Chronological Index

- **T03-076** Cooling Fin Design. V. Bertola, *Ecole Normale Superieure*, *France*; and E. Cafaro, *Politecnico di Torino, Italy* (17, 4, pp. 536–538) Technical Note
- Technical Comment by H. M. Soliman and A. M. Elazhary, *University of Manitoba* (22, 2, 319–320)
- **T08-001 Influence of Radiative Heating on a Martian Orbiter.** Olivier Rouzad, Lionel Tesse, and Tristan Soubrie, *ONERA, France*; Anouar Soufiani and Philippe Riviere, *EM2C, France*; and David Zeitoun, *IUSTI, France* (22, 1, p. 10) Article
- T08-002 Discontinuous Spectral Element Approach for Solving Transient Radiative Transfer Equations. J. M. Zhao and L. H. Liu, *Harbin Institute of Technology, China (ROC)* (22, 1, p. 20) Article
- **T08-003 Hybrid Particle–Continuum Simulations of Nonequilibrium Hypersonic Blunt-Body Flowfields.** Thomas E. Schwartzentruber, Leonardo C. Scalabrin, and Iain D. Boyd, *University of Michigan* (**22**, 1, p. 29) Article based on AIAA Paper 2006-3602
- **T08-004 Velocity Slip and Temperature Jump in Hypersonic Aerothermodynamics.** Andrew J. Lofthouse, Leonardo C. Scalabrin, and Iain D. Boyd, *University of Michigan* (**22**, 1, p. 38) Article based on AIAA Paper 2007-208
- **T08-005 Full-Coverage Film Cooling for a Turbine Blade with Axial-Shaped Holes.** Zhihong Gao, Diganta Narzary, Shantanu Mhetras, and JeChin Han, *Texas A&M University* (**22**, 1, p. 50) Article based on AIAA Paper 2007-4031
- T08-006 Radiative Gas Dynamic Model of Hydrogen Laser-Supported Plasma Generator. S. T. Surzhikov, *Institute for Problems in Mechanics, Russian Academy of Sciences, Russia*; M. Capitelli, G. Colonna, and C. Gorse, *University of Bari, Italy* (22, 1, p. 62) Article based on AIAA Paper 2002-0638
- T08-007 One-Dimensional Ablation Using a Full Newton's Method and Finite Control Volume Procedure. A. J. Amar, Sandia National Laboratories; B. F. Blackwell, Blackwell Consulting; and J. R. Edwards, North Carolina State University (22, 1, p. 71) Article based on AIAA Paper 2006-2910
- **T08-008** Investigation of Hydrogen Droplet Solidification in Cryogenic Helium. Betul Unlusu, Jinquan Xu, M. Yousuff Hussaini, Dogan Celik, and Steven W. Van Sciver, *Florida State University* (**22**, 1, p. 83) Article based on AIAA Paper 2005-4550
- **T08-009** Performance Characteristics of Electrohydrodynamic Conduction Pump in Two-Phase Loops. Seong-II Jeong, Korea Advanced Institute of Science and Technology, South Korea; and Jeffrey Didion, NASA Goddard Space Flight Center (**22**, 1, p. 90) Article based on AIAA Paper 2005-5069
- T08-010 Experimental Investigation of New Flat-Plate-Type Capillary Pumped Loop. Zhichun Liu, Wei Liu, and Jinguo Yang, Huazhong University of Science and Technology, China (ROC) (22, 1, p. 98) Article
- T08-011 Experimental and Numerical Studies of Thermally Induced Acoustic Waves in an Enclosure. Yiqiang Lin and Bakhtier Farouk, *Drexel University* (22, 1, p. 105) Article
- T08-012 Effectiveness of Complex Design Through an Evolutionary Approach. H. Pedro and M. H. Kobayashi, *University of Hawaii—Manoa*; C. F. M. Coimbra, *University of California*; and A. K. da Silva, *University of Hawaii—Manoa* (22, 1, p. 115) Technical Note
- **T08-013 Heat Transfer with a Step in Surface Temperature.** M. Sandoval and C. Treviño, *Universidad Nacional Autónoma de México, Mexico* (**22**, 1, p. 118) Technical Note

- T08-014 Modeling for the Transient Radiative Properties of Alumina Particles with Phase Transition. Shi-Kui Dong, Jia-Yu Li, Zhi-Hong He, and He-Ping Tan, *Harbin Institute of Technology, China (ROC)* (22, 1, p. 121) Technical Note
