale Switched Time-Delay Nonlinear Systems. He, W., +, JSYST June 2020 1549-1557

Local Controllability, Trajectory Planning, and Stabilization of a Two-Agent Underactuated Microrobotic System. Fruchard, M., +, JSYST June 2020 2892-2900

Neuroadaptive Sliding Mode Formation Control of Autonomous Underwater Vehicles With Uncertain Dynamics. Wang, J., +, JSYST Sept. 2020 3325-3333

Voltage/Current Large Transient Suppression in DC Microgrids Using Local Information and Active Stabilizing Capability. Azimi, S.M., +, JSYST March 2020 1109-1116

M

Machine bearings

A High-Accuracy Least-Time-Domain Mixture Features Machine-Fault Diagnosis Based on Wireless Sensor Network. *Du, C.*, +, *JSYST Sept. 2020* 4101-4109

An Online Bearing Fault Diagnosis Technique via Improved Demodulation Spectrum Analysis Under Variable Speed Conditions. *Liu, D.*, +, *JSYST June 2020 2323-2334*

Machine control

Disturbance-Observer-Based Frequency Regulation Scheme for Low-Inertia Microgrid Systems. Sharma, D., +, JSYST March 2020 782-792

Systematized Active Power Control of PMSG-Based Wind-Driven Generators. Ramachandran, V., +, JSYST March 2020 708-717

Machine learning

Autonomous Resource Slicing for Virtualized Vehicular Networks With D2D Communications Based on Deep Reinforcement Learning. Sun, G., +, JSYST Dec. 2020 4694-4705

Magnetic field measurement

Energy-Efficient Design of MI Communication-Based 3-D Non-Conventional WSNs. Yadav, S., +, JSYST June 2020 2585-2588

Magnetic sensors

Energy-Efficient Design of MI Communication-Based 3-D Non-Conventional WSNs. *Yadav*, S., +, *JSYST June 2020 2585-2588*

Maintenance engineering

Energy-Efficient Barrier Lifetime Prolonging Scheme Based on Repairing in Directional Sensor Networks. Fan, X., +, JSYST Dec. 2020 4943-4954

Manipulator dynamics

High-Fidelity Hexarot Simulation-Based Motion Platform Using Fuzzy Incremental Controller and Model Predictive Control-Based Motion Cueing Algorithm. *Qazani, M.R.C., +, JSYST Dec. 2020 5073-5083*

Manufacturing systems

Improved Bacterial Foraging Algorithm for Cell Formation and Product Scheduling Considering Learning and Forgetting Factors in Cellular Manufacturing Systems. Wang, J., +, JSYST June 2020 3047-3056

Marine pollution

System Dynamic-Based Oil Weathering Processes: Simulation and Analysis. Kasimu, A., +, JSYST March 2020 1375-1383

Marine vehicles

Optimal Heterogeneous Energy Storage Management for Multienergy Cruise Ships. Fang, S., +, JSYST Dec. 2020 4754-4764

Markov processes

AMOPE: Performance Analysis of OpenFlow Systems in Software-Defined Networks. *Mondal, A.*, +, *JSYST March 2020 124-131*

An Actor-Critic Deep Reinforcement Learning Approach for Transmission Scheduling in Cognitive Internet of Things Systems. *Yang, H.*, +, *JSYST March 2020 51-60*

An Analytical Model for Information Centric Internet of Things Networks in Opportunistic Scenarios. *Yang, J.*, +, *JSYST March 2020 172-183*

Decentralized Learning for Opportunistic Spectrum Access: Multiuser Restless Multiarmed Bandit Formulation. *Agrawal, H.*, +, *JSYST June 2020 2485-2496*

Information-Based Hierarchical Planning for a Mobile Sensing Network in Environmental Mapping. *Li*, *T*, +, *JSYST June 2020 1692-1703*

Mitigation Techniques for Impulsive Noise With Memory Modeled by a Two State Markov-Gaussian Process. *Alam, M.S.*, +, *JSYST Sept. 2020* 4079-4088

Online Planning for Multiagent Situational Information Gathering in the Markov Environment. Zhou, X., +, JSYST June 2020 1798-1809

Power Output Smoothing for Renewable Energy System: Planning, Algorithms, and Analysis. *Chen, X., +, JSYST March 2020 1034-1045*

Ranking Critical Activities in Complex System Development Projects. Srinivasan, S.M., +, JSYST March 2020 1353-1364

Matched filters

Integrated Communication and Localization System With OFDM-Chirp Waveform. *Jia, W.*, +, *JSYST June 2020 2464-2472*

Mathematical analysis

Energy Efficiency Versus Reliability Tradeoff Improvement in Low-Power Wireless Communications. Zogovic, N., JSYST Sept. 2020 3173-3184

PV Distributed-MPP Tracking: Total-Cross-Tied Configuration of String-Integrated-Converters to Extract the Maximum Power Under Various PSCs. *Pendem, S.R.*, +, *JSYST March 2020 1046-1057*

White-Box Implementation of Shamir's Identity-Based Signature Scheme. Feng, Q., +, JSYST June 2020 1820-1829

Mathematical model

An Enhanced Motorway Control System for Mixed Manual/Automated Traffic Flow. Li, D., +, JSYST Dec. 2020 4726-4734

High-Fidelity Hexarot Simulation-Based Motion Platform Using Fuzzy Incremental Controller and Model Predictive Control-Based Motion Cueing Algorithm. *Qazani, M.R.C.*, +, *JSYST Dec. 2020 5073-5083*

Modeling Social Contagion and Information Diffusion in Complex Socio-Technical Systems. *Muhlmeyer, M.*, +, *JSYST Dec. 2020 5187-5198*

Performance Analysis of Software-Defined Multihop Wireless Sensor Networks. *Jurado-Lasso, F.F.*, +, *JSYST Dec. 2020 4653-4662*

PMU Placement for Measurement Redundancy Distribution Considering Zero Injection Bus and Contingencies. *Chen, X.*, +, *JSYST Dec. 2020 5396-5406*

Mathematical programming

Robust Directional Modulation Design for Secrecy Rate Maximization in Multiuser Networks. *Gui*, L., +, *JSYST Sept.* 2020 3150-3160

Spotting Key Members in Networks: Clustering-Embedded Eigenvector Centrality. Carrizosa, E., +, JSYST Sept. 2020 3916-3925

Matlah

An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, N., +, *JSYST March 2020 1218-1229*

Improved Performance of Flywheel Fast Charging System (FFCS) Using Enhanced Artificial Immune System (EAIS). *Gabbar, H.A.*, +, *JSYST March 2020 824-831*

Islanding Detection of Distributed Generation Based on Parallel Inductive Impedance Switching. *Rostami, A., +, JSYST March 2020 813-823*

Proactive Forwarding of High Data Rate in Smart Virtualization Networks for High-Speed Trains. Yaseen, F.A., +, JSYST June 2020 1670-1681

Voltage/Current Large Transient Suppression in DC Microgrids Using Local Information and Active Stabilizing Capability. Azimi, S.M., +, JSYST March 2020 1109-1116

Matrix algebra

A Temporal Recommendation Mechanism Based on Signed Network of User Interest Changes. Chen, J., +, JSYST March 2020 244-252

Electrical Power System Resilience Assessment: A Comprehensive Approach. Sabouhi, H., +, JSYST June 2020 2643-2652

Partial-Fixed Interference Alignment in Multiuser Interference Channel. Chen, X., +, JSYST June 2020 2303-2310

Robust Directional Modulation Design for Secrecy Rate Maximization in Multiuser Networks. *Gui*, *L.*, +, *JSYST Sept. 2020 3150-3160*

SysEvoRecomd: Network Reconstruction by Graph Evolution and Change Learning. *Chaturvedi*, A., +, *JSYST Sept. 2020 4007-4014*

Maximum likelihood estimation

Application of the Mixture of Lognormal Distribution to Represent the First-Order Statistics of Wireless Channels. Das, S., +, JSYST Sept. 2020 4394-4401

Cooperative Sensing Scheme for Acquisition of Rotational Synchronization of Radar. Lee, J., +, JSYST June 2020 3061-3064

Nanomachine Localization in a Diffusive Molecular Communication System. Kumar, S., JSYST June 2020 3011-3014

Opinion Maximization Through Unknown Influence Power in Social Networks Under Weighted Voter Model. *He, Q.*, +, *JSYST June 2020 1874-1885*

Robust Power System State Estimation Using *t*-Distribution Noise Model. Chen, T, +, JSYST March 2020 771-781

Maximum power point trackers

A Hybrid Photovoltaic-Fuel Cell-Based Single-Stage Grid Integration With Lyapunov Control Scheme. *Priyadarshi*, N., +, *JSYST Sept.* 2020 3334-3342

Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG. *Gheisarnejad*, M., +, JSYST March 2020 1058-1068

An Experimental Estimation of Hybrid ANFIS–PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, *N.*, +, *JSYST March 2020 1218-1229*

Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator. *Kumar, V.N.*, +, *JSYST Sept. 2020 4308-4319*

PV Distributed-MPP Tracking: Total-Cross-Tied Configuration of String-Integrated-Converters to Extract the Maximum Power Under Various PSCs. *Pendem, S.R.*, +, *JSYST March 2020 1046-1057*

Mean square error methods

A Novel Receiver Design of Nonorthogonal FDM Systems in Underwater Acoustics Communication. *Anwar, S., +, JSYST Sept. 2020 3875-3884*

Deep Learning-Based MIMO-NOMA With Imperfect SIC Decoding. *Kang*, *J.*, +, *JSYST Sept. 2020 3414-3417*

Robust Power System State Estimation Using *t*-Distribution Noise Model. *Chen, T.*, +, *JSYST March 2020 771-781*

Measurement

A Generalized Dynamic Planning Framework for Green UAV-Assisted Intelligent Transportation System Infrastructure. *Lucic, M.C.*, +, *JSYST Dec.* 2020 4786-4797

Measurement errors

Measurement Errors and Delays on Wide-Area Control Based on IEEE Std C37.118.1-2011: Impact and Compensation. *Zacharia*, *L.*, +, *JSYST March* 2020 422-432

Mechanical engineering computing

An Online Bearing Fault Diagnosis Technique via Improved Demodulation Spectrum Analysis Under Variable Speed Conditions. *Liu, D.*, +, *JSYST June 2020 2323-2334*

Mechatronics

Toward a Robust Design of an Aileron Electromechanical Actuator: Sensitivity Analysis and Parametric Tolerancing Using a Variational Approach. Siala, H., +, JSYST Sept. 2020 3977-3986

Medical administrative data processing

Edge Computing-Based Mobile Health System: Network Architecture and Resource Allocation. *Lin, D.*, +, *JSYST June 2020 1716-1727*

Medical computing

ChainSDI: A Software-Defined Infrastructure for Regulation-Compliant Home-Based Healthcare Services Secured by Blockchains. *Li*, *P*, +, *JSYST June* 2020 2042-2053

MiND: Mind Networked Device Architecture for Attention-Gated Ambient Assisted Living Systems. Mukherjee, A., +, JSYST March 2020 1325-1332

Medical image processing

Heterogeneous System-on-Chip-Based Lattice-Boltzmann Visual Simulation System. Zhai, X., +, JSYST June 2020 1592-1601

Medical information systems

ChainSDI: A Software-Defined Infrastructure for Regulation-Compliant Home-Based Healthcare Services Secured by Blockchains. *Li*, *P*, +, *JSYST June* 2020 2042-2053

Medical signal detection

A Multistage Deep Residual Network for Biomedical Cyber-Physical Systems. *Pandey, A.*, +, *JSYST June 2020 1953-1962*

Medical signal processing

A Multistage Deep Residual Network for Biomedical Cyber-Physical Systems. Pandey, A., +, JSYST June 2020 1953-1962

Memory management

Multigranularity Space Management Scheme for Accelerating the Write Performance of In-Memory File Systems. Wu, T., +, JSYST Dec. 2020 5429-5440

Mercury (metals)

Fairness Enhancement for Opportunistic Interference Alignment Algorithm With Low Latency Communications. *Lu*, *H*., +, *JSYST Dec. 2020 5002-5013*

Message authentication

A Lightweight ECC-Based Authentication Scheme for Internet of Things (IoT). *Hammi, B.*, +, *JSYST Sept. 2020 3440-3450*

A Novel Privacy-Preserving Authentication Scheme for V2G Networks. Su, Y, +, JSYST June 2020 1963-1971

A Provably Secure and Efficient Identity-Based Anonymous Authentication Scheme for Mobile Edge Computing. *Jia, X.*, +, *JSYST March 2020 560-571*

Efficient Lattice-Based Ring Signature for Message Authentication in VANETs. *Mundhe, P., +, JSYST Dec. 2020 5463-5474*

Message passing

Random Pattern Multiplexing for Random Access in IoT-Oriented Satellite Networks. Zhao, B., +, JSYST Sept. 2020 4089-4100

Metadata

Multigranularity Space Management Scheme for Accelerating the Write Performance of In-Memory File Systems. Wu, T., +, JSYST Dec. 2020 5429-5440

Meteorology

PN Inference Based Autonomous Sequential Restoration of Distribution System Under Natural Disaster. Sandhya, K., +, JSYST Dec. 2020 5160-5171

Metering

An Elliptic Curve-Based Scalable Data Aggregation Scheme for Smart Grid. Chen, Y., +, JSYST June 2020 2066-2077

Microcellular radio

WmA-MiFN: A Weighted Majority and Auction Game Based Green Ultra-Dense Micro-Femtocell Network System. Mukherjee, A., +, JSYST March 2020 353-362

Microcontrollers

Fault Detection, Classification, and Location by Static Switch in Microgrids Using Wavelet Transform and Taguchi-Based Artificial Neural Network. Hong, Y., +, JSYST June 2020 2725-2735

Microgrids

An Improvized Coordinated Voltage Control Scheme for Better Utilization of Regulating Devices During Various Operating Conditions of a Distribution System. *Gururaj, M.V.*, +, *JSYST Dec. 2020 4891-4900*

Brief Survey on Attack Detection Methods for Cyber-Physical Systems. *Tan,* S., +, *JSYST Dec.* 2020 5329-5339

Optimal Chance-Constrained Scheduling of Reconfigurable Microgrids Considering Islanding Operation Constraints. *Hemmati, M.*, +, *JSYST Dec.* 2020 5340-5349

PN Inference Based Autonomous Sequential Restoration of Distribution System Under Natural Disaster. Sandhya, K., +, JSYST Dec. 2020 5160-5171

Protection of Converter-Interfaced Microgrids Using Modified Short-Time Correlation Transform. *Allahdadi, K.*, +, *JSYST Dec. 2020 5172-5175*

Microorganisms

Improved Bacterial Foraging Algorithm for Cell Formation and Product Scheduling Considering Learning and Forgetting Factors in Cellular Manufacturing Systems. Wang, J., +, JSYST June 2020 3047-3056

Microprocessor chips

Calibrating Phase Offsets for Commodity WiFi. Zhang, D., +, JSYST March 2020 661-664

Microrobots

Local Controllability, Trajectory Planning, and Stabilization of a Two-Agent Underactuated Microrobotic System. Fruchard, M., +, JSYST June 2020 2892-2900

Microstrip antenna arrays

Efficient Evaluation of Massive MIMO Channel Capacity. *Al-Wahhamy, A.*, +, *JSYST March 2020 614-620*

Military communication

A Theory for Optimizing Insecure Internetwork Connections. Das, P., +, JSYST Dec. 2020 4842-4853

System-of-Systems Quality Attribute-Based Architectural Alternatives. *Nelson, T.*, +, *JSYST Sept. 2020 3844-3854*

Military computing

A Novel Effectiveness Evaluation Method Based on Simultaneous Probabilistic Finite-State Machines. Nan, Y., +, JSYST June 2020 1611-1622

System-of-Systems Quality Attribute-Based Architectural Alternatives. *Nelson, T.*, +, *JSYST Sept. 2020 3844-3854*

Millimeter wave antenna arrays

Rate-Loss Mitigation for a Millimeter-Wave Beamspace MIMO Lens Antenna Array System Using a Hybrid Beam Selection Scheme. *Sarker, M.A.L.*, +, *JSYST Sept. 2020 3582-3585*

Secure Hybrid Beamformers Design in mmWave MIMO Wiretap Systems. Tian, X., +, JSYST March 2020 548-559

Millimeter wave antennas

Association, Blockage, and Handoffs in IEEE 802.11ad-Based 60-GHz Picocells—A Closer Look. *Joshi, K.C.*, +, *JSYST June 2020 2144-2153*

Outage Probability in the Uplink of Multitier Millimeter Wave Cellular Networks. Onireti, O., +, JSYST June 2020 2520-2531

Millimeter wave communication

Association, Blockage, and Handoffs in IEEE 802.11ad-Based 60-GHz Picocells—A Closer Look. *Joshi, K.C.*, +, *JSYST June 2020 2144-2153*

Coordinated Hybrid Precoding Design in Millimeter Wave Fog-RAN. *Hao*, W., +, *JSYST March* 2020 673-676

On the Optimization of User Association and Resource Allocation in Het-Nets With mm-Wave Base Stations. *Chaieb, C.*, +, *JSYST Sept. 2020 3957-3967*

Outage Probability in the Uplink of Multitier Millimeter Wave Cellular Networks. *Onireti*, O., +, *JSYST June* 2020 2520-2531

Relay-Aided Outdoor-to-Indoor Communication in Millimeter-Wave Cellular Networks. *Ntontin, K.*, +, *JSYST June 2020 2473-2484*

Secure Hybrid Beamformers Design in mmWave MIMO Wiretap Systems. Tian, X., +, JSYST March 2020 548-559

MIMO communication

A System Simulation Framework for Modeling Space Modulation Techniques. Hiari, O., +, JSYST March 2020 1435-1446

Artificial Noisy MIMO Systems Under Correlated Scattering Rayleigh Fading—A Physical Layer Security Approach. *Liu, Y., +, JSYST June 2020* 2121-2132

Artificial-Noise-Aided Energy-Efficient Secure Beamforming for Multi-Eavesdroppers in Cognitive Radio Networks. *Chen, P.*, +, *JSYST Sept. 2020 3801-3812*

Capacity-Maximized Transmitter Precoding for MU MIMO VLC Systems With Bounded Channel Uncertainties. *Zhao, S., +, JSYST Dec. 2020 5144-5147*

Coordinated Hybrid Precoding Design in Millimeter Wave Fog-RAN. *Hao*, W., +, *JSYST March 2020 673-676*

Cross PHY/APP Layer User Grouping and Power Allocation for Uplink Multiantenna NOMA Video Communication Systems. *Tseng, S.*, +, *JSYST Sept. 2020 3351-3359*

D2D-Enabled User Cooperation in Massive MIMO. *Liu*, Y, +, *JSYST Sept.* 2020 4406-4417

- Deep Learning-Based MIMO-NOMA With Imperfect SIC Decoding. *Kang*, *J.*, +, *JSYST Sept. 2020 3414-3417*
- Design Precoded Space-Time-Frequency 4 × 1 and 4 × 2 OFDM Architectures in Frequency-Selective Fading Channels. *Yeh, H., JSYST March 2020* 277-287
- Effect of Doppler Shift on the Performance of Multicell Full-Duplex Massive MIMO Networks. Dai, J., +, JSYST June 2020 2421-2431
- Efficient Evaluation of Massive MIMO Channel Capacity. *Al-Wahhamy, A.*, +, *JSYST March 2020 614-620*
- Energy Efficiency Evaluation for Downlink Full-Duplex Nonlinear MU-MI-MO-OFDM System With Self-Energy Recycling. Shaikh, M.H.N., +, JSYST Sept. 2020 3313-3324
- Location-Aided mMIMO Channel Tracking and Hybrid Beamforming for High-Speed Railway Communications: An Angle-Domain Approach. *Xu*, *K.*, +, *JSYST March 2020 93-104*
- Optimizing Design Parameters for Relay-Aided Massive MIMO Systems. El-Mashed, M.G., JSYST June 2020 2249-2256
- Rate-Loss Mitigation for a Millimeter-Wave Beamspace MIMO Lens Antenna Array System Using a Hybrid Beam Selection Scheme. *Sarker,* M.A.L., +, JSYST Sept. 2020 3582-3585
- RF Chain Reduction for MIMO Systems: A Hardware Prototype. *Gong, T.*, +, *JSYST Dec. 2020 5296-5307*
- Robust Optimization for Energy Efficiency in MIMO Two-Way Relay Networks With SWIPT. Li, Q., +, JSYST March 2020 196-207
- Secure Communications Over Cell-Free Massive MIMO Networks With Hardware Impairments. Zhang, X., +, JSYST June 2020 1909-1920
- Secure Hybrid Beamformers Design in mmWave MIMO Wiretap Systems. Tian, X., +, JSYST March 2020 548-559
- Secure Transmit Antenna Selection Protocol for MIMO NOMA Networks Over Nakagami-m Channels. Tran, D., +, JSYST March 2020 253-264
- Transmit Antenna Selection for Full-Duplex Spatial Modulation Multiple-Input Multiple-Output System. *Van Nguyen, L.*, +, *JSYST Dec. 2020 4777-4785*
- User-Centric MIMO Techniques for Indoor Visible Light Communication Systems. Chen, C., +, JSYST Sept. 2020 3202-3213

MIMO rada

Joint Subarray Selection and Power Allocation for Cognitive Target Tracking in Large-Scale MIMO Radar Networks. *Zhang, H.*, +, *JSYST June* 2020 2569-2580

MIMO systems

- A New MIMO ORC Architecture for Power Oscillation Damping Using Remote Feedback Signals Under Intermittent Observations. *Yogarathinam*, A., +, JSYST March 2020 939-949
- Improving Power Systems Transient Stability by Coordinated Control of Energy Storage Systems and Synchronous Generators in Presence of Measurement Noise. *Rostami, M.*, +, *JSYST March 2020 1088-1097*

Minimization

- Cache-Aware Computation Offloading in IoT Systems. Wei, H., +, JSYST March 2020 61-72
- Connected Target *ϵ*-probability Coverage in WSNs With Directional Probabilistic Sensors. *Xu*, *X*, +, *JSYST Sept. 2020 3399-3409*
- Delay-Optimal Cooperation Policy in a Slotted Aloha Full-Duplex Wireless Network: Static Approach. *Vaezi, K.*, +, *JSYST June 2020 2257-2268*
- Energy-Efficient Design of MI Communication-Based 3-D Non-Conventional WSNs. *Yadav*, S., +, *JSYST June 2020 2585-2588*
- Flow Setup Aware Controller Placement in Distributed Software-Defined Networking. *Correia, N.*, +, *JSYST Dec. 2020 5096-5099*
- Intelligent Residential Energy Management System Using Deep Reinforcement Learning. Mathew, A., +, JSYST Dec. 2020 5362-5372
- Joint Task Offloading, CNN Layer Scheduling, and Resource Allocation in Cooperative Computing System. Chai, R., +, JSYST Dec. 2020 5350-5361
- Low Probability of Intercept-Based Optimal Power Allocation Scheme for an Integrated Multistatic Radar and Communication System. Shi, C., +, JSYST March 2020 983-994
- Optimal CHP Planning in Integrated Energy Systems Considering Network Charges. Wang, H., +, JSYST June 2020 2684-2693

- Optimal Planning and Operational Strategy of a Residential Microgrid With Demand Side Management. *Bhamidi, L., +, JSYST June 2020 2624-2632*
- Path-Based Distribution Feeder Reconfiguration for Optimization of Losses and Reliability. *Jose, J.*, +, *JSYST March 2020 1417-1426*
- Uplink Low-Power Scheduling for Delay-Bounded Industrial Wireless Networks Based on Imperfect Power-Domain NOMA. *Xu, C.*, +, *JSYST June* 2020 2443-2454

Mining

Optimized Fuzzy Logic-Based Fire Monitoring in Underground Coal Mines: Binary Particle Swarm Optimization Approach. *Muduli, L.*, +, *JSYST June 2020 3039-3046*

MISO communication

Energy Efficiency for MISO-OFDMA-Based User-Relay Assisted Cellular Networks. *Basturk, 1.*, +, *JSYST Dec. 2020 5274-5283*

Missile control

Distributed Estimation in Multimissile Cyber-Physical Systems With Time Delay. *Abdelmawgoud, A.*, +, *JSYST March 2020 1491-1502*

Missile guidance

Distributed Estimation in Multimissile Cyber-Physical Systems With Time Delay. *Abdelmawgoud*, A., +, *JSYST March* 2020 1491-1502

Missiles

A Novel Effectiveness Evaluation Method Based on Simultaneous Probabilistic Finite-State Machines. Nan, Y., +, JSYST June 2020 1611-1622

Mobile computing

- A Context-Aware Augmentative and Alternative Communication System for School Children With Intellectual Disabilities. *Chan, R.Y.*, +, *JSYST March* 2020 208-219
- A Provably Secure and Efficient Identity-Based Anonymous Authentication Scheme for Mobile Edge Computing. *Jia, X.*, +, *JSYST March 2020 560*-571
- Adversarial-Example Attacks Toward Android Malware Detection System. Li, H., +, JSYST March 2020 653-656
- Cache-Aware Computation Offloading in IoT Systems. Wei, H., +, JSYST March 2020 61-72
- Distributed Artificial Intelligence Solution for D2D Communication in 5G Networks. *Ioannou, I.*, +, *JSYST Sept. 2020 4232-4241*
- Duration-Sensitive Task Allocation for Mobile Crowd Sensing. Lai, C., +, JSYST Sept. 2020 4430-4441
- Edge Computing-Based Mobile Health System: Network Architecture and Resource Allocation. *Lin, D., +, JSYST June 2020 1716-1727*
- Microscale Particulate Matter Monitoring With Reliable Event Transport in Urban Environments. *Yang, T.*, +, *JSYST June 2020 3057-3060*
- SieveDroid: Intercepting Undesirable Private-Data Transmissions in Android Applications. *Huang, J.*, +, *JSYST March 2020 375-386*
- Smart Parking System Based on Bluetooth Low Energy Beacons With Particle Filtering. *Mackey, A.*, +, *JSYST Sept. 2020 3371-3382*
- Venue2Vec: An Efficient Embedding Model for Fine-Grained User Location Prediction in Geo-Social Networks. Xu, S., +, JSYST June 2020 1740-1751
- VTracer: When Online Vehicle Trajectory Compression Meets Mobile Edge Computing. Chen, C., +, JSYST June 2020 1635-1646

Mobile handsets

EHLinQ: Distributed Scheduler for D2D Communication With RF Energy Harvesting. Lee, H., +, JSYST June 2020 2281-2292

Mobile nodes

Energy-Efficient Barrier Lifetime Prolonging Scheme Based on Repairing in Directional Sensor Networks. Fan, X., +, JSYST Dec. 2020 4943-4954

Mobile radio

- Campus Edge Computing Network Based on IoT Street Lighting Nodes. Chang, Y, +, JSYST March 2020 164-171
- Covert Communications in D2D Underlaying Cellular Networks With Power Domain NOMA. *Jiang, Y.*, +, *JSYST Sept. 2020 3717-3728*
- Energy-Aware Connectivity Restoration Mechanism for Cyber-Physical Systems of Networked Sensors and Robots. *Baroudi, U.*, +, *JSYST Sept.* 2020 3093-3104
- Fuzzy-Based 3-D Stream Traffic Lightweighting Over Mobile P2P Network. Zhang, C., +, JSYST June 2020 1840-1851

- Joint Position, Decoding Order, and Power Allocation Optimization in UAV-Based NOMA Downlink Communications. *Hu, D.*, +, *JSYST June 2020 2949-2960*
- Multicriteria UAV Base Stations Placement for Disaster Management. Akram, T., +, JSYST Sept. 2020 3475-3482
- Resource Optimization Protocol Based on Multicommunity Model for Intermittently Connected Mobile Networks. Wang, T., +, JSYST March 2020 410-421

Mobile robots

- A Multilevel Fusion System for Multirobot 3-D Mapping Using Heterogeneous Sensors. *Yue*, Y., +, *JSYST March 2020 1341-1352*
- A Robust Visual Person-Following Approach for Mobile Robots in Disturbing Environments. *Pang, L.*, +, *JSYST June 2020 2965-2968*
- Computation and Sensor Offloading for Cloud-Based Infrastructure-Assisted Autonomous Vehicles. Kong, P., JSYST Sept. 2020 3360-3370
- Energy-Aware Connectivity Restoration Mechanism for Cyber-Physical Systems of Networked Sensors and Robots. *Baroudi*, U., +, *JSYST Sept*. 2020 3093-3104
- Formation Obstacle Avoidance: A Fluid-Based Solution. Wu, J., +, JSYST March 2020 1479-1490
- FPGA-Based Design Optimization in Autonomous Robot Systems for Inspection of Civil Infrastructure. *Lins, R.G.*, +, *JSYST June 2020 2961-2964*
- Globally Stable Formation Control of Nonholonomic Multiagent Systems With Bearing-Only Measurement. *Luo*, *X*., +, *JSYST June 2020 2901-2912* Health Monitoring for Cyber Physical Systems. *Shangguan*, *L*., +, *JSYST March 2020 1457-1467*
- Local Controllability, Trajectory Planning, and Stabilization of a Two-Agent Underactuated Microrobotic System. *Fruchard, M.*, +, *JSYST June 2020 2892-2900*
- Loosely Coupled Cloud Robotic Framework for QoS-Driven Resource Allocation-Based Web Service Composition. *Xie, Y., +, JSYST March 2020 1245-1256*
- Navigation of Scalar Fronts With Multirobot Clusters in Simulation and Experiment. McDonald, R.T., +, JSYST Sept. 2020 3755-3766
- Neuroadaptive Sliding Mode Formation Control of Autonomous Underwater Vehicles With Uncertain Dynamics. Wang, J., +, JSYST Sept. 2020 3325-3333
- Path Planning for Autonomous Underwater Vehicles With Simultaneous Arrival in Ocean Environment. *Yao, P., +, JSYST Sept. 2020 3185-3193*
- Understanding Risks and Opportunities of Autonomous Vehicle Technology Adoption Through Systems Dynamic Scenario Modeling—The American Insurance Industry. *Liu*, *C.*, +, *JSYST March* 2020 1365-1374
- Visual Perception for Multiple Human–Robot Interaction From Motion Behavior. Benli, E., +, JSYST June 2020 2937-2948

Mobility management (mobile radio)

- Association, Blockage, and Handoffs in IEEE 802.11ad-Based 60-GHz Picocells—A Closer Look. *Joshi, K.C.*, +, *JSYST June 2020 2144-2153*
- Location-Aware, Context-Driven QoS for IoT Applications. Ahmad, E., +, JSYST March 2020 232-243
- Proactive Forwarding of High Data Rate in Smart Virtualization Networks for High-Speed Trains. *Yaseen, F.A.*, +, *JSYST June 2020 1670-1681*

Modeling

- An Information Theoretic Approach to Platform Technology Selection to Aid Influence Operations. *Hartong, M.W.*, +, *JSYST Dec. 2020 5308-5319* Research on SoS-GERT Network Model for Equipment System of Systems Contribution Evaluation Based on Joint Operation. *Wang, Z.*, +, *JSYST Sept. 2020 4188-4196*
- Systems Engineers' Effectiveness in an Organization: Text and Visual Analytics Approach. Zavala, A., +, JSYST Dec. 2020 5049-5060

Modulation

- A System Simulation Framework for Modeling Space Modulation Techniques. *Hiari*, O., +, *JSYST March* 2020 1435-1446
- Cooperative Space Shift Keying Media-Based Modulation With Hybrid Relaying. Yarkin, F., +, JSYST March 2020 500-509
- Transmit Antenna Selection for Full-Duplex Spatial Modulation Multiple-Input Multiple-Output System. Van Nguyen, L., +, JSYST Dec. 2020 4777-4785

Molecular communication (telecommunication)

Nanomachine Localization in a Diffusive Molecular Communication System. Kumar, S., JSYST June 2020 3011-3014

Monitoring

- Anticomplementary Triangles for Efficient Coverage in Sensor Network-Based IoT. Shivhare, A., +, JSYST Dec. 2020 4854-4863
- Fault Detection for Low-Voltage Residential Distribution Systems With Low-Frequency Measured Data. *Shafiei, M.*, +, *JSYST Dec. 2020 5265-5273*

Monte Carlo methods

- A Method to Establish a Trade-Space of System Requirements and Life Cycle Cost. Abdul Rahim, N.B., +, JSYST March 2020 1257-1264
- An Agent-Based Model of Miscommunication in Complex System Engineering Organizations. *Meluso*, J., +, JSYST Sept. 2020 3463-3474
- An Analytical View of ASE for Multicell OFDMA Networks Based on Frequency-Reuse Scheme. Ghosh, J., +, JSYST March 2020 645-648
- Cognitive Radio Spectrum Sensing Under Joint TX/RX I/Q Imbalance and Uncalibrated Receiver. *Jalali, F.*, +, *JSYST March 2020 105-112*
- Covariance Analysis of LAV Robust Dynamic State Estimation in Power Systems. Sun, L., +, JSYST June 2020 2801-2812
- Distributed Estimation in Multimissile Cyber-Physical Systems With Time Delay. *Abdelmawgoud*, A., +, JSYST March 2020 1491-1502
- Echo State Network and Echo State Gaussian Process for Non-Line-of-Sight Target Tracking. Yang, X., +, JSYST Sept. 2020 3885-3892
- Equilibrium Analysis of Electricity Market With Demand Response Exchange to Counterbalance Bid Deviations of Renewable Generators. *Wang, X.*, +, *JSYST June 2020 2713-2724*
- On the Secrecy Performance of Random VLC Networks With Imperfect CSI and Protected Zone. Wang, J., +, JSYST Sept. 2020 4176-4187
- Online Planning for Multiagent Situational Information Gathering in the Markov Environment. Zhou, X., +, JSYST June 2020 1798-1809
- Outage Probability and Throughput of Multirelay SWIPT-WPCN Networks With Nonlinear EH Model and Imperfect CSI. *Jiang, R.*, +, *JSYST March* 2020 1206-1217
- Probabilistic Model for Microgrids Optimal Energy Management Considering AC Network Constraints. *Javidsharifi*, M., +, *JSYST June 2020 2703-2712*
- Reliability Evaluation and Reliability-Based Optimal Design for Wireless Sensor Networks. *Xiang, S., +, JSYST June 2020 1752-1763*
- Secure Transmit Antenna Selection Protocol for MIMO NOMA Networks Over Nakagami-*m* Channels. *Tran, D.*, +, *JSYST March 2020 253-264*
- Spectrum-Occupancy Aware Cooperative Spectrum Sensing Using Adaptive Detection. Al-Jarrah, M.A., +, JSYST June 2020 2225-2236
- Time-Dependent Bit Error Rate Analysis for Smart Utility Networks in the Presence of WLAN Interferers. *Gouissem, A.*, +, *JSYST June 2020 2133-2143*

Motion control

- Formation Obstacle Avoidance: A Fluid-Based Solution. Wu, J., +, JSYST March 2020 1479-1490
- Globally Stable Formation Control of Nonholonomic Multiagent Systems With Bearing-Only Measurement. *Luo*, X., +, *JSYST June 2020 2901-2912*

Multi-access systems

- A Novel Communication System of High Capacity. Fattouche, M., JSYST Sept. 2020 4197-4208
- Covert Communications in D2D Underlaying Cellular Networks With Power Domain NOMA. *Jiang, Y., +, JSYST Sept. 2020 3717-3728*
- Cross PHY/APP Layer User Grouping and Power Allocation for Uplink Multiantenna NOMA Video Communication Systems. *Tseng, S.*, +, *JSYST Sept. 2020 3351-3359*
- Deep Learning-Based MIMO-NOMA With Imperfect SIC Decoding. *Kang*, J., +, JSYST Sept. 2020 3414-3417
- Downlink NOMA Networks With Hybrid Long-Packet and Short-Packet Communications in Flat Rayleigh Fading Channels. *Lai*, X., +, *JSYST Sept.* 2020 3410-3413
- Effect of Doppler Shift on the Performance of Multicell Full-Duplex Massive MIMO Networks. Dai, J., +, JSYST June 2020 2421-2431
- End-to-End Distortion Analysis of Nonorthogonal Layered Coding Over Relay-Assisted Networks. *Padidar, P., +, JSYST Sept. 2020 4466-4476*

- Energy-Efficient Adaptive Sectorization for 5G Green Wireless Communication Systems. *Jain, P., +, JSYST June 2020 2382-2391*
- Ergodic Capacity of NOMA-Based Uplink Satellite Networks With Randomly Deployed Users. *Yan, X.*, +, *JSYST Sept. 2020 3343-3350*
- Joint Position, Decoding Order, and Power Allocation Optimization in UAV-Based NOMA Downlink Communications. *Hu, D.*, +, *JSYST June 2020 2949-2960*
- Outage and Average Rate Performances of Full-Duplex Multiuser AF Relay Systems With Time-Selective Fading. Raut, P., +, JSYST Sept. 2020 3390-3398
- Performance Analysis of Impaired SWIPT NOMA Relaying Networks Over Imperfect Weibull Channels. *Li*, *X*., +, *JSYST March 2020 669-672*
- Rate-Loss Mitigation for a Millimeter-Wave Beamspace MIMO Lens Antenna Array System Using a Hybrid Beam Selection Scheme. Sarker, M.A.L., +, JSYST Sept. 2020 3582-3585
- Secure Transmit Antenna Selection Protocol for MIMO NOMA Networks Over Nakagami-m Channels. Tran, D., +, JSYST March 2020 253-264
- Uplink Low-Power Scheduling for Delay-Bounded Industrial Wireless Networks Based on Imperfect Power-Domain NOMA. *Xu, C.*, +, *JSYST June* 2020 2443-2454

Multi-agent systems

- Consensus and Clustering of Expressed and Private Opinions in Dynamical Networks Against Attacks. Shang, Y., JSYST June 2020 2078-2084
- Containment Control of Linear Multiagent Systems With Stochastic Disturbances via Event-Triggered Strategies. Zou, W., +, JSYST Dec. 2020 4810-4819
- Cyber-Social Systems: Modeling, Inference, and Optimal Design. *Doostmo-hammadian*, M., +, JSYST March 2020 73-83
- Distributed Artificial Intelligence Solution for D2D Communication in 5G Networks. *Ioannou*, *I.*, +, *JSYST Sept. 2020 4232-4241*
- Formation Obstacle Avoidance: A Fluid-Based Solution. Wu, J., +, JSYST March 2020 1479-1490
- Online Planning for Multiagent Situational Information Gathering in the Markov Environment. Zhou, X., +, JSYST June 2020 1798-1809
- Secure Consensus Control of Multiagent Cyber-Physical Systems With Uncertain Nonlinear Models. *Rezaee, H.*, +, *JSYST Sept. 2020 3539-3546* Simulating Systems-of-Systems With Agent-Based Modeling: A Systematic
- Literature Review. Silva, R.d.A., +, JSYST Sept. 2020 3609-3617 Toward a Theory of Systems Engineering Processes: A Principal–Agent Model of a One-Shot, Shallow Process. Safarkhani, S., +, JSYST Sept. 2020 3277-3288

Multi-robot systems

- A Multilevel Fusion System for Multirobot 3-D Mapping Using Heterogeneous Sensors. *Yue*, Y., +, JSYST March 2020 1341-1352
- Formation Obstacle Avoidance: A Fluid-Based Solution. Wu, J., +, JSYST March 2020 1479-1490
- Globally Stable Formation Control of Nonholonomic Multiagent Systems With Bearing-Only Measurement. *Luo*, X., +, *JSYST June 2020 2901-2912*
- Navigation of Scalar Fronts With Multirobot Clusters in Simulation and Experiment. McDonald, R.T., +, JSYST Sept. 2020 3755-3766
- Neuroadaptive Sliding Mode Formation Control of Autonomous Underwater Vehicles With Uncertain Dynamics. Wang, J., +, JSYST Sept. 2020 3325-3333
- System Architecture for Real-Time Surface Inspection Using Multiple UAVs. Hoang, V.T., +, JSYST June 2020 2925-2936

Multicast communication

Near-Optimal Multicast Tree Construction in Leaf-Spine Data Center Networks. *Luo*, S., +, *JSYST June 2020 2581-2584*

Multilayer perceptrons

A Hierarchical Attention Model for CTR Prediction Based on User Interest. Wang, Q., +, JSYST Sept. 2020 4015-4024

Multipath channels

- An Analytical View of ASE for Multicell OFDMA Networks Based on Frequency-Reuse Scheme. Ghosh, J., +, JSYST March 2020 645-648
- Near-Optimal Detection of Monobit Digitized UWB Signals in the Presence of Noise and Strong Intersymbol Interference. *Khani, H.*, +, *JSYST June* 2020 2311-2322

Multiplexing

Random Pattern Multiplexing for Random Access in IoT-Oriented Satellite Networks. *Zhao, B., +, JSYST Sept. 2020 4089-4100*

Multiuser channels

- Ergodic Capacity of NOMA-Based Uplink Satellite Networks With Randomly Deployed Users. Yan, X., +, JSYST Sept. 2020 3343-3350
- Partial-Fixed Interference Alignment in Multiuser Interference Channel. Chen, X., +, JSYST June 2020 2303-2310
- Secure Transmit Antenna Selection Protocol for MIMO NOMA Networks Over Nakagami-m Channels. Tran, D., +, JSYST March 2020 253-264

Multiuser detection

Robust Directional Modulation Design for Secrecy Rate Maximization in Multiuser Networks. *Gui, L.*, +, *JSYST Sept. 2020 3150-3160*

Museums

BLE Beacons for Indoor Positioning at an Interactive IoT-Based Smart Museum. Spachos, P., +, JSYST Sept. 2020 3483-3493

N

Nakagami channels

- End-to-End Performance Analysis With Decode-and-Forward Relays in Multihop Wireless Systems Over\$\alpha\$- η- μ Fading Channels. Salameh, H.A.B., +, JSYST March 2020 84-92
- On Secure Mixed RF-FSO Decode-and-Forward Relaying Systems With Energy Harvesting. Saber, M.J., +, JSYST Sept. 2020 4402-4405
- Performance of Wireless Powered DF Relay System Under Nakagami-mFading: Relay Assists Energy-Constrained Source. Kumar, P., +, JSYST June 2020 2497-2507
- Physical-Layer Security for Frequency Diverse Array Communication System Over Nakagami-*m* Fading Channels. *Ji*, S., +, *JSYST June 2020 2370-2381*
- Secure Transmit Antenna Selection Protocol for MIMO NOMA Networks Over Nakagami-*m* Channels. *Tran*, D., +, *JSYST March* 2020 253-264

Natural gas technology

- A Novel Hybrid Framework for Co-Optimization of Power and Natural Gas Networks Integrated With Emerging Technologies. *Mirzaei*, *M.A.*, +, *JSYST Sept. 2020 3598-3608*
- Optimal CHP Planning in Integrated Energy Systems Considering Network Charges. Wang, H., +, JSYST June 2020 2684-2693

Natural language processing

Venue2Vec: An Efficient Embedding Model for Fine-Grained User Location Prediction in Geo-Social Networks. *Xu, S.,* +, *JSYST June 2020 1740-1751*

Navigatio

Navigation of a Network of Aerial Drones for Monitoring a Frontier of a Moving Environmental Disaster Area. Savkin, A.V., +, JSYST Dec. 2020 4746-4749

Nearest neighbor methods

Detection and Experimental Validation of High Impedance Arc Fault in Distribution System Using Empirical Mode Decomposition. *Lala, H.*, +, *JSYST Sept. 2020 3494-3505*

Network coding

- A Priority-Based Multiobjective Design for Routing, Spectrum, and Network Coding Assignment Problem in Network-Coding-Enabled Elastic Optical Networks. *Hai, D.T.*, +, *JSYST June 2020 2358-2369*
- Performance Evaluation of In-Band Full-Duplex System Using One-Time-Slot Two-Way Relay. *Chang, K.*, +, *JSYST March 2020 510-519*

Network servers

Traffic Control for RDMA-Enabled Data Center Networks: A Survey. *Guo*, Z., +, *JSYST March 2020 677-688*

