IEEE TRANSACTIONS ON

ANTENNAS AND PROPAGATION

A PUBLICATION OF THE IEEE ANTENNAS AND PROPAGATION SOCIETY

JUNE 2024 VOLUME 72 NUMBER 6 IETPAK (ISSN 0018-926X)

COMMUNICATIONS

Millimeter-Wave Compact Wideband High-Gain 8 × 8 CP Filtenna Array With Densified 16-Way SIW Feeding Network . . . . . *W. Wang, H. Jin, W. Yu, L. Liu, K.-S. Chin, and G. Q. Luo*
Dual-Polarized Folded Reflectarray Antenna With Active Components . . . . . *M. Wang, M. T. Yim, and C. H. Chan*
Broadband Dual-Polarization Thin Aperture Based on Dense Arrangement of Subwavelength Unit Cells for Low-Profile Transmitarray Antenna . . . . . *Z.-H. Fu, X.-S. Yang, L.-L. Wang, and B.-Z. Wang*
Methodology and Design of Absorptive Filtering Reconfigurable Intelligent Surfaces . . . . . *Q. Hu, H. Yang, X. Zeng, Y. Rao, and X. Y. Zhang*
A Wideband High-Efficiency Metal-Only Folded Reflectarray Using Subwavelength Detachable Trapezoidal Grooved Element . . . . . *M. Wang, X. Li, H. Hao, W. Luo, Z. Chen, and Z. Tian*
A Liquid-Crystal-Based Dynamic Metasurface Antenna for Electronical Beam-Steering at 105 GHz . . . . . *P.-Y. Wang, B. Sievert, A. Rennings, and D. Erni*
A Fully Metallic 3-D mmWave Reflectarray With Independent Polarization Steering Control . . . . . *I. Parellada-Serrano, J. Velasco, C. Molero, M. García-Vigueras, and P. Padilla*
Array Nulling Synthesis Based on Hyper-Parameter Optimized Self-Paced Learning Convolutional Neural Networks . . . . . *Y. Zhang, H. Hu, T. Li, B. Chen, J. Tian, and S. Lei*
SLM Printed Wideband Filtering Antenna With Low Sidelobe and Controllable Bandwidth for *K*-Band Multibeam Applications . . . . . *H. Qi and H. Liu*
Deep Learning Electromagnetic Inversion Solver Based on a Two-Step Framework for High-Contrast and Heterogeneous Scatterers . . . . . *H. M. Yao, M. Ng, and L. Jiang*
3-D-Printed Integrated GRIN Lens–Polarizer Using Anisotropic Materials . . . . . *J.-M. Poyanco, F. Pizarro, and E. Rajo-Iglesias*
A Butler Matrix-Based Multibeam W-Band Slot Antenna Array Fabricated by Metal Additive Manufacturing Technology . . . . . *D. Wang, K.-D. Xu, Y. Cao, C. Guo, and S. Yan*
Analytical Model for Calculating Gain Pattern of Antennas Implanted in Large Host Bodies . . . . . *M. Gao, Z. Šipuš, I. V. Soares, S. Raman, D. Nikolayev, and A. K. Skrivervik*
Integration of Second-Order Bandstop Filter Into a Dual-Polarized 5G Millimeter-Wave Magneto-Electric Dipole Antenna . . . . . *J. Chen, M. Berg, K. Rasilainen, Z. Siddiqui, M. E. Leinonen, and A. Pärssinen*
A Series-Fed Slant-Polarized Microstrip Patch Antenna Array . . . . . *F.-C. Chen, Y.-Z. Liang, W.-F. Zeng, and K.-R. Xiang*
Compact Isolation-Enhanced Dual-Band ±45° Polarization Beam-Scanning Millimeter-Wave Antennas With Dual-Band Bandstop Structures . . . . . *Z.-H. Tu, W.-S. Ou, and F.-C. Chen*
Conformal Wideband Circularly Polarized H-Plane Horn Antenna Integrated With Quasi-Yagi . . . . . *Y. Zhao, A.-Z. Wang, S.-M. Zhang, and J.-Q. Ding*
A Reflectionless Circularly Polarized High-Gain Microstrip Filtering Antenna With Wideband Response . . . . . *V. Paul and K. Dhwaj*
Huygens Pattern-Reconfigurable Antenna Array With Wide Beam-Steering Angle and Stable-Enhanced Gain . . . . . *M. Chen, H. Hu, K. Sun, S. Lei, J. Tian, and B. Chen*
Antenna Array Diagnosis Using a Deep Learning Approach . . . . . *H. M. Yao, M. Li, L. Jiang, K. L. Yeung, and M. Ng*
A Statistical Approach for Robust Metasurfaces and Metasurface-Based RIS Engineering . . . . . *L. Stefanini, D. Ramaccia, M. Barbuto, Z. Hamzavi-Zarghani, M. Longhi, A. Monti, S. Vellucci, A. Toscano, and F. Bilotti*
An Integrated Antenna Array With Broadband, Low-RCS, and High-Gain Characteristics . . . . . *L. Zhu, J. Sun, G. Xu, Z. Hao, and Q. Cao*
Optically Transparent Circularly Polarized Reflectarray for Ka-Band Applications . . . . . *X. W. Dai, Y. H. Zhang, Z. Li, W. Yu, L. Liu, and G. Q. Luo*
Depolarization Dyadics for Truncated Spheres, Spheroids, and Ellipsoids . . . . . *T. G. Mackay and A. Lakhtakia*
A Hybrid Method of ACA-PO for Efficient Analysis of Antenna Array Mounted on Electrically Large Platforms . . . . . *Z. Xu, X. Wang, H. Zhang, L. Zhao, C. Liu, and Y. Liu*