- T08-015 Radiation Effects on the Magnetohydrodynamic Free Convection Flow. Tzer-Ming Chen, National Taipei University of Technology, Taiwan (ROC) (22, 1, p. 125) Technical Note
- **T08-016** Efficient Calculation of Radiation Heat Transfer in Participating Media. P. Hassanzadeh and G. D. Raithby, *University of Waterloo, Canada*; and E. H. Chui, *National Resources Canada, Canada* (22, 2, p. 129) Article
- T08-017 Numerical Computation of Radiative Heating Environment for Huygens Probe Entry Flight. Hiroshi Osawa, *Tohoku University, Japan*; Shingo Matsuyama, *Japan Aerospace Exploration Agency, Japan*; Naofumi Ohnishi, Michiko Furudate, and Keisuke Sawada, *Tohoku University, Japan* (22, 2, p. 140) Article based on AIAA Paper 2006-3772
- **T08-018** Spectroscopic Analysis of Titan Atmospheric Plasmas. M. Playez and D. G. Fletcher, *von Karman Institute for Fluid Dynamics, Belgium* (22, 2, p. 150) Article based on AIAA Paper 2007-813
- T08-018E Erratum on Spectroscopic Analysis of Titan Atmospheric Plasmas. M. Playez and D. G. Fletcher, von Karman Institute for Fluid Dynamics, Belgium (22, 3, p. 538) Erratum
- T08-019 Studies of Chemi-Ionization and Chemiluminescence in Supersonic Flows of Combustion Products. Saurabh Keshav, Yurii G. Utkin, Munetake Nishihara, Ainan Bao, J. William Rich, and Igor V. Adamovich, *The Ohio State University* (22, 2, p. 157) Article based on AIAA Paper 2007-1353
- T08-020 Numerical Simulation of Stagnation Line Nonequilibrium Airflows for Reentry Applications. A. Bourdon, *Ecole Centrale Paris, France*; and A. Bultel, *Université de Rouen, Site Universitaire du Madrillet, France* (22, 2, p. 168) Article
- T08-021 Nitric Oxide Production from Surface Recombination of Oxygen and Nitrogen Atoms. Dušan A. Pekakovic and Jochen Marschall, SRI International; Lian Duan and Maria P. Martin, Princeton University (22, 2, p. 178) Article
- **T08-022** Analysis of Segmented Arc-Heater Flows with High Argon Concentration. Jeong-Il Lee, Sang-Hoon Han, Chongam Kim, and Kyu-Hong Kim, Seoul National University, South Korea (22, 2, p. 187) Article
- **T08-023 Film-Cooling Prediction on Rotor Blade Leading Edge in 1-1/2 Turbine Stage.** Huitao Yang, Hamn-Ching Chen, and Je-Chin Han, *Texas A&M University*; and Hee-Koo Moon, *Solar Turbines, Inc.* **(22,** 2, p. 201) Article
- T08-024 Thermal Transport During Liquid Jet Impingement from a Confined Spinning Nozzle. Muhammad M. Rahman and Jorge C. Lallave, University of South Florida (22, 2, p. 210) Article
- T08-025 Multiphase Nusselt Correlation for Impinging Droplet Heat Flux from a NACA Airfoil. X. Wang, University of Manitoba, Canada; G. F. Naterer, University of Ontario Institute of Technology, Canada; and Eric Bibeau, University of Manitoba, Canada (22, 2, p. 219) Article
- T08-026 Unified Formulation for Contact Melting Inside a Symmetric Enclosure. Wenzhen Chen, YuanSong Zhao, Lei Luo, and Fengrui Sun, Naval University of Engineering, China (ROC) (22, 2, p. 227) Article

- T08-027 Power, Efficiency, and Irreversibility of Latent Energy Systems. T. Kousksou, T. El Rhafiki, A. Arid, E. Schall, and Y. Zeraouli, Laboratoire de Thermique Energétique et Procédés, France (22, 2, p. 234) Article
- **T08-028** Temperature Range and Conjugate Effects in Microencapsulated Phase-Change Suspensions. Daniel Cassidy and Richard D. Gould, *North Carolina State University* (**22**, 2, p. 240) Article