Network synthesis

Calibrating Phase Offsets for Commodity WiFi. Zhang, D., +, JSYST March 2020 661-664

Network theory (graphs)

- Consensus and Clustering of Expressed and Private Opinions in Dynamical Networks Against Attacks. Shang, Y., JSYST June 2020 2078-2084
- Critical Nodes Identification of Complex Power Systems Based on Electric Cactus Structure. Yang, D., +, JSYST Sept. 2020 4477-4488

- Minimal Driver Nodes for Structural Controllability of Large-Scale Dynamical Systems: Node Classification. *Doostmohammadian, M., JSYST Sept.* 2020 4209-4216
- Opinion Maximization Through Unknown Influence Power in Social Networks Under Weighted Voter Model. *He, Q.*, +, *JSYST June 2020 1874-1885*
- Spotting Key Members in Networks: Clustering-Embedded Eigenvector Centrality. Carrizosa, E., +, JSYST Sept. 2020 3916-3925
- SysEvoRecomd: Network Reconstruction by Graph Evolution and Change Learning. *Chaturvedi, A.*, +, *JSYST Sept. 2020 4007-4014*

Neural networks

- A High-Accuracy Least-Time-Domain Mixture Features Machine-Fault Diagnosis Based on Wireless Sensor Network. *Du, C.*, +, *JSYST Sept. 2020* 4101-4109
- A New Hybrid Fault Prognosis Method for MFS Systems Based on Distributed Neural Networks and Recursive Bayesian Algorithm. *Kordestani, M.*, +, *JSYST Dec.* 2020 5407-5416
- A Smart Optimization of Fault Diagnosis in Electrical Grid Using Distributed Software-Defined IoT System. *Al Mhdawi, A.K.*, +, *JSYST June 2020* 2780-2790
- Adversarial-Example Attacks Toward Android Malware Detection System. Li, H., +, JSYST March 2020 653-656
- Deep Learning-Based MIMO-NOMA With Imperfect SIC Decoding. *Kang*, *J.*, +, *JSYST Sept. 2020 3414-3417*
- Detection and Experimental Validation of High Impedance Arc Fault in Distribution System Using Empirical Mode Decomposition. *Lala, H.*, +, *JSYST Sept. 2020 3494-3505*
- E-WACGAN: Enhanced Generative Model of Signaling Data Based on WGAN-GP and ACGAN. Jin, Q., +, JSYST Sept. 2020 3289-3300
- Fault Detection, Classification, and Location by Static Switch in Microgrids Using Wavelet Transform and Taguchi-Based Artificial Neural Network. Hong, Y, +, JSYST June 2020 2725-2735
- FreeTrack: Device-Free Human Tracking With Deep Neural Networks and Particle Filtering. Zhou, R., +, JSYST June 2020 2990-3000
- SimProxy Decision Support System: A Neural Network Proxy Applied to Reservoir and Surface Integrated Optimization. *Kohler, M.*, +, *JSYST Dec.* 2020 5111-5120
- Toward Greater Intelligence in Route Planning: A Graph-Aware Deep Learning Approach. Zhuang, Z., +, JSYST June 2020 1658-1669

Neurocontrollers

- An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, N., +, *JSYST March* 2020 1218-1229
- Improving Microgrid Low-Voltage Ride-Through Capacity Using Neural Control. *Djilali*, L., +, *JSYST June 2020 2825-2836*
- Neuroadaptive Sliding Mode Formation Control of Autonomous Underwater Vehicles With Uncertain Dynamics. Wang, J., +, JSYST Sept. 2020 3325-3333

Newton method

Transmission–Distribution Cosimulation: Analytical Methods for Iterative Coupling. *Krishnamoorthy, G.*, +, *JSYST June 2020 2633-2642*

Newton-Raphson method

Performance Evaluation of In-Band Full-Duplex System Using One-Time-Slot Two-Way Relay. *Chang, K.*, +, *JSYST March 2020 510-519*

Noise measurement

Protection of Converter-Interfaced Microgrids Using Modified Short-Time Correlation Transform. *Allahdadi, K.*, +, *JSYST Dec. 2020 5172-5175*

NOMA

- Iterative Sub-Band and Power Allocation in Downlink Multiband NOMA. Goswami, D., +, JSYST Dec. 2020 5199-5209
- On Communication Performance in Energy Harvesting WSNs Under a Cooperative Jamming Attack. Vo, V.N., +, JSYST Dec. 2020 4955-4966
- Shortest Uplink Scheduling for NOMA-Based Industrial Wireless Networks. Xu, C., +, JSYST Dec. 2020 5384-5395

Nonlinear control systems

Global Fault-Tolerant Sampled-Data Control for Large-Scale Switched Time-Delay Nonlinear Systems. He, W., +, JSYST June 2020 1549-1557

- Improving Microgrid Low-Voltage Ride-Through Capacity Using Neural Control. *Djilali, L., +, JSYST June 2020 2825-2836*
- Local Controllability, Trajectory Planning, and Stabilization of a Two-Agent Underactuated Microrobotic System. *Fruchard, M.*, +, *JSYST June 2020 2892-2900*
- Minimal Driver Nodes for Structural Controllability of Large-Scale Dynamical Systems: Node Classification. *Doostmohammadian, M., JSYST Sept.* 2020 4209-4216
- Neuroadaptive Sliding Mode Formation Control of Autonomous Underwater Vehicles With Uncertain Dynamics. Wang, J., +, JSYST Sept. 2020 3325-3333
- Robust Nonlinear State Feedback Control of Bidirectional Interlink Power Converters in Grid-Connected Hybrid Microgrids. *Zolfaghari, M.*, +, *JSYST March 2020 1117-1124*
- Robust Voltage Control in Inverter-Interfaced Microgrids Under Plug-and-Play Functionalities. Zarei, A., +, JSYST June 2020 2813-2824
- Sampled-Data Decentralized Output Feedback Control for a Class of Switched Large-Scale Stochastic Nonlinear Systems. *Li*, *S*., +, *JSYST June* 2020 1602-1610
- Secure Consensus Control of Multiagent Cyber-Physical Systems With Uncertain Nonlinear Models. *Rezaee*, H., +, JSYST Sept. 2020 3539-3546
- Voltage/Current Large Transient Suppression in DC Microgrids Using Local Information and Active Stabilizing Capability. Azimi, S.M., +, JSYST March 2020 1109-1116

Nonlinear dynamical systems

Minimal Driver Nodes for Structural Controllability of Large-Scale Dynamical Systems: Node Classification. *Doostmohammadian, M., JSYST Sept.* 2020 4209-4216

Nonlinear programming

- A Mixed Integer Nonlinear Program Based Power Load Estimator for Distribution Grid. *Yang*, *Y*, +, *JSYST March 2020 842-851*
- Adaptive Traffic Management and Energy Cooperation in Renewable-Energy-Powered Cellular Networks. Lee, H., +, JSYST March 2020 132-143
- An MINLP-Based Approach for the Design-for-Control of Resilient Water Supply Systems. *Ulusoy, A.*, +, *JSYST Sept. 2020 4579-4590*
- Energy-Efficient Resource Allocation for Dynamic Priority-Based Vehicular Mobile-Health Communications. Fan, B., +, JSYST June 2020 2097-2108
- Highly Accurate Directional Overcurrent Coordination via Combination of Rosen's Gradient Projection—Complex Method With GA-PSO Algorithm. Darabi, A., +, JSYST March 2020 1171-1182
- Integrated Utility-Transit Model for Optimal Configuration of Battery Electric Bus Systems. *El-Taweel, N.A.*, +, *JSYST March 2020 738-748*

Nonvolatile memory

Multigranularity Space Management Scheme for Accelerating the Write Performance of In-Memory File Systems. Wu, T., +, JSYST Dec. 2020 5429-5440

Notch filters

Adaptive Narrow-Band Interference Suppression and Performance Evaluation Based on Code-Aided in GNSS Inter-Satellite Links. Wang, H., +, JSYST March 2020 538-547

Numerical analysis

- A Robust Synchronization-Based Chaotic Secure Communication Scheme With Double-Layered and Multiple Hybrid Networks. *Zhou, L.*, +, *JSYST June 2020 2508-2519*
- Fast Resource Scheduling for Distribution Systems Enabled With Discrete Control Devices. *Nouri*, A., +, *JSYST Sept.* 2020 3767-3778
- Joint Subarray Selection and Power Allocation for Cognitive Target Tracking in Large-Scale MIMO Radar Networks. *Zhang, H.*, +, *JSYST June* 2020 2569-2580
- Optimal Coordinated Expansion Planning of Transmission and Electrical Energy Storage Systems Under Physical Intentional Attacks. *Nemati, H.*, +, *JSYST March 2020 793-802*
- Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets. *Oikonomou, K.*, +, *JSYST Sept. 2020* 3729-3739
- QoS-Aware Cross-Layer Optimization of Hybrid DSL-LTE Access Networks. Chuah, T.C., +, JSYST June 2020 2175-2186

Robust Power System State Estimation Using *t*-Distribution Noise Model. *Chen, T., +, JSYST March 2020 771-781*

Spatio-Temporal Value of Energy Storage in Transmission Networks. Khatami, R., +, JSYST Sept. 2020 3855-3864

0

Object detection

A Robust Visual Person-Following Approach for Mobile Robots in Disturbing Environments. *Pang, L.*, +, *JSYST June 2020 2965-2968*

System Architecture for Real-Time Surface Inspection Using Multiple UAVs. Hoang, V.T., +, JSYST June 2020 2925-2936

System Integration of Sensor-Fusion Localization Tasks Using Vision-Based Driving Lane Detection and Road-Marker Recognition. *Lin, C.*, +, *JSYST Sept. 2020 4523-4534*

Object tracking

Simultaneous Heterogeneous Sensor Localization, Joint Tracking, and Upper Extremity Modeling for Stroke Rehabilitation. *Chen, J.*, +, *JSYST Sept. 2020 3570-3581*

Object-oriented programming

An MDE-Based Tool for Early Analysis of UML2.0/PSM Atomic and Composite Components. *Rouis, T.S.*, +, *JSYST June 2020 1647-1657*

Bioanalytical Device Design With Model-Based Systems Engineering Tools. Evin, E., +, JSYST Sept. 2020 3139-3149

Observability

Minimal Driver Nodes for Structural Controllability of Large-Scale Dynamical Systems: Node Classification. *Doostmohammadian, M., JSYST Sept.* 2020 4209-4216

PMU Placement for Measurement Redundancy Distribution Considering Zero Injection Bus and Contingencies. *Chen, X.*, +, *JSYST Dec. 2020 5396-5406*

Observers

Brief Survey on Attack Detection Methods for Cyber-Physical Systems. *Tan, S., +, JSYST Dec. 2020 5329-5339*

Critical Nodes Identification of Complex Power Systems Based on Electric Cactus Structure. Yang, D., +, JSYST Sept. 2020 4477-4488

Cyber-Attacks in a Looped Energy-Water Nexus: An Inoculated Sub-Observer-Based Approach. Khalid, H.M., +, JSYST June 2020 2054-2065

Detection and Location of Bias Load Injection Attack in Smart Grid via Robust Adaptive Observer. Wang, X., +, JSYST Sept. 2020 4454-4465

Disturbance-Observer-Based Frequency Regulation Scheme for Low-Inertia Microgrid Systems. Sharma, D., +, JSYST March 2020 782-792

Fuzzy-Observer-Based Predictive Stabilization of DC Microgrids With Power Buffers Through an Imperfect 5G Network. Vafamand, N., +, JSYST Sept. 2020 4025-4035

Global Fault-Tolerant Sampled-Data Control for Large-Scale Switched Time-Delay Nonlinear Systems. He, W., +, JSYST June 2020 1549-1557

Robust Nonlinear State Feedback Control of Bidirectional Interlink Power Converters in Grid-Connected Hybrid Microgrids. *Zolfaghari, M.*, +, *JSYST March 2020 1117-1124*

Robust Voltage Control in Inverter-Interfaced Microgrids Under Plug-and-Play Functionalities. Zarei, A., +, JSYST June 2020 2813-2824

Sampled-Data Decentralized Output Feedback Control for a Class of Switched Large-Scale Stochastic Nonlinear Systems. *Li*, S., +, *JSYST June* 2020 1602-1610

OFDM

A Flexible Multicarrier Scheme Based on the Discrete Orthogonal Stockwell Transform. Colen, G.R., +, JSYST Dec. 2020 5284-5295

A Novel Receiver Design of Nonorthogonal FDM Systems in Underwater Acoustics Communication. *Anwar, S., +, JSYST Sept. 2020 3875-3884*

Adaptive OFDM Waveform Design for Cognitive Radar in Signal-Dependent Clutter. Karimi, V., +, JSYST Sept. 2020 3630-3640

An Analytical View of ASE for Multicell OFDMA Networks Based on Frequency-Reuse Scheme. Ghosh, J., +, JSYST March 2020 645-648

Bridging the Gap Between CP-OFDM and ZP-OFDM for the Provision of Ultra-Low Latency Services in 5G. *Ayadi*, R., +, *JSYST March 2020 603-613*

Design Precoded Space-Time-Frequency 4×1 and 4×2 OFDM Architectures in Frequency-Selective Fading Channels. *Yeh, H., JSYST March 2020* 277-287

Energy Efficiency for MISO-OFDMA-Based User-Relay Assisted Cellular Networks. *Basturk*, 1., +, *JSYST Dec.* 2020 5274-5283

Energy Efficiency Evaluation for Downlink Full-Duplex Nonlinear MU-MI-MO-OFDM System With Self-Energy Recycling. *Shaikh, M.H.N.*, +, *JSYST Sept. 2020 3313-3324*

Integrated Communication and Localization System With OFDM-Chirp Waveform. *Jia, W.*, +, *JSYST June 2020 2464-2472*

Location-Aided mMIMO Channel Tracking and Hybrid Beamforming for High-Speed Railway Communications: An Angle-Domain Approach. *Xu*, *K.*, +, *JSYST March 2020 93-104*

Mitigation Techniques for Impulsive Noise With Memory Modeled by a Two State Markov-Gaussian Process. Alam, M.S., +, JSYST Sept. 2020 4079-4088

Multiuser Variable Rate GO-OFDMA Architecture and Its FPGA Prototype. Palisetty, R., +, JSYST June 2020 2455-2463

Orthogonal Chirp Division Multiplexing for Baseband Data Communication Systems. De M. B. A. Dib, L., +, JSYST June 2020 2164-2174

Performance Analysis of Precoded Wireless OFDM With Carrier Frequency Offset. Kalbat, F., +, JSYST June 2020 2237-2248

Reconfigurable Architecture of UFMC Transmitter for 5G and Its FPGA Prototype. Kumar, V., +, JSYST March 2020 28-38

Robust OFDM-Based Synchronization Against Very High Fractional CFO and Time-Varying Fading. Chang, K., +, JSYST Sept. 2020 4047-4058

Oil pollution

System Dynamic-Based Oil Weathering Processes: Simulation and Analysis. Kasimu, A., +, JSYST March 2020 1375-1383

Oil refining

Quantum-Inspired Genetic Programming Algorithm for the Crude Oil Scheduling of a Real-World Refinery. *Pereira, C.S.*, +, *JSYST Sept. 2020* 3926-3937

On load tap changers

An Improvized Coordinated Voltage Control Scheme for Better Utilization of Regulating Devices During Various Operating Conditions of a Distribution System. *Gururaj, M.V.*, +, *JSYST Dec. 2020 4891-4900*

Moth Search Optimization for Optimal DERs Integration in Conjunction to OLTC Tap Operations in Distribution Systems. Singh, P., +, JSYST March 2020 880-888

Optimal Voltage Control in Distribution Systems With Intermittent PV Using Multiobjective Grey-Wolf-Lévy Optimizer. *Mahmoud, K.*, +, *JSYST March* 2020 760-770

Ontologies (artificial intelligence)

Design Ontology in a Case Study for Cosimulation in a Model-Based Systems Engineering Tool-Chain. Lu, J., +, JSYST March 2020 1297-1308

Open systems

Architecting Ubiquitous Communication and Collaborative-Automation-Based Machine Network Systems for Flexible Manufacturing. *Meng, Z.*, +, *JSYST March 2020 113-123*

ChainSDI: A Software-Defined Infrastructure for Regulation-Compliant Home-Based Healthcare Services Secured by Blockchains. *Li*, *P*, +, *JSYST June 2020 2042-2053*

Model-Based Design of Complex Aeronautical Systems Through Digital Twin and Thread Concepts. *Bachelor, G., +, JSYST June 2020 1568-1579*

Optical communication

On the Secrecy Performance of Random VLC Networks With Imperfect CSI and Protected Zone. Wang, J., +, JSYST Sept. 2020 4176-4187

Optical fiber networks

A Priority-Based Multiobjective Design for Routing, Spectrum, and Network Coding Assignment Problem in Network-Coding-Enabled Elastic Optical Networks. *Hai, D.T.*, +, *JSYST June 2020 2358-2369*

Optical links

Optimizing the Ground Network of Optical MEO Satellite Communication Systems. *Lyras*, *N.K.*, +, *JSYST Sept. 2020 3968-3976*

Performance Analysis of a Mixed Cooperative PLC–VLC System for Indoor Communication Systems. *Jani, M.*, +, *JSYST March 2020 469-476*

Optical modulation

Expanded Multiband Super-Nyquist CAP Modulation for Highly Bandlimited Organic Visible Light Communications. *Chvojka, P.*, +, *JSYST June* 2020 2544-2550

Optical radar

Computation and Sensor Offloading for Cloud-Based Infrastructure-Assisted Autonomous Vehicles. Kong, P., JSYST Sept. 2020 3360-3370

Optical transmitters

Capacity-Maximized Transmitter Precoding for MU MIMO VLC Systems With Bounded Channel Uncertainties. *Zhao*, S., +, *JSYST Dec. 2020 5144-5147*

Optimal control

- A Novel Control Method Based on Droop for Cooperation of Flywheel and Battery Energy Storage Systems in Islanded Microgrids. *Khodadoost Arani*, A.A., +, JSYST March 2020 1080-1087
- Delay Reduction Through Optimal Controller Placement to Boost Scalability in an SDDC. *Bangash, Y.A.*, +, *JSYST Sept. 2020 4489-4499*
- Model Predictive for Reactive Power Scheduling Control Strategy for PV—Battery Hybrid System in Competitive Energy Market. *Lupangu, C.*, +, *JSYST Sept. 2020 4071-4078*
- Optimal Connected Cruise Control With Arbitrary Communication Delays. Wang, Z., +, JSYST June 2020 2913-2924
- Optimal Control Methods for Photovoltaic Enabled Grid With Abnormal Power Loads. Yang, Y., +, JSYST March 2020 852-861
- Research on Cooperative Trajectory Planning and Tracking Problem for Multiple Carrier Aircraft on the Deck. Liu, J., +, JSYST June 2020 3027-3038
- Spatio-Temporal Value of Energy Storage in Transmission Networks. *Khatami*, R., +, JSYST Sept. 2020 3855-3864

Optimal scheduling

- Fairness Enhancement for Opportunistic Interference Alignment Algorithm With Low Latency Communications. *Lu, H.*, +, *JSYST Dec. 2020 5002-5013*
- Optimal Chance-Constrained Scheduling of Reconfigurable Microgrids Considering Islanding Operation Constraints. *Hemmati, M.*, +, *JSYST Dec.* 2020 5340-5349

Optimization

- A Coordinated Real-Time Voltage Control Approach for Increasing the Penetration of Distributed Generation. *Othman, M.M.*, +, *JSYST March 2020 699-707*
- A Decomposition-Based Local Search for Large-Scale Many-Objective Vehicle Routing Problems With Simultaneous Delivery and Pickup and Time Windows. *Zhou*, *Y*., +, *JSYST Dec.* 2020 5253-5264
- A New Model for Reconfiguration and Distributed Generation Allocation in Distribution Network Considering Power Quality Indices and Network Losses. *Moghaddam, M.J.H.*, +, *JSYST Sept. 2020 3530-3538*
- A Novel Hybrid Framework for Co-Optimization of Power and Natural Gas Networks Integrated With Emerging Technologies. *Mirzaei, M.A.*, +, *JSYST Sept. 2020 3598-3608*
- A Periodic Multinode Charging and Data Collection Scheme With Optimal Traveling Path in WRSNs. Lyu, Z., +, JSYST Sept. 2020 3518-3529
- A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926
- A Review on the Recent Development in the Design and Optimization of Magnetic Coupling Mechanism of Wireless Power Transmission. *Dai, Z.*, +, *JSYST Sept. 2020 4368-4381*
- A Smart Optimization of Fault Diagnosis in Electrical Grid Using Distributed Software-Defined IoT System. *Al Mhdawi, A.K.*, +, *JSYST June 2020 2780-2790*
- A Theory for Optimizing Insecure Internetwork Connections. Das, P., +, JSYST Dec. 2020 4842-4853
- A WOA-Based Optimization Approach for Task Scheduling in Cloud Computing Systems. Chen, X., +, JSYST Sept. 2020 3117-3128
- Adaptive OFDM Waveform Design for Cognitive Radar in Signal-Dependent Clutter. Karimi, V., +, JSYST Sept. 2020 3630-3640
- Artificial-Noise-Aided Energy-Efficient Secure Beamforming for Multi-Eavesdroppers in Cognitive Radio Networks. *Chen, P.*, +, *JSYST Sept. 2020 3801-3812*

- Bee-Inspired Evaluation Algorithm Leads to Improved Decision Making in Groups. Sturgis, M., +, JSYST March 2020 1427-1434
- Cable Connection Optimization for Onshore Wind Farms Considering Restricted Area and Topography. Li, J., +, JSYST Sept. 2020 3082-3092
- Combined Impact of Network Reconfiguration and Volt-VAR Control Devices on Energy Savings in the Presence of Distributed Generation. Pamshetti, V.B., +, JSYST March 2020 995-1006
- Comparative Analysis of Communication Assisted Grid Synchronization Methods in Microgrids. S., N., +, JSYST March 2020 1007-1014
- Control of Parallel ULTC Transformers in Active Distribution Systems. *Pouladi*, A., +, *JSYST March* 2020 960-970
- Coordinated Hybrid Precoding Design in Millimeter Wave Fog-RAN. *Hao*, W., +, *JSYST March* 2020 673-676
- Cost-Effective Migration Toward Virtualized C-RAN With Scalable Fronthaul Design. *Masoudi*, M., +, *JSYST Dec. 2020 5100-5110*
- Cross PHY/APP Layer User Grouping and Power Allocation for Uplink Multiantenna NOMA Video Communication Systems. *Tseng, S.*, +, *JSYST Sept. 2020 3351-3359*
- Cross-Layer Network Lifetime Maximization in Underwater Wireless Sensor Networks. Zhou, Y, +, JSYST March 2020 220-231
- Crowd-Based Cooperative Task Allocation via Multicriteria Optimization and Decision-Making. *Zhao, L., +, JSYST Sept. 2020 3904-3915*
- Cyber-Social Systems: Modeling, Inference, and Optimal Design. *Doostmo-hammadian*, M., +, JSYST March 2020 73-83
- Distributed Hierarchical Control for Optimal Power Dispatch in Multiple DC Microgrids. *Babazadeh-Dizaji*, R., +, *JSYST March* 2020 1015-1023
- Duration-Sensitive Task Allocation for Mobile Crowd Sensing. Lai, C., +, JSYST Sept. 2020 4430-4441
- Dynamic Uncertainty Set Characterization for Bulk Power Grid Flexibility Assessment. *Pourahmadi, F., +, JSYST March 2020 718-728*
- End-to-End Distortion Analysis of Nonorthogonal Layered Coding Over Relay-Assisted Networks. *Padidar, P., +, JSYST Sept. 2020 4466-4476*
- Energy Storage Systems Architecture Optimization for Grid Resilience With High Penetration of Distributed Photovoltaic Generation. *Confrey, J.*, +, *JSYST March 2020 1135-1146*
- Energy-Efficient Joint Scheduling and Resource Management for UAV-Enabled Multicell Networks. *Yang*, H., +, JSYST March 2020 363-374
- Fast Resource Scheduling for Distribution Systems Enabled With Discrete Control Devices. *Nouri*, A., +, *JSYST Sept.* 2020 3767-3778
- Fast Switching With VM Migration in 5G Cloud Radio Access Networks. Wang, Y., +, JSYST March 2020 477-488
- Importance Sampling Using Multilabel Radial Basis Classification for Composite Power System Reliability Evaluation. *Urgun*, D., +, *JSYST June* 2020 2791-2800
- Integration Design of Sortie Scheduling for Carrier Aircrafts Based on Hybrid Flexible Flowshop. *Liu*, *J*., +, *JSYST March 2020 1503-1511*
- Joint Optimization of Power and Fronthaul Compression for Data and Pilot Signals in Uplink C-RANs. Yu, H., +, JSYST Dec. 2020 4990-5001
- Joint Position, Decoding Order, and Power Allocation Optimization in UAV-Based NOMA Downlink Communications. *Hu, D.*, +, *JSYST June 2020 2949-2960*
- Joint Task Offloading, CNN Layer Scheduling, and Resource Allocation in Cooperative Computing System. Chai, R., +, JSYST Dec. 2020 5350-5361
- Model Predictive for Reactive Power Scheduling Control Strategy for PV—Battery Hybrid System in Competitive Energy Market. *Lupangu, C.*, +, *JSYST Sept. 2020 4071-4078*
- Moth Search Optimization for Optimal DERs Integration in Conjunction to OLTC Tap Operations in Distribution Systems. Singh, P., +, JSYST March 2020 880-888
- Multicriteria UAV Base Stations Placement for Disaster Management. Akram, T., +, JSYST Sept. 2020 3475-3482
- Navigation of a Network of Aerial Drones for Monitoring a Frontier of a Moving Environmental Disaster Area. Savkin, A.V., +, JSYST Dec. 2020 4746-4749
- Near-Optimal Multicast Tree Construction in Leaf-Spine Data Center Networks. Luo, S., +, JSYST June 2020 2581-2584

- Opinion Maximization Through Unknown Influence Power in Social Networks Under Weighted Voter Model. *He*, Q., +, *JSYST June 2020 1874-1885*
- Optimal Charge/Discharge Scheduling of Battery Storage Interconnected With Residential PV System. Kapoor, A., +, JSYST Sept. 2020 3825-3835
- Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets. *Oikonomou, K.*, +, *JSYST Sept. 2020* 3729-3739
- Optimal Voltage Control in Distribution Systems With Intermittent PV Using Multiobjective Grey-Wolf-Lévy Optimizer. *Mahmoud, K.*, +, *JSYST March 2020 760-770*
- Optimizing Design Parameters for Relay-Aided Massive MIMO Systems. *El-Mashed, M.G., JSYST June 2020 2249-2256*
- Optimizing the Ground Network of Optical MEO Satellite Communication Systems. Lyras, N.K., +, JSYST Sept. 2020 3968-3976
- Performance Evaluation of In-Band Full-Duplex System Using One-Time-Slot Two-Way Relay. *Chang, K.*, +, *JSYST March 2020 510-519*
- Power Output Smoothing for Renewable Energy System: Planning, Algorithms, and Analysis. Chen, X., +, JSYST March 2020 1034-1045
- Probabilistic Optimal Dynamic Planning of Onsite Solar Generation for Residential Energy Hubs. Senemar, S., +, JSYST March 2020 832-841
- Reliability Evaluation and Reliability-Based Optimal Design for Wireless Sensor Networks. *Xiang*, S., +, *JSYST June* 2020 1752-1763
- Residual Energy Maximization in Cognitive Radio Networks With Q-Routing. Paul, A., +, JSYST Sept. 2020 3791-3800
- Resource Allocation in Wireless Networks With Deep Reinforcement Learning: A Circumstance-Independent Approach. *Lee, H.*, +, *JSYST June 2020* 2589-2592
- Resource Optimization Protocol Based on Multicommunity Model for Intermittently Connected Mobile Networks. Wang, T., +, JSYST March 2020 410-421
- Robust Optimization for Energy Efficiency in MIMO Two-Way Relay Networks With SWIPT. Li, Q., +, JSYST March 2020 196-207
- Robust Optimization-Based Energy Storage Operation for System Congestion Management. Yan, X., +, JSYST June 2020 2694-2702
- Robust Power System State Estimation Using *t*-Distribution Noise Model. *Chen, T., +, JSYST March 2020 771-781*
- Security--Reliability Tradeoff for Untrusted and Selfish Relay-Assisted D2D Communications in Heterogeneous Cellular Networks for IoT. *Zhang, C.*, +, *JSYST June 2020 2192-2201*
- SimProxy Decision Support System: A Neural Network Proxy Applied to Reservoir and Surface Integrated Optimization. *Kohler, M.*, +, *JSYST Dec.* 2020 5111-5120
- Smart Parking System Based on Bluetooth Low Energy Beacons With Particle Filtering. *Mackey, A.*, +, *JSYST Sept. 2020 3371-3382*
- Spectrum Optimization for Satellite Communication Systems With Heterogeneous User Preferences. Li, F., +, JSYST June 2020 2187-2191
- Throughput Maximization for Cognitive Radio With Wirelessly Powered Primary Users. Sun, M., +, JSYST June 2020 2432-2442
- Toward a More Reliable System for Contingency Selection in Static Security Analysis of Electric Power Systems. da Silva, J.M., +, JSYST March 2020 1183-1194
- Toward a Theory of Systems Engineering Processes: A Principal–Agent Model of a One-Shot, Shallow Process. Safarkhani, S., +, JSYST Sept. 2020 3277-3288
- Toward Energy-Oriented Optimization for Green Communication in Sensor Enabled IoT Environments. *Kumar, S.*, +, *JSYST Dec. 2020 4663-4673*
- Voltage Stability Constrained OPF in Multi-Micro-Grid Considering Demand Response Programs. *Nojavan, M.*, +, *JSYST Dec. 2020 5221-5228*WmA-MiFN: A Weighted Majority and Auction Game Rosed Green Ultra-
- WmA-MiFN: A Weighted Majority and Auction Game Based Green Ultra-Dense Micro-Femtocell Network System. *Mukherjee*, A., +, *JSYST March* 2020 353-362

Orbits

Expectation and SAA Models and Algorithms for Scheduling of Multiple Earth Observation Satellites Under the Impact of Clouds. *Wang, J.*, +, *JSYST Dec. 2020 5451-5462*

Organizational aspects

An Agent-Based Model of Miscommunication in Complex System Engineering Organizations. *Meluso, J.*, +, *JSYST Sept. 2020 3463-3474*

Organizations

Systems Engineers' Effectiveness in an Organization: Text and Visual Analytics Approach. Zavala, A., +, JSYST Dec. 2020 5049-5060

Oscillations

- A New MIMO ORC Architecture for Power Oscillation Damping Using Remote Feedback Signals Under Intermittent Observations. *Yogarathinam, A.*, +, *JSYST March 2020 939-949*
- Mitigation of Power and Frequency Instability to Improve Load Sharing Among Distributed Inverters in Microgrid Systems. *Firdaus, A.*, +, *JSYST March 2020 1024-1033*

Outsourcing

Improving Security and Privacy Attribute Based Data Sharing in Cloud Computing. Zhang, L., +, JSYST March 2020 387-397

Overcurrent protection

- Allocation of Renewables, Switches, and Relays Considering Relays Actual Operation Time. *Fatemi, S.S.*, +, *JSYST March 2020 950-959*
- Highly Accurate Directional Overcurrent Coordination via Combination of Rosen's Gradient Projection—Complex Method With GA-PSO Algorithm. Darabi, A., +, JSYST March 2020 1171-1182
- Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. Manohar, M., +, JSYST Sept. 2020 3430-3439

P

Parallel algorithms

Creating Power System Network Layouts: A Fast Parallel Algorithm. *Olauson*, J., +, JSYST Sept. 2020 3687-3694

Parallel processing

An Adaptive Grid Frequency Support Mechanism for Energy Management in Cloud Data Centers. *Kaur*, K., +, *JSYST March* 2020 1195-1205

Parameter estimation

Application of the Mixture of Lognormal Distribution to Represent the First-Order Statistics of Wireless Channels. *Das, S.,* +, *JSYST Sept. 2020* 4394-4401

Pareto optimization

- A Variable Neighborhood Search-Based Hybrid Multiobjective Evolutionary Algorithm for HazMat Heterogeneous Vehicle Routing Problem With Time Windows. *Jiang, P.*, +, *JSYST Sept. 2020 4344-4355*
- Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur, R.*, +, *JSYST March 2020 729-737*
- Energy Efficiency Versus Reliability Tradeoff Improvement in Low-Power Wireless Communications. Zogovic, N., JSYST Sept. 2020 3173-3184
- Increment-Exchange-Based Decentralized Multiobjective Optimal Power Flow for Active Distribution Grids. *Lu, W.*, +, *JSYST Sept. 2020 3695-3704* Weight Induced Norm Approach to Group Decision Making for Multiobjective Optimization Problems in Systems Engineering. *Chiu, W.*, +, *JSYST June 2020 1580-1591*

Parity check codes

Mitigation Techniques for Impulsive Noise With Memory Modeled by a Two State Markov-Gaussian Process. *Alam, M.S.*, +, *JSYST Sept. 2020* 4079-4088

Particle filtering (numerical methods)

- FreeTrack: Device-Free Human Tracking With Deep Neural Networks and Particle Filtering. Zhou, R., +, JSYST June 2020 2990-3000
- RBPF-MSIS: Toward Rao-Blackwellized Particle Filter SLAM for Autonomous Underwater Vehicle With Slow Mechanical Scanning Imaging Sonar. Chen, L., +, JSYST Sept. 2020 3301-3312
- Smart Parking System Based on Bluetooth Low Energy Beacons With Particle Filtering. Mackey, A., +, JSYST Sept. 2020 3371-3382
- System Integration of Sensor-Fusion Localization Tasks Using Vision-Based Driving Lane Detection and Road-Marker Recognition. *Lin, C.*, +, *JSYST Sept. 2020 4523-4534*

Particle swarm optimization

- A Hybrid Photovoltaic-Fuel Cell-Based Single-Stage Grid Integration With Lyapunov Control Scheme. *Priyadarshi*, N., +, *JSYST Sept.* 2020 3334-3342
- A New Combinatory Approach for Wind Power Forecasting. *Abedinia, O.*, +, *JSYST Sept. 2020 4614-4625*
- An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, N., +, *JSYST March 2020 1218-1229*
- Determining Impact of Lightning Strike Location on Failures in Transmission Network Elements Using Fuzzy Decision-Making. *Petrovic, I.*, +, *JSYST June 2020 2665-2675*
- Highly Accurate Directional Overcurrent Coordination via Combination of Rosen's Gradient Projection—Complex Method With GA-PSO Algorithm. Darabi, A., +, JSYST March 2020 1171-1182
- Multiobjective Multiscenario Under-Frequency Load Shedding in a Standalone Power System. *Hong, Y., +, JSYST June 2020 2759-2769*
- Optimized Fuzzy Logic-Based Fire Monitoring in Underground Coal Mines: Binary Particle Swarm Optimization Approach. *Muduli, L.*, +, *JSYST June* 2020 3039-3046
- System Architecture for Real-Time Surface Inspection Using Multiple UAVs. *Hoang, V.T.*, +, *JSYST June 2020 2925-2936*

Passive optical networks

Cost-Effective Migration Toward Virtualized C-RAN With Scalable Fronthaul Design. *Masoudi*, M., +, *JSYST Dec. 2020 5100-5110*

Path planning

- A Periodic Multinode Charging and Data Collection Scheme With Optimal Traveling Path in WRSNs. Lyu, Z., +, JSYST Sept. 2020 3518-3529
- Cooperative Dynamic Fuzzy Perimeter Surveillance: Modeling and Fluid-Based Framework. Wu, J., +, JSYST Dec. 2020 5210-5220
- Information-Based Hierarchical Planning for a Mobile Sensing Network in Environmental Mapping. *Li*, *T*., +, *JSYST June 2020 1692-1703*
- Navigation of Scalar Fronts With Multirobot Clusters in Simulation and Experiment. *McDonald, R.T.*, +, *JSYST Sept. 2020 3755-3766*

Patient rehabilitation

Simultaneous Heterogeneous Sensor Localization, Joint Tracking, and Upper Extremity Modeling for Stroke Rehabilitation. *Chen, J.*, +, *JSYST Sept. 2020 3570-3581*

Pattern classification

- A Pipeline Leak Classification and Location Estimation System With Convolutional Neural Networks. Cai, Y., +, JSYST Sept. 2020 3072-3081
- An Intelligent Detection of High-Impedance Faults for Distribution Lines Integrated With Distributed Generators. *Chaitanya, B.K.*, +, *JSYST March* 2020 870-879
- Birds of a Feature: Intrafamily Clustering for Version Identification of Packed Malware. Park, L.H., +, JSYST Sept. 2020 4545-4556
- Classification Methods Applied to Credit Scoring With Collateral. *Teles, G.*, +, *JSYST Sept. 2020 4557-4566*
- Development of an Ensemble Decision Tree-Based Power System Dynamic Security State Predictor. Mukherjee, R., +, JSYST Sept. 2020 3836-3843
- E-WACGAN: Enhanced Generative Model of Signaling Data Based on WGAN-GP and ACGAN. Jin, Q., +, JSYST Sept. 2020 3289-3300
- Importance Sampling Using Multilabel Radial Basis Classification for Composite Power System Reliability Evaluation. *Urgun*, D., +, *JSYST June* 2020 2791-2800

Pattern clustering

- A Robust Coordinated Expansion Planning Model For Wind Farm-Integrated Power Systems With Flexibility Sources Using Affine Policies. Dehghan, S., +, JSYST Sept. 2020 4110-4118
- A Robust Synchronization-Based Chaotic Secure Communication Scheme With Double-Layered and Multiple Hybrid Networks. *Zhou, L.*, +, *JSYST June 2020 2508-2519*
- A Temporal Recommendation Mechanism Based on Signed Network of User Interest Changes. *Chen, J.*, +, *JSYST March 2020 244-252*
- Birds of a Feature: Intrafamily Clustering for Version Identification of Packed Malware. Park, L.H., +, JSYST Sept. 2020 4545-4556
- Consensus and Clustering of Expressed and Private Opinions in Dynamical Networks Against Attacks. Shang, Y., JSYST June 2020 2078-2084

- Cooperative Communication and Energy-Harvesting-Enabled Energy-Efficient Design of MI-Based Clustered Nonconventional WSNs. *Prasanna*, A.L., +, JSYST June 2020 2293-2302
- Energy-Efficient Design of MI Communication-Based 3-D Non-Conventional WSNs. *Yadav*, S., +, *JSYST June 2020 2585-2588*
- New Clustering Algorithms for Twitter Sentiment Analysis. *Rehioui, H.*, +, JSYST March 2020 530-537
- Robust Power Control for Clustering-Based Vehicle-to-Vehicle Communication. Liu, Z., +, JSYST June 2020 2557-2568
- Securing Untrusted Full-Duplex Relay Channels in the Presence of Multiple External Cluster-Based Eavesdroppers. *Mabrouk, A.*, +, *JSYST March* 2020 665-668
- The Allocation and Reuse Scheme of Physical Cell Identifications Based on Maximum Degree First Coloring Algorithm. *Liu, M.*, +, *JSYST March* 2020 582-591

Pattern matching

VTracer: When Online Vehicle Trajectory Compression Meets Mobile Edge Computing. Chen, C., +, JSYST June 2020 1635-1646

PD control

Robust Voltage Control in Inverter-Interfaced Microgrids Under Plug-and-Play Functionalities. Zarei, A., +, JSYST June 2020 2813-2824

Peer-to-peer computing

Fuzzy-Based 3-D Stream Traffic Lightweighting Over Mobile P2P Network. Zhang, C., +, JSYST June 2020 1840-1851

Performance evaluation

Performance Analysis of Priority-Based Access Class Barring Scheme for Massive MTC Random Access. Sim, Y., +, JSYST Dec. 2020 5245-5252

Permanent magnet generators

Systematized Active Power Control of PMSG-Based Wind-Driven Generators. Ramachandran, V., +, JSYST March 2020 708-717

Personal area networks

A Software-Defined Management System for IP-Enabled WSNs. *Jura-do-Lasso*, F.F., +, *JSYST June 2020 2335-2346*

Petri net

- Modeling and Decision-Making Methods for a Class of Cyber–Physical Systems Based on Modified Hybrid Stochastic Timed Petri Net. *Cao, R.*, +, *JSYST Dec. 2020 4684-4693*
- PN Inference Based Autonomous Sequential Restoration of Distribution System Under Natural Disaster. Sandhya, K., +, JSYST Dec. 2020 5160-5171

Phase estimation

An Online Bearing Fault Diagnosis Technique via Improved Demodulation Spectrum Analysis Under Variable Speed Conditions. *Liu, D.*, +, *JSYST June 2020 2323-2334*

Phase modulation

Expanded Multiband Super-Nyquist CAP Modulation for Highly Bandlimited Organic Visible Light Communications. *Chvojka, P.*, +, *JSYST June* 2020 2544-2550

Phase shift keying

Performance of Wireless Powered DF Relay System Under Nakagami-mFading: Relay Assists Energy-Constrained Source. *Kumar, P.*, +, *JSYST June* 2020 2497-2507

Phase shifters

RF Chain Reduction for MIMO Systems: A Hardware Prototype. *Gong, T.*, +, *JSYST Dec.* 2020 5296-5307

Phasor measurement

- A PMU-Based Data-Driven Approach for Classifying Power System Events Considering Cyberattacks. Ma, R., +, JSYST Sept. 2020 3558-3569
- An Algorithm for Detection of Fault, Islanding, and Power Swings in DG-Equipped Radial Distribution Networks. *Ebrahim, M.A.*, +, *JSYST Sept. 2020 3893-3903*
- Cyber-Attack Resilient Design of Wide-Area PSS Considering Practical Communication Constraints. *Prakash*, T., +, *JSYST June* 2020 2012-2022
- Local Measurements-Based Backup Protection for DC Microgrids Using Sequential Analyzing Technique. *Meghwani*, A., +, *JSYST March 2020* 1159-1170

Measurement Errors and Delays on Wide-Area Control Based on IEEE Std C37.118.1-2011: Impact and Compensation. *Zacharia*, *L.*, +, *JSYST March* 2020 422-432

PMU-Assisted Zone-3 Protection Scheme for PV Integrated Power Systems Immune to Interharmonics. Prakash, T., +, JSYST Sept. 2020 3267-3276

PMUs Enabled Tellegen's Theorem-Based Fault Identification Method for Unbalanced Active Distribution Network Using RTDS. *Bansal, Y.*, +, *JSYST Sept. 2020 4567-4578*

Phasor measurement units

Development and Validation of Artificial Neural Network-Based Tools for Forecasting of Power System Inertia With Wind Farms Penetration. *Paidi, E.S.N.R.*, +, *JSYST Dec. 2020 4978-4989*

PMU Placement for Measurement Redundancy Distribution Considering Zero Injection Bus and Contingencies. *Chen, X.*, +, *JSYST Dec. 2020 5396-5406*

Photovoltaic cells

Optimal Control Methods for Photovoltaic Enabled Grid With Abnormal Power Loads. Yang, Y., +, JSYST March 2020 852-861

Photovoltaic power systems

A Hybrid Photovoltaic-Fuel Cell-Based Single-Stage Grid Integration With Lyapunov Control Scheme. *Priyadarshi*, N., +, *JSYST Sept. 2020 3334-3342*

A Mixed Integer Nonlinear Program Based Power Load Estimator for Distribution Grid. Yang, Y., +, JSYST March 2020 842-851

An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, *N.*, +, *JSYST March* 2020 1218-1229

Combined Impact of Network Reconfiguration and Volt-VAR Control Devices on Energy Savings in the Presence of Distributed Generation. Pamshetti, V.B., +, JSYST March 2020 995-1006

Decentralized Output-Feedback-Based Robust LQR V-f Controller for PV-Battery Microgrid Including Generation Uncertainties. Sen, S., +, JSYST Sept. 2020 4418-4429

Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur*, R., +, *JSYST March* 2020 729-737

Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator. *Kumar*; V.N., +, JSYST Sept. 2020 4308-4319

Model Predictive Control via PV-Based VAR Scheme for Power Distribution Systems With Regular and Unexpected Abnormal Loads. *Yang, Y.*, +, *JSYST March 2020 689-698*

Model Predictive for Reactive Power Scheduling Control Strategy for PV—Battery Hybrid System in Competitive Energy Market. *Lupangu, C.*, +, *JSYST Sept. 2020 4071-4078*

Multilevel Inverter (MLI)-Based Stand-Alone Photovoltaic System: Modeling, Analysis, and Control. Kumar, N., +, JSYST March 2020 909-915

Optimal Control Methods for Photovoltaic Enabled Grid With Abnormal Power Loads. Yang, Y., +, JSYST March 2020 852-861

Optimal Scheduling of EV Charging at a Solar Power-Based Charging Station. Kabir, M.E., +, JSYST Sept. 2020 4221-4231

Optimal Voltage Control in Distribution Systems With Intermittent PV Using Multiobjective Grey-Wolf-Lévy Optimizer. *Mahmoud, K.*, +, *JSYST March* 2020 760-770

PMU-Assisted Zone-3 Protection Scheme for PV Integrated Power Systems Immune to Interharmonics. Prakash, T., +, JSYST Sept. 2020 3267-3276

Probabilistic Optimal Dynamic Planning of Onsite Solar Generation for Residential Energy Hubs. Senemar, S., +, JSYST March 2020 832-841

PV Distributed-MPP Tracking: Total-Cross-Tied Configuration of String-Integrated-Converters to Extract the Maximum Power Under Various PSCs. Pendem, S.R., +, JSYST March 2020 1046-1057

Simplified Modeling and HIL Validation of Solar PVs and Storage-Based Islanded Microgrid With Generation Uncertainties. Sen, S., +, JSYST June 2020 2653-2664

Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. Manohar, M., +, JSYST Sept. 2020 3430-3439

Physical layer

PLC Systems Under the Presence of a Malicious Wireless Communication Device: Physical Layer Security Analyses. *Camponogara*, A., +, *JSYST Dec.* 2020 4901-4910

PI control

Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator. *Kumar*; V.N., +, JSYST Sept. 2020 4308-4319

Robust Nonlinear State Feedback Control of Bidirectional Interlink Power Converters in Grid-Connected Hybrid Microgrids. *Zolfaghari, M.*, +, *JSYST March 2020 1117-1124*

Picocellular radio

Association, Blockage, and Handoffs in IEEE 802.11ad-Based 60-GHz Picocells—A Closer Look. *Joshi, K.C.*, +, *JSYST June 2020 2144-2153*

Pipelines

A Pipeline Leak Classification and Location Estimation System With Convolutional Neural Networks. Cai, Y., +, JSYST Sept. 2020 3072-3081

Pipes

A Pipeline Leak Classification and Location Estimation System With Convolutional Neural Networks. Cai, Y., +, JSYST Sept. 2020 3072-3081

An MINLP-Based Approach for the Design-for-Control of Resilient Water Supply Systems. *Ulusoy, A.*, +, *JSYST Sept. 2020 4579-4590*

Planning (artificial intelligence)

Online Planning for Multiagent Situational Information Gathering in the Markov Environment. Zhou, X., +, JSYST June 2020 1798-1809

Poles and towers

An Integrated Preventive Operation Framework for Power Systems During Hurricanes. Sang, Y., +, JSYST Sept. 2020 3245-3255

Polynomials

Polynomial Chaos Expansion for Parametric Problems in Engineering Systems: A Review. Shen, D., +, JSYST Sept. 2020 4500-4514

Uplink Low-Power Scheduling for Delay-Bounded Industrial Wireless Networks Based on Imperfect Power-Domain NOMA. *Xu, C.*, +, *JSYST June* 2020 2443-2454

Portable instruments

MiND: Mind Networked Device Architecture for Attention-Gated Ambient Assisted Living Systems. Mukherjee, A., +, JSYST March 2020 1325-1332

Pose estimation

RBPF-MSIS: Toward Rao-Blackwellized Particle Filter SLAM for Autonomous Underwater Vehicle With Slow Mechanical Scanning Imaging Sonar. Chen, L., +, JSYST Sept. 2020 3301-3312

Position control

Formation Obstacle Avoidance: A Fluid-Based Solution. Wu, J., +, JSYST March 2020 1479-1490

Local Controllability, Trajectory Planning, and Stabilization of a Two-Agent Underactuated Microrobotic System. Fruchard, M., +, JSYST June 2020 2892-2900

Neuroadaptive Sliding Mode Formation Control of Autonomous Underwater Vehicles With Uncertain Dynamics. Wang, J., +, JSYST Sept. 2020 3325-3333

Position sensitive particle detectors

A Safety System for Human Radiation Protection and Guidance in Extreme Environmental Conditions. *Adamidi, E.S.*, +, *JSYST March 2020 1384-1394*

Power aware computing

Bio-Inspired Heuristics for VM Consolidation in Cloud Data Centers. Wang, J.V., +, JSYST March 2020 152-163

Power cables

Cable Connection Optimization for Onshore Wind Farms Considering Restricted Area and Topography. Li, J., +, JSYST Sept. 2020 3082-3092

Modeling and Vulnerability Analysis of Cyber-Physical Power Systems Based on Community Theory. Pan, H., +, JSYST Sept. 2020 3938-3948

PLC Systems Under the Presence of a Malicious Wireless Communication Device: Physical Layer Security Analyses. *Camponogara*, A., +, *JSYST Dec.* 2020 4901-4910

Power capacitors

A Coordinated Real-Time Voltage Control Approach for Increasing the Penetration of Distributed Generation. *Othman, M.M.*, +, *JSYST March 2020 699-707*

- Combined Impact of Network Reconfiguration and Volt-VAR Control Devices on Energy Savings in the Presence of Distributed Generation. Pamshetti, V.B., +, JSYST March 2020 995-1006
- Control of Parallel ULTC Transformers in Active Distribution Systems. *Pouladi. A.*, +, *JSYST March 2020 960-970*
- Improvement in Recloser–Fuse Coordination Technique Based on Modification Factor. Makwana, Y.M., +, JSYST June 2020 2770-2779
- Moth Search Optimization for Optimal DERs Integration in Conjunction to OLTC Tap Operations in Distribution Systems. Singh, P., +, JSYST March 2020 880-888

Power consumption

- An Elliptic Curve-Based Scalable Data Aggregation Scheme for Smart Grid. Chen, Y., +, JSYST June 2020 2066-2077
- Energy-Efficient Adaptive Sectorization for 5G Green Wireless Communication Systems. *Jain, P., +, JSYST June 2020 2382-2391*
- Model Predictive Control via PV-Based VAR Scheme for Power Distribution Systems With Regular and Unexpected Abnormal Loads. *Yang, Y.*, +, *JSYST March 2020 689-698*
- Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets. *Oikonomou, K.*, +, *JSYST Sept. 2020* 3729-3739

Power control

- Adaptive Jamming Power Control for Untrusted Relay Networks With Imperfect Channel Reciprocity. Lee, K., +, JSYST Sept. 2020 4217-4220
- Cross PHY/APP Layer User Grouping and Power Allocation for Uplink Multiantenna NOMA Video Communication Systems. *Tseng*, S., +, *JSYST Sept.* 2020 3351-3359
- Outage and ASE Analyses for Power Controlled D2D Communication. Pawar, P., +, JSYST June 2020 2269-2280
- Outage Probability in the Uplink of Multitier Millimeter Wave Cellular Networks. *Onireti*, O., +, *JSYST June* 2020 2520-2531
- Recursive Smooth Variable Structure Filter for Estimation Processes in Direct Power Control Scheme Under Balanced and Unbalanced Power Grid. AlShabi, M., +, JSYST March 2020 971-982
- Robust Power Control for Clustering-Based Vehicle-to-Vehicle Communication. Liu, Z., +, JSYST June 2020 2557-2568

Power conversion

Adaptive Interconnection and Damping Assignment Passivity-Based Control of Interlinking Converter in Hybrid AC/DC Grids. *Azimi, S.M.*, +, *JSYST Dec. 2020 4718-4725*

Power converters

- Comparative Analysis of Communication Assisted Grid Synchronization Methods in Microgrids. S., N., +, JSYST March 2020 1007-1014
- Local Measurements-Based Backup Protection for DC Microgrids Using Sequential Analyzing Technique. *Meghwani*, A., +, *JSYST March 2020* 1159-1170
- Multilevel Inverter (MLI)-Based Stand-Alone Photovoltaic System: Modeling, Analysis, and Control. Kumar, N., +, JSYST March 2020 909-915
- Robust Nonlinear State Feedback Control of Bidirectional Interlink Power Converters in Grid-Connected Hybrid Microgrids. *Zolfaghari, M.*, +, *JSYST March 2020 1117-1124*
- System Design and Realization of a Solar-Powered Electric Vehicle Charging Station. Shariff, S.M., +, JSYST June 2020 2748-2758
- Voltage/Current Large Transient Suppression in DC Microgrids Using Local Information and Active Stabilizing Capability. Azimi, S.M., +, JSYST March 2020 1109-1116

Power demand

- Cost-Effective Migration Toward Virtualized C-RAN With Scalable Fronthaul Design. *Masoudi*, M., +, *JSYST Dec. 2020 5100-5110*
- Energy Efficiency for MISO-OFDMA-Based User-Relay Assisted Cellular Networks. *Basturk, I.*, +, *JSYST Dec. 2020 5274-5283*

Power distribution

A Mixed Integer Nonlinear Program Based Power Load Estimator for Distribution Grid. Yang, Y., +, JSYST March 2020 842-851

Power distribution control

A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926

- Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG. *Gheisarnejad*, M., +, JSYST March 2020 1058-1068
- Combined Impact of Network Reconfiguration and Volt-VAR Control Devices on Energy Savings in the Presence of Distributed Generation. Pamshetti, V.B., +, JSYST March 2020 995-1006
- Control of Parallel ULTC Transformers in Active Distribution Systems. *Pouladi*, A., +, *JSYST March* 2020 960-970
- Efficient and Risk-Aware Control of Electricity Distribution Grids. *Liberati*, F, +, JSYST Sept. 2020 3586-3597
- Fast Resource Scheduling for Distribution Systems Enabled With Discrete Control Devices. *Nouri*, A., +, *JSYST Sept. 2020 3767-3778*
- Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator. *Kumar, V.N.*, +, *JSYST Sept. 2020 4308-4319*
- Improving Microgrid Low-Voltage Ride-Through Capacity Using Neural Control. *Djilali, L., +, JSYST June 2020 2825-2836*
- Optimal Voltage Control in Distribution Systems With Intermittent PV Using Multiobjective Grey-Wolf-Lévy Optimizer. *Mahmoud, K.*, +, *JSYST March* 2020 760-770
- Two-Mode Adaptive Schemes for VAR Control With Solar Power and Energy Storage. *Doan, S., +, JSYST March 2020 889-899*

Power distribution economics

- A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926
- Control of Parallel ULTC Transformers in Active Distribution Systems. *Pouladi*, A., +, *JSYST March* 2020 960-970
- Efficient and Risk-Aware Control of Electricity Distribution Grids. *Liberati*, F., +, JSYST Sept. 2020 3586-3597
- Increment-Exchange-Based Decentralized Multiobjective Optimal Power Flow for Active Distribution Grids. *Lu, W.*, +, *JSYST Sept. 2020 3695-3704* Risk-Based Probabilistic Quantification of Power Distribution System Operational Resilience. *Poudel, S.*, +, *JSYST Sept. 2020 3506-3517*

Power distribution faults

- A Cyber-Physical Cooperative Hierarchical Control Strategy for Islanded Microgrid Facing With Random Communication Failure. *Zhang, B.*, +, *JSYST June 2020 2849-2860*
- A Novel Control Method Based on Droop for Cooperation of Flywheel and Battery Energy Storage Systems in Islanded Microgrids. *Khodadoost Arani, A.A.*, +, *JSYST March 2020 1080-1087*
- A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926
- Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG. *Gheisarnejad*, M., +, JSYST March 2020 1058-1068
- Allocation of Renewables, Switches, and Relays Considering Relays Actual Operation Time. Fatemi, S.S., +, JSYST March 2020 950-959
- An Algorithm for Detection of Fault, Islanding, and Power Swings in DG-Equipped Radial Distribution Networks. *Ebrahim, M.A.*, +, *JSYST Sept. 2020 3893-3903*
- An Intelligent Detection of High-Impedance Faults for Distribution Lines Integrated With Distributed Generators. *Chaitanya, B.K.*, +, *JSYST March* 2020 870-879
- Combined Impact of Network Reconfiguration and Volt-VAR Control Devices on Energy Savings in the Presence of Distributed Generation. Pamshetti, V.B., +, JSYST March 2020 995-1006
- Detection and Experimental Validation of High Impedance Arc Fault in Distribution System Using Empirical Mode Decomposition. *Lala, H.*, +, *JSYST Sept. 2020 3494-3505*
- Islanding Detection of Distributed Generation Based on Parallel Inductive Impedance Switching. *Rostami, A.*, +, *JSYST March 2020 813-823*
- Novel Change Detection and Fault Classification Scheme for AC Microgrids. *Jarrahi*, M.A., +, *JSYST Sept.* 2020 3987-3998
- PMUs Enabled Tellegen's Theorem-Based Fault Identification Method for Unbalanced Active Distribution Network Using RTDS. *Bansal, Y.*, +, *JSYST Sept. 2020 4567-4578*

Simplified Modeling and HIL Validation of Solar PVs and Storage-Based Islanded Microgrid With Generation Uncertainties. Sen, S., +, JSYST June 2020 2653-2664

Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. Manohar, M., +, JSYST Sept. 2020 3430-3439

Power distribution lines

An Intelligent Detection of High-Impedance Faults for Distribution Lines Integrated With Distributed Generators. *Chaitanya, B.K.*, +, *JSYST March* 2020 870-879

Model Predictive Control via PV-Based VAR Scheme for Power Distribution Systems With Regular and Unexpected Abnormal Loads. *Yang. Y.*, +, *JSYST March 2020 689-698*

Power distribution planning

A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926

Risk-Based Probabilistic Quantification of Power Distribution System Operational Resilience. *Poudel, S.*, +, *JSYST Sept. 2020 3506-3517*

Power distribution protection

Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. Manohar, M., +, JSYST Sept. 2020 3430-3439

Power distribution reliability

- A New Model for Reconfiguration and Distributed Generation Allocation in Distribution Network Considering Power Quality Indices and Network Losses. *Moghaddam, M.J.H.*, +, *JSYST Sept. 2020 3530-3538*
- A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926
- An Algorithm for Detection of Fault, Islanding, and Power Swings in DG-Equipped Radial Distribution Networks. *Ebrahim, M.A.*, +, *JSYST Sept. 2020 3893-3903*
- An Integrated Preventive Operation Framework for Power Systems During Hurricanes. Sang, Y., +, JSYST Sept. 2020 3245-3255
- Detection and Experimental Validation of High Impedance Arc Fault in Distribution System Using Empirical Mode Decomposition. *Lala, H.*, +, *JSYST Sept. 2020 3494-3505*
- Path-Based Distribution Feeder Reconfiguration for Optimization of Losses and Reliability. *Jose, J.*, +, *JSYST March 2020 1417-1426*
- PMUs Enabled Tellegen's Theorem-Based Fault Identification Method for Unbalanced Active Distribution Network Using RTDS. *Bansal, Y.*, +, *JSYST Sept. 2020 4567-4578*

Power engineering computing

- A Dynamic Membership Data Aggregation (DMDA) Protocol for Smart Grid. Song, J., +, JSYST March 2020 900-908
- A Lightweight Mutual Authentication for Smart Grid Neighborhood Area Network Communications Based on Physically Unclonable Function. Kaveh, M., +, JSYST Sept. 2020 4535-4544
- A Multidimensional Holistic Framework for the Security of Distributed Energy and Control Systems. Saleem, D., +, JSYST March 2020 17-27
- A New Combinatory Approach for Wind Power Forecasting. *Abedinia, O.*, +, *JSYST Sept. 2020 4614-4625*
- A Novel SCL Configuration Method for Modeling Microgrids With IEC 61850. Aftab, M.A., +, JSYST June 2020 2676-2683
- A PMU-Based Data-Driven Approach for Classifying Power System Events Considering Cyberattacks. Ma, R., +, JSYST Sept. 2020 3558-3569
- A Robust Coordinated Expansion Planning Model For Wind Farm-Integrated Power Systems With Flexibility Sources Using Affine Policies. Dehghan, S., +, JSYST Sept. 2020 4110-4118
- A Smart Optimization of Fault Diagnosis in Electrical Grid Using Distributed Software-Defined IoT System. *Al Mhdawi, A.K.*, +, *JSYST June 2020 2780-2790*
- A Stochastic Model of Cascading Failure Dynamics in Cyber-Physical Power Systems. *Gao*, X., +, *JSYST Sept. 2020 4626-4637*
- An Algorithm for Detection of Fault, Islanding, and Power Swings in DG-Equipped Radial Distribution Networks. *Ebrahim, M.A.*, +, *JSYST Sept. 2020 3893-3903*
- An Efficient Privacy-Friendly Hop-by-Hop Data Aggregation Scheme for Smart Grids. Gope, P., +, JSYST March 2020 343-352

An Elliptic Curve-Based Scalable Data Aggregation Scheme for Smart Grid. Chen, Y., +, JSYST June 2020 2066-2077

- An Intelligent Detection of High-Impedance Faults for Distribution Lines Integrated With Distributed Generators. *Chaitanya, B.K.*, +, *JSYST March* 2020 870-879
- Bidirectional Charging in V2G Systems: An In-Cell Variation Analysis of Vehicle Batteries. *Khalid, H.M.*, +, *JSYST Sept. 2020 3665-3675*
- Computational Tools for Modeling and Analysis of Power Generation and Transmission Systems of the Smart Grid. *Mahmud, K.*, +, *JSYST Sept.* 2020 3641-3652
- Cyber-Attacks in a Looped Energy-Water Nexus: An Inoculated Sub-Observer-Based Approach. *Khalid, H.M.*, +, *JSYST June 2020 2054-2065*
- Detection and Experimental Validation of High Impedance Arc Fault in Distribution System Using Empirical Mode Decomposition. *Lala, H.*, +, *JSYST Sept. 2020 3494-3505*
- Detection and Location of Bias Load Injection Attack in Smart Grid via Robust Adaptive Observer. Wang, X., +, JSYST Sept. 2020 4454-4465
- Determining Impact of Lightning Strike Location on Failures in Transmission Network Elements Using Fuzzy Decision-Making. *Petrovic, I.*, +, *JSYST June 2020 2665-2675*
- Development of an Ensemble Decision Tree-Based Power System Dynamic Security State Predictor. *Mukherjee*, R., +, *JSYST Sept. 2020 3836-3843*
- Fault Detection, Classification, and Location by Static Switch in Microgrids Using Wavelet Transform and Taguchi-Based Artificial Neural Network. Hong, Y., +, JSYST June 2020 2725-2735
- Improved Performance of Flywheel Fast Charging System (FFCS) Using Enhanced Artificial Immune System (EAIS). Gabbar, H.A., +, JSYST March 2020 824-831
- Improving Microgrid Low-Voltage Ride-Through Capacity Using Neural Control. *Djilali, L., +, JSYST June 2020 2825-2836*
- Load Disaggregation Using One-Directional Convolutional Stacked Long Short-Term Memory Recurrent Neural Network. Quek, Y.T., +, JSYST March 2020 1395-1404
- Modeling and Vulnerability Analysis of Cyber-Physical Power Systems Based on Community Theory. Pan, H., +, JSYST Sept. 2020 3938-3948
- Residual Energy Maximization in Cognitive Radio Networks With Q-Routing. Paul, A., +, JSYST Sept. 2020 3791-3800
- Reweighted Compressed Sensing-Based Smart Grids Topology Reconstruction With Application to Identification of Power Line Outage. *Huang, K.*, +, *JSYST Sept. 2020 4329-4339*
- SMS-A Security Management System for Steam Turbines Using a Multisensor Array. *Kordestani*, M., +, JSYST Sept. 2020 3813-3824
- Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. Manohar, M., +, JSYST Sept. 2020 3430-3439

Power factor correction

System Design and Realization of a Solar-Powered Electric Vehicle Charging Station. Shariff, S.M., +, JSYST June 2020 2748-2758

Power generation

- A Practicable Copula-Based Approach for Power Forecasting of Small-Scale Photovoltaic Systems. *Rajabalizadeh*, S., +, JSYST Dec. 2020 4911-4918
- Formal Reliability Analysis of an Integrated Power Generation System Using Theorem Proving. *Ahmad, W.*, +, *JSYST Dec. 2020 4820-4831*
- Voltage Stability Constrained OPF in Multi-Micro-Grid Considering Demand Response Programs. Nojavan, M., +, JSYST Dec. 2020 5221-5228

Power generation control

- A Coordinated Real-Time Voltage Control Approach for Increasing the Penetration of Distributed Generation. *Othman, M.M.*, +, *JSYST March 2020* 699-707
- A Cyber-Physical Cooperative Hierarchical Control Strategy for Islanded Microgrid Facing With Random Communication Failure. *Zhang, B.*, +, *JSYST June 2020 2849-2860*
- A Hybrid Photovoltaic-Fuel Cell-Based Single-Stage Grid Integration With Lyapunov Control Scheme. *Priyadarshi, N.*, +, *JSYST Sept. 2020 3334-3342*

- A New MIMO ORC Architecture for Power Oscillation Damping Using Remote Feedback Signals Under Intermittent Observations. *Yogarathinam, A.*, +, *JSYST March 2020 939-949*
- A Novel Control Method Based on Droop for Cooperation of Flywheel and Battery Energy Storage Systems in Islanded Microgrids. *Khodadoost Arani*, A.A., +, JSYST March 2020 1080-1087
- A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926
- Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG. *Gheisarnejad*, M., +, JSYST March 2020 1058-1068
- An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, N., +, *JSYST March* 2020 1218-1229
- Application of Bang–Bang Controller to Emulate Primary Frequency Response in DFIGs. *Toulabi*, M., +, *JSYST June 2020 2615-2623*
- Combined Impact of Network Reconfiguration and Volt-VAR Control Devices on Energy Savings in the Presence of Distributed Generation. Pamshetti, V.B., +, JSYST March 2020 995-1006
- Comparative Analysis of Communication Assisted Grid Synchronization Methods in Microgrids. S., N., +, JSYST March 2020 1007-1014
- Control of Parallel ULTC Transformers in Active Distribution Systems. Pouladi, A., +, JSYST March 2020 960-970
- Decentralized Output-Feedback-Based Robust LQR V-f Controller for PV-Battery Microgrid Including Generation Uncertainties. Sen, S., +, JSYST Sept. 2020 4418-4429
- Detection and Mitigation of Cyber-Attacks on AGC Systems of Low Inertia Power Grid. Roy, S.D., +, JSYST June 2020 2023-2031
- Distributed Hierarchical Control for Optimal Power Dispatch in Multiple DC Microgrids. *Babazadeh-Dizaji*, R., +, *JSYST March* 2020 1015-1023
- Fast Resource Scheduling for Distribution Systems Enabled With Discrete Control Devices. *Nouri*, A., +, *JSYST Sept.* 2020 3767-3778
- Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator. *Kumar*; V.N., +, JSYST Sept. 2020 4308-4319
- Improving Microgrid Low-Voltage Ride-Through Capacity Using Neural Control. *Djilali, L., +, JSYST June 2020 2825-2836*
- Intrusion-Detector-Dependent Frequency Regulation for Microgrids Under Denial-of-Service Attacks. *Liu*, S., +, *JSYST June 2020 2593-2596*
- Mitigation of Power and Frequency Instability to Improve Load Sharing Among Distributed Inverters in Microgrid Systems. Firdaus, A., +, JSYST March 2020 1024-1033
- Model Predictive for Reactive Power Scheduling Control Strategy for PV—Battery Hybrid System in Competitive Energy Market. *Lupangu, C.*, +, *JSYST Sept. 2020 4071-4078*
- Multilevel Inverter (MLI)-Based Stand-Alone Photovoltaic System: Modeling, Analysis, and Control. Kumar, N., +, JSYST March 2020 909-915
- Optimal Control Methods for Photovoltaic Enabled Grid With Abnormal Power Loads. Yang, Y., +, JSYST March 2020 852-861
- Optimal Voltage Control in Distribution Systems With Intermittent PV Using Multiobjective Grey-Wolf-Lévy Optimizer. *Mahmoud, K.*, +, *JSYST March* 2020 760-770
- Power Output Smoothing for Renewable Energy System: Planning, Algorithms, and Analysis. Chen, X., +, JSYST March 2020 1034-1045
- PV Distributed-MPP Tracking: Total-Cross-Tied Configuration of String-Integrated-Converters to Extract the Maximum Power Under Various PSCs. *Pendem, S.R.*, +, *JSYST March 2020 1046-1057*
- Systematized Active Power Control of PMSG-Based Wind-Driven Generators. Ramachandran, V., +, JSYST March 2020 708-717

Power generation dispatch

- A Novel Hybrid Framework for Co-Optimization of Power and Natural Gas Networks Integrated With Emerging Technologies. *Mirzaei, M.A.*, +, *JSYST Sept. 2020 3598-3608*
- A Two-Stage Mathematical Programming Approach for the Solution of Combined Heat and Power Economic Dispatch. *Moradi-Dalvand, M.*, +, *JSYST June 2020 2873-2881*

- An Integrated Preventive Operation Framework for Power Systems During Hurricanes. Sang, Y., +, JSYST Sept. 2020 3245-3255
- An Optimal Multivariable Constrained Nonlinear (MVCNL) Stochastic Microgrid Planning and Operation Problem With Renewable Penetration. Kumar, M., +, JSYST Sept. 2020 4143-4154
- Distributed Hierarchical Control for Optimal Power Dispatch in Multiple DC Microgrids. *Babazadeh-Dizaji*, R., +, *JSYST March* 2020 1015-1023
- Dynamic Uncertainty Set Characterization for Bulk Power Grid Flexibility Assessment. *Pourahmadi, F., +, JSYST March 2020 718-728*
- Modeling and Vulnerability Analysis of Cyber-Physical Power Systems Based on Community Theory. Pan, H., +, JSYST Sept. 2020 3938-3948
- Modified Power Reserve Management Solution in Power System Considering Frequency Constraints. *Hosseini*, S.A., +, JSYST March 2020 1125-1134
- Moth Search Optimization for Optimal DERs Integration in Conjunction to OLTC Tap Operations in Distribution Systems. Singh, P., +, JSYST March 2020 880-888
- Multiobjective Optimization Technique for Mitigating Unbalance and Improving Voltage Considering Higher Penetration of Electric Vehicles and Distributed Generation. *Islam, M.R.*, +, *JSYST Sept. 2020 3676-3686*

Power generation economics

- A Coordinated Real-Time Voltage Control Approach for Increasing the Penetration of Distributed Generation. *Othman, M.M.*, +, *JSYST March 2020 699-707*
- A Novel Hybrid Framework for Co-Optimization of Power and Natural Gas Networks Integrated With Emerging Technologies. *Mirzaei, M.A.*, +, *JSYST Sept. 2020 3598-3608*
- A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926
- A Robust Coordinated Expansion Planning Model For Wind Farm-Integrated Power Systems With Flexibility Sources Using Affine Policies. Dehghan, S., +, JSYST Sept. 2020 4110-4118
- A Two-Stage Mathematical Programming Approach for the Solution of Combined Heat and Power Economic Dispatch. *Moradi-Dalvand, M.*, +, *JSYST June 2020 2873-2881*
- An Optimal Multivariable Constrained Nonlinear (MVCNL) Stochastic Microgrid Planning and Operation Problem With Renewable Penetration. Kumar, M., +, JSYST Sept. 2020 4143-4154
- Cable Connection Optimization for Onshore Wind Farms Considering Restricted Area and Topography. Li, J., +, JSYST Sept. 2020 3082-3092
- Control of Parallel ULTC Transformers in Active Distribution Systems. *Pouladi, A.*, +, *JSYST March 2020 960-970*
- Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur*; R., +, *JSYST March 2020 729-737*
- Distributed Hierarchical Control for Optimal Power Dispatch in Multiple DC Microgrids. *Babazadeh-Dizaji*, R., +, *JSYST March* 2020 1015-1023
- Dynamic Uncertainty Set Characterization for Bulk Power Grid Flexibility Assessment. *Pourahmadi, F.*, +, *JSYST March 2020 718-728*
- Equilibrium Analysis of Electricity Market With Demand Response Exchange to Counterbalance Bid Deviations of Renewable Generators. *Wang, X.*, +, *JSYST June 2020 2713-2724*
- Increment-Exchange-Based Decentralized Multiobjective Optimal Power Flow for Active Distribution Grids. Lu, W., +, JSYST Sept. 2020 3695-3704
- Modified Power Reserve Management Solution in Power System Considering Frequency Constraints. *Hosseini, S.A.*, +, *JSYST March 2020 1125-1134*
- Optimal CHP Planning in Integrated Energy Systems Considering Network Charges. Wang, H., +, JSYST June 2020 2684-2693
- Optimal Scheduling of EV Charging at a Solar Power-Based Charging Station. Kabir, M.E., +, JSYST Sept. 2020 4221-4231
- Power Output Smoothing for Renewable Energy System: Planning, Algorithms, and Analysis. Chen, X., +, JSYST March 2020 1034-1045
- Probabilistic Optimal Dynamic Planning of Onsite Solar Generation for Residential Energy Hubs. Senemar, S., +, JSYST March 2020 832-841

Power generation faults

- A Cyber-Physical Cooperative Hierarchical Control Strategy for Islanded Microgrid Facing With Random Communication Failure. *Zhang, B.*, +, *JSYST June 2020 2849-2860*
- An Algorithm for Detection of Fault, Islanding, and Power Swings in DG-Equipped Radial Distribution Networks. *Ebrahim, M.A.*, +, *JSYST Sept. 2020 3893-3903*
- An Intelligent Detection of High-Impedance Faults for Distribution Lines Integrated With Distributed Generators. *Chaitanya, B.K.*, +, *JSYST March* 2020 870-879
- Combined Impact of Network Reconfiguration and Volt-VAR Control Devices on Energy Savings in the Presence of Distributed Generation. Pamshetti, V.B., +, JSYST March 2020 995-1006
- Discrete-Wavelet-Transform and Stockwell-Transform-Based Statistical Parameters Estimation for Fault Analysis in Grid-Connected Wind Power System. *Mukherjee*, N., +, *JSYST Sept. 2020 4320-4328*
- Energy Storage Systems Architecture Optimization for Grid Resilience With High Penetration of Distributed Photovoltaic Generation. *Confrey, J.*, +, *JSYST March 2020 1135-1146*
- Fault Detection, Classification, and Location by Static Switch in Microgrids Using Wavelet Transform and Taguchi-Based Artificial Neural Network. Hong, Y., +, JSYST June 2020 2725-2735
- Local Measurements-Based Backup Protection for DC Microgrids Using Sequential Analyzing Technique. *Meghwani*, A., +, *JSYST March 2020* 1159-1170
- PMUs Enabled Tellegen's Theorem-Based Fault Identification Method for Unbalanced Active Distribution Network Using RTDS. *Bansal, Y.*, +, *JSYST Sept. 2020 4567-4578*
- Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. Manohar, M., +, JSYST Sept. 2020 3430-3439

Power generation planning

- A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926
- A Robust Coordinated Expansion Planning Model For Wind Farm-Integrated Power Systems With Flexibility Sources Using Affine Policies. Dehghan, S., +, JSYST Sept. 2020 4110-4118
- Cable Connection Optimization for Onshore Wind Farms Considering Restricted Area and Topography. Li, J., +, JSYST Sept. 2020 3082-3092
- Model Predictive for Reactive Power Scheduling Control Strategy for PV—Battery Hybrid System in Competitive Energy Market. *Lupangu, C.*, +, *JSYST Sept. 2020 4071-4078*
- Optimal CHP Planning in Integrated Energy Systems Considering Network Charges. Wang, H., +, JSYST June 2020 2684-2693
- Optimal Planning and Operational Strategy of a Residential Microgrid With Demand Side Management. Bhamidi, L., +, JSYST June 2020 2624-2632
- Power Output Smoothing for Renewable Energy System: Planning, Algorithms, and Analysis. *Chen, X., +, JSYST March 2020 1034-1045*
- Probabilistic Optimal Dynamic Planning of Onsite Solar Generation for Residential Energy Hubs. Senemar, S., +, JSYST March 2020 832-841
- Probabilistic Study of Undervoltage Load Shedding Scheme to Mitigate the Impact of Protection System Hidden Failures. Pal, D., +, JSYST March 2020 862-869

Power generation protection

- Fault Detection, Classification, and Location by Static Switch in Microgrids Using Wavelet Transform and Taguchi-Based Artificial Neural Network. Hong, Y., +, JSYST June 2020 2725-2735
- PMU-Assisted Zone-3 Protection Scheme for PV Integrated Power Systems Immune to Interharmonics. Prakash, T., +, JSYST Sept. 2020 3267-3276
- Probabilistic Study of Undervoltage Load Shedding Scheme to Mitigate the Impact of Protection System Hidden Failures. *Pal, D.*, +, *JSYST March* 2020 862-869
- Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. Manohar, M., +, JSYST Sept. 2020 3430-3439

Power generation reliability

- A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926
- An Algorithm for Detection of Fault, Islanding, and Power Swings in DG-Equipped Radial Distribution Networks. *Ebrahim, M.A.*, +, *JSYST Sept. 2020 3893-3903*
- An Optimal Multivariable Constrained Nonlinear (MVCNL) Stochastic Microgrid Planning and Operation Problem With Renewable Penetration. Kumar, M., +, JSYST Sept. 2020 4143-4154
- Detection and Mitigation of Cyber-Attacks on AGC Systems of Low Inertia Power Grid. Roy, S.D., +, JSYST June 2020 2023-2031
- Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur, R.*, +, *JSYST March 2020 729-737*
- Improving Microgrid Low-Voltage Ride-Through Capacity Using Neural Control. *Djilali*, L., +, *JSYST June 2020 2825-2836*
- PMUs Enabled Tellegen's Theorem-Based Fault Identification Method for Unbalanced Active Distribution Network Using RTDS. *Bansal, Y.*, +, *JSYST Sept. 2020 4567-4578*
- Power Output Smoothing for Renewable Energy System: Planning, Algorithms, and Analysis. *Chen, X., +, JSYST March 2020 1034-1045*
- Probabilistic Study of Undervoltage Load Shedding Scheme to Mitigate the Impact of Protection System Hidden Failures. *Pal, D., +, JSYST March* 2020 862-869
- Reliability Evaluation in Microgrids With Non-Exponential Failure Rates of Power Units. *Peyghami*, S., +, *JSYST June 2020 2861-2872*

Power generation scheduling

- A Novel Hybrid Framework for Co-Optimization of Power and Natural Gas Networks Integrated With Emerging Technologies. *Mirzaei*, *M.A.*, +, *JSYST Sept. 2020 3598-3608*
- A Two-Stage Mathematical Programming Approach for the Solution of Combined Heat and Power Economic Dispatch. *Moradi-Dalvand, M.*, +, *JSYST June 2020 2873-2881*
- An Integrated Preventive Operation Framework for Power Systems During Hurricanes. Sang, Y., +, JSYST Sept. 2020 3245-3255
- An Optimal Multivariable Constrained Nonlinear (MVCNL) Stochastic Microgrid Planning and Operation Problem With Renewable Penetration. Kumar, M., +, JSYST Sept. 2020 4143-4154
- Fast Resource Scheduling for Distribution Systems Enabled With Discrete Control Devices. *Nouri*, A., +, *JSYST Sept. 2020 3767-3778*
- Model Predictive for Reactive Power Scheduling Control Strategy for PV—Battery Hybrid System in Competitive Energy Market. *Lupangu, C.*, +, *JSYST Sept. 2020 4071-4078*
- Optimal Charge/Discharge Scheduling of Battery Storage Interconnected With Residential PV System. *Kapoor, A., +, JSYST Sept. 2020 3825-3835*
- Optimal Scheduling of EV Charging at a Solar Power-Based Charging Station. Kabir, M.E., +, JSYST Sept. 2020 4221-4231
- Priority-Based Scheduling of Energy Exchanges Between Cooperative Microgrids in Risk-Averse Environment. *Lahon, R.*, +, *JSYST March 2020* 1098-1108

Power grids

- A Hybrid Photovoltaic-Fuel Cell-Based Single-Stage Grid Integration With Lyapunov Control Scheme. *Priyadarshi*, *N.*, +, *JSYST Sept. 2020 3334-3342*
- A Mixed Integer Nonlinear Program Based Power Load Estimator for Distribution Grid. *Yang*, Y, +, *JSYST March 2020 842-851*
- A New Model for Reconfiguration and Distributed Generation Allocation in Distribution Network Considering Power Quality Indices and Network Losses. *Moghaddam, M.J.H.*, +, *JSYST Sept. 2020 3530-3538*
- A Smart Optimization of Fault Diagnosis in Electrical Grid Using Distributed Software-Defined IoT System. *Al Mhdawi, A.K.*, +, *JSYST June 2020 2780-2790*
- A Stochastic Model of Cascading Failure Dynamics in Cyber-Physical Power Systems. *Gao*, X., +, *JSYST Sept. 2020 4626-4637*
- Adaptive Traffic Management and Energy Cooperation in Renewable-Energy-Powered Cellular Networks. Lee, H., +, JSYST March 2020 132-143

- An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, N., +, *JSYST March 2020 1218-1229*
- Application of Bang–Bang Controller to Emulate Primary Frequency Response in DFIGs. *Toulabi*, M., +, *JSYST June 2020 2615-2623*
- Comparative Analysis of Communication Assisted Grid Synchronization Methods in Microgrids. S., N., +, JSYST March 2020 1007-1014
- Cyber-Attack Resilient Design of Wide-Area PSS Considering Practical Communication Constraints. Prakash, T., +, JSYST June 2020 2012-2022
- Detection and Mitigation of Cyber-Attacks on AGC Systems of Low Inertia Power Grid. Roy, S.D., +, JSYST June 2020 2023-2031
- Discrete-Wavelet-Transform and Stockwell-Transform-Based Statistical Parameters Estimation for Fault Analysis in Grid-Connected Wind Power System. *Mukherjee*, N., +, *JSYST Sept. 2020 4320-4328*
- Dynamic Uncertainty Set Characterization for Bulk Power Grid Flexibility Assessment. *Pourahmadi, F., +, JSYST March 2020 718-728*
- Efficient and Risk-Aware Control of Electricity Distribution Grids. *Liberati*, F, +, *JSYST Sept. 2020 3586-3597*
- Energy Storage Systems Architecture Optimization for Grid Resilience With High Penetration of Distributed Photovoltaic Generation. *Confrey, J.*, +, *JSYST March 2020 1135-1146*
- Fuzzy-Observer-Based Predictive Stabilization of DC Microgrids With Power Buffers Through an Imperfect 5G Network. Vafamand, N., +, JSYST Sept. 2020 4025-4035
- Importance Sampling Using Multilabel Radial Basis Classification for Composite Power System Reliability Evaluation. *Urgun*, D., +, *JSYST June* 2020 2791-2800
- Improved Performance of Flywheel Fast Charging System (FFCS) Using Enhanced Artificial Immune System (EAIS). Gabbar, H.A., +, JSYST March 2020 824-831
- Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator. *Kumar*; V.N., +, JSYST Sept. 2020 4308-4319
- Improving Microgrid Low-Voltage Ride-Through Capacity Using Neural Control. *Djilali, L.*, +, *JSYST June 2020 2825-2836*
- Increment-Exchange-Based Decentralized Multiobjective Optimal Power Flow for Active Distribution Grids. Lu, W., +, JSYST Sept. 2020 3695-3704
- Islanding Detection of Distributed Generation Based on Parallel Inductive Impedance Switching. Rostami, A., +, JSYST March 2020 813-823
- Load Disaggregation Using One-Directional Convolutional Stacked Long Short-Term Memory Recurrent Neural Network. Quek, Y.T., +, JSYST March 2020 1395-1404
- Local Estimation of Critical and Off-Peak Periods for Grid-Friendly Flexible Load Management. *Guzman, C.*, +, *JSYST Sept. 2020 4262-4271*
- Local Measurements-Based Backup Protection for DC Microgrids Using Sequential Analyzing Technique. *Meghwani*, A., +, *JSYST March 2020* 1159-1170
- Modeling and Vulnerability Analysis of Cyber-Physical Power Systems Based on Community Theory. Pan, H., +, JSYST Sept. 2020 3938-3948
- Moth Search Optimization for Optimal DERs Integration in Conjunction to OLTC Tap Operations in Distribution Systems. Singh, P., +, JSYST March 2020 880-888
- Multilevel Inverter (MLI)-Based Stand-Alone Photovoltaic System: Modeling, Analysis, and Control. Kumar, N., +, JSYST March 2020 909-915
- Multiobjective Optimization Technique for Mitigating Unbalance and Improving Voltage Considering Higher Penetration of Electric Vehicles and Distributed Generation. Islam, M.R., +, JSYST Sept. 2020 3676-3686
- Novel Change Detection and Fault Classification Scheme for AC Microgrids. *Jarrahi, M.A.*, +, *JSYST Sept. 2020 3987-3998*
- Optimal Control Methods for Photovoltaic Enabled Grid With Abnormal Power Loads. *Yang, Y., +, JSYST March 2020 852-861*
- Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets. *Oikonomou, K.*, +, *JSYST Sept. 2020 3729-3739*
- Optimal Planning and Operational Strategy of a Residential Microgrid With Demand Side Management. *Bhamidi*, L., +, JSYST June 2020 2624-2632

- Power Output Smoothing for Renewable Energy System: Planning, Algorithms, and Analysis. *Chen, X., +, JSYST March 2020 1034-1045*
- Priority-Based Protection Against the Malicious Data Injection Attacks on State Estimation. *Khanna, K.*, +, *JSYST June 2020 1945-1952*
- Probabilistic Study of Undervoltage Load Shedding Scheme to Mitigate the Impact of Protection System Hidden Failures. *Pal, D.*, +, *JSYST March* 2020 862-869
- Protection Coordination for Assembly HVDC Breakers for HVDC Multiterminal Grids Using Wavelet Transform. *Mitra, B.*, +, *JSYST March 2020* 1069-1079
- Protection of High-Voltage DC Grids Using Traveling-Wave Frequency Characteristics. Saleh, K.A., +, JSYST Sept. 2020 4284-4295
- Recursive Smooth Variable Structure Filter for Estimation Processes in Direct Power Control Scheme Under Balanced and Unbalanced Power Grid. AlShabi, M., +, JSYST March 2020 971-982
- Time-Dependent Bit Error Rate Analysis for Smart Utility Networks in the Presence of WLAN Interferers. *Gouissem, A.*, +, *JSYST June 2020 2133-2143*
- Two-Mode Adaptive Schemes for VAR Control With Solar Power and Energy Storage. *Doan, S., +, JSYST March 2020 889-899*

Power markets

- A Graph-Theoretic Approach to Capacity Benefit Margin Calculation for Large Multiarea Power Systems. *Mohammed, O.O.*, +, *JSYST March 2020* 1230-1233
- A New Combinatory Approach for Wind Power Forecasting. *Abedinia, O.*, +, *JSYST Sept. 2020 4614-4625*
- Active Distribution Network Operation: A Market-Based Approach. Zubo, R.H.A., +, JSYST March 2020 1405-1416
- Equilibrium Analysis of Electricity Market With Demand Response Exchange to Counterbalance Bid Deviations of Renewable Generators. *Wang, X.*, +, *JSYST June 2020 2713-2724*
- Local Estimation of Critical and Off-Peak Periods for Grid-Friendly Flexible Load Management. *Guzman, C.*, +, *JSYST Sept. 2020 4262-4271*
- Model Predictive for Reactive Power Scheduling Control Strategy for PV—Battery Hybrid System in Competitive Energy Market. *Lupangu, C.*, +, *JSYST Sept. 2020 4071-4078*
- Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets. *Oikonomou, K.*, +, *JSYST Sept. 2020* 3729-3739
- Priority-Based Scheduling of Energy Exchanges Between Cooperative Microgrids in Risk-Averse Environment. *Lahon, R.*, +, *JSYST March 2020* 1098-1108