- **T08-029** Effects of Vapor Pressure on Marangoni Condensation of Steam-Ethanol Mixtures. Yusen Yang, Junjie Yan, Xinzhuang Wu, and Shenhua Hu, Xi'an Jiantong University, China (ROC) (22, 2, p. 247) Article
- T08-030 Transient Convection on a Vertical Cylinder with Variable Viscosity and Thermal Conductivity. H.P. Rani and Chang Nyung Kim, Kyung Hee University, South Korea (22, 2, p. 254) Article
- T08-031 Study of Laminar Forced Convection Heat Transfer for Dimpled Heat Sinks. Doseo Park, Carlos Silva, Egidio (Ed) Marotta, and Leroy (Skip) Fletcher, *Texas A&M University* (22, 2, p. 262) Article
- T08-032 Transition Criteria for Entropy Reduction of Convective Heat Transfer from Micropatterned Surfaces. G. F. Naterer, *University of Ontario Institute of Technology, Canada* (22, 2, p. 271) Article
- **T08-033** Heat Transfer Within Carbon Nanotubes During Electron Field Emission. Jaime A. Sanchez, M. Pinar Menguc, and King-Fu Hii, University of Kentucky; and R. Ryan Vallance, George Washington University (22, 2, p. 281) Article
- T08-034 Comparison of Analytical and Superposition Solutions of the Transient Liquid Crystal Technique. Jae Su Kwak, *Korea Aerospace* University, Republic of Korea (22, 2, p. 290) Article
- T08-035 Thermal Analysis of Optical Windows for Spacecraft Applications. Jian-Feng Luo, *National University of Defense Technology, China (ROC)*; Hong-Liang Yi and He-Ping Tan, *Harbin Institute of Technology, China (ROC)*; and Li-Jia Yang, *National University of Defense Technology, China (ROC)* (22, 2, p. 296) Technical Note
- T08-036 Modeling of High-Temperature Air Species Nonequilibrium Spectral Radiation Properties. Shi-Kui Dong, Yu Ma, and He-Ping Tan, *Harbin Institute of Technology, China (ROC)* (22, 2, p. 301) Technical Note
- T08-037 Turbulent Aeroheating on the Mars Science Laboratory Entry Vehicle. Michael D. Bynum, North Carolina State University; Brian R. Hollis, NASA Langley Research Center; Hassan A. Hassan and Xudong Xiao, North Carolina State University (22, 2, p. 306) Technical Note based on AIAA Paper 2007-4393
- **T08-038** Efficiency Analysis of a Two-Stage Hybrid Electric Thruster. Hannah Böhrk and Monika Auweter-Kurtz, *Universitat Stuttgart, Germany* (22, 2, p. 309) Technical Note based on AIAA Paper 2007-4149
- **T08-039** Energy Absorption Heating and Ignition of Energetic Solids. Tiegang Fang, *North Carolina State University* (22, 2, p. 313) Technical Note
- **T08-040** Stacked Packaging Laminar-Convection-Cooled Printed Circuit Using the Entropy Generation Minimization Method. Takahiro Furukawa and Wen-Jei Yang, *University of Michigan*; Shuichi Torii, *Kumamoto University, Japan* (22, 2, p. 315) Technical Note
- T08-041 Numerical Investigation of a Radial Microchannel Heat Exchanger with Varying Cross-Sectional Channels. R. Muwanga, I. Hassan, and M. Ghorab, *Concordia University, Canada* (22, 3, p. 321) Article
- T08-042 Flow and Heat Transfer in a Cross-Linked Silicon Microchannel Heat Sink. I. Hassan and R. Muwanga, *Concordia University, Canada* (22, 3, p. 333) Article

- T08-043 Microchannel Heat Sink with Designed Roughness: Analysis and Optimization. Afzal Husain and Kwang-Yong Kim, *Inha University, Republic of Korea* (22, 3, p. 342) Article
- T08-044 Analytical Modeling of Fluid Flow and Heat Transfer in Microchannel/Nanochannel Heat Sinks. W. A. Khan, *National University of Science and Technology, Pakistan*; and M. M. Yovanovich, *University of Waterloo, Canada* (22, 3, p. 352) Article
- T08-045 Performance Analysis of an Electrostatic Switched Radiator Using Heat-Flux-Based Emissivity Measurement. Joseph Currano, Saeed Moghaddam, and John Lawler, Advanced Thermal and Environmental Concepts; and Jungho Kim, University of Maryland (22, 3, p. 360) Article
- **T08-046 Visual Observation of Oscillating Heat Pipes Using Neutron Radiography.** C. Wilson, B. Borgmeyer, R. A. Winholtz, and H. B. Ma, *University of Missouri—Columbia*; D. L. Jacobson, D. S. Hussey, and M. Arif, *National Institute of Science and Technology* (22, 3, p. 366) Article
- T08-047 Effect of Temperature-Sensitive-Paint Thickness on Global Heat Transfer Measurement in Hypersonic Flow. H. Nagai, S. Ohmi, and K. Asai, *Tohoku University, Japan*; and K. Nakakita, *Japan Aerospace Exploration Agency, Japan* (22, 3, p. 373) Article based on AIAA Paper 2006-1048
- T08-048 Experimental Study of Graphite Ablation in Nitrogen Flow. Toshiyuki Suzuki and Kazuhisa Fujita, *Japan Aerospace Exploration Agency, Japan*; Keisuke Ando and Takeharu Sakai, *Nagoya University, Japan* (22, 3, p. 382) Article based on AIAA Paper 2007-4402
- T08-049 State-to-State Simulation of Nonequilibrium Nitrogen Stagnation-Line Flows: Fluid Dynamics and Vibrational Kinetics. A. Orsini, P. Rini, V. Taviani, and D. Fletcher, von Karman Institute for Fluid Dynamics, Belgium; E. V. Kustova and E. A. Nagnibeda, Saint Petersburg State University, Russia (22, 3, p. 390) Article
- T08-050 Recombination-Assisted Nitrogen Dissociation Rates Under Nonequilibrium Conditions. Gianpiero Colonna and Lucia Daniela Pietanza, Consiglio Nazionale delle Ricerche, Italy; and Mario Capitelli, Università di Bari, Italy (22, 3, p. 399) Article based on AIAA Paper 2007-4554
- T08-051 Modeling Laser-Induced Plasma Expansion Under Equilibrium Conditions. A. R. Casavola, *University of Bologna, Italy*; G. Colonna, *Institute of Inorganic Methodologies and Plasmas CNR, Italy*; A. Cristofolini and C. A. Borghi, *University of Bologna, Italy*; and M. Capitelli, *Università di Bari, Italy* (22, 3, p. 407) Article based on AIAA Paper 2007-4593
- T08-052 Boltzmann and Master Equations for Magnetohydrodynamics in Weakly Ionized Gases. Gianpiero Colonna, *Consiglio Nazionale delle Ricerche, Italy*; and Mario Capitelli, *Università di Bari, Italy* (22, 3, p. 414) Article based on AIAA Paper 2007-4126
- T08-053 Transport Properties of Partially Ionized Argon in a Magnetic Field. D. Bruno and A. Laricchiuta, *Consiglio Nazionale delle Ricerche, Italy*; M. Capitelli and C. Catalfamo, *University of Bari, Italy*; and D. Giordano, *ESA/European Space Research and Technology Centre, The Netherlands* (22, 3, p. 424) Article based on AIAA Paper 2007-4137
- T08-054 Thermodynamic Properties of High-Temperature Jupiter-Atmosphere Components. T D. Pagano, A. Casavola, and L. D. Pietanza, University of Bari, Italy; G. Colonna, Institute of Inorganic Methodologies and Plasmas Consiglio Nazionale delle Ricerche, Italy; D. Giordano, European Space Research and Technology Center, The Netherlands; and M. Capitelli, University of Bari, Italy (22, 3, p. 434) Article based on AIAA Paper 2007-4042
- T08-055 Properties of Helium, Nitrogen, and He-N₂ Binary Gas Mixtures. Jean-Michael P. Tournier and Mohamed S. El-Genk, *University of New Mexico* (22, 3, p. 442) Article

- T08-056 Convective Heat Transfer from a NACA Airfoil at Varying Angles of Attack. X. Wang, *University of Manitoba, Canada*; G. F. Naterer, *University of Ontario Institute of Technology, Canada*; and E. Bibeau, *University of Manitoba, Canada* (22, 3, p. 457) Article