Power outages

PLC Systems Under the Presence of a Malicious Wireless Communication Device: Physical Layer Security Analyses. *Camponogara*, A., +, *JSYST Dec.* 2020 4901-4910

Power overhead lines

Protection of High-Voltage DC Grids Using Traveling-Wave Frequency Characteristics. Saleh, K.A., +, JSYST Sept. 2020 4284-4295

Power supply quality

- A Hybrid Photovoltaic-Fuel Cell-Based Single-Stage Grid Integration With Lyapunov Control Scheme. *Priyadarshi*, N., +, *JSYST Sept. 2020 3334-2342*
- A New Model for Reconfiguration and Distributed Generation Allocation in Distribution Network Considering Power Quality Indices and Network Losses. *Moghaddam, M.J.H.*, +, *JSYST Sept. 2020 3530-3538*
- Comparative Analysis of Communication Assisted Grid Synchronization Methods in Microgrids. S., N., +, JSYST March 2020 1007-1014
- Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator. *Kumar*; V.N., +, JSYST Sept. 2020 4308-4319
- Multiobjective Optimization Technique for Mitigating Unbalance and Improving Voltage Considering Higher Penetration of Electric Vehicles and Distributed Generation. Islam, M.R., +, JSYST Sept. 2020 3676-3686

Power system analysis computing

Creating Power System Network Layouts: A Fast Parallel Algorithm. *Olauson*, J., +, JSYST Sept. 2020 3687-3694

Power system CAD

PMU-Assisted Zone-3 Protection Scheme for PV Integrated Power Systems Immune to Interharmonics. Prakash, T., +, JSYST Sept. 2020 3267-3276

Protection Coordination for Assembly HVDC Breakers for HVDC Multiterminal Grids Using Wavelet Transform. *Mitra*, B., +, *JSYST March 2020* 1069-1079

Power system control

- Critical Nodes Identification of Complex Power Systems Based on Electric Cactus Structure. Yang, D., +, JSYST Sept. 2020 4477-4488
- Cyber-Attack Resilient Design of Wide-Area PSS Considering Practical Communication Constraints. *Prakash*, *T.*, +, *JSYST June 2020 2012-2022*
- Flexible Control Structure for Enhancement of Scalability in DC Microgrids. Ko, B., +, JSYST Sept. 2020 4591-4601
- Fuzzy-Observer-Based Predictive Stabilization of DC Microgrids With Power Buffers Through an Imperfect 5G Network. *Vafamand, N.*, +, *JSYST Sept. 2020 4025-4035*
- Improving Power Systems Transient Stability by Coordinated Control of Energy Storage Systems and Synchronous Generators in Presence of Measurement Noise. *Rostami, M.*, +, *JSYST March 2020 1088-1097*
- Measurement Errors and Delays on Wide-Area Control Based on IEEE Std C37.118.1-2011: Impact and Compensation. *Zacharia*, *L.*, +, *JSYST March* 2020 422-432
- Modeling and Vulnerability Analysis of Cyber-Physical Power Systems Based on Community Theory. Pan, H., +, JSYST Sept. 2020 3938-3948
- Recursive Smooth Variable Structure Filter for Estimation Processes in Direct Power Control Scheme Under Balanced and Unbalanced Power Grid. AlShabi, M., +, JSYST March 2020 971-982

Power system dynamics

Development and Validation of Artificial Neural Network-Based Tools for Forecasting of Power System Inertia With Wind Farms Penetration. *Paidi*, E.S.N.R., +, JSYST Dec. 2020 4978-4989

Power system economics

- Joint Energy-QoE Efficient Content Delivery Networks Using Real-Time Energy Management. *Goudarzi, P.*, +, *JSYST March 2020 927-938*
- Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets. *Oikonomou, K.*, +, *JSYST Sept. 2020* 3729-3739

Power system faults

- A PMU-Based Data-Driven Approach for Classifying Power System Events Considering Cyberattacks. Ma, R., +, JSYST Sept. 2020 3558-3569
- A Smart Optimization of Fault Diagnosis in Electrical Grid Using Distributed Software-Defined IoT System. *Al Mhdawi, A.K.*, +, *JSYST June 2020 2780-2790*

Power system harmonics

- Detection and Experimental Validation of High Impedance Arc Fault in Distribution System Using Empirical Mode Decomposition. *Lala, H.*, +, *JSYST Sept. 2020 3494-3505*
- Discrete-Wavelet-Transform and Stockwell-Transform-Based Statistical Parameters Estimation for Fault Analysis in Grid-Connected Wind Power System. *Mukherjee*, N., +, *JSYST Sept. 2020 4320-4328*
- PMU-Assisted Zone-3 Protection Scheme for PV Integrated Power Systems Immune to Interharmonics. Prakash, T., +, JSYST Sept. 2020 3267-3276
- Robust Voltage Control in Inverter-Interfaced Microgrids Under Plug-and-Play Functionalities. Zarei, A., +, JSYST June 2020 2813-2824

Power system interconnection

- A Graph-Theoretic Approach to Capacity Benefit Margin Calculation for Large Multiarea Power Systems. *Mohammed*, O.O., +, JSYST March 2020 1230-1233
- Modified Power Reserve Management Solution in Power System Considering Frequency Constraints. *Hosseini, S.A.*, +, *JSYST March 2020 1125-1134*
- Optimal Charge/Discharge Scheduling of Battery Storage Interconnected With Residential PV System. *Kapoor, A., +, JSYST Sept. 2020 3825-3835*

Power system management

A Review of the Measures to Enhance Power Systems Resilience. *Mahzarnia*, M., +, *JSYST Sept.* 2020 4059-4070

- A Smart Optimization of Fault Diagnosis in Electrical Grid Using Distributed Software-Defined IoT System. *Al Mhdawi, A.K.*, +, *JSYST June 2020* 2780-2790
- Active Distribution Network Operation: A Market-Based Approach. Zubo, R.H.A., +, JSYST March 2020 1405-1416
- Risk and Resilience Assessment With Component Criticality Ranking of Electric Power Systems Subject to Earthquakes. *Espinoza, S.*, +, *JSYST June 2020 2837-2848*
- Robust Optimization-Based Energy Storage Operation for System Congestion Management. Yan, X., +, JSYST June 2020 2694-2702
- Spectral Graph Analysis of the Geometry of Power Flows in Transmission Networks. *Retiere*, N., +, *JSYST June 2020 2736-2747*

Power system measurement

- A PMU-Based Data-Driven Approach for Classifying Power System Events Considering Cyberattacks. Ma, R., +, JSYST Sept. 2020 3558-3569
- Detection of False Data Injection Attacks in Smart Grids Based on Graph Signal Processing. *Drayer, E.*, +, *JSYST June 2020 1886-1896*

Power system parameter estimation

Discrete-Wavelet-Transform and Stockwell-Transform-Based Statistical Parameters Estimation for Fault Analysis in Grid-Connected Wind Power System. *Mukherjee*, N., +, *JSYST Sept. 2020 4320-4328*

Power system planning

- A Review of the Measures to Enhance Power Systems Resilience. *Mahzarnia*, M., +, JSYST Sept. 2020 4059-4070
- Importance Sampling Using Multilabel Radial Basis Classification for Composite Power System Reliability Evaluation. *Urgun, D.*, +, *JSYST June* 2020 2791-2800

Power system protection

- Allocation of Renewables, Switches, and Relays Considering Relays Actual Operation Time. Fatemi, S.S., +, JSYST March 2020 950-959
- Critical Nodes Identification of Complex Power Systems Based on Electric Cactus Structure. Yang, D., +, JSYST Sept. 2020 4477-4488
- Local Measurements-Based Backup Protection for DC Microgrids Using Sequential Analyzing Technique. *Meghwani*, A., +, *JSYST March 2020* 1159-1170
- Probabilistic Study of Undervoltage Load Shedding Scheme to Mitigate the Impact of Protection System Hidden Failures. Pal, D., +, JSYST March 2020 862-869

Power system reliability

- A Review of the Measures to Enhance Power Systems Resilience. *Mahzarnia*, M., +, JSYST Sept. 2020 4059-4070
- A Smart Optimization of Fault Diagnosis in Electrical Grid Using Distributed Software-Defined IoT System. *Al Mhdawi, A.K.*, +, *JSYST June 2020* 2780-2790
- A Stochastic Model of Cascading Failure Dynamics in Cyber-Physical Power Systems. *Gao*, X., +, *JSYST Sept. 2020 4626-4637*
- Allocation of Renewables, Switches, and Relays Considering Relays Actual Operation Time. Fatemi, S.S., +, JSYST March 2020 950-959
- Critical Nodes Identification of Complex Power Systems Based on Electric Cactus Structure. Yang, D., +, JSYST Sept. 2020 4477-4488
- Formal Reliability Analysis of an Integrated Power Generation System Using Theorem Proving. *Ahmad, W.*, +, *JSYST Dec. 2020 4820-4831*
- Importance Sampling Using Multilabel Radial Basis Classification for Composite Power System Reliability Evaluation. *Urgun*, D., +, *JSYST June* 2020 2791-2800
- Microservice-Based Architecture for an Energy Management System. *Lyu*, Z, +, *JSYST Dec. 2020 5061-5072*
- PLC Systems Under the Presence of a Malicious Wireless Communication Device: Physical Layer Security Analyses. *Camponogara*, A., +, *JSYST Dec.* 2020 4901-4910
- PN Inference Based Autonomous Sequential Restoration of Distribution System Under Natural Disaster. Sandhya, K., +, JSYST Dec. 2020 5160-5171
- Probabilistic Study of Undervoltage Load Shedding Scheme to Mitigate the Impact of Protection System Hidden Failures. Pal, D., +, JSYST March 2020 862-869

- Reweighted Compressed Sensing-Based Smart Grids Topology Reconstruction With Application to Identification of Power Line Outage. *Huang, K.*, +, *JSYST Sept. 2020 4329-4339*
- Toward a More Reliable System for Contingency Selection in Static Security Analysis of Electric Power Systems. da Silva, J.M., +, JSYST March 2020 1183-1194

Power system restoration

- A Review of the Measures to Enhance Power Systems Resilience. *Mahzarnia*, M., +, *JSYST Sept. 2020 4059-4070*
- Improvement in Recloser–Fuse Coordination Technique Based on Modification Factor. Makwana, Y.M., +, JSYST June 2020 2770-2779
- PMUs Enabled Tellegen's Theorem-Based Fault Identification Method for Unbalanced Active Distribution Network Using RTDS. *Bansal, Y.*, +, *JSYST Sept. 2020 4567-4578*

Power system security

- A Lightweight Mutual Authentication for Smart Grid Neighborhood Area Network Communications Based on Physically Unclonable Function. Kaveh, M., +, JSYST Sept. 2020 4535-4544
- A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926
- A PMU-Based Data-Driven Approach for Classifying Power System Events Considering Cyberattacks. Ma, R., +, JSYST Sept. 2020 3558-3569
- Comparative Analysis of Communication Assisted Grid Synchronization Methods in Microgrids. S., N., +, JSYST March 2020 1007-1014
- Complex Network-Based Transmission Network Vulnerability Assessment Using Adjacent Graphs. Zang, T., +, JSYST March 2020 572-581
- Cyber-Attack Resilient Design of Wide-Area PSS Considering Practical Communication Constraints. *Prakash*, *T.*, +, *JSYST June 2020 2012-2022*
- Detection and Location of Bias Load Injection Attack in Smart Grid via Robust Adaptive Observer. Wang, X., +, JSYST Sept. 2020 4454-4465
- Detection and Mitigation of Cyber-Attacks on AGC Systems of Low Inertia Power Grid. Roy, S.D., +, JSYST June 2020 2023-2031
- Detection of False Data Injection Attacks in Smart Grids Based on Graph Signal Processing. *Drayer, E., +, JSYST June 2020 1886-1896*
- Development of an Ensemble Decision Tree-Based Power System Dynamic Security State Predictor. *Mukherjee*, R., +, *JSYST Sept. 2020 3836-3843*
- Dynamic Uncertainty Set Characterization for Bulk Power Grid Flexibility Assessment. *Pourahmadi, F.*, +, *JSYST March 2020 718-728*
- Modified Power Reserve Management Solution in Power System Considering Frequency Constraints. *Hosseini, S.A.*, +, *JSYST March 2020 1125-1134*
- Priority-Based Protection Against the Malicious Data Injection Attacks on State Estimation. *Khanna, K.*, +, *JSYST June 2020 1945-1952*
- Toward a More Reliable System for Contingency Selection in Static Security Analysis of Electric Power Systems. da Silva, J.M., +, JSYST March 2020 1183-1194

Power system simulation

- A New Phase Angle of Superimposed Positive Sequence Current-Based Discrimination Scheme for Prevention of Maloperation of Distance Relay During Severe Stressed Conditions. *Rao, J.T.*, +, *JSYST Sept. 2020 3705-3716*
- Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG. *Gheisarnejad*, M., +, JSYST March 2020 1058-1068
- Critical Nodes Identification of Complex Power Systems Based on Electric Cactus Structure. Yang, D., +, JSYST Sept. 2020 4477-4488
- Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator. *Kumar, V.N.*, +, *JSYST Sept. 2020 4308-4319*
- Islanding Detection of Distributed Generation Based on Parallel Inductive Impedance Switching. *Rostami*, A., +, JSYST March 2020 813-823
- Local Measurements-Based Backup Protection for DC Microgrids Using Sequential Analyzing Technique. *Meghwani*, A., +, *JSYST March 2020* 1159-1170
- PMUs Enabled Tellegen's Theorem-Based Fault Identification Method for Unbalanced Active Distribution Network Using RTDS. *Bansal, Y.*, +, *JSYST Sept. 2020 4567-4578*

- Transmission–Distribution Cosimulation: Analytical Methods for Iterative Coupling. *Krishnamoorthy, G.*, +, *JSYST June 2020 2633-2642*
- Voltage/Current Large Transient Suppression in DC Microgrids Using Local Information and Active Stabilizing Capability. Azimi, S.M., +, JSYST March 2020 1109-1116

Power system stability

- A New MIMO ORC Architecture for Power Oscillation Damping Using Remote Feedback Signals Under Intermittent Observations. *Yogarathinam*, A., +, JSYST March 2020 939-949
- A Novel Control Method Based on Droop for Cooperation of Flywheel and Battery Energy Storage Systems in Islanded Microgrids. *Khodadoost Arani, A.A.*, +, *JSYST March 2020 1080-1087*
- Comparative Analysis of Communication Assisted Grid Synchronization Methods in Microgrids. S., N., +, JSYST March 2020 1007-1014
- Control of Parallel ULTC Transformers in Active Distribution Systems. *Pouladi, A.*, +, *JSYST March 2020 960-970*
- Cyber-Attack Resilient Design of Wide-Area PSS Considering Practical Communication Constraints. *Prakash*, T., +, *JSYST June* 2020 2012-2022
- Detection and Experimental Validation of High Impedance Arc Fault in Distribution System Using Empirical Mode Decomposition. *Lala, H.*, +, *JSYST Sept. 2020 3494-3505*
- Development and Validation of Artificial Neural Network-Based Tools for Forecasting of Power System Inertia With Wind Farms Penetration. *Paidi, E.S.N.R.*, +, *JSYST Dec. 2020 4978-4989*
- Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator. Kumar, V.N., +, JSYST Sept. 2020 4308-4319
- Mitigation of Power and Frequency Instability to Improve Load Sharing Among Distributed Inverters in Microgrid Systems. *Firdaus, A.*, +, *JSYST March 2020 1024-1033*
- Model Predictive Control via PV-Based VAR Scheme for Power Distribution Systems With Regular and Unexpected Abnormal Loads. *Yang, Y.*, +, *JSYST March 2020 689-698*
- Robust Voltage Control in Inverter-Interfaced Microgrids Under Plug-and-Play Functionalities. Zarei, A., +, JSYST June 2020 2813-2824
- Voltage Stability Constrained OPF in Multi-Micro-Grid Considering Demand Response Programs. *Nojavan, M.*, +, *JSYST Dec. 2020 5221-5228* Voltage/Current Large Transient Suppression in DC Microgrids Using Local Information and Active Stabilizing Capability. *Azimi, S.M.*, +, *JSYST*

March 2020 1109-1116 Power system state estimation

- Covariance Analysis of LAV Robust Dynamic State Estimation in Power Systems. Sun, L., +, JSYST June 2020 2801-2812
- Detection and Location of Bias Load Injection Attack in Smart Grid via Robust Adaptive Observer. Wang, X., +, JSYST Sept. 2020 4454-4465
- Detection of False Data Injection Attacks in Smart Grids Based on Graph Signal Processing. Drayer, E., +, JSYST June 2020 1886-1896
- Priority-Based Protection Against the Malicious Data Injection Attacks on State Estimation. *Khanna, K.*, +, *JSYST June 2020 1945-1952*
- Robust Power System State Estimation Using *t*-Distribution Noise Model. *Chen, T.*, +, *JSYST March 2020 771-781*

Power system transient stability

Improving Power Systems Transient Stability by Coordinated Control of Energy Storage Systems and Synchronous Generators in Presence of Measurement Noise. *Rostami, M.*, +, *JSYST March 2020 1088-1097*

Power system transients

Voltage/Current Large Transient Suppression in DC Microgrids Using Local Information and Active Stabilizing Capability. *Azimi, S.M.*, +, *JSYST March 2020 1109-1116*

Power systems

Optimal Heterogeneous Energy Storage Management for Multienergy Cruise Ships. Fang, S., +, JSYST Dec. 2020 4754-4764

Power transformers

- A Smart Optimization of Fault Diagnosis in Electrical Grid Using Distributed Software-Defined IoT System. *Al Mhdawi, A.K.*, +, *JSYST June 2020 2780-2790*
- Control of Parallel ULTC Transformers in Active Distribution Systems. Pouladi, A., +, JSYST March 2020 960-970

Power transmission control

Spatio-Temporal Value of Energy Storage in Transmission Networks. Khatami, R., +, JSYST Sept. 2020 3855-3864

Power transmission economics

A Robust Coordinated Expansion Planning Model For Wind Farm-Integrated Power Systems With Flexibility Sources Using Affine Policies. Dehghan, S., +, JSYST Sept. 2020 4110-4118

Power transmission faults

- A Graph-Based Model for Transmission Network Vulnerability Analysis. Yang, S., +, JSYST March 2020 1447-1456
- A New Phase Angle of Superimposed Positive Sequence Current-Based Discrimination Scheme for Prevention of Maloperation of Distance Relay During Severe Stressed Conditions. *Rao, J.T.*, +, *JSYST Sept. 2020 3705-3716*
- Complex Network-Based Transmission Network Vulnerability Assessment Using Adjacent Graphs. Zang, T., +, JSYST March 2020 572-581
- Protection Coordination for Assembly HVDC Breakers for HVDC Multiterminal Grids Using Wavelet Transform. *Mitra*, B., +, *JSYST March 2020* 1069-1079
- Protection of High-Voltage DC Grids Using Traveling-Wave Frequency Characteristics. Saleh, K.A., +, JSYST Sept. 2020 4284-4295

Power transmission lines

- A Graph-Based Model for Transmission Network Vulnerability Analysis. *Yang*, S., +, *JSYST March* 2020 1447-1456
- A Graph-Theoretic Approach to Capacity Benefit Margin Calculation for Large Multiarea Power Systems. *Mohammed, O.O.*, +, *JSYST March 2020 1230-1233*
- Detection and Experimental Validation of High Impedance Arc Fault in Distribution System Using Empirical Mode Decomposition. *Lala, H.*, +, *JSYST Sept. 2020 3494-3505*
- Determining Impact of Lightning Strike Location on Failures in Transmission Network Elements Using Fuzzy Decision-Making. *Petrovic, I.*, +, *JSYST June 2020 2665-2675*
- Electrical Power System Resilience Assessment: A Comprehensive Approach. Sabouhi, H., +, JSYST June 2020 2643-2652

Power transmission planning

- A Robust Coordinated Expansion Planning Model For Wind Farm-Integrated Power Systems With Flexibility Sources Using Affine Policies. Dehghan, S., +, JSYST Sept. 2020 4110-4118
- Optimal Coordinated Expansion Planning of Transmission and Electrical Energy Storage Systems Under Physical Intentional Attacks. *Nemati, H.*, +, *JSYST March 2020 793-802*
- Spectral Graph Analysis of the Geometry of Power Flows in Transmission Networks. *Retiere*, N., +, JSYST June 2020 2736-2747

Power transmission protection

- Protection Coordination for Assembly HVDC Breakers for HVDC Multiterminal Grids Using Wavelet Transform. *Mitra*, B., +, *JSYST March 2020* 1069-1079
- Protection of High-Voltage DC Grids Using Traveling-Wave Frequency Characteristics. Saleh, K.A., +, JSYST Sept. 2020 4284-4295

Power transmission reliability

- A Graph-Based Model for Transmission Network Vulnerability Analysis. *Yang*, S., +, *JSYST March 2020 1447-1456*
- A Graph-Theoretic Approach to Capacity Benefit Margin Calculation for Large Multiarea Power Systems. *Mohammed*, O.O., +, JSYST March 2020 1230-1233

Precoding

- Capacity-Maximized Transmitter Precoding for MU MIMO VLC Systems With Bounded Channel Uncertainties. *Zhao, S.*, +, *JSYST Dec. 2020 5144-5147*
- Coordinated Hybrid Precoding Design in Millimeter Wave Fog-RAN. *Hao*, W., +, *JSYST March 2020 673-676*
- D2D-Enabled User Cooperation in Massive MIMO. *Liu*, Y., +, *JSYST Sept.* 2020 4406-4417
- Deep Learning-Based MIMO-NOMA With Imperfect SIC Decoding. *Kang*, *J.*, +, *JSYST Sept. 2020 3414-3417*

- Design Precoded Space-Time-Frequency 4 × 1 and 4 × 2 OFDM Architectures in Frequency-Selective Fading Channels. *Yeh, H., JSYST March 2020* 277-287
- Joint Precoding and Combining Design for Hybrid Beamforming Systems With Subconnected Structure. Zhang, Z., +, JSYST March 2020 184-195
- Multiobjective Precoder Design for Coexisting Wireless Energy Transfer and Information Transmission Systems. *Zhang, H.*, +, *JSYST March 2020* 445-456
- Partial-Fixed Interference Alignment in Multiuser Interference Channel. Chen, X., +, JSYST June 2020 2303-2310
- Performance Analysis of Precoded Wireless OFDM With Carrier Frequency Offset. *Kalbat, F., +, JSYST June 2020 2237-2248*
- Rate-Loss Mitigation for a Millimeter-Wave Beamspace MIMO Lens Antenna Array System Using a Hybrid Beam Selection Scheme. Sarker, M.A.L., +, JSYST Sept. 2020 3582-3585
- Robust Optimization for Energy Efficiency in MIMO Two-Way Relay Networks With SWIPT. Li, Q., +, JSYST March 2020 196-207
- Secure Hybrid Beamformers Design in mmWave MIMO Wiretap Systems. Tian, X., +, JSYST March 2020 548-559
- Securing Untrusted Full-Duplex Relay Channels in the Presence of Multiple External Cluster-Based Eavesdroppers. *Mabrouk, A.*, +, *JSYST March* 2020 665-668

Prediction algorithms

Midterm Load Forecasting: A Multistep Approach Based on Phase Space Reconstruction and Support Vector Machine. *Li*, G., +, *JSYST Dec. 2020* 4967-4977

Predictive control

- Efficient and Risk-Aware Control of Electricity Distribution Grids. *Liberati*, F., +, JSYST Sept. 2020 3586-3597
- Fuzzy-Observer-Based Predictive Stabilization of DC Microgrids With Power Buffers Through an Imperfect 5G Network. *Vafamand*, N., +, *JSYST Sept.* 2020 4025-4035
- Improving Power Systems Transient Stability by Coordinated Control of Energy Storage Systems and Synchronous Generators in Presence of Measurement Noise. Rostami, M., +, JSYST March 2020 1088-1097
- Model Predictive Control via PV-Based VAR Scheme for Power Distribution Systems With Regular and Unexpected Abnormal Loads. *Yang, Y.*, +, *JSYST March 2020 689-698*
- Model Predictive for Reactive Power Scheduling Control Strategy for PV—Battery Hybrid System in Competitive Energy Market. *Lupangu, C.*, +, *JSYST Sept. 2020 4071-4078*

Predictive models

- A Practicable Copula-Based Approach for Power Forecasting of Small-Scale Photovoltaic Systems. *Rajabalizadeh*, S., +, JSYST Dec. 2020 4911-4918
- High-Fidelity Hexarot Simulation-Based Motion Platform Using Fuzzy Incremental Controller and Model Predictive Control-Based Motion Cueing Algorithm. *Qazani, M.R.C.*, +, *JSYST Dec. 2020 5073-5083*
- Midterm Load Forecasting: A Multistep Approach Based on Phase Space Reconstruction and Support Vector Machine. *Li*, G., +, *JSYST Dec.* 2020 4967-4977

Pricing

- Active Distribution Network Operation: A Market-Based Approach. Zubo, R.H.A., +, JSYST March 2020 1405-1416
- Intelligent Residential Energy Management System Using Deep Reinforcement Learning. Mathew, A., +, JSYST Dec. 2020 5362-5372
- Joint Energy-QoE Efficient Content Delivery Networks Using Real-Time Energy Management. *Goudarzi*, P., +, JSYST March 2020 927-938
- Model Predictive for Reactive Power Scheduling Control Strategy for PV—Battery Hybrid System in Competitive Energy Market. *Lupangu, C.*, +, *JSYST Sept. 2020 4071-4078*
- Optimal Scheduling of EV Charging at a Solar Power-Based Charging Station. Kabir, M.E., +, JSYST Sept. 2020 4221-4231
- Probabilistic Optimal Dynamic Planning of Onsite Solar Generation for Residential Energy Hubs. Senemar, S., +, JSYST March 2020 832-841
- Spectrum Optimization for Satellite Communication Systems With Heterogeneous User Preferences. Li, F., +, JSYST June 2020 2187-2191
- Toward Characterizing Blockchain-Based Cryptocurrencies for Highly Accurate Predictions. Saad, M., +, JSYST March 2020 321-332

Principal component analysis

- Energy-Efficient Design of MI Communication-Based 3-D Non-Conventional WSNs. Yadav, S., +, JSYST June 2020 2585-2588
- Energy-Efficient IoT-Fog-Cloud Architectural Paradigm for Real-Time Wildfire Prediction and Forecasting. Kaur, H., +, JSYST June 2020 2003-2011

Privacy

- Agent Pseudonymous Authentication-Based Conditional Privacy Preservation: An Emergent Intelligence Technique. *Chavhan, S.*, +, *JSYST Dec.* 2020 5233-5244
- Efficient Lattice-Based Ring Signature for Message Authentication in VANETs. Mundhe, P., +, JSYST Dec. 2020 5463-5474
- Enhanced Security Identity-Based Privacy-Preserving Authentication Scheme Supporting Revocation for VANETs. Wang, Y., +, JSYST Dec. 2020 5373-5383

Private key cryptography

White-Box Implementation of Shamir's Identity-Based Signature Scheme. Feng, O., +, JSYST June 2020 1820-1829

Probabilistic logic

A New Distributed Fault Detection Method for Wireless Sensor Networks. Gharamaleki, M.M., +, JSYST Dec. 2020 4883-4890

Probability

- A Contract Theory Approach-Based Scheme to Encourage Secondary Users for Cooperative Sensing in Cognitive Radio Networks. *Gupta*, *N*., +, *JSYST June* 2020 2400-2410
- A Graph-Based Model for Transmission Network Vulnerability Analysis. Yang, S., +, JSYST March 2020 1447-1456
- A Multilevel Fusion System for Multirobot 3-D Mapping Using Heterogeneous Sensors. *Yue, Y., +, JSYST March 2020 1341-1352*
- A Novel Effectiveness Evaluation Method Based on Simultaneous Probabilistic Finite-State Machines. Nan, Y., +, JSYST June 2020 1611-1622
- A Novel Hybrid Framework for Co-Optimization of Power and Natural Gas Networks Integrated With Emerging Technologies. *Mirzaei, M.A.*, +, *JSYST Sept. 2020 3598-3608*
- A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926
- A Stochastic Model of Cascading Failure Dynamics in Cyber-Physical Power Systems. *Gao*, X., +, *JSYST Sept. 2020 4626-4637*
- AMOPE: Performance Analysis of OpenFlow Systems in Software-Defined Networks. *Mondal, A.*, +, *JSYST March 2020 124-131*
- An Integrated Preventive Operation Framework for Power Systems During Hurricanes. Sang, Y., +, JSYST Sept. 2020 3245-3255
- Application of the Mixture of Lognormal Distribution to Represent the First-Order Statistics of Wireless Channels. *Das, S.*, +, *JSYST Sept. 2020* 4394-4401
- Bayesian-Inference-Based Sliding Window Trust Model Against Probabilistic SSDF Attack in Cognitive Radio Networks. Fu, Y, +, JSYST June 2020 1764-1775
- Bidirectional Charging in V2G Systems: An In-Cell Variation Analysis of Vehicle Batteries. *Khalid, H.M.*, +, *JSYST Sept. 2020 3665-3675*
- Classification Methods Applied to Credit Scoring With Collateral. *Teles, G.*, +, *JSYST Sept. 2020 4557-4566*
- Complex Network-Based Transmission Network Vulnerability Assessment Using Adjacent Graphs. Zang, T., +, JSYST March 2020 572-581
- Connected Target ε-probability Coverage in WSNs With Directional Probabilistic Sensors. Xu, X., +, JSYST Sept. 2020 3399-3409
- Covert Communications in D2D Underlaying Cellular Networks With Power Domain NOMA. *Jiang, Y.*, +, *JSYST Sept. 2020 3717-3728*
- Delay- and Interference-Aware Routing for Wireless Mesh Network. *Chai*, Y, +, JSYST Sept. 2020 4119-4130
- Delay-Optimal Cooperation Policy in a Slotted Aloha Full-Duplex Wireless Network: Static Approach. *Vaezi*, K., +, *JSYST June 2020 2257-2268*
- Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur*, R., +, *JSYST March* 2020 729-737
- Distributed Elections Using Site-Push Majority Winner Monitoring. Chaturvedi, K., +, JSYST June 2020 1682-1691

- Downlink NOMA Networks With Hybrid Long-Packet and Short-Packet Communications in Flat Rayleigh Fading Channels. *Lai*, X., +, *JSYST Sept.* 2020 3410-3413
- Duration-Sensitive Task Allocation for Mobile Crowd Sensing. Lai, C., +, JSYST Sept. 2020 4430-4441
- Efficient Population of the Verification Tradespace Using Bayesian Inference. Farkhondehmaal, F., +, JSYST Sept. 2020 3225-3232
- Electrical Power System Resilience Assessment: A Comprehensive Approach. Sabouhi, H., +, JSYST June 2020 2643-2652
- End-to-End Performance Analysis With Decode-and-Forward Relays in Multihop Wireless Systems Over\$\alpha\$- η- μ Fading Channels. Salameh, H.A.B., +, JSYST March 2020 84-92
- Health Monitoring for Cyber Physical Systems. Shangguan, L., +, JSYST March 2020 1457-1467
- Joint Nullspace Projection-Based Interference Mitigation for Full-Duplex Relay-Assisted Multicell Networks. *Fadoul, M.M.*, +, *JSYST June 2020* 2392-2399
- Low Probability of Intercept-Based Optimal Power Allocation Scheme for an Integrated Multistatic Radar and Communication System. Shi, C., +, JSYST March 2020 983-994
- On Secure Mixed RF-FSO Decode-and-Forward Relaying Systems With Energy Harvesting. Saber, M.J., +, JSYST Sept. 2020 4402-4405
- On the Secrecy Performance of Random VLC Networks With Imperfect CSI and Protected Zone. Wang, J., +, JSYST Sept. 2020 4176-4187
- Outage and Average Rate Performances of Full-Duplex Multiuser AF Relay Systems With Time-Selective Fading. *Raut, P.*, +, *JSYST Sept. 2020 3390-3398*
- Outage Probability and Throughput of Multirelay SWIPT-WPCN Networks With Nonlinear EH Model and Imperfect CSI. *Jiang, R.*, +, *JSYST March 2020 1206-1217*
- Outage Probability in the Uplink of Multitier Millimeter Wave Cellular Networks. *Onireti*, O., +, *JSYST June* 2020 2520-2531
- Path-Based Distribution Feeder Reconfiguration for Optimization of Losses and Reliability. *Jose, J., +, JSYST March 2020 1417-1426*
- Performance Analysis of Impaired SWIPT NOMA Relaying Networks Over Imperfect Weibull Channels. *Li*, *X.*, +, *JSYST March 2020 669-672*
- Physical Layer Security Enhancement for Satellite Communication Among Similar Channels: Relay Selection and Power Allocation. *Li*, *J*., +, *JSYST March* 2020 433-444
- Physical-Layer Security for Frequency Diverse Array Communication System Over Nakagami-*m* Fading Channels. *Ji*, S., +, *JSYST June 2020 2370-2381*
- Probabilistic Optimal Dynamic Planning of Onsite Solar Generation for Residential Energy Hubs. *Senemar, S.*, +, *JSYST March 2020 832-841*
- Probabilistic Study of Undervoltage Load Shedding Scheme to Mitigate the Impact of Protection System Hidden Failures. *Pal, D.*, +, *JSYST March* 2020 862-869
- Random Pattern Multiplexing for Random Access in IoT-Oriented Satellite Networks. Zhao, B., +, JSYST Sept. 2020 4089-4100
- Ranking Critical Activities in Complex System Development Projects. Srinivasan, S.M., +, JSYST March 2020 1353-1364
- Reliability Evaluation in Microgrids With Non-Exponential Failure Rates of Power Units. *Peyghami, S.*, +, *JSYST June 2020 2861-2872*
- Remote Data Checking With a Designated Verifier in Cloud Storage. *Yan*, H., +, *JSYST June 2020 1788-1797*
- Residual Energy Maximization in Cognitive Radio Networks With Q-Routing. Paul, A., +, JSYST Sept. 2020 3791-3800
- Risk and Resilience Assessment With Component Criticality Ranking of Electric Power Systems Subject to Earthquakes. *Espinoza*, S., +, *JSYST June* 2020 2837-2848
- Risk-Based Probabilistic Quantification of Power Distribution System Operational Resilience. *Poudel, S.*, +, *JSYST Sept. 2020 3506-3517*
- Robust Power Control for Clustering-Based Vehicle-to-Vehicle Communication. Liu, Z., +, JSYST June 2020 2557-2568
- Safety Cruise Control of Connected Vehicles Using Radar and Vehicle-to-Vehicle Communication. Ma, Z., +, JSYST Sept. 2020 4602-4613

Secure Transmit Antenna Selection Protocol for MIMO NOMA Networks Over Nakagami-*m* Channels. *Tran*, D., +, *JSYST March* 2020 253-264

Security--Reliability Tradeoff for Untrusted and Selfish Relay-Assisted D2D Communications in Heterogeneous Cellular Networks for IoT. *Zhang, C.*, +, *JSYST June 2020 2192-2201*

Spectrum-Occupancy Aware Cooperative Spectrum Sensing Using Adaptive Detection. Al-Jarrah, M.A., +, JSYST June 2020 2225-2236

Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. Manohar, M., +, JSYST Sept. 2020 3430-3439

Utility-Driven Data Analytics on Uncertain Data. Gan, W., +, JSYST Sept. 2020 4442-4453

Process control

Modeling and Decision-Making Methods for a Class of Cyber–Physical Systems Based on Modified Hybrid Stochastic Timed Petri Net. *Cao, R.*, +, *JSYST Dec. 2020 4684-4693*

Performance Analysis of Software-Defined Multihop Wireless Sensor Networks. *Jurado-Lasso*, F.F., +, JSYST Dec. 2020 4653-4662

Process design

Additive Manufacturing Evaluation Tool for Design Studies. *Garzaniti*, N., +, JSYST Sept. 2020 4382-4393

Product development

Additive Manufacturing Evaluation Tool for Design Studies. *Garzaniti*, N., +, JSYST Sept. 2020 4382-4393

Best Practice Patterns for Variant Modeling of Activities in Model-Based Systems Engineering. *Colletti, R.A.*, +, *JSYST Sept. 2020 4165-4175*

Ranking Critical Activities in Complex System Development Projects. Srinivasan, S.M., +, JSYST March 2020 1353-1364

Product life cycle management

A Model for the Build-Versus-Buy Decision in Developing Embedded Systems. Fowler, K.R., +, JSYST March 2020 1317-1324

Production

SimProxy Decision Support System: A Neural Network Proxy Applied to Reservoir and Surface Integrated Optimization. *Kohler, M.*, +, *JSYST Dec.* 2020 5111-5120

Production control

Improved Bacterial Foraging Algorithm for Cell Formation and Product Scheduling Considering Learning and Forgetting Factors in Cellular Manufacturing Systems. Wang, J., +, JSYST June 2020 3047-3056

Production engineering computing

A High-Accuracy Least-Time-Domain Mixture Features Machine-Fault Diagnosis Based on Wireless Sensor Network. *Du, C.*, +, *JSYST Sept. 2020* 4101-4109

Architecting Ubiquitous Communication and Collaborative-Automation-Based Machine Network Systems for Flexible Manufacturing. *Meng, Z.*, +, *JSYST March 2020 113-123*

Bioanalytical Device Design With Model-Based Systems Engineering Tools. Evin, E., +, JSYST Sept. 2020 3139-3149

Cybersecurity Vulnerability Mitigation Framework Through Empirical Paradigm (CyFEr): Prioritized Gap Analysis. *Gourisetti, S.N.G.*, +, *JSYST June 2020 1897-1908*

Model-Based Design of Complex Aeronautical Systems Through Digital Twin and Thread Concepts. *Bachelor, G., +, JSYST June 2020 1568-1579*

Profitability

Model Predictive for Reactive Power Scheduling Control Strategy for PV—Battery Hybrid System in Competitive Energy Market. *Lupangu, C.*, +, *JSYST Sept. 2020 4071-4078*

Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets. *Oikonomou, K.*, +, *JSYST Sept. 2020 3729-3739*

Priority-Based Scheduling of Energy Exchanges Between Cooperative Microgrids in Risk-Averse Environment. *Lahon, R.*, +, *JSYST March 2020 1098-1108*

Prognostics and health management

A New Hybrid Fault Prognosis Method for MFS Systems Based on Distributed Neural Networks and Recursive Bayesian Algorithm. *Kordestani*, M., +, JSYST Dec. 2020 5407-5416

Program diagnostics

An MDE-Based Tool for Early Analysis of UML2.0/PSM Atomic and Composite Components. *Rouis, T.S.*, +, *JSYST June 2020 1647-1657*

Program verification

An MDE-Based Tool for Early Analysis of UML2.0/PSM Atomic and Composite Components. *Rouis, T.S.*, +, *JSYST June 2020 1647-1657*

Efficient Population of the Verification Tradespace Using Bayesian Inference. Farkhondehmaal, F., +, JSYST Sept. 2020 3225-3232

Project management

Additive Manufacturing Evaluation Tool for Design Studies. *Garzaniti*, N., +, JSYST Sept. 2020 4382-4393

Propulsion

Optimal Heterogeneous Energy Storage Management for Multienergy Cruise Ships. Fang, S., +, JSYST Dec. 2020 4754-4764

Process Heuristics: Extraction, Analysis, and Repository Considerations. Fillingim, K.B., +, JSYST Dec. 2020 5148-5159

Protocols

A Lightweight Mutual Authentication for Smart Grid Neighborhood Area Network Communications Based on Physically Unclonable Function. Kaveh, M., +, JSYST Sept. 2020 4535-4544

A Review on Design and Implementation of Software-Defined WLANs. Oureshi, K.I., +, JSYST June 2020 2601-2614

Analyzing NDN NACK on Interest Flooding Attack via SIS Epidemic Model. Wang, K., +, JSYST June 2020 1862-1873

Containment Control of Linear Multiagent Systems With Stochastic Disturbances via Event-Triggered Strategies. Zou, W., +, JSYST Dec. 2020 4810-4819

DAISY: A Detection and Mitigation System Against Denial-of-Service Attacks in Software-Defined Networks. *Imran, M.*, +, *JSYST June 2020* 1933-1944

Distributed Elections Using Site-Push Majority Winner Monitoring. Chaturvedi, K., +, JSYST June 2020 1682-1691

End-to-End Performance Analysis With Decode-and-Forward Relays in Multihop Wireless Systems Over\$\alpha\$- η- μ Fading Channels. Salameh, H.A.B., +, JSYST March 2020 84-92

Enhanced Security Identity-Based Privacy-Preserving Authentication Scheme Supporting Revocation for VANETs. Wang, Y., +, JSYST Dec. 2020 5373-5383

Novel Energy-Harvesting AF Relaying Schemes With Channel Estimation Errors. *Zhou, Y.*, +, *JSYST March 2020 333-342*

Online Power Management for Latency-Sensitive Bluetooth Low-Energy Beacons. Chen, D., +, JSYST June 2020 2411-2420

Performance Analysis of Impaired SWIPT NOMA Relaying Networks Over Imperfect Weibull Channels. *Li*, *X*., +, *JSYST March* 2020 669-672

QoS-Aware Cross-Layer Optimization of Hybrid DSL-LTE Access Networks. Chuah, T.C., +, JSYST June 2020 2175-2186

Resource Optimization Protocol Based on Multicommunity Model for Intermittently Connected Mobile Networks. Wang, T., +, JSYST March 2020 410-421

Secure Transmit Antenna Selection Protocol for MIMO NOMA Networks Over Nakagami-*m* Channels. *Tran*, D., +, *JSYST March* 2020 253-264

Prototypes

RF Chain Reduction for MIMO Systems: A Hardware Prototype. *Gong, T.*, +, *JSYST Dec. 2020 5296-5307*

Psychology

An Information Theoretic Approach to Platform Technology Selection to Aid Influence Operations. *Hartong, M.W.*, +, *JSYST Dec. 2020 5308-5319*

Public domain software

Location-Aware, Context-Driven QoS for IoT Applications. *Ahmad, E.*, +, *JSYST March 2020 232-243*

Public key cryptography

A Lightweight Certificateless Aggregation Signature Scheme With Provably Security in the Standard Model. *Deng, L.*, +, *JSYST Sept. 2020 4242-4251*

A Lightweight ECC-Based Authentication Scheme for Internet of Things (IoT). *Hammi, B.*, +, *JSYST Sept. 2020 3440-3450*

A Novel Privacy-Preserving Authentication Scheme for V2G Networks. Su, Y, +, JSYST June 2020 1963-1971

- A Provably Secure and Efficient Identity-Based Anonymous Authentication Scheme for Mobile Edge Computing. *Jia*, X., +, *JSYST March 2020 560-571*
- A Secure End-to-End Verifiable Internet-Voting System Using Identity-Based Blind Signature. *Kumar*, M., +, *JSYST June* 2020 2032-2041
- A Secure Three-Factor User Authentication Protocol With Forward Secrecy for Wireless Medical Sensor Network Systems. *Li*, *X*., +, *JSYST March* 2020 39-50
- An Efficient Elliptic Curve Cryptography-Based Without Pairing KPABE for Internet of Things. Sowjanya, K., +, JSYST June 2020 2154-2163
- An Elliptic Curve-Based Scalable Data Aggregation Scheme for Smart Grid. Chen, Y., +, JSYST June 2020 2066-2077
- Anonymous Aggregate Encryption Scheme for Industrial Internet of Things. Deng, L., JSYST Sept. 2020 3999-4006
- CB-PS: An Efficient Short-Certificate-Based Proxy Signature Scheme for UAVs. Verma, G.K., +, JSYST March 2020 621-632
- Efficient and Provably Secure Certificateless Parallel Key-Insulated Signature Without Pairing for IIoT Environments. *Xiong, H.*, +, *JSYST March* 2020 310-320
- Insider Attack Protection: Lightweight Password-Based Authentication Techniques Using ECC. *Rajamanickam, S.*, +, *JSYST June 2020 1972-1983*
- PFCBAS: Pairing Free and Provable Certificate-Based Aggregate Signature Scheme for the e-Healthcare Monitoring System. *Verma*, G.K., +, JSYST June 2020 1704-1715
- Remote Data Checking With a Designated Verifier in Cloud Storage. *Yan*, H., +, *JSYST June 2020 1788-1797*

Pulse shaping

Bridging the Gap Between CP-OFDM and ZP-OFDM for the Provision of Ultra-Low Latency Services in 5G. *Ayadi*, R., +, *JSYST March 2020 603-613*

Pulse shaping circuits

Reconfigurable Architecture of UFMC Transmitter for 5G and Its FPGA Prototype. Kumar, V., +, JSYST March 2020 28-38

Python

Creating Power System Network Layouts: A Fast Parallel Algorithm. *Olauson*, J., +, JSYST Sept. 2020 3687-3694

Q

Quadratic programming

Increment-Exchange-Based Decentralized Multiobjective Optimal Power Flow for Active Distribution Grids. *Lu, W.*, +, *JSYST Sept. 2020 3695-3704* Path-Based Distribution Feeder Reconfiguration for Optimization of Losses and Reliability. *Jose, J.*, +, *JSYST March 2020 1417-1426*

Quality of service

- Autonomous Resource Slicing for Virtualized Vehicular Networks With D2D Communications Based on Deep Reinforcement Learning. Sun, G., +, JSYST Dec. 2020 4694-4705
- Cross PHY/APP Layer User Grouping and Power Allocation for Uplink Multiantenna NOMA Video Communication Systems. *Tseng, S.*, +, *JSYST Sept. 2020 3351-3359*
- EHLinQ: Distributed Scheduler for D2D Communication With RF Energy Harvesting. Lee, H., +, JSYST June 2020 2281-2292
- Energy-Efficient Resource Allocation for Dynamic Priority-Based Vehicular Mobile-Health Communications. *Fan, B.*, +, *JSYST June 2020 2097-2108*Energy Efficient Resource Allocation in SWIRT Cooperative Wireless Not
- Energy-Efficient Resource Allocation in SWIPT Cooperative Wireless Networks. Guo, S., +, JSYST Sept. 2020 4131-4142
- Ergodic Capacity of NOMA-Based Uplink Satellite Networks With Randomly Deployed Users. Yan, X., +, JSYST Sept. 2020 3343-3350
- Hierarchical Edge-Cloud SDN Controller System With Optimal Adaptive Resource Allocation for Load-Balancing. *Lin, F.P.*, +, *JSYST March 2020* 265-276
- Improved Teaching Learning-Based QoS-Aware Services Composition for Internet of Things. Khanouche, M.E., +, JSYST Sept. 2020 4155-4164
- Interplay of Processing and Radio Parameters: A Service-Oriented Performance Study. Alabbasi, A., +, JSYST March 2020 398-409

- Location-Aware, Context-Driven QoS for IoT Applications. *Ahmad, E.*, +, JSYST March 2020 232-243
- Loosely Coupled Cloud Robotic Framework for QoS-Driven Resource Allocation-Based Web Service Composition. *Xie, Y., +, JSYST March 2020 1245-1256*
- Online Power Management for Latency-Sensitive Bluetooth Low-Energy Beacons. Chen, D., +, JSYST June 2020 2411-2420
- Optimal Heterogeneous Energy Storage Management for Multienergy Cruise Ships. Fang, S., +, JSYST Dec. 2020 4754-4764
- Performance Analysis of Priority-Based Access Class Barring Scheme for Massive MTC Random Access. Sim. Y., +, JSYST Dec. 2020 5245-5252
- Procurement-Based User Association for LTE-Advanced HetNets. *Kumar*, S., +, JSYST Sept. 2020 3194-3201
- QoS-Aware Cross-Layer Optimization of Hybrid DSL-LTE Access Networks. Chuah, T.C., +, JSYST June 2020 2175-2186
- Robust Secure Beamforming and Power Splitting for Millimeter-Wave Cognitive Satellite-Terrestrial Networks With SWIPT. Yan, Y., +, JSYST Sept. 2020 3233-3244
- Secure Hybrid Beamformers Design in mmWave MIMO Wiretap Systems. Tian, X., +, JSYST March 2020 548-559
- The Allocation and Reuse Scheme of Physical Cell Identifications Based on Maximum Degree First Coloring Algorithm. *Liu, M.*, +, *JSYST March* 2020 582-591
- Throughput Maximization for Cognitive Radio With Wirelessly Powered Primary Users. Sun, M., +, JSYST June 2020 2432-2442

Quantization (signal)

- Asymptotic Analysis of Full-Duplex Large-Scale MIMO Systems With Low-Resolution ADCs/DACs Over Rician Fading Channels. *Dai, J.*, +, *JSYST Dec. 2020 4832-4841*
- Rate-Loss Mitigation for a Millimeter-Wave Beamspace MIMO Lens Antenna Array System Using a Hybrid Beam Selection Scheme. Sarker, M.A.L., +, JSYST Sept. 2020 3582-3585
- Reconfigurable Architecture of UFMC Transmitter for 5G and Its FPGA Prototype. Kumar, V., +, JSYST March 2020 28-38

Quantum computing

Toward Energy-Oriented Optimization for Green Communication in Sensor Enabled IoT Environments. *Kumar, S.*, +, *JSYST Dec. 2020 4663-4673*

Query languages

Design Ontology in a Case Study for Cosimulation in a Model-Based Systems Engineering Tool-Chain. Lu, J., +, JSYST March 2020 1297-1308

Query processing

MQry: Elastic Validity Region for Querying Mobile Point-of-Interests in Infrastructure-Less Networks. *Jung. B.*, +, *JSYST June 2020 1852-1861*

Queueing theory

- Adaptive and Stable Delay Control for Combating Bufferbloat: Theory and Algorithms. Ye, J., +, JSYST March 2020 1285-1296
- Hierarchical Edge-Cloud SDN Controller System With Optimal Adaptive Resource Allocation for Load-Balancing. *Lin, F.P.*, +, *JSYST March 2020* 265-276
- Multigranular Wavelet Decomposition-Based Support Vector Regression and Moving Average Method for Service-Time Prediction on Web Map Service Platforms. *Dong, G.*, +, *JSYST Sept. 2020 3653-3664*

R

Radar clutter

Adaptive OFDM Waveform Design for Cognitive Radar in Signal-Dependent Clutter. Karimi, V., +, JSYST Sept. 2020 3630-3640

Joint Subarray Selection and Power Allocation for Cognitive Target Tracking in Large-Scale MIMO Radar Networks. Zhang, H., +, JSYST June 2020 2569-2580

Radar detection

Low Probability of Intercept-Based Optimal Power Allocation Scheme for an Integrated Multistatic Radar and Communication System. Shi, C., +, JSYST March 2020 983-994

Radar receivers

Low Probability of Intercept-Based Optimal Power Allocation Scheme for an Integrated Multistatic Radar and Communication System. Shi, C., +, JSYST March 2020 983-994

Radar signal processing

Adaptive OFDM Waveform Design for Cognitive Radar in Signal-Dependent Clutter. Karimi, V., +, JSYST Sept. 2020 3630-3640

Radar tracking

Joint Subarray Selection and Power Allocation for Cognitive Target Tracking in Large-Scale MIMO Radar Networks. Zhang, H., +, JSYST June 2020 2569-2580

Radial basis function networks

An Actor-Critic Deep Reinforcement Learning Approach for Transmission Scheduling in Cognitive Internet of Things Systems. *Yang*, *H.*, +, *JSYST March* 2020 51-60

Radiation protection

A Safety System for Human Radiation Protection and Guidance in Extreme Environmental Conditions. *Adamidi, E.S.*, +, *JSYST March 2020 1384-1394*

Radio access networks

Coordinated Hybrid Precoding Design in Millimeter Wave Fog-RAN. *Hao*, W., +, *JSYST March 2020 673-676*

Fast Switching With VM Migration in 5G Cloud Radio Access Networks. Wang, Y., +, JSYST March 2020 477-488

Interplay of Processing and Radio Parameters: A Service-Oriented Performance Study. Alabbasi, A., +, JSYST March 2020 398-409

QoS-Aware Cross-Layer Optimization of Hybrid DSL-LTE Access Networks. Chuah, T.C., +, JSYST June 2020 2175-2186

Radio direction-finding

WiFi Fingerprinting Indoor Localization Using Local Feature-Based Deep LSTM. Chen, Z., +, JSYST June 2020 3001-3010

Radio frequency

Artificial Noise Hopping: A Practical Secure Transmission Technique With Experimental Analysis for Millimeter Wave Systems. *Ju, Y.*, +, *JSYST Dec.* 2020 5121-5132

Extreme-Learning-Machine-Based Noniterative and Iterative Nonlinearity Mitigation for LED Communication Systems. *Gao*, *D*., +, *JSYST Dec*. 2020 4674-4683

On Communication Performance in Energy Harvesting WSNs Under a Cooperative Jamming Attack. Vo, V.N., +, JSYST Dec. 2020 4955-4966

RF Chain Reduction for MIMO Systems: A Hardware Prototype. *Gong, T.*, +, *JSYST Dec. 2020 5296-5307*

Radio links

Content Placement in Cache Networks Using Graph Coloring. *Javedankherad, M.*, +, *JSYST Sept. 2020 3129-3138*

EHLinQ: Distributed Scheduler for D2D Communication With RF Energy Harvesting. Lee, H., +, JSYST June 2020 2281-2292

Robust Power Control for Clustering-Based Vehicle-to-Vehicle Communication. Liu, Z., +, JSYST June 2020 2557-2568

Radio networks

A Contract Theory Approach-Based Scheme to Encourage Secondary Users for Cooperative Sensing in Cognitive Radio Networks. *Gupta, N.*, +, *JSYST June 2020 2400-2410*

Artificial-Noise-Aided Energy-Efficient Secure Beamforming for Multi-Eavesdroppers in Cognitive Radio Networks. *Chen, P.*, +, *JSYST Sept. 2020 3801-3812*

Bayesian-Inference-Based Sliding Window Trust Model Against Probabilistic SSDF Attack in Cognitive Radio Networks. Fu, Y., +, JSYST June 2020 1764-1775

Delay-Optimal Cooperation Policy in a Slotted Aloha Full-Duplex Wireless Network: Static Approach. Vaezi, K., +, JSYST June 2020 2257-2268

End-to-End Performance Analysis With Decode-and-Forward Relays in Multihop Wireless Systems Over\$\alpha\$- η- μ Fading Channels. Salameh, H.A.B., +, JSYST March 2020 84-92

Joint Trajectory Design, Tx Power Allocation, and Rx Power Splitting for UAV-Enabled Multicasting SWIPT Systems. *Kang, J.*, +, *JSYST Sept.* 2020 3740-3743

MQry: Elastic Validity Region for Querying Mobile Point-of-Interests in Infrastructure-Less Networks. *Jung, B.*, +, *JSYST June 2020 1852-1861*

Performance Evaluation of In-Band Full-Duplex System Using One-Time-Slot Two-Way Relay. *Chang, K.*, +, *JSYST March 2020 510-519*

Residual Energy Maximization in Cognitive Radio Networks With Q-Routing. Paul, A., +, JSYST Sept. 2020 3791-3800

Spectrum-Occupancy Aware Cooperative Spectrum Sensing Using Adaptive Detection. *Al-Jarrah*, *M.A.*, +, *JSYST June 2020 2225-2236*

Uplink Low-Power Scheduling for Delay-Bounded Industrial Wireless Networks Based on Imperfect Power-Domain NOMA. *Xu, C.*, +, *JSYST June* 2020 2443-2454

Radio receivers

Artificial Noisy MIMO Systems Under Correlated Scattering Rayleigh Fading—A Physical Layer Security Approach. *Liu, Y., +, JSYST June 2020* 2/21-2/32

Bridging the Gap Between CP-OFDM and ZP-OFDM for the Provision of Ultra-Low Latency Services in 5G. *Ayadi*, R., +, *JSYST March 2020 603-613*

FreeTrack: Device-Free Human Tracking With Deep Neural Networks and Particle Filtering. Zhou, R., +, JSYST June 2020 2990-3000

Joint Precoding and Combining Design for Hybrid Beamforming Systems With Subconnected Structure. Zhang, Z., +, JSYST March 2020 184-195

Joint Trajectory Design, Tx Power Allocation, and Rx Power Splitting for UAV-Enabled Multicasting SWIPT Systems. *Kang, J.*, +, *JSYST Sept.* 2020 3740-3743

Multiuser Variable Rate GO-OFDMA Architecture and Its FPGA Prototype. Palisetty, R., +, JSYST June 2020 2455-2463

Near-Optimal Detection of Monobit Digitized UWB Signals in the Presence of Noise and Strong Intersymbol Interference. *Khani, H.*, +, *JSYST June* 2020 2311-2322

Outage Probability and Throughput of Multirelay SWIPT-WPCN Networks With Nonlinear EH Model and Imperfect CSI. *Jiang, R.*, +, *JSYST March 2020 1206-1217*

Outage Probability in the Uplink of Multitier Millimeter Wave Cellular Networks. *Onireti*, O., +, *JSYST June* 2020 2520-2531

Partial-Fixed Interference Alignment in Multiuser Interference Channel. Chen, X., +, JSYST June 2020 2303-2310

Performance Analysis of Precoded Wireless OFDM With Carrier Frequency Offset. *Kalbat, F., +, JSYST June 2020 2237-2248*

Performance of Wireless Powered DF Relay System Under Nakagami-mFading: Relay Assists Energy-Constrained Source. Kumar, P., +, JSYST June 2020 2497-2507

Physical-Layer Security for Frequency Diverse Array Communication System Over Nakagami-*m* Fading Channels. *Ji*, S., +, *JSYST June 2020 2370-2381*

Radio reception

Joint Nullspace Projection-Based Interference Mitigation for Full-Duplex Relay-Assisted Multicell Networks. *Fadoul, M.M.*, +, *JSYST June 2020* 2392-2399

Radio spectrum management

A Contract Theory Approach-Based Scheme to Encourage Secondary Users for Cooperative Sensing in Cognitive Radio Networks. *Gupta, N.*, +, *JSYST June 2020 2400-2410*

A Robust Hyperbolic Tangent-Based Energy Detector With Gaussian and Non-Gaussian Noise Environments in Cognitive Radio System. *Qu, H.*, +, *JSYST Sept. 2020 3161-3172*

Bayesian-Inference-Based Sliding Window Trust Model Against Probabilistic SSDF Attack in Cognitive Radio Networks. Fu, Y, +, JSYST June 2020 1764-1775

Cognitive Radio Spectrum Sensing Under Joint TX/RX I/Q Imbalance and Uncalibrated Receiver. *Jalali, F.*, +, *JSYST March 2020 105-112*

Cooperative Sensing Scheme for Acquisition of Rotational Synchronization of Radar. Lee, J., +, JSYST June 2020 3061-3064

Cost-Benefit Tradeoff of Byzantine Attack in Cooperative Spectrum Sensing. Wu, J., +, JSYST June 2020 2532-2543

Energy-Efficient GCSA Medium Access Protocol for Infrastructure-Based Cognitive Radio Networks. Syed, T.S., +, JSYST March 2020 288-297

- Ergodic Capacity of NOMA-Based Uplink Satellite Networks With Randomly Deployed Users. *Yan, X.*, +, *JSYST Sept. 2020 3343-3350*
- Novel Algorithms for Blind Sensing of Signals With Variable Bandwidths in Cognitive Radio. De, P., JSYST Sept. 2020 4272-4283
- Spectrum Optimization for Satellite Communication Systems With Heterogeneous User Preferences. Li, F., +, JSYST June 2020 2187-2191
- Spectrum-Occupancy Aware Cooperative Spectrum Sensing Using Adaptive Detection. Al-Jarrah, M.A., +, JSYST June 2020 2225-2236
- Sum-Throughput Maximization of Secondary Users in an In-Band Full-Duplex Cognitive Wireless Powered Communication Network. *Jafari*, R., +, *JSYST June* 2020 2109-2120

Radio transceivers

- Cognitive Radio Spectrum Sensing Under Joint TX/RX I/Q Imbalance and Uncalibrated Receiver. *Jalali, F.*, +, *JSYST March 2020 105-112*
- Energy Efficiency Versus Reliability Tradeoff Improvement in Low-Power Wireless Communications. Zogovic, N., JSYST Sept. 2020 3173-3184

Radio transmitters

- Artificial-Noise-Aided Energy-Efficient Secure Beamforming for Multi-Eavesdroppers in Cognitive Radio Networks. *Chen, P.*, +, *JSYST Sept. 2020 3801-3812*
- FreeTrack: Device-Free Human Tracking With Deep Neural Networks and Particle Filtering. Zhou, R., +, JSYST June 2020 2990-3000
- Joint Precoding and Combining Design for Hybrid Beamforming Systems With Subconnected Structure. Zhang, Z., +, JSYST March 2020 184-195
- Multiuser Variable Rate GO-OFDMA Architecture and Its FPGA Prototype. Palisetty, R., +, JSYST June 2020 2455-2463
- Partial-Fixed Interference Alignment in Multiuser Interference Channel. Chen, X., +, JSYST June 2020 2303-2310
- Reconfigurable Architecture of UFMC Transmitter for 5G and Its FPGA Prototype. Kumar, V., +, JSYST March 2020 28-38
- Uplink Low-Power Scheduling for Delay-Bounded Industrial Wireless Networks Based on Imperfect Power-Domain NOMA. *Xu, C.*, +, *JSYST June* 2020 2443-2454
- WiFlowCount: Device-Free People Flow Counting by Exploiting Doppler Effect in Commodity WiFi. Zhou, R., +, JSYST Dec. 2020 4919-4930

Radiocommunication

Resource Allocation in Wireless Networks With Deep Reinforcement Learning: A Circumstance-Independent Approach. *Lee, H.*, +, *JSYST June 2020 2589-2592*

Radiofrequency interference

- A Contract Theory Approach-Based Scheme to Encourage Secondary Users for Cooperative Sensing in Cognitive Radio Networks. *Gupta, N.*, +, *JSYST June 2020 2400-2410*
- A Novel Communication System of High Capacity. Fattouche, M., JSYST Sept. 2020 4197-4208
- Adaptive Narrow-Band Interference Suppression and Performance Evaluation Based on Code-Aided in GNSS Inter-Satellite Links. Wang, H., +, JSYST March 2020 538-547
- An Analytical View of ASE for Multicell OFDMA Networks Based on Frequency-Reuse Scheme. Ghosh, J., +, JSYST March 2020 645-648
- Artificial-Noise-Aided Energy-Efficient Secure Beamforming for Multi-Eavesdroppers in Cognitive Radio Networks. *Chen, P.*, +, *JSYST Sept. 2020 3801-3812*
- Covert Communications in D2D Underlaying Cellular Networks With Power Domain NOMA. Jiang, Y., +, JSYST Sept. 2020 3717-3728
- Cross PHY/APP Layer User Grouping and Power Allocation for Uplink Multiantenna NOMA Video Communication Systems. *Tseng, S.*, +, *JSYST Sept. 2020 3351-3359*
- Delay- and Interference-Aware Routing for Wireless Mesh Network. *Chai*, Y, +, JSYST Sept. 2020 4119-4130
- Effect of Doppler Shift on the Performance of Multicell Full-Duplex Massive MIMO Networks. Dai, J., +, JSYST June 2020 2421-2431
- End-to-End Distortion Analysis of Nonorthogonal Layered Coding Over Relay-Assisted Networks. Padidar, P., +, JSYST Sept. 2020 4466-4476
- Energy-Efficient Adaptive Sectorization for 5G Green Wireless Communication Systems. *Jain, P., +, JSYST June 2020 2382-2391*
- Interplay of Processing and Radio Parameters: A Service-Oriented Performance Study. *Alabbasi*, A., +, *JSYST March 2020 398-409*

- Joint Nullspace Projection-Based Interference Mitigation for Full-Duplex Relay-Assisted Multicell Networks. Fadoul, M.M., +, JSYST June 2020 2392-2399
- Joint Position, Decoding Order, and Power Allocation Optimization in UAV-Based NOMA Downlink Communications. *Hu, D.*, +, *JSYST June 2020 2949-2960*
- Location-Aided mMIMO Channel Tracking and Hybrid Beamforming for High-Speed Railway Communications: An Angle-Domain Approach. *Xu*, *K.*, +, *JSYST March 2020 93-104*
- Optimizing Efficient Energy Transmission on a SWIPT Interference Channel Under Linear/Nonlinear EH Models. *Tuan, P.V.*, +, *JSYST March 2020* 457-468
- Outage and Average Rate Performances of Full-Duplex Multiuser AF Relay Systems With Time-Selective Fading. *Raut, P.*, +, *JSYST Sept. 2020 3390*-3308
- Partial-Fixed Interference Alignment in Multiuser Interference Channel. Chen, X., +, JSYST June 2020 2303-2310
- Performance Evaluation of In-Band Full-Duplex System Using One-Time-Slot Two-Way Relay. *Chang, K.*, +, *JSYST March 2020 510-519*
- Sum-Throughput Maximization of Secondary Users in an In-Band Full-Duplex Cognitive Wireless Powered Communication Network. *Jafari, R.*, +, *JSYST June 2020 2109-2120*
- Time-Dependent Bit Error Rate Analysis for Smart Utility Networks in the Presence of WLAN Interferers. *Gouissem, A.*, +, *JSYST June 2020 2133-2143*
- Uplink Low-Power Scheduling for Delay-Bounded Industrial Wireless Networks Based on Imperfect Power-Domain NOMA. *Xu, C.*, +, *JSYST June* 2020 2443-2454
- WmA-MiFN: A Weighted Majority and Auction Game Based Green Ultra-Dense Micro-Femtocell Network System. *Mukherjee*, A., +, *JSYST March* 2020 353-362

Radiofrequency power transmission

- A Novel Energy Supply Strategy for Stable Sensor Data Delivery in Wireless Sensor Networks. *Jin, Y., +, JSYST Sept. 2020 3418-3429*
- Deep RNN-Based Channel Tracking for Wireless Energy Transfer System. Kang, J., +, JSYST Sept. 2020 4340-4343
- EHLinQ: Distributed Scheduler for D2D Communication With RF Energy Harvesting. Lee, H., +, JSYST June 2020 2281-2292
- Energy Efficiency Evaluation for Downlink Full-Duplex Nonlinear MU-MI-MO-OFDM System With Self-Energy Recycling. *Shaikh, M.H.N.*, +, *JSYST Sept. 2020 3313-3324*
- Multiobjective Precoder Design for Coexisting Wireless Energy Transfer and Information Transmission Systems. *Zhang, H.*, +, *JSYST March 2020 445-456*
- Optimizing Efficient Energy Transmission on a SWIPT Interference Channel Under Linear/Nonlinear EH Models. *Tuan, P.V.*, +, *JSYST March 2020* 457-468
- Performance Analysis of Impaired SWIPT NOMA Relaying Networks Over Imperfect Weibull Channels. *Li*, *X*., +, *JSYST March 2020 669-672*
- Robust Optimization for Energy Efficiency in MIMO Two-Way Relay Networks With SWIPT. Li, Q., +, JSYST March 2020 196-207

Radiowave propagation

Near-Optimal Detection of Monobit Digitized UWB Signals in the Presence of Noise and Strong Intersymbol Interference. *Khani, H.*, +, *JSYST June* 2020 2311-2322

Railway communication

- Location-Aided mMIMO Channel Tracking and Hybrid Beamforming for High-Speed Railway Communications: An Angle-Domain Approach. *Xu*, *K.*, +, *JSYST March 2020 93-104*
- Proactive Forwarding of High Data Rate in Smart Virtualization Networks for High-Speed Trains. Yaseen, F.A., +, JSYST June 2020 1670-1681

Random access memory

Multigranularity Space Management Scheme for Accelerating the Write Performance of In-Memory File Systems. Wu, T., +, JSYST Dec. 2020 5429-5440

Random processes

Application of the Mixture of Lognormal Distribution to Represent the First-Order Statistics of Wireless Channels. *Das, S.*, +, *JSYST Sept. 2020* 4394-4401

Distributed Elections Using Site-Push Majority Winner Monitoring. Chaturvedi, K., +, JSYST June 2020 1682-1691

White-Box Implementation of Shamir's Identity-Based Signature Scheme. Feng. Q., +, JSYST June 2020 1820-1829

Random variables

Formal Reliability Analysis of an Integrated Power Generation System Using Theorem Proving. *Ahmad, W.*, +, *JSYST Dec. 2020 4820-4831*

Rapid prototyping (industrial)

Additive Manufacturing Evaluation Tool for Design Studies. *Garzaniti*, N., +, JSYST Sept. 2020 4382-4393

Rayleigh channels

An Analytical View of ASE for Multicell OFDMA Networks Based on Frequency-Reuse Scheme. Ghosh, J., +, JSYST March 2020 645-648

Artificial Noisy MIMO Systems Under Correlated Scattering Rayleigh Fading—A Physical Layer Security Approach. *Liu, Y., +, JSYST June 2020 2121-2132*

Cooperative Communication and Energy-Harvesting-Enabled Energy-Efficient Design of MI-Based Clustered Nonconventional WSNs. *Prasanna*, A.L., +, JSYST June 2020 2293-2302

Downlink NOMA Networks With Hybrid Long-Packet and Short-Packet Communications in Flat Rayleigh Fading Channels. *Lai*, *X*., +, *JSYST Sept.* 2020 3410-3413

End-to-End Distortion Analysis of Nonorthogonal Layered Coding Over Relay-Assisted Networks. *Padidar, P., +, JSYST Sept. 2020 4466-4476*

End-to-End Performance Analysis With Decode-and-Forward Relays in Multihop Wireless Systems Over\$\alpha\$- η- μ Fading Channels. Salameh, H.A.B., +, JSYST March 2020 84-92

Energy Efficiency Versus Reliability Tradeoff Improvement in Low-Power Wireless Communications. Zogovic, N., JSYST Sept. 2020 3173-3184

Outage Probability and Throughput of Multirelay SWIPT-WPCN Networks With Nonlinear EH Model and Imperfect CSI. *Jiang, R.*, +, *JSYST March* 2020 1206-1217

Reactive power

A Coordinated Real-Time Voltage Control Approach for Increasing the Penetration of Distributed Generation. *Othman, M.M.*, +, *JSYST March 2020 699-707*

A Planning Framework for Optimal Partitioning of Distribution Networks Into Microgrids. Osama, R.A., +, JSYST March 2020 916-926

Adaptive Interconnection and Damping Assignment Passivity-Based Control of Interlinking Converter in Hybrid AC/DC Grids. *Azimi, S.M.*, +, *JSYST Dec. 2020 4718-4725*

An Improvized Coordinated Voltage Control Scheme for Better Utilization of Regulating Devices During Various Operating Conditions of a Distribution System. *Gururaj, M.V.*, +, *JSYST Dec. 2020 4891-4900*

Enhanced Active and Reactive Power Sharing in Islanded Microgrids. Parvizimosaed, M., +, JSYST Dec. 2020 5037-5048

Model Predictive Control via PV-Based VAR Scheme for Power Distribution Systems With Regular and Unexpected Abnormal Loads. *Yang, Y.*, +, *JSYST March 2020 689-698*

Voltage Stability Constrained OPF in Multi-Micro-Grid Considering Demand Response Programs. *Nojavan, M.*, +, *JSYST Dec. 2020 5221-5228*

Reactive power control

A Cyber-Physical Cooperative Hierarchical Control Strategy for Islanded Microgrid Facing With Random Communication Failure. *Zhang, B.*, +, *JSYST June 2020 2849-2860*

Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG. *Gheisarnejad*, M., +, JSYST March 2020 1058-1068

Combined Impact of Network Reconfiguration and Volt-VAR Control Devices on Energy Savings in the Presence of Distributed Generation. Pamshetti, V.B., +, JSYST March 2020 995-1006

Model Predictive for Reactive Power Scheduling Control Strategy for PV—Battery Hybrid System in Competitive Energy Market. *Lupangu, C.*, +, *JSYST Sept. 2020 4071-4078*

Optimal Control Methods for Photovoltaic Enabled Grid With Abnormal Power Loads. *Yang*, Y., +, *JSYST March* 2020 852-861

Two-Mode Adaptive Schemes for VAR Control With Solar Power and Energy Storage. *Doan, S., +, JSYST March 2020 889-899*

Real-time systems

An Improvized Coordinated Voltage Control Scheme for Better Utilization of Regulating Devices During Various Operating Conditions of a Distribution System. *Gururaj, M.V.*, +, *JSYST Dec. 2020 4891-4900*

Reconfigurable Architecture of UFMC Transmitter for 5G and Its FPGA Prototype. *Kumar, V., +, JSYST March 2020 28-38*

Transient Instability Mitigation via Repetitive Corrective Actions Based Upon the Real-Time Macrocoherency Evaluation. *Babu, G.V.N.Y.*, +, *JSYST Dec.* 2020 5084-5095

Receivers

Capacity-Maximized Transmitter Precoding for MU MIMO VLC Systems With Bounded Channel Uncertainties. *Zhao, S., +, JSYST Dec. 2020 5144-5147*

Environment-Assisted Passive WiFi Tracking With Self-Localizing Asynchronous Sniffers. Suraweera, N., +, JSYST Dec. 2020 4798-4809

Extreme-Learning-Machine-Based Noniterative and Iterative Nonlinearity Mitigation for LED Communication Systems. *Gao, D.*, +, *JSYST Dec.* 2020 4674-4683

Low-Complexity Reconfigurable and Intelligent Ultrawideband Angular Sensing. Joshi, H., +, JSYST Dec. 2020 4931-4942

RF Chain Reduction for MIMO Systems: A Hardware Prototype. *Gong, T.*, +, *JSYST Dec.* 2020 5296-5307

WiFlowCount: Device-Free People Flow Counting by Exploiting Doppler Effect in Commodity WiFi. Zhou, R., +, JSYST Dec. 2020 4919-4930

Receiving antennas

Cooperative Space Shift Keying Media-Based Modulation With Hybrid Relaying. Yarkin, F., +, JSYST March 2020 500-509

Energy Efficiency Evaluation for Downlink Full-Duplex Nonlinear MU-MI-MO-OFDM System With Self-Energy Recycling. *Shaikh, M.H.N.*, +, *JSYST Sept. 2020 3313-3324*

Joint Precoding and Combining Design for Hybrid Beamforming Systems With Subconnected Structure. Zhang, Z., +, JSYST March 2020 184-195

Transmit Antenna Selection for Full-Duplex Spatial Modulation Multiple-Input Multiple-Output System. Van Nguyen, L., +, JSYST Dec. 2020 4777-4785

Recommender systems

A Temporal Recommendation Mechanism Based on Signed Network of User Interest Changes. Chen, J., +, JSYST March 2020 244-252

Reconfigurable architectures

Reconfigurable Architecture of UFMC Transmitter for 5G and Its FPGA Prototype. Kumar, V., +, JSYST March 2020 28-38

Recurrent neural networks

A Hierarchical Attention Model for CTR Prediction Based on User Interest. Wang, Q., +, JSYST Sept. 2020 4015-4024

Deep RNN-Based Channel Tracking for Wireless Energy Transfer System. Kang, J., +, JSYST Sept. 2020 4340-4343

Echo State Network and Echo State Gaussian Process for Non-Line-of-Sight Target Tracking. Yang, X., +, JSYST Sept. 2020 3885-3892

Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator. *Kumar*; V.N., +, JSYST Sept. 2020 4308-4319

Load Disaggregation Using One-Directional Convolutional Stacked Long Short-Term Memory Recurrent Neural Network. Quek, Y.T., +, JSYST March 2020 1395-1404

Recursive filters

Recursive Smooth Variable Structure Filter for Estimation Processes in Direct Power Control Scheme Under Balanced and Unbalanced Power Grid. AlShabi, M., +, JSYST March 2020 971-982

Recycling

Augmenting Water Supplies Through Urban Wastewater Recycling (March 2019). Malisa, R., +, JSYST March 2020 1523-1530

Redundancy

PMU Placement for Measurement Redundancy Distribution Considering Zero Injection Bus and Contingencies. *Chen, X.*, +, *JSYST Dec. 2020* 5396-5406

Regression analysis

Echo State Network and Echo State Gaussian Process for Non-Line-of-Sight Target Tracking. Yang, X., +, JSYST Sept. 2020 3885-3892

Energy-Efficient IoT-Fog-Cloud Architectural Paradigm for Real-Time Wildfire Prediction and Forecasting. Kaur, H., +, JSYST June 2020 2003-2011

Multigranular Wavelet Decomposition-Based Support Vector Regression and Moving Average Method for Service-Time Prediction on Web Map Service Platforms. *Dong, G.*, +, *JSYST Sept. 2020 3653-3664*

Reinforcement learning

Intelligent Residential Energy Management System Using Deep Reinforcement Learning. Mathew, A., +, JSYST Dec. 2020 5362-5372

Relay networks (telecommunication)

Adaptive Jamming Power Control for Untrusted Relay Networks With Imperfect Channel Reciprocity. Lee, K., +, JSYST Sept. 2020 4217-4220

Cooperative Space Shift Keying Media-Based Modulation With Hybrid Relaying. Yarkin, F., +, JSYST March 2020 500-509

Delay-Optimal Cooperation Policy in a Slotted Aloha Full-Duplex Wireless Network: Static Approach. *Vaezi*, K., +, *JSYST June 2020 2257-2268*

End-to-End Distortion Analysis of Nonorthogonal Layered Coding Over Relay-Assisted Networks. Padidar, P., +, JSYST Sept. 2020 4466-4476

End-to-End Performance Analysis With Decode-and-Forward Relays in Multihop Wireless Systems Over\$\alpha\$- η- μ Fading Channels. Salameh, H.A.B., +, JSYST March 2020 84-92

Energy-Efficient Design of MI Communication-Based 3-D Non-Conventional WSNs. Yadav, S., +, JSYST June 2020 2585-2588

Energy-Efficient Resource Allocation in SWIPT Cooperative Wireless Networks. Guo, S., +, JSYST Sept. 2020 4131-4142

Increasing the Lifetime of Underwater Acoustic Sensor Networks: Difference Convex Approach. *Mohammadi*, Z., +, *JSYST Sept.* 2020 3214-3224

Joint Beamforming and Relay Selection in AF Two-Way Relay Networks With Energy Transfer. *Tian, M., +, JSYST June 2020 2597-2600*

Joint Nullspace Projection-Based Interference Mitigation for Full-Duplex Relay-Assisted Multicell Networks. *Fadoul, M.M.*, +, *JSYST June 2020* 2392-2399

Novel Energy-Harvesting AF Relaying Schemes With Channel Estimation Errors. Zhou, Y., +, JSYST March 2020 333-342

On Secure Mixed RF-FSO Decode-and-Forward Relaying Systems With Energy Harvesting. Saber, M.J., +, JSYST Sept. 2020 4402-4405

Optimizing Design Parameters for Relay-Aided Massive MIMO Systems. El-Mashed, M.G., JSYST June 2020 2249-2256

Outage Probability and Throughput of Multirelay SWIPT-WPCN Networks With Nonlinear EH Model and Imperfect CSI. *Jiang, R.*, +, *JSYST March* 2020 1206-1217

Performance Analysis of a Mixed Cooperative PLC–VLC System for Indoor Communication Systems. *Jani, M., +, JSYST March 2020 469-476*

Performance Analysis of Impaired SWIPT NOMA Relaying Networks Over Imperfect Weibull Channels. *Li*, *X*., +, *JSYST March 2020 669-672*

Performance Evaluation of In-Band Full-Duplex System Using One-Time-Slot Two-Way Relay. *Chang, K.*, +, *JSYST March 2020 510-519*

Performance of Wireless Powered DF Relay System Under Nakagami-mFading: Relay Assists Energy-Constrained Source. Kumar, P., +, JSYST June 2020 2497-2507

Physical Layer Security Enhancement for Satellite Communication Among Similar Channels: Relay Selection and Power Allocation. *Li*, *J*., +, *JSYST March* 2020 433-444

Relay-Aided Outdoor-to-Indoor Communication in Millimeter-Wave Cellular Networks. *Ntontin, K.*, +, *JSYST June 2020 2473-2484*

Robust Optimization for Energy Efficiency in MIMO Two-Way Relay Networks With SWIPT. Li, Q., +, JSYST March 2020 196-207

Securing Untrusted Full-Duplex Relay Channels in the Presence of Multiple External Cluster-Based Eavesdroppers. *Mabrouk, A.*, +, *JSYST March* 2020 665-668 Security--Reliability Tradeoff for Untrusted and Selfish Relay-Assisted D2D Communications in Heterogeneous Cellular Networks for IoT. *Zhang, C.*, +, *JSYST June 2020 2192-2201*

Relay protection

A New Phase Angle of Superimposed Positive Sequence Current-Based Discrimination Scheme for Prevention of Maloperation of Distance Relay During Severe Stressed Conditions. *Rao, J.T.*, +, *JSYST Sept. 2020 3705-3716*

Allocation of Renewables, Switches, and Relays Considering Relays Actual Operation Time. Fatemi, S.S., +, JSYST March 2020 950-959

Highly Accurate Directional Overcurrent Coordination via Combination of Rosen's Gradient Projection—Complex Method With GA-PSO Algorithm. Darabi, A., +, JSYST March 2020 1171-1182

Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. Manohar, M., +, JSYST Sept. 2020 3430-3439

Relavs

Energy Efficiency for MISO-OFDMA-Based User-Relay Assisted Cellular Networks. *Basturk*, 1., +, *JSYST Dec.* 2020 5274-5283

On Communication Performance in Energy Harvesting WSNs Under a Cooperative Jamming Attack. Vo, V.N., +, JSYST Dec. 2020 4955-4966

PMU-Assisted Zone-3 Protection Scheme for PV Integrated Power Systems Immune to Interharmonics. Prakash, T., +, JSYST Sept. 2020 3267-3276

Trajectory Optimization of SUAV for Marine Vessels Communication Relay Mission. Lun, Y, +, JSYST Dec. 2020 5014-5024

Reliability

Green Computing in Underwater Wireless Sensor Networks Pressure Centric Energy Modeling. *Khasawneh*, A.M., +, JSYST Dec. 2020 4735-4745 Microservice-Based Architecture for an Energy Management System. Lyu,

On Communication Performance in Energy Harvesting WSNs Under a Cooperative Jamming Attack. Vo. V.N., +, JSYST Dec. 2020 4955-4966

Optimal Chance-Constrained Scheduling of Reconfigurable Microgrids Considering Islanding Operation Constraints. *Hemmati, M.*, +, *JSYST Dec.* 2020 5340-5349

Spatio-Temporal Value of Energy Storage in Transmission Networks. Khatami, R., +, JSYST Sept. 2020 3855-3864

Reliability theory

Formal Reliability Analysis of an Integrated Power Generation System Using Theorem Proving. Ahmad, W., +, JSYST Dec. 2020 4820-4831

Remotely operated vehicles

Z., +, JSYST Dec. 2020 5061-5072

Mobile Target Tracking Mechanisms Using Unmanned Aerial Vehicle: Investigations and Future Directions. *Hentati, A.I.*, +, *JSYST June 2020* 2969-2979

Renewable energy sources

Adaptive Traffic Management and Energy Cooperation in Renewable-Energy-Powered Cellular Networks. *Lee, H., +, JSYST March 2020 132-143* Allocation of Renewables, Switches, and Relays Considering Relays Actual Operation Time. *Fatemi, S.S., +, JSYST March 2020 950-959*

Decentralized Output-Feedback-Based Robust LQR V-f Controller for PV-Battery Microgrid Including Generation Uncertainties. Sen, S., +, JSYST Sept. 2020 4418-4429

Design Optimization of RES-Based Desalination Systems Cooperating With Smart Grids. Malisovas, A., +, JSYST Dec. 2020 4706-4717

Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur, R.*, +, *JSYST March 2020 729-737*

Improving Microgrid Low-Voltage Ride-Through Capacity Using Neural Control. *Djilali, L.*, +, *JSYST June 2020 2825-2836*

Power Output Smoothing for Renewable Energy System: Planning, Algorithms, and Analysis. Chen, X., +, JSYST March 2020 1034-1045

Robust Optimization-Based Energy Storage Operation for System Congestion Management. *Yan*, X., +, *JSYST June 2020 2694-2702*

Reservoirs

SimProxy Decision Support System: A Neural Network Proxy Applied to Reservoir and Surface Integrated Optimization. *Kohler, M.*, +, *JSYST Dec.* 2020 5111-5120

Resilience

Flow Setup Aware Controller Placement in Distributed Software-Defined Networking. *Correia*, N., +, *JSYST Dec. 2020 5096-5099*

Resonator

Fast Wireless Power Transfer for Multiple Receivers in Linear Topology. Lee, K., +, JSYST March 2020 649-652

Resource allocation

- Bio-Inspired Heuristics for VM Consolidation in Cloud Data Centers. Wang, J.V., +, JSYST March 2020 152-163
- Campus Edge Computing Network Based on IoT Street Lighting Nodes. Chang, Y, +, JSYST March 2020 164-171
- Cross PHY/APP Layer User Grouping and Power Allocation for Uplink Multiantenna NOMA Video Communication Systems. *Tseng*, S., +, *JSYST Sept.* 2020 3351-3359
- Crowd-Based Cooperative Task Allocation via Multicriteria Optimization and Decision-Making. Zhao, L., +, JSYST Sept. 2020 3904-3915
- Duration-Sensitive Task Allocation for Mobile Crowd Sensing. Lai, C., +, JSYST Sept. 2020 4430-4441
- Dynamic Network Scheduling for Virtual Routers. *Lee, K.*, +, *JSYST Sept.* 2020 3618-3629
- Edge Computing-Based Mobile Health System: Network Architecture and Resource Allocation. *Lin, D.*, +, *JSYST June 2020 1716-1727*
- Energy-Efficient Resource Allocation for Dynamic Priority-Based Vehicular Mobile-Health Communications. Fan, B., +, JSYST June 2020 2097-2108
- Energy-Efficient Resource Allocation in SWIPT Cooperative Wireless Networks. Guo, S., +, JSYST Sept. 2020 4131-4142
- Ergodic Capacity of NOMA-Based Uplink Satellite Networks With Randomly Deployed Users. Yan, X., +, JSYST Sept. 2020 3343-3350
- Fast Switching With VM Migration in 5G Cloud Radio Access Networks. Wang, Y., +, JSYST March 2020 477-488
- Hierarchical Edge-Cloud SDN Controller System With Optimal Adaptive Resource Allocation for Load-Balancing. *Lin, F.P.*, +, *JSYST March 2020* 265-276
- Improved Performance of Flywheel Fast Charging System (FFCS) Using Enhanced Artificial Immune System (EAIS). Gabbar, H.A., +, JSYST March 2020 824-831
- Joint Subarray Selection and Power Allocation for Cognitive Target Tracking in Large-Scale MIMO Radar Networks. Zhang, H., +, JSYST June 2020 2569-2580
- Joint Trajectory Design, Tx Power Allocation, and Rx Power Splitting for UAV-Enabled Multicasting SWIPT Systems. *Kang, J.*, +, *JSYST Sept.* 2020 3740-3743
- Loosely Coupled Cloud Robotic Framework for QoS-Driven Resource Allocation-Based Web Service Composition. *Xie, Y., +, JSYST March 2020 1245-1256*
- Market-Driven Stochastic Resource Allocation Framework for Wireless Network Virtualization. *Gomez, M.M.*, +, *JSYST March 2020 489-499*
- Multigranular Wavelet Decomposition-Based Support Vector Regression and Moving Average Method for Service-Time Prediction on Web Map Service Platforms. *Dong*, G., +, *JSYST Sept.* 2020 3653-3664
- Network Slice Admission Model: Tradeoff Between Monetization and Rejections. Challa, R., +, JSYST March 2020 657-660
- On the Optimization of User Association and Resource Allocation in Het-Nets With mm-Wave Base Stations. *Chaieb, C.*, +, *JSYST Sept. 2020 3957-3967*
- Probabilistic Stability of Traffic Load Balancing on Wireless Complex Networks. *Moutsinas, G.*, +, *JSYST June 2020 2551-2556*
- Procurement-Based User Association for LTE-Advanced HetNets. *Kumar*, S., +, JSYST Sept. 2020 3194-3201
- QoS-Aware Cross-Layer Optimization of Hybrid DSL-LTE Access Networks. Chuah, T.C., +, JSYST June 2020 2175-2186
- Resource Allocation in Wireless Networks With Deep Reinforcement Learning: A Circumstance-Independent Approach. *Lee, H.*, +, *JSYST June 2020 2589-2592*
- Robust Power Control for Clustering-Based Vehicle-to-Vehicle Communication. Liu, Z., +, JSYST June 2020 2557-2568

- The Allocation and Reuse Scheme of Physical Cell Identifications Based on Maximum Degree First Coloring Algorithm. *Liu, M.*, +, *JSYST March* 2020 582-591
- Throughput Maximization for Cognitive Radio With Wirelessly Powered Primary Users. Sun, M., +, JSYST June 2020 2432-2442

Resource management

- A Flexible Multicarrier Scheme Based on the Discrete Orthogonal Stockwell Transform. Colen, G.R., +, JSYST Dec. 2020 5284-5295
- Autonomous Resource Slicing for Virtualized Vehicular Networks With D2D Communications Based on Deep Reinforcement Learning. Sun, G., +, JSYST Dec. 2020 4694-4705
- Dynamic User Association for Resilient Backhauling in Satellite–Terrestrial Integrated Networks. *Dai*, C., +, *JSYST Dec*. 2020 5025-5036
- Energy Efficiency for MISO-OFDMA-Based User-Relay Assisted Cellular Networks. *Basturk, I.*, +, *JSYST Dec. 2020 5274-5283*
- Iterative Sub-Band and Power Allocation in Downlink Multiband NOMA. Goswami, D., +, JSYST Dec. 2020 5199-5209
- Joint Task Offloading, CNN Layer Scheduling, and Resource Allocation in Cooperative Computing System. Chai, R., +, JSYST Dec. 2020 5350-5361
 Multigranularity Space Management Scheme for Accelerating the Write Performance of In-Memory File Systems. Wu, T., +, JSYST Dec. 2020 5429-

5440 Rician channels

- Asymptotic Analysis of Full-Duplex Large-Scale MIMO Systems With Low-Resolution ADCs/DACs Over Rician Fading Channels. *Dai, J.*, +, *JSYST Dec. 2020 4832-4841*
- Outage and Average Rate Performances of Full-Duplex Multiuser AF Relay Systems With Time-Selective Fading. *Raut, P.*, +, *JSYST Sept. 2020 3390-3398*

Risk analysis

- A Functional Resonance Analysis Method Driven Resilience Quantification for Socio-Technical Systems. *Bellini*, E., +, *JSYST March* 2020 1234-1244
- Risk Analysis of Cyber-Physical Systems by GTST-MLD. Di Maio, F., +, JSYST March 2020 1333-1340
- Risk-Based Probabilistic Quantification of Power Distribution System Operational Resilience. *Poudel, S.*, +, *JSYST Sept. 2020 3506-3517*

Risk management

- A Variable Neighborhood Search-Based Hybrid Multiobjective Evolutionary Algorithm for HazMat Heterogeneous Vehicle Routing Problem With Time Windows. *Jiang, P.*, +, *JSYST Sept. 2020 4344-4355*
- Cybersecurity Vulnerability Mitigation Framework Through Empirical Paradigm (CyFEr): Prioritized Gap Analysis. *Gourisetti, S.N.G.*, +, *JSYST June 2020 1897-1908*
- Quantifying the System-Level Resilience of Thermal Power Generation to Extreme Temperatures and Water Scarcity. *Zhou, Y.*, +, *JSYST March 2020 749-759*
- Ranking Critical Activities in Complex System Development Projects. Srinivasan, S.M., +, JSYST March 2020 1353-1364
- Understanding Risks and Opportunities of Autonomous Vehicle Technology Adoption Through Systems Dynamic Scenario Modeling—The American Insurance Industry. *Liu, C.*, +, *JSYST March 2020 1365-1374*

Road safety

- Lightweight Secure Message Broadcasting Protocol for Vehicle-to-Vehicle Communication. *Limbasiya*, T., +, *JSYST March* 2020 520-529
- Optimal Connected Cruise Control With Arbitrary Communication Delays. Wang, Z., +, JSYST June 2020 2913-2924
- Safety Cruise Control of Connected Vehicles Using Radar and Vehicle-to-Vehicle Communication. Ma, Z., +, JSYST Sept. 2020 4602-4613
- Understanding Risks and Opportunities of Autonomous Vehicle Technology Adoption Through Systems Dynamic Scenario Modeling—The American Insurance Industry. *Liu*, C., +, *JSYST March 2020 1365-1374*

Road traffic control

- Optimal Connected Cruise Control With Arbitrary Communication Delays. Wang, Z., +, JSYST June 2020 2913-2924
- Safety Cruise Control of Connected Vehicles Using Radar and Vehicle-to-Vehicle Communication. Ma, Z., +, JSYST Sept. 2020 4602-4613

Road vehicles

Safety Cruise Control of Connected Vehicles Using Radar and Vehicle-to-Vehicle Communication. Ma, Z., +, JSYST Sept. 2020 4602-4613

System Integration of Sensor-Fusion Localization Tasks Using Vision-Based Driving Lane Detection and Road-Marker Recognition. *Lin, C.*, +, *JSYST Sept. 2020 4523-4534*

Roads

A Generalized Dynamic Planning Framework for Green UAV-Assisted Intelligent Transportation System Infrastructure. *Lucic, M.C.*, +, *JSYST Dec.* 2020 4786-4797

Robot dynamics

Formation Obstacle Avoidance: A Fluid-Based Solution. Wu, J., +, JSYST March 2020 1479-1490

Robot kinematics

Formation Obstacle Avoidance: A Fluid-Based Solution. Wu, J., +, JSYST March 2020 1479-1490

Globally Stable Formation Control of Nonholonomic Multiagent Systems With Bearing-Only Measurement. *Luo*, X., +, *JSYST June 2020 2901-2912*

Robot sensing systems

Ephemeral-Cyber-Physical System: A Cloud-Like CPS Using Shared Devices in Open IoT. *Noguchi, H., +, JSYST Dec. 2020 5176-5186*

Robot vision

A Multilevel Fusion System for Multirobot 3-D Mapping Using Heterogeneous Sensors. *Yue, Y., +, JSYST March 2020 1341-1352*

A Robust Visual Person-Following Approach for Mobile Robots in Disturbing Environments. *Pang, L.*, +, *JSYST June 2020 2965-2968*

FPGA-Based Design Optimization in Autonomous Robot Systems for Inspection of Civil Infrastructure. *Lins, R.G.*, +, *JSYST June 2020 2961-2964*

Multicriteria UAV Base Stations Placement for Disaster Management. Akram, T., +, JSYST Sept. 2020 3475-3482

Visual Perception for Multiple Human–Robot Interaction From Motion Behavior. Benli, E., +, JSYST June 2020 2937-2948

Robots

Containment Control of Linear Multiagent Systems With Stochastic Disturbances via Event-Triggered Strategies. Zou, W., +, JSYST Dec. 2020 4810-4819

Robust control

Decentralized Output-Feedback-Based Robust LQR V-f Controller for PV-Battery Microgrid Including Generation Uncertainties. Sen, S., +, JSYST Sept. 2020 4418-4429

Multilevel Inverter (MLI)-Based Stand-Alone Photovoltaic System: Modeling, Analysis, and Control. Kumar, N., +, JSYST March 2020 909-915

Neuroadaptive Sliding Mode Formation Control of Autonomous Underwater Vehicles With Uncertain Dynamics. Wang, J., +, JSYST Sept. 2020 3325-3333

Robust Nonlinear State Feedback Control of Bidirectional Interlink Power Converters in Grid-Connected Hybrid Microgrids. *Zolfaghari, M.*, +, *JSYST March 2020 1117-1124*

Robust Power Control for Clustering-Based Vehicle-to-Vehicle Communication. Liu, Z., +, JSYST June 2020 2557-2568

Robust Voltage Control in Inverter-Interfaced Microgrids Under Plug-and-Play Functionalities. Zarei, A., +, JSYST June 2020 2813-2824

Secure Consensus Control of Multiagent Cyber-Physical Systems With Uncertain Nonlinear Models. Rezaee, H., +, JSYST Sept. 2020 3539-3546

Toward a Robust Design of an Aileron Electromechanical Actuator: Sensitivity Analysis and Parametric Tolerancing Using a Variational Approach. Siala, H., +, JSYST Sept. 2020 3977-3986

Root loci

A Novel Control Method Based on Droop for Cooperation of Flywheel and Battery Energy Storage Systems in Islanded Microgrids. *Khodadoost Arani*, A.A., +, JSYST March 2020 1080-1087

Rotors

Transient Instability Mitigation via Repetitive Corrective Actions Based Upon the Real-Time Macrocoherency Evaluation. *Babu, G.V.N.Y.*, +, *JSYST Dec.* 2020 5084-5095

Routing

Flow Setup Aware Controller Placement in Distributed Software-Defined Networking. *Correia, N.*, +, *JSYST Dec. 2020 5096-5099*

Green Computing in Underwater Wireless Sensor Networks Pressure Centric Energy Modeling. *Khasawneh, A.M.*, +, *JSYST Dec. 2020 4735-4745*Toward Energy-Oriented Optimization for Green Communication in Sensor Enabled IoT Environments. *Kumar, S.*, +, *JSYST Dec. 2020 4663-4673*

Routing protocols

A Software-Defined Management System for IP-Enabled WSNs. *Jura-do-Lasso*, F.F., +, *JSYST June 2020 2335-2346*

Green Computing in Underwater Wireless Sensor Networks Pressure Centric Energy Modeling. *Khasawneh, A.M.*, +, *JSYST Dec. 2020 4735-4745*Performance Analysis of Software-Defined Multihop Wireless Sensor Networks. *Jurado-Lasso, F.F.*, +, *JSYST Dec. 2020 4653-4662*

RSSI

MEGAN: Multipurpose Energy-Efficient, Adaptable, and Low-Cost Wireless Sensor Node for the Internet of Things. *Misra, S.*, +, *JSYST March* 2020 144-151

S

Safety

Data-Driven Vulnerability Exploration for Design Phase System Analysis. *Bakirtzis, G.*, +, *JSYST Dec. 2020 4864-4873*

Efficient Lattice-Based Ring Signature for Message Authentication in VANETs. *Mundhe, P., +, JSYST Dec. 2020 5463-5474*

Safety systems

A Safety System for Human Radiation Protection and Guidance in Extreme Environmental Conditions. *Adamidi, E.S.*, +, *JSYST March 2020 1384-1394*

Safety-critical software

Dynamic Fault Tree Generation for Safety-Critical Systems Within a Systems Engineering Approach. *Baklouti, A.*, +, *JSYST March 2020 1512-1522*

Model-Based Design of Complex Aeronautical Systems Through Digital Twin and Thread Concepts. *Bachelor, G., +, JSYST June 2020 1568-1579* Probabilistic Inference of Fault Condition of Cyber-Physical Systems Under Uncertainty. *Tao, X., +, JSYST Sept. 2020 3256-3266*

Sampled data systems

Global Fault-Tolerant Sampled-Data Control for Large-Scale Switched Time-Delay Nonlinear Systems. He, W., +, JSYST June 2020 1549-1557

Sampled-Data Decentralized Output Feedback Control for a Class of Switched Large-Scale Stochastic Nonlinear Systems. *Li*, S., +, *JSYST June* 2020 1602-1610

Satellite communication

Optimizing the Ground Network of Optical MEO Satellite Communication Systems. *Lyras*, N.K., +, JSYST Sept. 2020 3968-3976

Physical Layer Security Enhancement for Satellite Communication Among Similar Channels: Relay Selection and Power Allocation. *Li*, *J*., +, *JSYST March* 2020 433-444

Random Pattern Multiplexing for Random Access in IoT-Oriented Satellite Networks. Zhao, B., +, JSYST Sept. 2020 4089-4100

Robust Secure Beamforming and Power Splitting for Millimeter-Wave Cognitive Satellite—Terrestrial Networks With SWIPT. *Yan*, *Y*, +, *JSYST Sept.* 2020 3233-3244

Spectrum Optimization for Satellite Communication Systems With Heterogeneous User Preferences. Li, F, +, JSYST June 2020 2187-2191

System-of-Systems Quality Attribute-Based Architectural Alternatives. *Nelson, T.*, +, *JSYST Sept. 2020 3844-3854*

Satellite links

Adaptive Narrow-Band Interference Suppression and Performance Evaluation Based on Code-Aided in GNSS Inter-Satellite Links. Wang, H., +, JSYST March 2020 538-547

Ergodic Capacity of NOMA-Based Uplink Satellite Networks With Randomly Deployed Users. Yan, X., +, JSYST Sept. 2020 3343-3350

Optimizing the Ground Network of Optical MEO Satellite Communication Systems. Lyras, N.K., +, JSYST Sept. 2020 3968-3976

Satellite navigation

Adaptive Narrow-Band Interference Suppression and Performance Evaluation Based on Code-Aided in GNSS Inter-Satellite Links. Wang, H., +, JSYST March 2020 538-547

Fault-Tolerant GNSS/SINS/DVL/CNS Integrated Navigation and Positioning Mechanism Based on Adaptive Information Sharing Factors. *Xiong*, H., +, JSYST Sept. 2020 3744-3754

Satellites

Dynamic User Association for Resilient Backhauling in Satellite-Terrestrial Integrated Networks. *Dai*, C., +, *JSYST Dec*. 2020 5025-5036

Expectation and SAA Models and Algorithms for Scheduling of Multiple Earth Observation Satellites Under the Impact of Clouds. Wang, J., +, $JSYST\ Dec.\ 2020\ 5451-5462$

SCADA systems

Determining Impact of Lightning Strike Location on Failures in Transmission Network Elements Using Fuzzy Decision-Making. *Petrovic, I.*, +, *JSYST June 2020 2665-2675*

Risk Analysis of Cyber-Physical Systems by GTST-MLD. *Di Maio, F.*, +, *JSYST March 2020 1333-1340*

Scheduling

A Generalized Dynamic Planning Framework for Green UAV-Assisted Intelligent Transportation System Infrastructure. *Lucic, M.C.*, +, *JSYST Dec.* 2020 4786-4797

A WOA-Based Optimization Approach for Task Scheduling in Cloud Computing Systems. *Chen, X.*, +, *JSYST Sept. 2020 3117-3128*

An Actor-Critic Deep Reinforcement Learning Approach for Transmission Scheduling in Cognitive Internet of Things Systems. *Yang, H.*, +, *JSYST March 2020 51-60*

An Adaptive Grid Frequency Support Mechanism for Energy Management in Cloud Data Centers. Kaur, K., +, JSYST March 2020 1195-1205

Energy-Efficient Joint Scheduling and Resource Management for UAV-Enabled Multicell Networks. *Yang, H.*, +, *JSYST March 2020 363-374*

Expectation and SAA Models and Algorithms for Scheduling of Multiple Earth Observation Satellites Under the Impact of Clouds. Wang, J., +, $JSYST\ Dec.\ 2020\ 5451-5462$

Fairness Enhancement for Opportunistic Interference Alignment Algorithm With Low Latency Communications. *Lu, H.*, +, *JSYST Dec. 2020 5002-5013*

Improved Bacterial Foraging Algorithm for Cell Formation and Product Scheduling Considering Learning and Forgetting Factors in Cellular Manufacturing Systems. Wang, J., +, JSYST June 2020 3047-3056

Integration Design of Sortie Scheduling for Carrier Aircrafts Based on Hybrid Flexible Flowshop. *Liu*, *J*., +, *JSYST March 2020 1503-1511*

Joint Task Offloading, CNN Layer Scheduling, and Resource Allocation in Cooperative Computing System. Chai, R., +, JSYST Dec. 2020 5350-5361
 Quantum-Inspired Genetic Programming Algorithm for the Crude Oil Scheduling of a Real-World Refinery. Pereira, C.S., +, JSYST Sept. 2020 3926-3937

Search problems

A Decomposition-Based Local Search for Large-Scale Many-Objective Vehicle Routing Problems With Simultaneous Delivery and Pickup and Time Windows. *Zhou, Y., +, JSYST Dec. 2020 5253-5264*

A Variable Neighborhood Search-Based Hybrid Multiobjective Evolutionary Algorithm for HazMat Heterogeneous Vehicle Routing Problem With Time Windows. *Jiang, P.*, +, *JSYST Sept. 2020 4344-4355*

A WOA-Based Optimization Approach for Task Scheduling in Cloud Computing Systems. Chen, X., +, JSYST Sept. 2020 3117-3128

Improved Bacterial Foraging Algorithm for Cell Formation and Product Scheduling Considering Learning and Forgetting Factors in Cellular Manufacturing Systems. Wang, J., +, JSYST June 2020 3047-3056

Information-Based Hierarchical Planning for a Mobile Sensing Network in Environmental Mapping. *Li*, *T*, +, *JSYST June 2020 1692-1703*

Joint Subarray Selection and Power Allocation for Cognitive Target Tracking in Large-Scale MIMO Radar Networks. *Zhang, H.*, +, *JSYST June* 2020 2569-2580

Secondary cells

Bidirectional Charging in V2G Systems: An In-Cell Variation Analysis of Vehicle Batteries. *Khalid, H.M.*, +, *JSYST Sept. 2020 3665-3675*

Simplified Modeling and HIL Validation of Solar PVs and Storage-Based Islanded Microgrid With Generation Uncertainties. Sen, S., +, JSYST June 2020 2653-2664

System Design and Realization of a Solar-Powered Electric Vehicle Charging Station. Shariff, S.M., +, JSYST June 2020 2748-2758

Security

A Theory for Optimizing Insecure Internetwork Connections. *Das, P.*, +, *JSYST Dec. 2020 4842-4853*

Artificial Noise Hopping: A Practical Secure Transmission Technique With Experimental Analysis for Millimeter Wave Systems. *Ju, Y.*, +, *JSYST Dec.* 2020 5121-5132

PLC Systems Under the Presence of a Malicious Wireless Communication Device: Physical Layer Security Analyses. *Camponogara*, A., +, *JSYST Dec.* 2020 4901-4910

Security of data

A Multidimensional Holistic Framework for the Security of Distributed Energy and Control Systems. Saleem, D., +, JSYST March 2020 17-27

A PMU-Based Data-Driven Approach for Classifying Power System Events Considering Cyberattacks. Ma, R., +, JSYST Sept. 2020 3558-3569

ChainSDI: A Software-Defined Infrastructure for Regulation-Compliant Home-Based Healthcare Services Secured by Blockchains. *Li*, *P*, +, *JSYST June* 2020 2042-2053

Consensus and Clustering of Expressed and Private Opinions in Dynamical Networks Against Attacks. Shang, Y., JSYST June 2020 2078-2084

Cyber-Attacks in a Looped Energy-Water Nexus: An Inoculated Sub-Observer-Based Approach. Khalid, H.M., +, JSYST June 2020 2054-2065

Cybersecurity Vulnerability Mitigation Framework Through Empirical Paradigm (CyFEr): Prioritized Gap Analysis. *Gourisetti, S.N.G.*, +, *JSYST June 2020 1897-1908*

Detection and Location of Bias Load Injection Attack in Smart Grid via Robust Adaptive Observer. Wang, X., +, JSYST Sept. 2020 4454-4465

Detection of False Data Injection Attacks in Smart Grids Based on Graph Signal Processing. *Drayer, E., +, JSYST June 2020 1886-1896*

Disclose or Exploit? A Game-Theoretic Approach to Strategic Decision Making in Cyber-Warfare. Chen, H., +, JSYST Sept. 2020 3779-3790

Priority-Based Protection Against the Malicious Data Injection Attacks on State Estimation. *Khanna, K.*, +, *JSYST June 2020 1945-1952*

Risk Analysis of Cyber-Physical Systems by GTST-MLD. Di Maio, F., +, JSYST March 2020 1333-1340

Seismology

An Improved Rapid-Source Parameter Determination System (AQUA) for Giant Earthquakes. *Kimura*, H., +, *JSYST Sept.* 2020 3451-3462

ASIS: Autonomous Seismic Imaging System With *In Situ* Data Analytics and Renewable Energy. *Clemente, J., +, JSYST March 2020 1277-1284*

Seismometers

Smart Home Monitoring System via Footstep-Induced Vibrations. *Li*, F, +, JSYST Sept. 2020 3383-3389

Semantic Web

Design Ontology in a Case Study for Cosimulation in a Model-Based Systems Engineering Tool-Chain. Lu, J., +, JSYST March 2020 1297-1308

Sensitivity analys

Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur, R.*, +, *JSYST March 2020 729-737*

Disturbance-Observer-Based Frequency Regulation Scheme for Low-Inertia Microgrid Systems. Sharma, D., +, JSYST March 2020 782-792

Optimal Coordinated Expansion Planning of Transmission and Electrical Energy Storage Systems Under Physical Intentional Attacks. *Nemati, H.,* +, *JSYST March 2020 793-802*

Toward a Robust Design of an Aileron Electromechanical Actuator: Sensitivity Analysis and Parametric Tolerancing Using a Variational Approach. Siala, H., +, JSYST Sept. 2020 3977-3986

Sensor fusion

Connected Target ε-probability Coverage in WSNs With Directional Probabilistic Sensors. Xu, X., +, JSYST Sept. 2020 3399-3409

Cyber-Attacks in a Looped Energy-Water Nexus: An Inoculated Sub-Observer-Based Approach. *Khalid, H.M.*, +, *JSYST June 2020 2054-2065*

Fault-Tolerant GNSS/SINS/DVL/CNS Integrated Navigation and Positioning Mechanism Based on Adaptive Information Sharing Factors. *Xiong*, H., +, JSYST Sept. 2020 3744-3754

Simultaneous Heterogeneous Sensor Localization, Joint Tracking, and Upper Extremity Modeling for Stroke Rehabilitation. *Chen, J.*, +, *JSYST Sept. 2020 3570-3581*

SMS-A Security Management System for Steam Turbines Using a Multisensor Array. Kordestani, M., +, JSYST Sept. 2020 3813-3824

System Integration of Sensor-Fusion Localization Tasks Using Vision-Based Driving Lane Detection and Road-Marker Recognition. *Lin, C.*, +, *JSYST Sept. 2020 4523-4534*

Sensor placement

A Lattice Signcrypted Secured Localization in Wireless Sensor Networks. Kumar, G., +, JSYST Sept. 2020 3949-3956

Delay Reduction Through Optimal Controller Placement to Boost Scalability in an SDDC. *Bangash*, Y.A., +, JSYST Sept. 2020 4489-4499

Sensors

Anticomplementary Triangles for Efficient Coverage in Sensor Network-Based IoT. Shivhare, A., +, JSYST Dec. 2020 4854-4863

Cooperative Dynamic Fuzzy Perimeter Surveillance: Modeling and Fluid-Based Framework. Wu, J., +, JSYST Dec. 2020 5210-5220

Detection and Location of Bias Load Injection Attack in Smart Grid via Robust Adaptive Observer. Wang, X., +, JSYST Sept. 2020 4454-4465

Disturbance-Observer-Based Frequency Regulation Scheme for Low-Inertia Microgrid Systems. Sharma, D., +, JSYST March 2020 782-792

Efficient Obfuscation for Encrypted Identity-Based Signatures in Wireless Body Area Networks. *Zhang, Y.*, +, *JSYST Dec. 2020 5320-5328*

Energy-Efficient Barrier Lifetime Prolonging Scheme Based on Repairing in Directional Sensor Networks. Fan, X., +, JSYST Dec. 2020 4943-4954

Information-Based Hierarchical Planning for a Mobile Sensing Network in Environmental Mapping. *Li*, *T*, +, *JSYST June 2020 1692-1703*

Low-Complexity Reconfigurable and Intelligent Ultrawideband Angular Sensing. Joshi, H., +, JSYST Dec. 2020 4931-4942

Microscale Particulate Matter Monitoring With Reliable Event Transport in Urban Environments. *Yang, T.*, +, *JSYST June 2020 3057-3060*

On Communication Performance in Energy Harvesting WSNs Under a Cooperative Jamming Attack. Vo, V.N., +, JSYST Dec. 2020 4955-4966

Sentiment analysis

New Clustering Algorithms for Twitter Sentiment Analysis. *Rehioui, H.*, +, JSYST March 2020 530-537

Servers

Joint Task Offloading, CNN Layer Scheduling, and Resource Allocation in Cooperative Computing System. *Chai, R.*, +, *JSYST Dec. 2020 5350-5361* Microservice-Based Architecture for an Energy Management System. *Lyu, Z.*, +, *JSYST Dec. 2020 5061-5072*

Service-oriented architecture

Services Computing Systems Engineering Framework: A Proposition and Evaluation Through SOA Principles and Analysis Model. *Kurniawan, N.B.*, +, *JSYST Sept. 2020 3105-3116*

Set theory

Near-Optimal Multicast Tree Construction in Leaf-Spine Data Center Networks. Luo, S., +, JSYST June 2020 2581-2584

Weight Induced Norm Approach to Group Decision Making for Multiobjective Optimization Problems in Systems Engineering. *Chiu, W.*, +, *JSYST June 2020 1580-1591*

Short-circuit currents

PMUs Enabled Tellegen's Theorem-Based Fault Identification Method for Unbalanced Active Distribution Network Using RTDS. *Bansal, Y.*, +, *JSYST Sept. 2020 4567-4578*

Signal classification

A High-Accuracy Least-Time-Domain Mixture Features Machine-Fault Diagnosis Based on Wireless Sensor Network. *Du, C.*, +, *JSYST Sept. 2020 4101-4109*

Joint Precoding and Combining Design for Hybrid Beamforming Systems With Subconnected Structure. Zhang, Z., +, JSYST March 2020 184-195

Signal detection

A Contract Theory Approach-Based Scheme to Encourage Secondary Users for Cooperative Sensing in Cognitive Radio Networks. *Gupta, N.*, +, *JSYST June 2020 2400-2410*

A Robust Hyperbolic Tangent-Based Energy Detector With Gaussian and Non-Gaussian Noise Environments in Cognitive Radio System. *Qu, H.*, +, *JSYST Sept. 2020 3161-3172*

Bayesian-Inference-Based Sliding Window Trust Model Against Probabilistic SSDF Attack in Cognitive Radio Networks. Fu, Y., +, JSYST June 2020 1764-1775

Cognitive Radio Spectrum Sensing Under Joint TX/RX I/Q Imbalance and Uncalibrated Receiver. *Jalali, F.*, +, *JSYST March 2020 105-112*

Cooperative Sensing Scheme for Acquisition of Rotational Synchronization of Radar. Lee, J., +, JSYST June 2020 3061-3064

Cost-Benefit Tradeoff of Byzantine Attack in Cooperative Spectrum Sensing. Wu, J., +, JSYST June 2020 2532-2543

Energy-Efficient GCSA Medium Access Protocol for Infrastructure-Based Cognitive Radio Networks. Syed, T.S., +, JSYST March 2020 288-297

Near-Optimal Detection of Monobit Digitized UWB Signals in the Presence of Noise and Strong Intersymbol Interference. *Khani, H.*, +, *JSYST June* 2020 2311-2322

Novel Algorithms for Blind Sensing of Signals With Variable Bandwidths in Cognitive Radio. De, P., JSYST Sept. 2020 4272-4283

Spectrum-Occupancy Aware Cooperative Spectrum Sensing Using Adaptive Detection. *Al-Jarrah*, *M.A.*, +, *JSYST June 2020 2225-2236*

Signal processing

Cost-Effective Migration Toward Virtualized C-RAN With Scalable Fronthaul Design. *Masoudi*, M., +, JSYST Dec. 2020 5100-5110

Detection of False Data Injection Attacks in Smart Grids Based on Graph Signal Processing. *Drayer, E., +, JSYST June 2020 1886-1896*

Discrete-Wavelet-Transform and Stockwell-Transform-Based Statistical Parameters Estimation for Fault Analysis in Grid-Connected Wind Power System. *Mukherjee*, N., +, *JSYST Sept. 2020 4320-4328*

PMU-Assisted Zone-3 Protection Scheme for PV Integrated Power Systems Immune to Interharmonics. *Prakash, T.*, +, *JSYST Sept. 2020 3267-3276*

Signal reconstruction

Reweighted Compressed Sensing-Based Smart Grids Topology Reconstruction With Application to Identification of Power Line Outage. *Huang, K.*, +, *JSYST Sept. 2020 4329-4339*

Signal sampling

Novel Algorithms for Blind Sensing of Signals With Variable Bandwidths in Cognitive Radio. De, P., JSYST Sept. 2020 4272-4283

Signal to noise ratio

A Flexible Multicarrier Scheme Based on the Discrete Orthogonal Stockwell Transform. Colen, G.R., +, JSYST Dec. 2020 5284-5295

Iterative Sub-Band and Power Allocation in Downlink Multiband NOMA. Goswami, D., +, JSYST Dec. 2020 5199-5209

Silicon

Anticomplementary Triangles for Efficient Coverage in Sensor Network-Based IoT. Shivhare, A., +, JSYST Dec. 2020 4854-4863

Silicon carbide

Iterative Sub-Band and Power Allocation in Downlink Multiband NOMA. Goswami, D., +, JSYST Dec. 2020 5199-5209

Shortest Uplink Scheduling for NOMA-Based Industrial Wireless Networks. Xu, C., +, JSYST Dec. 2020 5384-5395

Singular value decomposition

Robust Optimization for Energy Efficiency in MIMO Two-Way Relay Networks With SWIPT. Li, Q., +, JSYST March 2020 196-207

SLAM (robots)

A Multilevel Fusion System for Multirobot 3-D Mapping Using Heterogeneous Sensors. *Yue, Y., +, JSYST March 2020 1341-1352*

RBPF-MSIS: Toward Rao-Blackwellized Particle Filter SLAM for Autonomous Underwater Vehicle With Slow Mechanical Scanning Imaging Sonar. Chen, L., +, JSYST Sept. 2020 3301-3312

Simultaneous Heterogeneous Sensor Localization, Joint Tracking, and Upper Extremity Modeling for Stroke Rehabilitation. *Chen, J.*, +, *JSYST Sept. 2020 3570-3581*

Sliding mode control

Navigation of a Network of Aerial Drones for Monitoring a Frontier of a Moving Environmental Disaster Area. Savkin, A.V., +, JSYST Dec. 2020 4746-4749

Smart cards

A Secure Three-Factor User Authentication Protocol With Forward Secrecy for Wireless Medical Sensor Network Systems. *Li*, *X*., +, *JSYST March* 2020 39-50

Smart grids

Design Optimization of RES-Based Desalination Systems Cooperating With Smart Grids. Malisovas, A., +, JSYST Dec. 2020 4706-4717

Smart meters

A Dynamic Membership Data Aggregation (DMDA) Protocol for Smart Grid. Song, J., +, JSYST March 2020 900-908

A Lightweight Mutual Authentication for Smart Grid Neighborhood Area Network Communications Based on Physically Unclonable Function. *Kaveh, M.*, +, *JSYST Sept. 2020 4535-4544*

An Efficient Privacy-Friendly Hop-by-Hop Data Aggregation Scheme for Smart Grids. Gope, P., +, JSYST March 2020 343-352

An Elliptic Curve-Based Scalable Data Aggregation Scheme for Smart Grid. Chen, Y, +, JSYST June 2020 2066-2077

Smart phones

BLE Beacons for Indoor Positioning at an Interactive IoT-Based Smart Museum. Spachos, P., +, JSYST Sept. 2020 3483-3493

Smart Parking System Based on Bluetooth Low Energy Beacons With Particle Filtering. *Mackey, A.*, +, *JSYST Sept. 2020 3371-3382*

VTracer: When Online Vehicle Trajectory Compression Meets Mobile Edge Computing. Chen, C., +, JSYST June 2020 1635-1646

Smart power grids

A Dynamic Membership Data Aggregation (DMDA) Protocol for Smart Grid. Song, J., +, JSYST March 2020 900-908

A Game Theoretic Model for the Multiperiodic Smart Grid Demand Response Problem. *Belhaiza*, S., +, JSYST March 2020 1147-1158

A Lightweight Mutual Authentication for Smart Grid Neighborhood Area Network Communications Based on Physically Unclonable Function. Kaveh, M., +, JSYST Sept. 2020 4535-4544

A Multidimensional Holistic Framework for the Security of Distributed Energy and Control Systems. Saleem, D., +, JSYST March 2020 17-27

A Novel Privacy-Preserving Authentication Scheme for V2G Networks. Su, Y, +, JSYST June 2020 1963-1971

An Efficient Privacy-Friendly Hop-by-Hop Data Aggregation Scheme for Smart Grids. Gope, P., +, JSYST March 2020 343-352

An Elliptic Curve-Based Scalable Data Aggregation Scheme for Smart Grid. Chen, Y., +, JSYST June 2020 2066-2077

Computational Tools for Modeling and Analysis of Power Generation and Transmission Systems of the Smart Grid. *Mahmud, K.*, +, *JSYST Sept.* 2020 3641-3652

Control of Parallel ULTC Transformers in Active Distribution Systems. *Pouladi*, A., +, *JSYST March* 2020 960-970

Detection and Location of Bias Load Injection Attack in Smart Grid via Robust Adaptive Observer. Wang, X., +, JSYST Sept. 2020 4454-4465

Detection of False Data Injection Attacks in Smart Grids Based on Graph Signal Processing. Drayer, E., +, JSYST June 2020 1886-1896

Joint Energy-QoE Efficient Content Delivery Networks Using Real-Time Energy Management. Goudarzi, P., +, JSYST March 2020 927-938

Optimal Planning and Operational Strategy of a Residential Microgrid With Demand Side Management. Bhamidi, L., +, JSYST June 2020 2624-2632

Priority-Based Protection Against the Malicious Data Injection Attacks on State Estimation. Khanna, K., +, JSYST June 2020 1945-1952

Reweighted Compressed Sensing-Based Smart Grids Topology Reconstruction With Application to Identification of Power Line Outage. *Huang, K.*, +, *JSYST Sept. 2020 4329-4339*

Time-Dependent Bit Error Rate Analysis for Smart Utility Networks in the Presence of WLAN Interferers. *Gouissem, A.*, +, *JSYST June 2020 2133-2143*

Social aspects of automation

A Functional Resonance Analysis Method Driven Resilience Quantification for Socio-Technical Systems. *Bellini, E., +, JSYST March 2020 1234-1244*

Social networking (online)

Cyber-Social Systems: Modeling, Inference, and Optimal Design. *Doostmo-hammadian*, M., +, JSYST March 2020 73-83

New Clustering Algorithms for Twitter Sentiment Analysis. *Rehioui, H.*, +, JSYST March 2020 530-537

Opinion Maximization Through Unknown Influence Power in Social Networks Under Weighted Voter Model. *He*, *Q*., +, *JSYST June 2020 1874-1885*

Simultaneous Benefit Maximization of Conflicting Opinions: Modeling and Analysis. *Yang, L., +, JSYST June 2020 1623-1634*

Venue2Vec: An Efficient Embedding Model for Fine-Grained User Location Prediction in Geo-Social Networks. Xu, S., +, JSYST June 2020 1740-1751

Social sciences

Opinion Maximization Through Unknown Influence Power in Social Networks Under Weighted Voter Model. *He, Q.*, +, *JSYST June 2020 1874-1885*

Sociology

Modeling Social Contagion and Information Diffusion in Complex Socio-Technical Systems. *Muhlmeyer, M.*, +, *JSYST Dec. 2020 5187-5198* Performance Comparison of Nonlinear Kalman Filters in Epidemic Tracking on Networks. *Wang, W.*, +, *JSYST Dec. 2020 5475-5485*

Software

A Model-Based Systems Engineering Approach for the Efficient Specification of Test Rig Architectures for Flight Control Computers. *Liscouet-Hanke*, S., +, JSYST Dec. 2020 5441-5450

Data-Driven Vulnerability Exploration for Design Phase System Analysis. Bakirtzis, G., +, JSYST Dec. 2020 4864-4873

Ephemeral-Cyber-Physical System: A Cloud-Like CPS Using Shared Devices in Open IoT. Noguchi, H., +, JSYST Dec. 2020 5176-5186

Multigranularity Space Management Scheme for Accelerating the Write Performance of In-Memory File Systems. Wu, T., +, JSYST Dec. 2020 5429-5440

Use of Patterns for Know-How Reuse in a Model-Based Systems Engineering Framework. Wu, Q., +, JSYST Dec. 2020 4765-4776

Software architecture

An MDE-Based Tool for Early Analysis of UML2.0/PSM Atomic and Composite Components. *Rouis, T.S.*, +, *JSYST June 2020 1647-1657*

System-of-Systems Quality Attribute-Based Architectural Alternatives. *Nelson, T.*, +, *JSYST Sept. 2020 3844-3854*

Software defined networking

A Review on Design and Implementation of Software-Defined WLANs. Qureshi, K.I., +, JSYST June 2020 2601-2614

A Smart Optimization of Fault Diagnosis in Electrical Grid Using Distributed Software-Defined IoT System. *Al Mhdawi, A.K.*, +, *JSYST June 2020* 2780-2790

AMOPE: Performance Analysis of OpenFlow Systems in Software-Defined Networks. *Mondal, A.*, +, *JSYST March 2020 124-131*

DAISY: A Detection and Mitigation System Against Denial-of-Service Attacks in Software-Defined Networks. *Imran, M.*, +, *JSYST June 2020 1933-1944*

Hierarchical Edge-Cloud SDN Controller System With Optimal Adaptive Resource Allocation for Load-Balancing. *Lin, F.P.*, +, *JSYST March 2020* 265-276

Location-Aware, Context-Driven QoS for IoT Applications. Ahmad, E., +, JSYST March 2020 232-243

Proactive Forwarding of High Data Rate in Smart Virtualization Networks for High-Speed Trains. Yaseen, F.A., +, JSYST June 2020 1670-1681

SDNMM—A Generic SDN-Based Modular Management System for Wireless Sensor Networks. Natiaye, M., +, JSYST June 2020 2347-2357

Toward Greater Intelligence in Route Planning: A Graph-Aware Deep Learning Approach. Zhuang, Z., +, JSYST June 2020 1658-1669

Software quality

System-of-Systems Quality Attribute-Based Architectural Alternatives. *Nelson, T.*, +, *JSYST Sept. 2020 3844-3854*

Software radio

Fast Switching With VM Migration in 5G Cloud Radio Access Networks. Wang, Y., +, JSYST March 2020 477-488 Integrated Communication and Localization System With OFDM-Chirp Waveform. Jia, W., +, JSYST June 2020 2464-2472

Solar cell arrays

An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, *N.*, +, *JSYST March* 2020 1218-1229

Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur*; R., +, *JSYST March* 2020 729-737

PV Distributed-MPP Tracking: Total-Cross-Tied Configuration of String-Integrated-Converters to Extract the Maximum Power Under Various PSCs. *Pendem, S.R.*, +, *JSYST March 2020 1046-1057*

Solar cells

System Design and Realization of a Solar-Powered Electric Vehicle Charging Station. Shariff, S.M., +, JSYST June 2020 2748-2758

Solar nower

Active Distribution Network Operation: A Market-Based Approach. Zubo, R.H.A., +, JSYST March 2020 1405-1416

Solar power generation

Comprehensive Optimization of Energy Storage and Standoff Tracking for Solar-Powered UAV. Wei, X., +, JSYST Dec. 2020 5133-5143

Solar power stations

Optimal Charge/Discharge Scheduling of Battery Storage Interconnected With Residential PV System. *Kapoor, A., +, JSYST Sept. 2020 3825-3835*

Probabilistic Optimal Dynamic Planning of Onsite Solar Generation for Residential Energy Hubs. Senemar, S., +, JSYST March 2020 832-841

Simplified Modeling and HIL Validation of Solar PVs and Storage-Based Islanded Microgrid With Generation Uncertainties. *Sen, S.*, +, *JSYST June* 2020 2653-2664

Solar powered vehicles

Optimal Scheduling of EV Charging at a Solar Power-Based Charging Station. Kabir, M.E., +, JSYST Sept. 2020 4221-4231

System Design and Realization of a Solar-Powered Electric Vehicle Charging Station. Shariff, S.M., +, JSYST June 2020 2748-2758

Sonar imaging

RBPF-MSIS: Toward Rao-Blackwellized Particle Filter SLAM for Autonomous Underwater Vehicle With Slow Mechanical Scanning Imaging Sonar. Chen, L., +, JSYST Sept. 2020 3301-3312

Source coding

End-to-End Distortion Analysis of Nonorthogonal Layered Coding Over Relay-Assisted Networks. *Padidar, P., +, JSYST Sept. 2020 4466-4476*

Space division multiplexing

User-Centric MIMO Techniques for Indoor Visible Light Communication Systems. Chen, C., +, JSYST Sept. 2020 3202-3213

Space-time codes

Design Precoded Space-Time-Frequency 4×1 and 4×2 OFDM Architectures in Frequency-Selective Fading Channels. *Yeh, H., JSYST March 2020* 277-287

Spatiotemporal phenomena

Spatio-Temporal Value of Energy Storage in Transmission Networks. *Khatami*, R., +, *JSYST Sept.* 2020 3855-3864

Spectral analysis

An Online Bearing Fault Diagnosis Technique via Improved Demodulation Spectrum Analysis Under Variable Speed Conditions. *Liu, D.*, +, *JSYST June 2020 2323-2334*

Spectrogram

WiFlowCount: Device-Free People Flow Counting by Exploiting Doppler Effect in Commodity WiFi. Zhou, R., +, JSYST Dec. 2020 4919-4930

Spread spectrum communication

Adaptive Narrow-Band Interference Suppression and Performance Evaluation Based on Code-Aided in GNSS Inter-Satellite Links. Wang, H., +, JSYST March 2020 538-547

SQL

Location-Aware, Context-Driven QoS for IoT Applications. *Ahmad, E.*, +, JSYST March 2020 232-243

Stability

Cyber-Attacks in a Looped Energy-Water Nexus: An Inoculated Sub-Observer-Based Approach. Khalid, H.M., +, JSYST June 2020 2054-2065 Flexible Control Structure for Enhancement of Scalability in DC Microgrids. Ko, B., +, JSYST Sept. 2020 4591-4601

Fuzzy-Observer-Based Predictive Stabilization of DC Microgrids With Power Buffers Through an Imperfect 5G Network. *Vafamand*, N., +, *JSYST Sept.* 2020 4025-4035

Globally Stable Formation Control of Nonholonomic Multiagent Systems With Bearing-Only Measurement. *Luo*, X., +, *JSYST June* 2020 2901-2912

Local Controllability, Trajectory Planning, and Stabilization of a Two-Agent Underactuated Microrobotic System. *Fruchard, M.*, +, *JSYST June 2020 2892-2900*

Optimal Connected Cruise Control With Arbitrary Communication Delays. Wang, Z., +, JSYST June 2020 2913-2924

Enhanced Active and Reactive Power Sharing in Islanded Microgrids. Parvizimosaed, M., +, JSYST Dec. 2020 5037-5048

Performance Comparison of Nonlinear Kalman Filters in Epidemic Tracking on Networks. Wang, W., +, JSYST Dec. 2020 5475-5485

Voltage Stability Constrained OPF in Multi-Micro-Grid Considering Demand Response Programs. Nojavan, M., +, JSYST Dec. 2020 5221-5228

State estimation

Joint Subarray Selection and Power Allocation for Cognitive Target Tracking in Large-Scale MIMO Radar Networks. Zhang, H., +, JSYST June 2020 2569-2580

Performance Comparison of Nonlinear Kalman Filters in Epidemic Tracking on Networks. Wang, W., +, JSYST Dec. 2020 5475-5485

State feedback

Optimal Connected Cruise Control With Arbitrary Communication Delays. Wang, Z., +, JSYST June 2020 2913-2924

Robust Nonlinear State Feedback Control of Bidirectional Interlink Power Converters in Grid-Connected Hybrid Microgrids. *Zolfaghari, M.*, +, *JSYST March 2020 1117-1124*

Statistical analysis

A Robust Synchronization-Based Chaotic Secure Communication Scheme With Double-Layered and Multiple Hybrid Networks. *Zhou, L.*, +, *JSYST June 2020 2508-2519*

Application of the Mixture of Lognormal Distribution to Represent the First-Order Statistics of Wireless Channels. *Das, S.*, +, *JSYST Sept. 2020* 4394-4401

Classification Methods Applied to Credit Scoring With Collateral. *Teles, G.*, +, *JSYST Sept. 2020 4557-4566*

Cooperative Sensing Scheme for Acquisition of Rotational Synchronization of Radar. Lee, J., +, JSYST June 2020 3061-3064

Discrete-Wavelet-Transform and Stockwell-Transform-Based Statistical Parameters Estimation for Fault Analysis in Grid-Connected Wind Power System. *Mukherjee*, N., +, *JSYST Sept. 2020 4320-4328*

Local Estimation of Critical and Off-Peak Periods for Grid-Friendly Flexible Load Management. *Guzman, C.*, +, *JSYST Sept. 2020 4262-4271*

Statistical distributions

Distributed Elections Using Site-Push Majority Winner Monitoring. Chaturvedi, K., +, JSYST June 2020 1682-1691

Novel Energy-Harvesting AF Relaying Schemes With Channel Estimation Errors. Zhou, Y., +, JSYST March 2020 333-342

Statistics

Modeling Social Contagion and Information Diffusion in Complex Socio-Technical Systems. *Muhlmeyer*, M., +, *JSYST Dec.* 2020 5187-5198 Performance Comparison of Nonlinear Kalman Filters in Epidemic Tracking on Networks. *Wang*, W., +, *JSYST Dec.* 2020 5475-5485

Stator windings

An Improved Current Balancing Technique of Two-Winding IG Suitable for Wind-PV-Based Grid-Isolated Hybrid Generation System. *Chatterjee, A.*, +, *JSYST Dec.* 2020 4874-4882

Steady-state

Transient Instability Mitigation via Repetitive Corrective Actions Based Upon the Real-Time Macrocoherency Evaluation. *Babu, G.V.N.Y.*, +, *JSYST Dec.* 2020 5084-5095

Steam turbines

SMS-A Security Management System for Steam Turbines Using a Multisensor Array. Kordestani, M., +, JSYST Sept. 2020 3813-3824

Stochastic processes

- A Robust Synchronization-Based Chaotic Secure Communication Scheme With Double-Layered and Multiple Hybrid Networks. *Zhou, L.*, +, *JSYST June 2020 2508-2519*
- A Stochastic Model of Cascading Failure Dynamics in Cyber-Physical Power Systems. *Gao*, X., +, *JSYST Sept. 2020 4626-4637*
- Containment Control of Linear Multiagent Systems With Stochastic Disturbances via Event-Triggered Strategies. Zou, W., +, JSYST Dec. 2020 4810-4819
- Modeling and Decision-Making Methods for a Class of Cyber–Physical Systems Based on Modified Hybrid Stochastic Timed Petri Net. *Cao, R.*, +, *JSYST Dec. 2020 4684-4693*
- Outage and ASE Analyses for Power Controlled D2D Communication. Pawar, P., +, JSYST June 2020 2269-2280
- Outage Probability in the Uplink of Multitier Millimeter Wave Cellular Networks. *Onireti*, O., +, *JSYST June* 2020 2520-2531
- Relay-Aided Outdoor-to-Indoor Communication in Millimeter-Wave Cellular Networks. *Ntontin, K.*, +, *JSYST June 2020 2473-2484*
- Resolution Limit of Positioning Error for Range-Free Localization Schemes. Gui, L., +, JSYST June 2020 2980-2989
- Risk and Resilience Assessment With Component Criticality Ranking of Electric Power Systems Subject to Earthquakes. *Espinoza, S.*, +, *JSYST June 2020 2837-2848*
- Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. Manohar, M., +, JSYST Sept. 2020 3430-3439
- Study on Base Station Topology in National Cellular Networks: Take Advantage of Alpha Shapes, Betti Numbers, and Euler Characteristics. *Chen, Y.*, +, *JSYST June 2020 2202-2213*

Stochastic programming

An Optimal Multivariable Constrained Nonlinear (MVCNL) Stochastic Microgrid Planning and Operation Problem With Renewable Penetration. Kumar, M., +, JSYST Sept. 2020 4143-4154

Stochastic systems

Sampled-Data Decentralized Output Feedback Control for a Class of Switched Large-Scale Stochastic Nonlinear Systems. *Li*, *S*., +, *JSYST June* 2020 1602-1610

Stock markets

A Multicriteria Trading System Based on Singular Spectrum Analysis Trading Rules. Leles, M.C.R., +, JSYST March 2020 1468-1478

Storage area networks

Delay Reduction Through Optimal Controller Placement to Boost Scalability in an SDDC. Bangash, Y.A., +, JSYST Sept. 2020 4489-4499

Storage management

- A Public Auditing Protocol for Cloud Storage System With Intrusion-Resilience. *Ding, R.*, +, *JSYST March 2020 633-644*
- Delay Reduction Through Optimal Controller Placement to Boost Scalability in an SDDC. Bangash, Y.A., +, JSYST Sept. 2020 4489-4499
- Remote Data Checking With a Designated Verifier in Cloud Storage. *Yan*, H., +, *JSYST June 2020 1788-1797*
- Topology-Aware Data Placement Strategy for Fault-Tolerant Storage Systems. Xia, J., +, JSYST Sept. 2020 4296-4307

Storms

Metanetwork Framework for Performance Analysis of Disaster Management System-of-Systems. Fan, C., +, JSYST March 2020 1265-1276

Street lighting

Campus Edge Computing Network Based on IoT Street Lighting Nodes. Chang, Y, +, JSYST March 2020 164-171

Structural engineering computing

- A Pipeline Leak Classification and Location Estimation System With Convolutional Neural Networks. Cai, Y., +, JSYST Sept. 2020 3072-3081
- FPGA-Based Design Optimization in Autonomous Robot Systems for Inspection of Civil Infrastructure. *Lins, R.G.*, +, *JSYST June 2020 2961-2964*

Substation automation

A Novel SCL Configuration Method for Modeling Microgrids With IEC 61850. *Aftab, M.A.*, +, *JSYST June 2020 2676-2683*

Substations

- A Multidimensional Holistic Framework for the Security of Distributed Energy and Control Systems. *Saleem, D., +, JSYST March 2020 17-27*
- An Intelligent Detection of High-Impedance Faults for Distribution Lines Integrated With Distributed Generators. *Chaitanya, B.K.*, +, *JSYST March* 2020 870-879
- Moth Search Optimization for Optimal DERs Integration in Conjunction to OLTC Tap Operations in Distribution Systems. Singh, P., +, JSYST March 2020 880-888

Supercapacitors

Voltage/Current Large Transient Suppression in DC Microgrids Using Local Information and Active Stabilizing Capability. Azimi, S.M., +, JSYST March 2020 1109-1116

Superconducting particle detectors

A Safety System for Human Radiation Protection and Guidance in Extreme Environmental Conditions. *Adamidi, E.S.*, +, *JSYST March 2020 1384-1394*

Support vector machines

- A Novel Control-Performance-Oriented Data-Driven Fault Classification Approach. *Liu, T.*, +, *JSYST June 2020 1830-1839*
- An Intelligent Detection of High-Impedance Faults for Distribution Lines Integrated With Distributed Generators. *Chaitanya, B.K.*, +, *JSYST March* 2020 870-879
- Classification Methods Applied to Credit Scoring With Collateral. *Teles, G.*, +, *JSYST Sept. 2020 4557-4566*
- Detection and Experimental Validation of High Impedance Arc Fault in Distribution System Using Empirical Mode Decomposition. *Lala, H.*, +, *JSYST Sept. 2020 3494-3505*
- E-WACGAN: Enhanced Generative Model of Signaling Data Based on WGAN-GP and ACGAN. *Jin, Q.*, +, *JSYST Sept. 2020 3289-3300*
- Energy-Efficient IoT-Fog-Cloud Architectural Paradigm for Real-Time Wildfire Prediction and Forecasting. *Kaur*; *H.*, +, *JSYST June 2020 2003-2011*
- Midterm Load Forecasting: A Multistep Approach Based on Phase Space Reconstruction and Support Vector Machine. *Li*, G., +, *JSYST Dec.* 2020 4967-4977
- Multigranular Wavelet Decomposition-Based Support Vector Regression and Moving Average Method for Service-Time Prediction on Web Map Service Platforms. *Dong*, G., +, *JSYST Sept.* 2020 3653-3664
- Resist Interest Flooding Attacks via Entropy–SVM and Jensen–Shannon Divergence in Information-Centric Networking. Zhi, T., +, JSYST June 2020 1776-1787
- Safety Cruise Control of Connected Vehicles Using Radar and Vehicle-to-Vehicle Communication. Ma, Z., +, JSYST Sept. 2020 4602-4613
- SMS-A Security Management System for Steam Turbines Using a Multisensor Array. Kordestani, M., +, JSYST Sept. 2020 3813-3824

Surface tension

System Dynamic-Based Oil Weathering Processes: Simulation and Analysis. Kasimu, A., +, JSYST March 2020 1375-1383

Surface treatment

SimProxy Decision Support System: A Neural Network Proxy Applied to Reservoir and Surface Integrated Optimization. *Kohler, M.*, +, *JSYST Dec.* 2020 5111-5120

Surgery

Heterogeneous System-on-Chip-Based Lattice-Boltzmann Visual Simulation System. Zhai, X., +, JSYST June 2020 1592-1601

Surveillance

- Cooperative Dynamic Fuzzy Perimeter Surveillance: Modeling and Fluid-Based Framework. Wu, J., +, JSYST Dec. 2020 5210-5220
- Legitimate Surveillance With Battery-Aided Wireless Powered Full-Duplex Monitor. Xu, D., JSYST Dec. 2020 5229-5232
- Navigation of a Network of Aerial Drones for Monitoring a Frontier of a Moving Environmental Disaster Area. Savkin, A.V., +, JSYST Dec. 2020 4746-4749
- Smart Home Monitoring System via Footstep-Induced Vibrations. *Li*, F, +, JSYST Sept. 2020 3383-3389

Sustainable development

Probabilistic Optimal Dynamic Planning of Onsite Solar Generation for Residential Energy Hubs. Senemar, S., +, JSYST March 2020 832-841

Switches

- Allocation of Renewables, Switches, and Relays Considering Relays Actual Operation Time. Fatemi, S.S., +, JSYST March 2020 950-959
- Flow Setup Aware Controller Placement in Distributed Software-Defined Networking. *Correia, N.*, +, *JSYST Dec. 2020 5096-5099*
- Optimal Chance-Constrained Scheduling of Reconfigurable Microgrids Considering Islanding Operation Constraints. *Hemmati, M.*, +, *JSYST Dec.* 2020 5340-5349
- PN Inference Based Autonomous Sequential Restoration of Distribution System Under Natural Disaster. Sandhya, K., +, JSYST Dec. 2020 5160-5171
- Protection of Converter-Interfaced Microgrids Using Modified Short-Time Correlation Transform. *Allahdadi, K.*, +, *JSYST Dec. 2020 5172-5175*

Switching systems (control)

Global Fault-Tolerant Sampled-Data Control for Large-Scale Switched Time-Delay Nonlinear Systems. He, W., +, JSYST June 2020 1549-1557

Synchronization

- A Robust Synchronization-Based Chaotic Secure Communication Scheme With Double-Layered and Multiple Hybrid Networks. *Zhou, L.*, +, *JSYST June 2020 2508-2519*
- A System Simulation Framework for Modeling Space Modulation Techniques. *Hiari*, O., +, *JSYST March* 2020 1435-1446
- Comparative Analysis of Communication Assisted Grid Synchronization Methods in Microgrids. S., N., +, JSYST March 2020 1007-1014
- Cooperative Sensing Scheme for Acquisition of Rotational Synchronization of Radar. Lee, J., +, JSYST June 2020 3061-3064
- Delay- and Interference-Aware Routing for Wireless Mesh Network. *Chai*, *Y*, +, *JSYST Sept. 2020 4119-4130*
- Environment-Assisted Passive WiFi Tracking With Self-Localizing Asynchronous Sniffers. Suraweera, N., +, JSYST Dec. 2020 4798-4809
- Measurement Errors and Delays on Wide-Area Control Based on IEEE Std C37.118.1-2011: Impact and Compensation. *Zacharia*, *L.*, +, *JSYST March* 2020 422-432
- Robust OFDM-Based Synchronization Against Very High Fractional CFO and Time-Varying Fading. *Chang, K.*, +, *JSYST Sept. 2020 4047-4058*

Synchronous generators

- Disturbance-Observer-Based Frequency Regulation Scheme for Low-Inertia Microgrid Systems. Sharma, D., +, JSYST March 2020 782-792
- Improving Power Systems Transient Stability by Coordinated Control of Energy Storage Systems and Synchronous Generators in Presence of Measurement Noise. *Rostami, M.*, +, *JSYST March 2020 1088-1097*
- Islanding Detection of Distributed Generation Based on Parallel Inductive Impedance Switching. *Rostami, A.*, +, *JSYST March 2020 813-823*
- Systematized Active Power Control of PMSG-Based Wind-Driven Generators. Ramachandran, V., +, JSYST March 2020 708-717

System analysis and design

Process Heuristics: Extraction, Analysis, and Repository Considerations. Fillingim, K.B., +, JSYST Dec. 2020 5148-5159

System buses

PMU Placement for Measurement Redundancy Distribution Considering Zero Injection Bus and Contingencies. *Chen, X.*, +, *JSYST Dec. 2020* 5396-5406

System theory

Toward a Theory of Systems Engineering Processes: A Principal–Agent Model of a One-Shot, Shallow Process. Safarkhani, S., +, JSYST Sept. 2020 3277-3288

System-on-chip

Heterogeneous System-on-Chip-Based Lattice-Boltzmann Visual Simulation System. Zhai, X., +, JSYST June 2020 1592-1601

Systems engineering

- A Method to Establish a Trade-Space of System Requirements and Life Cycle Cost. Abdul Rahim, N.B., +, JSYST March 2020 1257-1264
- Best Practice Patterns for Variant Modeling of Activities in Model-Based Systems Engineering. *Colletti, R.A.*, +, *JSYST Sept. 2020 4165-4175*

- Bioanalytical Device Design With Model-Based Systems Engineering Tools. Evin, E., +, JSYST Sept. 2020 3139-3149
- Design Ontology in a Case Study for Cosimulation in a Model-Based Systems Engineering Tool-Chain. Lu, J., +, JSYST March 2020 1297-1308
- Dynamic Fault Tree Generation for Safety-Critical Systems Within a Systems Engineering Approach. *Baklouti, A.*, +, *JSYST March 2020 1512-1522*
- Experiential Systems Engineering Education Concept Using Stratospheric Balloon Missions. *Golkar, A., JSYST June 2020 1558-1567*
- Model-Based Design of Complex Aeronautical Systems Through Digital Twin and Thread Concepts. *Bachelor, G., +, JSYST June 2020 1568-1579*
- Ranking Critical Activities in Complex System Development Projects. Srinivasan, S.M., +, JSYST March 2020 1353-1364
- Services Computing Systems Engineering Framework: A Proposition and Evaluation Through SOA Principles and Analysis Model. *Kurniawan, N.B.*, +, *JSYST Sept. 2020 3105-3116*
- Simulating Systems-of-Systems With Agent-Based Modeling: A Systematic Literature Review. Silva, R.d.A., +, JSYST Sept. 2020 3609-3617
- System Definition, System Worldviews, and Systemness Characteristics. *Dori*, D., +, *JSYST June* 2020 1538-1548
- Toward a Theory of Systems Engineering Processes: A Principal–Agent Model of a One-Shot, Shallow Process. Safarkhani, S., +, JSYST Sept. 2020 3277-3288
- Weight Induced Norm Approach to Group Decision Making for Multiobjective Optimization Problems in Systems Engineering. Chiu, W., +, JSYST June 2020 1580-1591

Systems of systems

Research on SoS-GERT Network Model for Equipment System of Systems Contribution Evaluation Based on Joint Operation. Wang, Z., +, JSYST Sept. 2020 4188-4196

T

Taguchi methods

- Fault Detection, Classification, and Location by Static Switch in Microgrids Using Wavelet Transform and Taguchi-Based Artificial Neural Network. Hong, Y., +, JSYST June 2020 2725-2735
- Multiobjective Multiscenario Under-Frequency Load Shedding in a Standalone Power System. *Hong, Y., +, JSYST June 2020 2759-2769*

Tanks (containers)

Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets. *Oikonomou, K.*, +, *JSYST Sept. 2020* 3729-3739

Target tracking

- A Robust Visual Person-Following Approach for Mobile Robots in Disturbing Environments. *Pang, L., +, JSYST June 2020 2965-2968*
- Comprehensive Optimization of Energy Storage and Standoff Tracking for Solar-Powered UAV. Wei, X., +, JSYST Dec. 2020 5133-5143
- Distributed Estimation in Multimissile Cyber-Physical Systems With Time Delay. *Abdelmawgoud*, A., +, *JSYST March* 2020 1491-1502
- Echo State Network and Echo State Gaussian Process for Non-Line-of-Sight Target Tracking. *Yang, X.*, +, *JSYST Sept. 2020 3885-3892*
- Environment-Assisted Passive WiFi Tracking With Self-Localizing Asynchronous Sniffers. Suraweera, N., +, JSYST Dec. 2020 4798-4809
- Joint Subarray Selection and Power Allocation for Cognitive Target Tracking in Large-Scale MIMO Radar Networks. Zhang, H., +, JSYST June 2020 2569-2580
- Mobile Target Tracking Mechanisms Using Unmanned Aerial Vehicle: Investigations and Future Directions. *Hentati, A.I.*, +, *JSYST June 2020 2969-2979*
- Visual Perception for Multiple Human–Robot Interaction From Motion Behavior. Benli, E., +, JSYST June 2020 2937-2948

Tariffs

- Model Predictive for Reactive Power Scheduling Control Strategy for PV—Battery Hybrid System in Competitive Energy Market. *Lupangu, C.*, +, *JSYST Sept. 2020 4071-4078*
- Optimal Charge/Discharge Scheduling of Battery Storage Interconnected With Residential PV System. Kapoor, A., +, JSYST Sept. 2020 3825-3835

Task analysis

Dynamic User Association for Resilient Backhauling in Satellite-Terrestrial Integrated Networks. *Dai*, C., +, *JSYST Dec*. 2020 5025-5036

Expectation and SAA Models and Algorithms for Scheduling of Multiple Earth Observation Satellites Under the Impact of Clouds. *Wang, J.*, +, *JSYST Dec. 2020 5451-5462*

 Joint Task Offloading, CNN Layer Scheduling, and Resource Allocation in Cooperative Computing System. *Chai*, R., +, JSYST Dec. 2020 5350-5361
 Trajectory Optimization of SUAV for Marine Vessels Communication Relay Mission. *Lun*, Y, +, JSYST Dec. 2020 5014-5024

Teaching

Experiential Systems Engineering Education Concept Using Stratospheric Balloon Missions. Golkar, A., JSYST June 2020 1558-1567

Telecommunication computing

Coordinated Hybrid Precoding Design in Millimeter Wave Fog-RAN. *Hao*, W., +, JSYST March 2020 673-676

Decentralized Learning for Opportunistic Spectrum Access: Multiuser Restless Multiarmed Bandit Formulation. *Agrawal, H.*, +, *JSYST June 2020 2485-2496*

Deep Learning-Based MIMO-NOMA With Imperfect SIC Decoding. *Kang*, *J.*, +, *JSYST Sept. 2020 3414-3417*

Deep RNN-Based Channel Tracking for Wireless Energy Transfer System. Kang, J., +, JSYST Sept. 2020 4340-4343

Distributed Learning and Coordination in Cognitive Infrastructureless Networks of Unknown Size. *Kumar*, R., +, *JSYST June 2020 2085-2096*

Fast Switching With VM Migration in 5G Cloud Radio Access Networks. Wang, Y., +, JSYST March 2020 477-488

Resource Allocation in Wireless Networks With Deep Reinforcement Learning: A Circumstance-Independent Approach. *Lee, H.*, +, *JSYST June 2020 2589-2592*

The Allocation and Reuse Scheme of Physical Cell Identifications Based on Maximum Degree First Coloring Algorithm. *Liu, M.*, +, *JSYST March* 2020 582-591

Telecommunication congestion control

Adaptive and Stable Delay Control for Combating Bufferbloat: Theory and Algorithms. Ye, J., +, JSYST March 2020 1285-1296

Network Slice Admission Model: Tradeoff Between Monetization and Rejections. Challa, R., +, JSYST March 2020 657-660

Traffic Control for RDMA-Enabled Data Center Networks: A Survey. *Guo*, Z., +, *JSYST March 2020 677-688*

Telecommunication control

Adaptive Jamming Power Control for Untrusted Relay Networks With Imperfect Channel Reciprocity. Lee, K., +, JSYST Sept. 2020 4217-4220

Outage Probability in the Uplink of Multitier Millimeter Wave Cellular Networks. Onireti, O., +, JSYST June 2020 2520-2531

Robust Power Control for Clustering-Based Vehicle-to-Vehicle Communication. Liu, Z., +, JSYST June 2020 2557-2568

Telecommunication network management

Adaptive Traffic Management and Energy Cooperation in Renewable-Energy-Powered Cellular Networks. *Lee, H.*, +, *JSYST March 2020 132-143* ORCID: Opportunistic Reconnectivity for Network Management in the Presence of Dumb Nodes in Wireless Sensor Networks. *Roy, A.*, +, *JSYST March 2020 9-16*

Telecommunication network reliability

A High-Accuracy Least-Time-Domain Mixture Features Machine-Fault Diagnosis Based on Wireless Sensor Network. *Du, C.*, +, *JSYST Sept. 2020* 4101-4109

A Lightweight Mutual Authentication for Smart Grid Neighborhood Area Network Communications Based on Physically Unclonable Function. Kaveh, M., +, JSYST Sept. 2020 4535-4544

Chaos-Based Anytime-Reliable Coded Communications. *Tarable, A.*, +, JSYST June 2020 2214-2224

Cross-Layer Network Lifetime Maximization in Underwater Wireless Sensor Networks. Zhou, Y., +, JSYST March 2020 220-231

Delay- and Interference-Aware Routing for Wireless Mesh Network. *Chai*, Y, +, JSYST Sept. 2020 4119-4130

End-to-End Performance Analysis With Decode-and-Forward Relays in Multihop Wireless Systems Over\$\alpha\$- η- μ Fading Channels. Salameh, H.A.B., +, JSYST March 2020 84-92

Energy Efficiency Versus Reliability Tradeoff Improvement in Low-Power Wireless Communications. Zogovic, N., JSYST Sept. 2020 3173-3184

Energy-Efficient Design of MI Communication-Based 3-D Non-Conventional WSNs. Yadav, S., +, JSYST June 2020 2585-2588

Energy-Efficient Resource Allocation for Dynamic Priority-Based Vehicular Mobile-Health Communications. Fan, B., +, JSYST June 2020 2097-2108

Lightweight Secure Message Broadcasting Protocol for Vehicle-to-Vehicle Communication. *Limbasiya*, T., +, JSYST March 2020 520-529

MEGAN: Multipurpose Energy-Efficient, Adaptable, and Low-Cost Wireless Sensor Node for the Internet of Things. *Misra, S.*, +, *JSYST March* 2020 144-151

On the Secrecy Performance of Random VLC Networks With Imperfect CSI and Protected Zone. Wang, J., +, JSYST Sept. 2020 4176-4187

Outage and Average Rate Performances of Full-Duplex Multiuser AF Relay Systems With Time-Selective Fading. *Raut, P.*, +, *JSYST Sept. 2020 3390*-3308

Outage Probability and Throughput of Multirelay SWIPT-WPCN Networks With Nonlinear EH Model and Imperfect CSI. *Jiang, R.*, +, *JSYST March* 2020 1206-1217

Physical Layer Security Enhancement for Satellite Communication Among Similar Channels: Relay Selection and Power Allocation. *Li*, *J*., +, *JSYST March 2020 433-444*

Reliability Evaluation and Reliability-Based Optimal Design for Wireless Sensor Networks. *Xiang*, S., +, *JSYST June* 2020 1752-1763

Residual Energy Maximization in Cognitive Radio Networks With Q-Routing. Paul, A., +, JSYST Sept. 2020 3791-3800

Robust Power Control for Clustering-Based Vehicle-to-Vehicle Communication. Liu, Z., +, JSYST June 2020 2557-2568

Security--Reliability Tradeoff for Untrusted and Selfish Relay-Assisted D2D Communications in Heterogeneous Cellular Networks for IoT. *Zhang, C.*, +, *JSYST June 2020 2192-2201*

Telecommunication network routing

A Priority-Based Multiobjective Design for Routing, Spectrum, and Network Coding Assignment Problem in Network-Coding-Enabled Elastic Optical Networks. *Hai, D.T.*, +, *JSYST June 2020 2358-2369*

Analyzing NDN NACK on Interest Flooding Attack via SIS Epidemic Model. Wang, K., +, JSYST June 2020 1862-1873

Delay- and Interference-Aware Routing for Wireless Mesh Network. *Chai*, *Y*, +, *JSYST Sept. 2020 4119-4130*

Dynamic Network Scheduling for Virtual Routers. *Lee, K.*, +, *JSYST Sept.* 2020 3618-3629

Hierarchical Edge-Cloud SDN Controller System With Optimal Adaptive Resource Allocation for Load-Balancing. *Lin, F.P.*, +, *JSYST March 2020* 265-276

Toward Greater Intelligence in Route Planning: A Graph-Aware Deep Learning Approach. Zhuang, Z., +, JSYST June 2020 1658-1669

Telecommunication network topology

A Priority-Based Multiobjective Design for Routing, Spectrum, and Network Coding Assignment Problem in Network-Coding-Enabled Elastic Optical Networks. *Hai, D.T.*, +, *JSYST June 2020 2358-2369*

Cooperative Communication and Energy-Harvesting-Enabled Energy-Efficient Design of MI-Based Clustered Nonconventional WSNs. *Prasanna*, A.L., +, JSYST June 2020 2293-2302

Cross-Layer Network Lifetime Maximization in Underwater Wireless Sensor Networks. Zhou, Y., +, JSYST March 2020 220-231

Delay- and Interference-Aware Routing for Wireless Mesh Network. *Chai*, *Y*, +, *JSYST Sept. 2020 4119-4130*

Probabilistic Stability of Traffic Load Balancing on Wireless Complex Networks. *Moutsinas, G.*, +, *JSYST June 2020 2551-2556*

Resource Optimization Protocol Based on Multicommunity Model for Intermittently Connected Mobile Networks. Wang, T., +, JSYST March 2020 410-421

Topology-Aware Data Placement Strategy for Fault-Tolerant Storage Systems. Xia, J., +, JSYST Sept. 2020 4296-4307

Telecommunication networks

A Robust Synchronization-Based Chaotic Secure Communication Scheme With Double-Layered and Multiple Hybrid Networks. *Zhou, L.*, +, *JSYST June 2020 2508-2519*

Telecommunication power management

- A Novel Energy Supply Strategy for Stable Sensor Data Delivery in Wireless Sensor Networks. *Jin, Y.*, +, *JSYST Sept. 2020 3418-3429*
- Adaptive Traffic Management and Energy Cooperation in Renewable-Energy-Powered Cellular Networks. Lee, H., +, JSYST March 2020 132-143
- Artificial-Noise-Aided Energy-Efficient Secure Beamforming for Multi-Eavesdroppers in Cognitive Radio Networks. *Chen, P.*, +, *JSYST Sept. 2020 3801-3812*
- BLE Beacons for Indoor Positioning at an Interactive IoT-Based Smart Museum. Spachos, P., +, JSYST Sept. 2020 3483-3493
- Cooperative Communication and Energy-Harvesting-Enabled Energy-Efficient Design of MI-Based Clustered Nonconventional WSNs. *Prasanna*, A.L., +, JSYST June 2020 2293-2302
- Cross-Layer Network Lifetime Maximization in Underwater Wireless Sensor Networks. Zhou, Y., +, JSYST March 2020 220-231
- EHLinQ: Distributed Scheduler for D2D Communication With RF Energy Harvesting. Lee, H., +, JSYST June 2020 2281-2292
- Energy Efficiency Evaluation for Downlink Full-Duplex Nonlinear MU-MI-MO-OFDM System With Self-Energy Recycling. Shaikh, M.H.N., +, JSYST Sept. 2020 3313-3324
- Energy Efficiency Versus Reliability Tradeoff Improvement in Low-Power Wireless Communications. Zogovic, N., JSYST Sept. 2020 3173-3184
- Energy-Efficient Adaptive Sectorization for 5G Green Wireless Communication Systems. *Jain, P., +, JSYST June 2020 2382-2391*
- Energy-Efficient Design of MI Communication-Based 3-D Non-Conventional WSNs. Yadav, S., +, JSYST June 2020 2585-2588
- Energy-Efficient GCSA Medium Access Protocol for Infrastructure-Based Cognitive Radio Networks. Syed, T.S., +, JSYST March 2020 288-297
- Energy-Efficient Resource Allocation for Dynamic Priority-Based Vehicular Mobile-Health Communications. Fan, B., +, JSYST June 2020 2097-2108
- Energy-Efficient Resource Allocation in SWIPT Cooperative Wireless Networks. *Guo*, S., +, *JSYST Sept. 2020 4131-4142*
- MEGAN: Multipurpose Energy-Efficient, Adaptable, and Low-Cost Wireless Sensor Node for the Internet of Things. *Misra*, S., +, *JSYST March* 2020 144-151
- Novel Energy-Harvesting AF Relaying Schemes With Channel Estimation Errors. Zhou, Y., +, JSYST March 2020 333-342
- On Secure Mixed RF-FSO Decode-and-Forward Relaying Systems With Energy Harvesting. Saber, M.J., +, JSYST Sept. 2020 4402-4405
- Online Power Management for Latency-Sensitive Bluetooth Low-Energy Beacons. Chen, D., +, JSYST June 2020 2411-2420
- Optimizing Design Parameters for Relay-Aided Massive MIMO Systems. El-Mashed, M.G., JSYST June 2020 2249-2256
- Optimizing Efficient Energy Transmission on a SWIPT Interference Channel Under Linear/Nonlinear EH Models. *Tuan, P.V.*, +, *JSYST March 2020* 457-468
- Performance Analysis of Impaired SWIPT NOMA Relaying Networks Over Imperfect Weibull Channels. Li, X., +, JSYST March 2020 669-672
- Robust Optimization for Energy Efficiency in MIMO Two-Way Relay Networks With SWIPT. *Li*, *Q*., +, *JSYST March 2020 196-207*
- Throughput Maximization for Cognitive Radio With Wirelessly Powered Primary Users. Sun, M., +, JSYST June 2020 2432-2442
- Uplink Low-Power Scheduling for Delay-Bounded Industrial Wireless Networks Based on Imperfect Power-Domain NOMA. Xu, C., +, JSYST June 2020 2443-2454

Telecommunication power supplies

- Adaptive Traffic Management and Energy Cooperation in Renewable-Energy-Powered Cellular Networks. *Lee, H.*, +, *JSYST March 2020 132-143*Discrete Multiplicative Grey Wolf Algorithm Based Optimal Sizing and
- Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur, R.*, +, *JSYST March 2020 729-737*

Telecommunication scheduling

- A Novel Energy Supply Strategy for Stable Sensor Data Delivery in Wireless Sensor Networks. *Jin, Y., +, JSYST Sept. 2020 3418-3429*
- Adaptive Traffic Management and Energy Cooperation in Renewable-Energy-Powered Cellular Networks. *Lee, H., +, JSYST March 2020 132-143*
- Dynamic Network Scheduling for Virtual Routers. *Lee, K.*, +, *JSYST Sept.* 2020 3618-3629
- EHLinQ: Distributed Scheduler for D2D Communication With RF Energy Harvesting. Lee, H., +, JSYST June 2020 2281-2292
- Outage and Average Rate Performances of Full-Duplex Multiuser AF Relay Systems With Time-Selective Fading. *Raut*, *P*., +, *JSYST Sept. 2020 3390*-3398
- QoS-Aware Cross-Layer Optimization of Hybrid DSL-LTE Access Networks. Chuah, T.C., +, JSYST June 2020 2175-2186
- Uplink Low-Power Scheduling for Delay-Bounded Industrial Wireless Networks Based on Imperfect Power-Domain NOMA. Xu, C., +, JSYST June 2020 2443-2454

Telecommunication security

- A Lattice Signcrypted Secured Localization in Wireless Sensor Networks. Kumar, G., +, JSYST Sept. 2020 3949-3956
- A Lightweight Privacy-Preserving Authentication Protocol for VANETs. *Li*, *X*., +, *JSYST Sept.* 2020 3547-3557
- A Novel Privacy-Preserving Authentication Scheme for V2G Networks. Su, Y, +, JSYST June 2020 1963-1971
- A Robust Synchronization-Based Chaotic Secure Communication Scheme With Double-Layered and Multiple Hybrid Networks. *Zhou, L.*, +, *JSYST June 2020 2508-2519*
- Adaptive Jamming Power Control for Untrusted Relay Networks With Imperfect Channel Reciprocity. Lee, K., +, JSYST Sept. 2020 4217-4220
- Artificial Noisy MIMO Systems Under Correlated Scattering Rayleigh Fading—A Physical Layer Security Approach. *Liu, Y., +, JSYST June 2020* 2121-2132
- Artificial-Noise-Aided Energy-Efficient Secure Beamforming for Multi-Eavesdroppers in Cognitive Radio Networks. *Chen, P., +, JSYST Sept. 2020 3801-3812*
- Bayesian-Inference-Based Sliding Window Trust Model Against Probabilistic SSDF Attack in Cognitive Radio Networks. Fu, Y, +, JSYST June 2020 1764-1775
- E-WACGAN: Enhanced Generative Model of Signaling Data Based on WGAN-GP and ACGAN. Jin, Q., +, JSYST Sept. 2020 3289-3300
- Lightweight Secure Message Broadcasting Protocol for Vehicle-to-Vehicle Communication. *Limbasiva*, T., +, JSYST March 2020 520-529
- On Secure Mixed RF-FSO Decode-and-Forward Relaying Systems With Energy Harvesting. Saber, M.J., +, JSYST Sept. 2020 4402-4405
- On the Secrecy Performance of Random VLC Networks With Imperfect CSI and Protected Zone. Wang, J., +, JSYST Sept. 2020 4176-4187
- Physical Layer Security Enhancement for Satellite Communication Among Similar Channels: Relay Selection and Power Allocation. *Li*, *J*., +, *JSYST March* 2020 433-444
- Physical-Layer Security for Frequency Diverse Array Communication System Over Nakagami-*m* Fading Channels. *Ji*, *S*., +, *JSYST June 2020 2370*-
- Priority-Based Protection Against the Malicious Data Injection Attacks on State Estimation. *Khanna, K.*, +, *JSYST June 2020 1945-1952*
- Robust Directional Modulation Design for Secrecy Rate Maximization in Multiuser Networks. *Gui*, L., +, *JSYST Sept.* 2020 3150-3160
- Robust Secure Beamforming and Power Splitting for Millimeter-Wave Cognitive Satellite—Terrestrial Networks With SWIPT. *Yan*, *Y*, +, *JSYST Sept.* 2020 3233-3244
- Secure Communications Over Cell-Free Massive MIMO Networks With Hardware Impairments. Zhang, X., +, JSYST June 2020 1909-1920
- Secure Hybrid Beamformers Design in mmWave MIMO Wiretap Systems. *Tian, X., +, JSYST March 2020 548-559*
- Secure Transmit Antenna Selection Protocol for MIMO NOMA Networks Over Nakagami-*m* Channels. *Tran, D.*, +, *JSYST March 2020 253-264*

Securing Untrusted Full-Duplex Relay Channels in the Presence of Multiple External Cluster-Based Eavesdroppers. *Mabrouk, A.*, +, *JSYST March* 2020 665-668

Security--Reliability Tradeoff for Untrusted and Selfish Relay-Assisted D2D Communications in Heterogeneous Cellular Networks for IoT. *Zhang, C.*, +, *JSYST June 2020 2192-2201*

Telecommunication switching

AMOPE: Performance Analysis of OpenFlow Systems in Software-Defined Networks. *Mondal, A.*, +, *JSYST March 2020 124-131*

Location-Aware, Context-Driven QoS for IoT Applications. *Ahmad, E.*, +, *JSYST March 2020 232-243*

Telecommunication traffic

A Smart Optimization of Fault Diagnosis in Electrical Grid Using Distributed Software-Defined IoT System. *Al Mhdawi, A.K.*, +, *JSYST June 2020* 2780-2790

Adaptive Traffic Management and Energy Cooperation in Renewable-Energy-Powered Cellular Networks. *Lee, H.*, +, *JSYST March 2020 132-143*

AMOPE: Performance Analysis of OpenFlow Systems in Software-Defined Networks. *Mondal, A.*, +, *JSYST March 2020 124-131*

DAISY: A Detection and Mitigation System Against Denial-of-Service Attacks in Software-Defined Networks. *Imran, M.*, +, *JSYST June 2020 1933-1944*

Dynamic Network Scheduling for Virtual Routers. *Lee, K.*, +, *JSYST Sept.* 2020 3618-3629

Energy-Efficient GCSA Medium Access Protocol for Infrastructure-Based Cognitive Radio Networks. Syed, T.S., +, JSYST March 2020 288-297

Fuzzy-Based 3-D Stream Traffic Lightweighting Over Mobile P2P Network. Zhang, C., +, JSYST June 2020 1840-1851

Hierarchical Edge-Cloud SDN Controller System With Optimal Adaptive Resource Allocation for Load-Balancing. *Lin, F.P.*, +, *JSYST March 2020* 265-276

Interplay of Processing and Radio Parameters: A Service-Oriented Performance Study. Alabbasi, A., +, JSYST March 2020 398-409

MQry: Elastic Validity Region for Querying Mobile Point-of-Interests in Infrastructure-Less Networks. *Jung, B.*, +, *JSYST June 2020 1852-1861*

Probabilistic Stability of Traffic Load Balancing on Wireless Complex Networks. *Moutsinas, G.*, +, *JSYST June 2020 2551-2556*

QoS-Aware Cross-Layer Optimization of Hybrid DSL-LTE Access Networks. Chuah, T.C., +, JSYST June 2020 2175-2186

The Allocation and Reuse Scheme of Physical Cell Identifications Based on Maximum Degree First Coloring Algorithm. *Liu, M.*, +, *JSYST March* 2020 582-591

Traffic-Aware Multiple Association in Ultradense Networks: A State-Based Potential Game. Wang, X., +, JSYST Sept. 2020 4356-4367

Temperature measurement

An Experimental Estimation of Hybrid ANFIS-PSO-Based MPPT for PV Grid Integration Under Fluctuating Sun Irradiance. *Priyadarshi*, *N.*, +, *JSYST March* 2020 1218-1229

Text analysis

A PMU-Based Data-Driven Approach for Classifying Power System Events Considering Cyberattacks. Ma, R., +, JSYST Sept. 2020 3558-3569

Text mining

Systems Engineers' Effectiveness in an Organization: Text and Visual Analytics Approach. Zavala, A., +, JSYST Dec. 2020 5049-5060

Thermal energy storage

Probabilistic Optimal Dynamic Planning of Onsite Solar Generation for Residential Energy Hubs. *Senemar, S., +, JSYST March 2020 832-841*

Thermal loading

Optimal Heterogeneous Energy Storage Management for Multienergy Cruise Ships. Fang, S., +, JSYST Dec. 2020 4754-4764

Thermal power stations

Quantifying the System-Level Resilience of Thermal Power Generation to Extreme Temperatures and Water Scarcity. *Zhou*, *Y*., +, *JSYST March 2020 749-759*

Throughput

Autonomous Resource Slicing for Virtualized Vehicular Networks With D2D Communications Based on Deep Reinforcement Learning. Sun, G., +, JSYST Dec. 2020 4694-4705

Iterative Sub-Band and Power Allocation in Downlink Multiband NOMA. Goswami, D., +, JSYST Dec. 2020 5199-5209

Joint Optimization of Power and Fronthaul Compression for Data and Pilot Signals in Uplink C-RANs. Yu, H., +, JSYST Dec. 2020 4990-5001

Low-Complexity Reconfigurable and Intelligent Ultrawideband Angular Sensing. *Joshi, H.*, +, *JSYST Dec. 2020 4931-4942*

Time complexity

Learning-Based Resource Management for SWIPT. *Lee, K.*, +, *JSYST Dec.* 2020 4750-4753

Time factors

A Decomposition-Based Local Search for Large-Scale Many-Objective Vehicle Routing Problems With Simultaneous Delivery and Pickup and Time Windows. *Zhou*, Y., +, *JSYST Dec.* 2020 5253-5264

Time series

Multigranular Wavelet Decomposition-Based Support Vector Regression and Moving Average Method for Service-Time Prediction on Web Map Service Platforms. *Dong, G.*, +, *JSYST Sept. 2020 3653-3664*

Smart Home Monitoring System via Footstep-Induced Vibrations. *Li*, F, +, JSYST Sept. 2020 3383-3389

Time-domain analysis

A High-Accuracy Least-Time-Domain Mixture Features Machine-Fault Diagnosis Based on Wireless Sensor Network. Du, C., +, JSYST Sept. 2020 4101-4109

A New MIMO ORC Architecture for Power Oscillation Damping Using Remote Feedback Signals Under Intermittent Observations. *Yogarathinam, A.*, +, *JSYST March 2020 939-949*

Application of Bang–Bang Controller to Emulate Primary Frequency Response in DFIGs. *Toulabi*, M., +, *JSYST June 2020 2615-2623*

Voltage/Current Large Transient Suppression in DC Microgrids Using Local Information and Active Stabilizing Capability. Azimi, S.M., +, JSYST March 2020 1109-1116

Time-frequency analysis

A Flexible Multicarrier Scheme Based on the Discrete Orthogonal Stockwell Transform. Colen, G.R., +, JSYST Dec. 2020 5284-5295

An Online Bearing Fault Diagnosis Technique via Improved Demodulation Spectrum Analysis Under Variable Speed Conditions. *Liu, D.*, +, *JSYST June 2020 2323-2334*

Time-of-arrival estimation

Echo State Network and Echo State Gaussian Process for Non-Line-of-Sight Target Tracking. *Yang, X.*, +, *JSYST Sept. 2020 3885-3892*

Smart Home Monitoring System via Footstep-Induced Vibrations. Li, F, +, JSYST Sept. 2020 3383-3389

Time-varying channels

Deep RNN-Based Channel Tracking for Wireless Energy Transfer System. Kang, J., +, JSYST Sept. 2020 4340-4343

Time-varying systems

Energy-Efficient Joint Scheduling and Resource Management for UAV-Enabled Multicell Networks. *Yang, H.*, +, *JSYST March 2020 363-374*

Tolerance analysi

Toward a Robust Design of an Aileron Electromechanical Actuator: Sensitivity Analysis and Parametric Tolerancing Using a Variational Approach. Siala, H., +, JSYST Sept. 2020 3977-3986

Tools

An Information Theoretic Approach to Platform Technology Selection to Aid Influence Operations. *Hartong, M.W.*, +, *JSYST Dec. 2020 5308-5319*

Development and Validation of Artificial Neural Network-Based Tools for Forecasting of Power System Inertia With Wind Farms Penetration. *Paidi, E.S.N.R.*, +, *JSYST Dec. 2020 4978-4989*

PN Inference Based Autonomous Sequential Restoration of Distribution System Under Natural Disaster. Sandhya, K., +, JSYST Dec. 2020 5160-5171

Topology

Containment Control of Linear Multiagent Systems With Stochastic Disturbances via Event-Triggered Strategies. Zou, W., +, JSYST Dec. 2020 4810-4819

Fast Wireless Power Transfer for Multiple Receivers in Linear Topology. Lee, K., +, JSYST March 2020 649-652 Flow Setup Aware Controller Placement in Distributed Software-Defined Networking. Correia, N., +, JSYST Dec. 2020 5096-5099

Town and country planning

Intelligent Energy-Saving Supervision System of Urban Buildings Based on the Internet of Things: A Case Study. *Xing, L.*, +, *JSYST Sept. 2020 4252-4261*

Traffic engineering computing

Computation and Sensor Offloading for Cloud-Based Infrastructure-Assisted Autonomous Vehicles. Kong, P., JSYST Sept. 2020 3360-3370

Smart Parking System Based on Bluetooth Low Energy Beacons With Particle Filtering. *Mackey*, A., +, *JSYST Sept.* 2020 3371-3382

System Integration of Sensor-Fusion Localization Tasks Using Vision-Based Driving Lane Detection and Road-Marker Recognition. *Lin, C.*, +, *JSYST Sept. 2020 4523-4534*

Training

Extreme-Learning-Machine-Based Noniterative and Iterative Nonlinearity Mitigation for LED Communication Systems. *Gao*, *D*., +, *JSYST Dec*. 2020 4674-4683

Trajectory control

Local Controllability, Trajectory Planning, and Stabilization of a Two-Agent Underactuated Microrobotic System. *Fruchard, M.*, +, *JSYST June 2020* 2892-2900

Research on Cooperative Trajectory Planning and Tracking Problem for Multiple Carrier Aircraft on the Deck. Liu, J., +, JSYST June 2020 3027-3038

Trajectory optimization

Comprehensive Optimization of Energy Storage and Standoff Tracking for Solar-Powered UAV. Wei, X., +, JSYST Dec. 2020 5133-5143

Trajectory Optimization of SUAV for Marine Vessels Communication Relay Mission. Lun, Y., +, JSYST Dec. 2020 5014-5024

Transfer functions

Research on SoS-GERT Network Model for Equipment System of Systems Contribution Evaluation Based on Joint Operation. Wang, Z., +, JSYST Sept. 2020 4188-4196

Transforms

Design Precoded Space-Time-Frequency 4 × 1 and 4 × 2 OFDM Architectures in Frequency-Selective Fading Channels. *Yeh, H., JSYST March 2020* 277-287

Transient analysis

An Improvized Coordinated Voltage Control Scheme for Better Utilization of Regulating Devices During Various Operating Conditions of a Distribution System. *Gururaj, M.V.*, +, *JSYST Dec. 2020 4891-4900*

Local Estimation of Critical and Off-Peak Periods for Grid-Friendly Flexible Load Management. *Guzman, C.*, +, *JSYST Sept. 2020 4262-4271*

Transient Instability Mitigation via Repetitive Corrective Actions Based Upon the Real-Time Macrocoherency Evaluation. *Babu, G.V.N.Y.*, +, *JSYST Dec.* 2020 5084-5095

Transient response

A Novel Control Method Based on Droop for Cooperation of Flywheel and Battery Energy Storage Systems in Islanded Microgrids. *Khodadoost Arani, A.A.*, +, *JSYST March 2020 1080-1087*

Adaptive OFDM Waveform Design for Cognitive Radar in Signal-Dependent Clutter. Karimi, V., +, JSYST Sept. 2020 3630-3640

Transmission networks

Computational Tools for Modeling and Analysis of Power Generation and Transmission Systems of the Smart Grid. *Mahmud, K.*, +, *JSYST Sept.* 2020 3641-3652

Spatio-Temporal Value of Energy Storage in Transmission Networks. *Khatami, R.*, +, *JSYST Sept. 2020 3855-3864*

Transmission–Distribution Cosimulation: Analytical Methods for Iterative Coupling. Krishnamoorthy, G., +, JSYST June 2020 2633-2642

Transmitters

A Generalized Dynamic Planning Framework for Green UAV-Assisted Intelligent Transportation System Infrastructure. *Lucic, M.C.*, +, *JSYST Dec.* 2020 4786-4797

Environment-Assisted Passive WiFi Tracking With Self-Localizing Asynchronous Sniffers. Suraweera, N., +, JSYST Dec. 2020 4798-4809

Transmitting antennas

Joint Precoding and Combining Design for Hybrid Beamforming Systems With Subconnected Structure. Zhang, Z., +, JSYST March 2020 184-195

Optimizing Design Parameters for Relay-Aided Massive MIMO Systems. El-Mashed, M.G., JSYST June 2020 2249-2256

Outage Probability and Throughput of Multirelay SWIPT-WPCN Networks With Nonlinear EH Model and Imperfect CSI. *Jiang, R.*, +, *JSYST March* 2020 1206-1217

Relay-Aided Outdoor-to-Indoor Communication in Millimeter-Wave Cellular Networks. *Ntontin, K.*, +, *JSYST June 2020 2473-2484*

Secure Transmit Antenna Selection Protocol for MIMO NOMA Networks Over Nakagami-m Channels. Tran, D., +, JSYST March 2020 253-264

Transmit Antenna Selection for Full-Duplex Spatial Modulation Multiple-Input Multiple-Output System. Van Nguyen, L., +, JSYST Dec. 2020 4777-4785

Transportation

Improved Performance of Flywheel Fast Charging System (FFCS) Using Enhanced Artificial Immune System (EAIS). Gabbar, H.A., +, JSYST March 2020 824-831

Understanding Risks and Opportunities of Autonomous Vehicle Technology Adoption Through Systems Dynamic Scenario Modeling—The American Insurance Industry. *Liu*, *C.*, +, *JSYST March 2020 1365-1374*

Tree data structures

Dynamic Fault Tree Generation for Safety-Critical Systems Within a Systems Engineering Approach. *Baklouti, A.*, +, *JSYST March 2020 1512-1522*

Trees (mathematics)

Cable Connection Optimization for Onshore Wind Farms Considering Restricted Area and Topography. Li, J., +, JSYST Sept. 2020 3082-3092

Near-Optimal Multicast Tree Construction in Leaf-Spine Data Center Networks. *Luo*, *S.*, +, *JSYST June 2020 2581-2584*

Tsunami

An Improved Rapid-Source Parameter Determination System (AQUA) for Giant Earthquakes. *Kimura*, H., +, *JSYST Sept.* 2020 3451-3462

Turbogenerators

Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG. *Gheisarnejad*, M., +, JSYST March 2020 1058-1068

Twitter

Modeling Social Contagion and Information Diffusion in Complex Socio-Technical Systems. *Muhlmeyer, M.*, +, *JSYST Dec. 2020 5187-5198*

U

Ubiquitous computing

Architecting Ubiquitous Communication and Collaborative-Automation-Based Machine Network Systems for Flexible Manufacturing. *Meng, Z.*, +, *JSYST March 2020 113-123*

Campus Edge Computing Network Based on IoT Street Lighting Nodes. Chang, Y., +, JSYST March 2020 164-171

ChainSDI: A Software-Defined Infrastructure for Regulation-Compliant Home-Based Healthcare Services Secured by Blockchains. *Li*, *P*., +, *JSYST June* 2020 2042-2053

Ultra wideband communication

Near-Optimal Detection of Monobit Digitized UWB Signals in the Presence of Noise and Strong Intersymbol Interference. *Khani, H.*, +, *JSYST June* 2020 2311-2322

Ultra wideband technology

Near-Optimal Detection of Monobit Digitized UWB Signals in the Presence of Noise and Strong Intersymbol Interference. *Khani, H.*, +, *JSYST June* 2020 2311-2322

Uncertain systems

Global Fault-Tolerant Sampled-Data Control for Large-Scale Switched Time-Delay Nonlinear Systems. He, W., +, JSYST June 2020 1549-1557

Neuroadaptive Sliding Mode Formation Control of Autonomous Underwater Vehicles With Uncertain Dynamics. Wang, J., +, JSYST Sept. 2020 3325-3333

Robust Nonlinear State Feedback Control of Bidirectional Interlink Power Converters in Grid-Connected Hybrid Microgrids. *Zolfaghari, M.*, +, *JSYST March 2020 1117-1124*

Robust Voltage Control in Inverter-Interfaced Microgrids Under Plug-and-Play Functionalities. Zarei, A., +, JSYST June 2020 2813-2824

Secure Consensus Control of Multiagent Cyber-Physical Systems With Uncertain Nonlinear Models. *Rezaee, H., +, JSYST Sept. 2020 3539-3546*

Uncertainty

A New Hybrid Fault Prognosis Method for MFS Systems Based on Distributed Neural Networks and Recursive Bayesian Algorithm. *Kordestani, M.*, +, *JSYST Dec.* 2020 5407-5416

Additive Manufacturing Evaluation Tool for Design Studies. *Garzaniti*, *N.*, +, *JSYST Sept. 2020 4382-4393* Capacity-Maximized Transmitter Precoding for MU MIMO VLC Systems With Bounded Channel Uncertainties. *Zhao*, *S.*, +, *JSYST Dec. 2020 5144-5147*

Optimal Chance-Constrained Scheduling of Reconfigurable Microgrids Considering Islanding Operation Constraints. *Hemmati, M.*, +, *JSYST Dec.* 2020 5340-5349

Underground cables

Protection of High-Voltage DC Grids Using Traveling-Wave Frequency Characteristics. Saleh, K.A., +, JSYST Sept. 2020 4284-4295

Underwater acoustic communication

A Novel Receiver Design of Nonorthogonal FDM Systems in Underwater Acoustics Communication. *Anwar, S., +, JSYST Sept. 2020 3875-3884*

Cross-Layer Network Lifetime Maximization in Underwater Wireless Sensor Networks. Zhou, Y., +, JSYST March 2020 220-231

Increasing the Lifetime of Underwater Acoustic Sensor Networks: Difference Convex Approach. Mohammadi, Z., +, JSYST Sept. 2020 3214-3224

Underwater vehicles

Neuroadaptive Sliding Mode Formation Control of Autonomous Underwater Vehicles With Uncertain Dynamics. Wang, J., +, JSYST Sept. 2020 3325-3333

RBPF-MSIS: Toward Rao-Blackwellized Particle Filter SLAM for Autonomous Underwater Vehicle With Slow Mechanical Scanning Imaging Sonar. Chen, L., +, JSYST Sept. 2020 3301-3312

Unified Modeling Language

An MDE-Based Tool for Early Analysis of UML2.0/PSM Atomic and Composite Components. *Rouis, T.S.*, +, *JSYST June 2020 1647-1657*

Uninterruptible power supplies

An Adaptive Grid Frequency Support Mechanism for Energy Management in Cloud Data Centers. *Kaur, K.*, +, *JSYST March 2020 1195-1205*

Unmanned aerial vehicles

A Generalized Dynamic Planning Framework for Green UAV-Assisted Intelligent Transportation System Infrastructure. *Lucic, M.C.*, +, *JSYST Dec.* 2020 4786-4797

Comprehensive Optimization of Energy Storage and Standoff Tracking for Solar-Powered UAV. Wei, X., +, JSYST Dec. 2020 5133-5143

Comprehensive Optimization of Energy Storage and Standoff Tracking for Solar-Powered UAV. Wei, X., +, JSYST Dec. 2020 5133-5143

Trajectory Optimization of SUAV for Marine Vessels Communication Relay Mission. *Lun*, Y., +, *JSYST Dec. 2020 5014-5024*

Uplink

Asymptotic Analysis of Full-Duplex Large-Scale MIMO Systems With Low-Resolution ADCs/DACs Over Rician Fading Channels. *Dai, J.*, +, *JSYST Dec. 2020 4832-4841*

Joint Optimization of Power and Fronthaul Compression for Data and Pilot Signals in Uplink C-RANs. Yu, H., +, JSYST Dec. 2020 4990-5001

Shortest Uplink Scheduling for NOMA-Based Industrial Wireless Networks. Xu, C., +, JSYST Dec. 2020 5384-5395

Urban areas

Agent Pseudonymous Authentication-Based Conditional Privacy Preservation: An Emergent Intelligence Technique. *Chavhan, S.*, +, *JSYST Dec.* 2020 5233-5244

US Department of Defense

An Information Theoretic Approach to Platform Technology Selection to Aid Influence Operations. *Hartong, M.W.*, +, *JSYST Dec. 2020 5308-5319*

Utility theory

Process Heuristics: Extraction, Analysis, and Repository Considerations. Fillingim, K.B., +, JSYST Dec. 2020 5148-5159

V

Variable structure systems

A Cyber-Physical Cooperative Hierarchical Control Strategy for Islanded Microgrid Facing With Random Communication Failure. *Zhang, B.*, +, *JSYST June 2020 2849-2860*

Improving Microgrid Low-Voltage Ride-Through Capacity Using Neural Control. *Djilali, L.*, +, *JSYST June 2020 2825-2836*

Neuroadaptive Sliding Mode Formation Control of Autonomous Underwater Vehicles With Uncertain Dynamics. Wang, J., +, JSYST Sept. 2020 3325-3333

Recursive Smooth Variable Structure Filter for Estimation Processes in Direct Power Control Scheme Under Balanced and Unbalanced Power Grid. AlShabi, M., +, JSYST March 2020 971-982

Vectors

Optimizing Efficient Energy Transmission on a SWIPT Interference Channel Under Linear/Nonlinear EH Models. *Tuan, P.V.*, +, *JSYST March 2020* 457-468

Weight Induced Norm Approach to Group Decision Making for Multiobjective Optimization Problems in Systems Engineering. Chiu, W., +, JSYST June 2020 1580-1591

Vehicle dynamics

Agent Pseudonymous Authentication-Based Conditional Privacy Preservation: An Emergent Intelligence Technique. *Chavhan, S.*, +, *JSYST Dec.* 2020 5233-5244

Autonomous Resource Slicing for Virtualized Vehicular Networks With D2D Communications Based on Deep Reinforcement Learning. Sun, G., +, JSYST Dec. 2020 4694-4705

Cooperative Dynamic Fuzzy Perimeter Surveillance: Modeling and Fluid-Based Framework. Wu, J., +, JSYST Dec. 2020 5210-5220

Research on Cooperative Trajectory Planning and Tracking Problem for Multiple Carrier Aircraft on the Deck. *Liu, J.*, +, *JSYST June 2020 3027-3038*

Vehicle routing

A Decomposition-Based Local Search for Large-Scale Many-Objective Vehicle Routing Problems With Simultaneous Delivery and Pickup and Time Windows. *Zhou, Y., +, JSYST Dec. 2020 5253-5264*

A Variable Neighborhood Search-Based Hybrid Multiobjective Evolutionary Algorithm for HazMat Heterogeneous Vehicle Routing Problem With Time Windows. *Jiang, P.*, +, *JSYST Sept. 2020 4344-4355*

Vehicle-to-grid

A Novel Privacy-Preserving Authentication Scheme for V2G Networks. Su, Y, +, JSYST June 2020 1963-1971

Bidirectional Charging in V2G Systems: An In-Cell Variation Analysis of Vehicle Batteries. *Khalid, H.M.*, +, *JSYST Sept. 2020 3665-3675*

Vehicles

An Enhanced Motorway Control System for Mixed Manual/Automated Traffic Flow. Li, D., +, JSYST Dec. 2020 4726-4734

Vehicular ad hoc networks

A Lightweight Privacy-Preserving Authentication Protocol for VANETs. *Li*, *X.*, +, *JSYST Sept. 2020 3547-3557*

Efficient Lattice-Based Ring Signature for Message Authentication in VANETs. Mundhe, P., +, JSYST Dec. 2020 5463-5474

Energy-Efficient Resource Allocation for Dynamic Priority-Based Vehicular Mobile-Health Communications. Fan. B., +, JSYST June 2020 2097-2108

Enhanced Security Identity-Based Privacy-Preserving Authentication Scheme Supporting Revocation for VANETs. Wang, Y., +, JSYST Dec. 2020 5373-5383

Lightweight Secure Message Broadcasting Protocol for Vehicle-to-Vehicle Communication. *Limbasiya*, T., +, *JSYST March 2020 520-529*

Robust Power Control for Clustering-Based Vehicle-to-Vehicle Communication. Liu, Z., +, JSYST June 2020 2557-2568

Vibrations

Smart Home Monitoring System via Footstep-Induced Vibrations. *Li*, F., +, JSYST Sept. 2020 3383-3389

Video communication

Cross PHY/APP Layer User Grouping and Power Allocation for Uplink Multiantenna NOMA Video Communication Systems. *Tseng*, S., +, *JSYST Sept.* 2020 3351-3359

Video streaming

Campus Edge Computing Network Based on IoT Street Lighting Nodes. Chang, Y., +, JSYST March 2020 164-171

Fuzzy-Based 3-D Stream Traffic Lightweighting Over Mobile P2P Network. Zhang, C., +, JSYST June 2020 1840-1851

Virtual machines

Bio-Inspired Heuristics for VM Consolidation in Cloud Data Centers. Wang, J.V., +, JSYST March 2020 152-163

Computation and Sensor Offloading for Cloud-Based Infrastructure-Assisted Autonomous Vehicles. Kong, P., JSYST Sept. 2020 3360-3370

Dynamic Network Scheduling for Virtual Routers. *Lee, K.*, +, *JSYST Sept.* 2020 3618-3629

Fast Switching With VM Migration in 5G Cloud Radio Access Networks. Wang, Y., +, JSYST March 2020 477-488

Virtualization

Autonomous Resource Slicing for Virtualized Vehicular Networks With D2D Communications Based on Deep Reinforcement Learning. Sun, G., +, JSYST Dec. 2020 4694-4705

Bio-Inspired Heuristics for VM Consolidation in Cloud Data Centers. Wang, J.V., +, JSYST March 2020 152-163

Dynamic Network Scheduling for Virtual Routers. Lee, K., +, JSYST Sept. 2020 3618-3629

Interplay of Processing and Radio Parameters: A Service-Oriented Performance Study. Alabbasi, A., +, JSYST March 2020 398-409

Market-Driven Stochastic Resource Allocation Framework for Wireless Network Virtualization. *Gomez, M.M.*, +, *JSYST March 2020 489-499*

Viscosity

System Dynamic-Based Oil Weathering Processes: Simulation and Analysis. Kasimu, A., +, JSYST March 2020 1375-1383

Visible light communication

Capacity-Maximized Transmitter Precoding for MU MIMO VLC Systems With Bounded Channel Uncertainties. *Zhao, S., +, JSYST Dec. 2020 5144-5147*

Extreme-Learning-Machine-Based Noniterative and Iterative Nonlinearity Mitigation for LED Communication Systems. *Gao, D.*, +, *JSYST Dec.* 2020 4674-4683

Visual perception

Visual Perception for Multiple Human–Robot Interaction From Motion Behavior. Benli, E., +, JSYST June 2020 2937-2948

Visualization

Systems Engineers' Effectiveness in an Organization: Text and Visual Analytics Approach. Zavala, A., +, JSYST Dec. 2020 5049-5060

Voltage control

A Coordinated Real-Time Voltage Control Approach for Increasing the Penetration of Distributed Generation. *Othman, M.M.*, +, *JSYST March 2020 699-707*

A Cyber-Physical Cooperative Hierarchical Control Strategy for Islanded Microgrid Facing With Random Communication Failure. *Zhang, B.*, +, *JSYST June 2020 2849-2860*

Adaptive Interconnection and Damping Assignment Passivity-Based Control of Interlinking Converter in Hybrid AC/DC Grids. *Azimi, S.M.*, +, *JSYST Dec.* 2020 4718-4725

An Improvized Coordinated Voltage Control Scheme for Better Utilization of Regulating Devices During Various Operating Conditions of a Distribution System. *Gururaj, M.V.*, +, *JSYST Dec. 2020 4891-4900*

Combined Impact of Network Reconfiguration and Volt-VAR Control Devices on Energy Savings in the Presence of Distributed Generation. Pamshetti, V.B., +, JSYST March 2020 995-1006

Control of Parallel ULTC Transformers in Active Distribution Systems. *Pouladi*, A., +, *JSYST March* 2020 960-970

Decentralized Output-Feedback-Based Robust LQR V-f Controller for PV-Battery Microgrid Including Generation Uncertainties. Sen, S., +, JSYST Sept. 2020 4418-4429

Enhanced Active and Reactive Power Sharing in Islanded Microgrids. Parvizimosaed, M., +, JSYST Dec. 2020 5037-5048

Fast Resource Scheduling for Distribution Systems Enabled With Discrete Control Devices. *Nouri*, A., +, *JSYST Sept.* 2020 3767-3778

Optimal Control Methods for Photovoltaic Enabled Grid With Abnormal Power Loads. *Yang, Y.*, +, *JSYST March 2020 852-861*

Optimal Voltage Control in Distribution Systems With Intermittent PV Using Multiobjective Grey-Wolf-Lévy Optimizer. *Mahmoud, K.*, +, *JSYST March* 2020 760-770

Robust Voltage Control in Inverter-Interfaced Microgrids Under Plug-and-Play Functionalities. Zarei, A., +, JSYST June 2020 2813-2824

Systematized Active Power Control of PMSG-Based Wind-Driven Generators. Ramachandran, V., +, JSYST March 2020 708-717

Two-Mode Adaptive Schemes for VAR Control With Solar Power and Energy Storage. *Doan, S., +, JSYST March 2020 889-899*

Voltage/Current Large Transient Suppression in DC Microgrids Using Local Information and Active Stabilizing Capability. Azimi, S.M., +, JSYST March 2020 1109-1116

Voltage measurement

PMU Placement for Measurement Redundancy Distribution Considering Zero Injection Bus and Contingencies. *Chen, X.*, +, *JSYST Dec. 2020 5396-5406*

Voltage regulators

A Coordinated Real-Time Voltage Control Approach for Increasing the Penetration of Distributed Generation. *Othman, M.M.*, +, *JSYST March 2020 699-707*

Combined Impact of Network Reconfiguration and Volt-VAR Control Devices on Energy Savings in the Presence of Distributed Generation. Pamshetti, V.B., +, JSYST March 2020 995-1006

Control of Parallel ULTC Transformers in Active Distribution Systems. *Pouladi, A.*, +, *JSYST March 2020 960-970*

Voltage-source converters

Improved Power Quality in a Solar PV Plant Integrated Utility Grid by Employing a Novel Adaptive Current Regulator. *Kumar*; V.N., +, JSYST Sept. 2020 4308-4319

Systematized Active Power Control of PMSG-Based Wind-Driven Generators. Ramachandran, V., +, JSYST March 2020 708-717

W

Wastewater treatment

Augmenting Water Supplies Through Urban Wastewater Recycling (March 2019). Malisa, R., +, JSYST March 2020 1523-1530

Water conservation

Augmenting Water Supplies Through Urban Wastewater Recycling (March 2019). Malisa, R., +, JSYST March 2020 1523-1530

Water pumps

Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets. *Oikonomou, K.*, +, *JSYST Sept. 2020 3729-3739*

Water resources

Augmenting Water Supplies Through Urban Wastewater Recycling (March 2019). Malisa, R., +, JSYST March 2020 1523-1530

Design Optimization of RES-Based Desalination Systems Cooperating With Smart Grids. Malisovas, A., +, JSYST Dec. 2020 4706-4717

Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets. *Oikonomou, K.*, +, *JSYST Sept. 2020 3729-3739*

Water storage

Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets. *Oikonomou, K.*, +, *JSYST Sept. 2020 3729-3739*

Water supply

An MINLP-Based Approach for the Design-for-Control of Resilient Water Supply Systems. *Ulusoy, A.*, +, *JSYST Sept. 2020 4579-4590*

Augmenting Water Supplies Through Urban Wastewater Recycling (March 2019). Malisa, R., +, JSYST March 2020 1523-1530

Optimal Participation of Water Desalination Plants in Electricity Demand Response and Regulation Markets. *Oikonomou, K.*, +, *JSYST Sept. 2020* 3729-3739

Waveguides

Cooperative Communication and Energy-Harvesting-Enabled Energy-Efficient Design of MI-Based Clustered Nonconventional WSNs. *Prasanna*, A.L., +, JSYST June 2020 2293-2302

Relay-Aided Outdoor-to-Indoor Communication in Millimeter-Wave Cellular Networks. *Ntontin, K.*, +, *JSYST June 2020 2473-2484*

Wavelet transforms

A New Combinatory Approach for Wind Power Forecasting. *Abedinia, O.*, +, *JSYST Sept. 2020 4614-4625*

Multigranular Wavelet Decomposition-Based Support Vector Regression and Moving Average Method for Service-Time Prediction on Web Map Service Platforms. *Dong*, G., +, *JSYST Sept.* 2020 3653-3664

Protection Coordination for Assembly HVDC Breakers for HVDC Multiterminal Grids Using Wavelet Transform. *Mitra*, B., +, *JSYST March 2020* 1069-1079

Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. Manohar, M., +, JSYST Sept. 2020 3430-3439

Weapons

A Novel Effectiveness Evaluation Method Based on Simultaneous Probabilistic Finite-State Machines. Nan, Y., +, JSYST June 2020 1611-1622

Disclose or Exploit? A Game-Theoretic Approach to Strategic Decision Making in Cyber-Warfare. Chen, H., +, JSYST Sept. 2020 3779-3790

Wearable computers

Simultaneous Heterogeneous Sensor Localization, Joint Tracking, and Upper Extremity Modeling for Stroke Rehabilitation. *Chen, J.*, +, *JSYST Sept. 2020 3570-3581*

Weather forecasting

A New Combinatory Approach for Wind Power Forecasting. *Abedinia, O.*, +, *JSYST Sept. 2020 4614-4625*

An Integrated Preventive Operation Framework for Power Systems During Hurricanes. Sang, Y., +, JSYST Sept. 2020 3245-3255

Optimal Charge/Discharge Scheduling of Battery Storage Interconnected With Residential PV System. *Kapoor, A., +, JSYST Sept. 2020 3825-3835*

Web services

Loosely Coupled Cloud Robotic Framework for QoS-Driven Resource Allocation-Based Web Service Composition. *Xie, Y., +, JSYST March 2020* 1245-1256

Services Computing Systems Engineering Framework: A Proposition and Evaluation Through SOA Principles and Analysis Model. *Kurniawan, N.B.*, +, *JSYST Sept. 2020 3105-3116*

Weibull distribution

Performance Analysis of Impaired SWIPT NOMA Relaying Networks Over Imperfect Weibull Channels. Li, X., +, JSYST March 2020 669-672

Wideband

Low-Complexity Reconfigurable and Intelligent Ultrawideband Angular Sensing. Joshi, H., +, JSYST Dec. 2020 4931-4942

Wildfire

Energy-Efficient IoT-Fog-Cloud Architectural Paradigm for Real-Time Wildfire Prediction and Forecasting. Kaur, H., +, JSYST June 2020 2003-2011

Wind farms

Development and Validation of Artificial Neural Network-Based Tools for Forecasting of Power System Inertia With Wind Farms Penetration. *Paidi, E.S.N.R.*, +, *JSYST Dec. 2020 4978-4989*

Wind forecasting

Optimal Chance-Constrained Scheduling of Reconfigurable Microgrids Considering Islanding Operation Constraints. *Hemmati*, M., +, *JSYST Dec.* 2020 5340-5349

Wind power

Active Distribution Network Operation: A Market-Based Approach. Zubo, R.H.A., +, JSYST March 2020 1405-1416

Wind power plants

- A New Combinatory Approach for Wind Power Forecasting. *Abedinia, O.*, +, *JSYST Sept. 2020 4614-4625*
- A New MIMO ORC Architecture for Power Oscillation Damping Using Remote Feedback Signals Under Intermittent Observations. *Yogarathinam*, A., +, JSYST March 2020 939-949
- A Novel Hybrid Framework for Co-Optimization of Power and Natural Gas Networks Integrated With Emerging Technologies. *Mirzaei*, *M.A.*, +, *JSYST Sept. 2020 3598-3608*
- A Robust Coordinated Expansion Planning Model For Wind Farm-Integrated Power Systems With Flexibility Sources Using Affine Policies. Dehghan, S., +, JSYST Sept. 2020 4110-4118
- Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG. *Gheisarnejad*, M., +, JSYST March 2020 1058-1068
- Application of Bang–Bang Controller to Emulate Primary Frequency Response in DFIGs. *Toulabi*, M., +, *JSYST June 2020 2615-2623*
- Cable Connection Optimization for Onshore Wind Farms Considering Restricted Area and Topography. Li, J., +, JSYST Sept. 2020 3082-3092
- Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur, R.*, +, *JSYST March 2020 729-737*
- Discrete-Wavelet-Transform and Stockwell-Transform-Based Statistical Parameters Estimation for Fault Analysis in Grid-Connected Wind Power System. *Mukherjee*, N., +, *JSYST Sept. 2020 4320-4328*
- Dynamic Uncertainty Set Characterization for Bulk Power Grid Flexibility Assessment. *Pourahmadi, F., +, JSYST March 2020 718-728*
- Stochastic Weather Modeling-Based Protection Scheme for Hybrid PV—Wind System With Immunity Against Solar Irradiance and Wind Speed. *Manohar, M.*, +, *JSYST Sept. 2020 3430-3439*

Wind speed

A Practicable Copula-Based Approach for Power Forecasting of Small-Scale Photovoltaic Systems. *Rajabalizadeh*, S., +, JSYST Dec. 2020 4911-4918

Wind turbines

Active Power Sharing and Frequency Recovery Control in an Islanded Microgrid With Nonlinear Load and Nondispatchable DG. *Gheisarnejad*, M., +, JSYST March 2020 1058-1068

Application of Bang–Bang Controller to Emulate Primary Frequency Response in DFIGs. *Toulabi*, M., +, *JSYST June 2020 2615-2623*

Cable Connection Optimization for Onshore Wind Farms Considering Restricted Area and Topography. Li, J., +, JSYST Sept. 2020 3082-3092

Discrete Multiobjective Grey Wolf Algorithm Based Optimal Sizing and Sensitivity Analysis of PV-Wind-Battery System for Rural Telecom Towers. *Kaur*; R., +, *JSYST March 2020 729-737*

Probabilistic Model for Microgrids Optimal Energy Management Considering AC Network Constraints. *Javidsharifi*, M., +, *JSYST June 2020 2703-2712*

Windings

An Improved Current Balancing Technique of Two-Winding IG Suitable for Wind-PV-Based Grid-Isolated Hybrid Generation System. *Chatterjee, A.*, +, *JSYST Dec.* 2020 4874-4882

Wireless channels

Adaptive Jamming Power Control for Untrusted Relay Networks With Imperfect Channel Reciprocity. Lee, K., +, JSYST Sept. 2020 4217-4220

Application of the Mixture of Lognormal Distribution to Represent the First-Order Statistics of Wireless Channels. *Das, S.,* +, *JSYST Sept. 2020*

Association, Blockage, and Handoffs in IEEE 802.11ad-Based 60-GHz Picocells—A Closer Look. *Joshi, K.C.*, +, *JSYST June 2020 2144-2153*

Bridging the Gap Between CP-OFDM and ZP-OFDM for the Provision of Ultra-Low Latency Services in 5G. *Ayadi*, R., +, *JSYST March 2020 603-613*

Chaos-Based Anytime-Reliable Coded Communications. *Tarable, A.*, +, *JSYST June 2020 2214-2224*

Cross PHY/APP Layer User Grouping and Power Allocation for Uplink Multiantenna NOMA Video Communication Systems. *Tseng, S.*, +, *JSYST Sept. 2020 3351-3359*

- Cross-Layer Network Lifetime Maximization in Underwater Wireless Sensor Networks. Zhou, Y., +, JSYST March 2020 220-231
- Decentralized Learning for Opportunistic Spectrum Access: Multiuser Restless Multiarmed Bandit Formulation. *Agrawal, H.*, +, *JSYST June 2020 2485-2496*
- Deep RNN-Based Channel Tracking for Wireless Energy Transfer System. Kang, J., +, JSYST Sept. 2020 4340-4343
- Effect of Doppler Shift on the Performance of Multicell Full-Duplex Massive MIMO Networks. *Dai, J.*, +, *JSYST June 2020 2421-2431*
- Efficient Evaluation of Massive MIMO Channel Capacity. Al-Wahhamy, A., +, JSYST March 2020 614-620
- Energy-Efficient Resource Allocation for Dynamic Priority-Based Vehicular Mobile-Health Communications. Fan, B., +, JSYST June 2020 2097-2108
- Energy-Efficient Resource Allocation in SWIPT Cooperative Wireless Networks. Guo, S., +, JSYST Sept. 2020 4131-4142
- Ergodic Capacity of NOMA-Based Uplink Satellite Networks With Randomly Deployed Users. *Yan, X.*, +, *JSYST Sept. 2020 3343-3350*
- FreeTrack: Device-Free Human Tracking With Deep Neural Networks and Particle Filtering. Zhou, R., +, JSYST June 2020 2990-3000
- Joint Nullspace Projection-Based Interference Mitigation for Full-Duplex Relay-Assisted Multicell Networks. *Fadoul, M.M.*, +, *JSYST June 2020* 2392-2399
- Joint Trajectory Design, Tx Power Allocation, and Rx Power Splitting for UAV-Enabled Multicasting SWIPT Systems. *Kang, J.*, +, *JSYST Sept.* 2020 3740-3743
- Multiobjective Precoder Design for Coexisting Wireless Energy Transfer and Information Transmission Systems. *Zhang, H.*, +, *JSYST March 2020* 445-456
- Near-Optimal Detection of Monobit Digitized UWB Signals in the Presence of Noise and Strong Intersymbol Interference. *Khani, H.*, +, *JSYST June* 2020 2311-2322
- Novel Algorithms for Blind Sensing of Signals With Variable Bandwidths in Cognitive Radio. De, P., JSYST Sept. 2020 4272-4283
- On the Secrecy Performance of Random VLC Networks With Imperfect CSI and Protected Zone. Wang, J., +, JSYST Sept. 2020 4176-4187
- Optimizing Design Parameters for Relay-Aided Massive MIMO Systems. El-Mashed, M.G., JSYST June 2020 2249-2256
- Optimizing Efficient Energy Transmission on a SWIPT Interference Channel Under Linear/Nonlinear EH Models. *Tuan, P.V.*, +, *JSYST March 2020* 457-468
- Outage Probability in the Uplink of Multitier Millimeter Wave Cellular Networks. *Onireti*, O., +, *JSYST June* 2020 2520-2531
- Partial-Fixed Interference Alignment in Multiuser Interference Channel. Chen, X., +, JSYST June 2020 2303-2310
- Performance Analysis of a Mixed Cooperative PLC–VLC System for Indoor Communication Systems. *Jani, M.*, +, *JSYST March 2020 469-476*
- Performance Analysis of Impaired SWIPT NOMA Relaying Networks Over Imperfect Weibull Channels. *Li*, *X*., +, *JSYST March 2020 669-672*
- Performance Evaluation of In-Band Full-Duplex System Using One-Time-Slot Two-Way Relay. *Chang, K.*, +, *JSYST March 2020 510-519*
- Probabilistic Stability of Traffic Load Balancing on Wireless Complex Networks. *Moutsinas, G.*, +, *JSYST June 2020 2551-2556*
- QoS-Aware Cross-Layer Optimization of Hybrid DSL-LTE Access Networks. Chuah, T.C., +, JSYST June 2020 2175-2186
- Rate-Loss Mitigation for a Millimeter-Wave Beamspace MIMO Lens Antenna Array System Using a Hybrid Beam Selection Scheme. *Sarker, M.A.L.*, +, *JSYST Sept. 2020 3582-3585*
- Robust Directional Modulation Design for Secrecy Rate Maximization in Multiuser Networks. Gui, L., +, JSYST Sept. 2020 3150-3160
- Robust Optimization for Energy Efficiency in MIMO Two-Way Relay Networks With SWIPT. Li, Q., +, JSYST March 2020 196-207
- Robust Power Control for Clustering-Based Vehicle-to-Vehicle Communication. Liu, Z., +, JSYST June 2020 2557-2568
- Secure Communications Over Cell-Free Massive MIMO Networks With Hardware Impairments. *Zhang, X., +, JSYST June 2020 1909-1920*
- Secure Hybrid Beamformers Design in mmWave MIMO Wiretap Systems. *Tian, X.*, +, *JSYST March 2020 548-559*

Securing Untrusted Full-Duplex Relay Channels in the Presence of Multiple External Cluster-Based Eavesdroppers. *Mabrouk, A.*, +, *JSYST March* 2020 665-668

Wireless communication

- Artificial Noise Hopping: A Practical Secure Transmission Technique With Experimental Analysis for Millimeter Wave Systems. *Ju, Y.*, +, *JSYST Dec.* 2020 5121-5132
- Efficient Obfuscation for Encrypted Identity-Based Signatures in Wireless Body Area Networks. *Zhang, Y.*, +, *JSYST Dec. 2020 5320-5328*
- Enhanced Security Identity-Based Privacy-Preserving Authentication Scheme Supporting Revocation for VANETs. Wang, Y., +, JSYST Dec. 2020 5373-5383
- Environment-Assisted Passive WiFi Tracking With Self-Localizing Asynchronous Sniffers. Suraweera, N., +, JSYST Dec. 2020 4798-4809
- Learning-Based Resource Management for SWIPT. Lee, K., +, JSYST Dec. 2020 4750-4753
- Legitimate Surveillance With Battery-Aided Wireless Powered Full-Duplex Monitor. *Xu, D., JSYST Dec. 2020 5229-5232*
- Shortest Uplink Scheduling for NOMA-Based Industrial Wireless Networks. Xu, C., +, JSYST Dec. 2020 5384-5395

Wireless fidelity

- Environment-Assisted Passive WiFi Tracking With Self-Localizing Asynchronous Sniffers. Suraweera, N., +, JSYST Dec. 2020 4798-4809
- WiFlowCount: Device-Free People Flow Counting by Exploiting Doppler Effect in Commodity WiFi. Zhou, R., +, JSYST Dec. 2020 4919-4930

Wireless LAN

- A Review on Design and Implementation of Software-Defined WLANs. *Qureshi, K.I.*, +, *JSYST June 2020 2601-2614*
- Association, Blockage, and Handoffs in IEEE 802.11ad-Based 60-GHz Picocells—A Closer Look. *Joshi, K.C.*, +, *JSYST June 2020 2144-2153*
- Calibrating Phase Offsets for Commodity WiFi. Zhang, D., +, JSYST March 2020 661-664
- Energy-Efficient GCSA Medium Access Protocol for Infrastructure-Based Cognitive Radio Networks. Syed, T.S., +, JSYST March 2020 288-297
- FreeTrack: Device-Free Human Tracking With Deep Neural Networks and Particle Filtering. Zhou, R., +, JSYST June 2020 2990-3000
- Lightweight Privacy-Preserving Scheme in Wi-Fi Fingerprint-Based Indoor Localization. Zhang, G., +, JSYST Sept. 2020 4638-4647
- Time-Dependent Bit Error Rate Analysis for Smart Utility Networks in the Presence of WLAN Interferers. *Gouissem, A.*, +, *JSYST June 2020 2133-2143*
- WiFi Fingerprinting Indoor Localization Using Local Feature-Based Deep LSTM. Chen, Z., +, JSYST June 2020 3001-3010

Wireless mesh networks

Delay- and Interference-Aware Routing for Wireless Mesh Network. *Chai*, *Y*., +, *JSYST Sept. 2020 4119-4130*

Wireless sensor networks

- A High-Accuracy Least-Time-Domain Mixture Features Machine-Fault Diagnosis Based on Wireless Sensor Network. *Du, C.*, +, *JSYST Sept. 2020* 4101-4109
- A Lattice Signcrypted Secured Localization in Wireless Sensor Networks. *Kumar, G.*, +, *JSYST Sept. 2020 3949-3956*
- A New Distributed Fault Detection Method for Wireless Sensor Networks. Gharamaleki, M.M., +, JSYST Dec. 2020 4883-4890
- A Novel Energy Supply Strategy for Stable Sensor Data Delivery in Wireless Sensor Networks. *Jin, Y., +, JSYST Sept. 2020 3418-3429*
- A Periodic Multinode Charging and Data Collection Scheme With Optimal Traveling Path in WRSNs. Lyu, Z., +, JSYST Sept. 2020 3518-3529
- A Software-Defined Management System for IP-Enabled WSNs. *Jura-do-Lasso, F.F.*, +, *JSYST June 2020 2335-2346*
- ASIS: Autonomous Seismic Imaging System With *In Situ* Data Analytics and Renewable Energy. *Clemente, J., +, JSYST March 2020 1277-1284*
- Connected Target ε-probability Coverage in WSNs With Directional Probabilistic Sensors. Xu, X., +, JSYST Sept. 2020 3399-3409
- Cooperative Communication and Energy-Harvesting-Enabled Energy-Efficient Design of MI-Based Clustered Nonconventional WSNs. *Prasanna*, A.L., +, JSYST June 2020 2293-2302

Cross-Layer Network Lifetime Maximization in Underwater Wireless Sensor Networks. Zhou, Y., +, JSYST March 2020 220-231

- Efficient Obfuscation for Encrypted Identity-Based Signatures in Wireless Body Area Networks. *Zhang, Y.*, +, *JSYST Dec. 2020 5320-5328*
- Energy-Aware Connectivity Restoration Mechanism for Cyber-Physical Systems of Networked Sensors and Robots. *Baroudi, U.*, +, *JSYST Sept.* 2020 3093-3104
- Energy-Efficient Barrier Lifetime Prolonging Scheme Based on Repairing in Directional Sensor Networks. Fan, X., +, JSYST Dec. 2020 4943-4954
- Energy-Efficient Design of MI Communication-Based 3-D Non-Conventional WSNs. *Yadav, S.*, +, *JSYST June 2020 2585-2588*
- Energy-Efficient IoT-Fog-Cloud Architectural Paradigm for Real-Time Wildfire Prediction and Forecasting. Kaur, H., +, JSYST June 2020 2003-2011
- Green Computing in Underwater Wireless Sensor Networks Pressure Centric Energy Modeling. *Khasawneh, A.M.*, +, *JSYST Dec. 2020 4735-4745* Increasing the Lifetime of Underwater Acoustic Sensor Networks: Difference Convex Approach. *Mohammadi, Z.*, +, *JSYST Sept. 2020 3214-3224*

- MEGAN: Multipurpose Energy-Efficient, Adaptable, and Low-Cost Wireless Sensor Node for the Internet of Things. *Misra, S.*, +, *JSYST March* 2020 144-151
- On Communication Performance in Energy Harvesting WSNs Under a Cooperative Jamming Attack. Vo, V.N., +, JSYST Dec. 2020 4955-4966
- Optimized Fuzzy Logic-Based Fire Monitoring in Underground Coal Mines: Binary Particle Swarm Optimization Approach. *Muduli, L.*, +, *JSYST June* 2020 3039-3046
- ORCID: Opportunistic Reconnectivity for Network Management in the Presence of Dumb Nodes in Wireless Sensor Networks. *Roy, A.*, +, *JSYST March 2020 9-16*
- Performance Analysis of Software-Defined Multihop Wireless Sensor Networks. *Jurado-Lasso, F.F.*, +, *JSYST Dec. 2020 4653-4662*
- Reliability Evaluation and Reliability-Based Optimal Design for Wireless Sensor Networks. *Xiang*, S., +, *JSYST June* 2020 1752-1763
- SDNMM—A Generic SDN-Based Modular Management System for Wireless Sensor Networks. *Ndiaye, M.*, +, *JSYST June 2020 2347-2357*