- T08-057 Unsteady Numerical Investigation of Blade Tip Leakage, Part 2: Time-Dependent Parametric Study. Patricia Phutthavong and Ibrahim Hassan, *Concordia University, Canada*; and Terry Lucas, *Pratt and Whitney Canada, Canada* (22, 3, p. 464) Article
- T08-058 Unsteady Numerical Investigation of Blade Tip Leakage, Part 2: Time-Dependent Parametric Study. Patricia Phutthavong and Ibrahim Hassan, *Concordia University, Canada*; and Terry Lucas, *Pratt and Whitney Canada, Canada* (22, 3, p. 474) Article
- **T08-059 Film-Cooling Performance and Heat Transfer over an Inclined Film-Cooled Surface.** C. S. Yang, Far East University, Taiwan (ROC); C. L. Lin, *Air Force Academy of China, China (ROC)*; and Chie Gau, *National Cheng Kung University, Tainan, Taiwan (ROC)* (**22**, 3, p. 485) Article
- **T08-060** Feasibility Study of Cooling Enhancement with Porous Metal Inserts. Kun Yuan, Yan Ji, and J. N. Chung, *University of Florida* (22, 3, p. 493) Article based on AIAA Paper 2005-4128
- T08-061 Thermal Effectiveness Correlation for a Shell and Tube Condenser with Noncondensing Gas. Y. Haseli, I. Dincer, and G. F. Naterer, University of Ontario Institute of Technology, Canada (22, 3, p. 501) Article
- **T08-062** Heat Balance Integral Method for One-Dimensional Finite Ablation. S. L. Mitchell and T. G. Myers, *University of Cape Town, South Africa* (22, 3, p. 508) Article
- **T08-063** Natural Convection Flow in a Cubical Enclosure with a **Heated Strip.** Esam M. Alawadhi, *Kuwait University, Kuwait* (22, 3, p. 515) Article
- T08-064 Analytical Study of Heat Transfer from Elliptical Cylinder in Liquid Metals. R. Ahmad, COMSATS Institute of Information Technology, Pakistan; and W. A. Khan, National University of Sciences and Technology, Pakistan (22, 3, p. 522) Article
- T08-065 Thermal Design and Analysis of a Hard X-Ray Modulation Telescope. H. X. Zhang, *Chinese Academy of Sciences, China (ROC)*; G. L. Huang, *University of Arkansas at Little Rock*; and J. Yang, *University of West Ontario, Canada* (22, 3, p. 528) Technical Note
- **T08-066** Correlation Between Dual-Phase-Lag Model and Parabolic Two-Step Model. Peng Han, DaWei Tang, and Jie Zhu, *Chinese Academy of Sciences, China (ROC)* (22, 3, p. 530) Technical Note
- **T08-067** Thermal Efficiency Limits for Furnaces and Other Combustion Systems. Robert De Saro, *Energy Research Company* (22, 3, p. 532) Technical Note
- T08-068 Electrothermal Behavior of Conductive Polymer Composite Heating Elements Filled with Ceramic Particles. G. Droval, P. Glouannec, P. Salagnac, and J. F. Feller, *Universite de Bretagne Sud, France* (22, 4, p. 545) Article
- **T08-069** Reactive Flow in Halide Chemical Vapor Deposition of Silicon Carbide Epitaxial Films. Rong Wang and Ronghui Ma, *University of Maryland* (22, 4, p. 555) Article
- **T08-070** Innovative Optimal Control Methodology of Heat Dissipation in Electronic Devices. Horng-Yuan Jang, *Nan Kai Institute of Technology, Taiwan (ROC)* (22, 4, p. 563) Article
- T08-071 Design of a Dual Latent Heat Sink for Pulsed Electronic Systems. Krishna M. Kota, Louis C. Chow, Jianhua Du, and Jayanta S. Kapat, University of Central Florida; Quinn Leland, U.S. Air Force Research Laboratory; and Richard Harris, University of Dayton Research Institute (22, 4, p. 572) Article based on AIAA Paper 2007-4271

- T08-072 Characterizations of Interfacial Heat Transfer for Electronic Packages by Multiscale Modeling. Ningbo Liao and Ping Yang, *Jiangsu University, China (ROC)* (22, 4, p. 581) Article
- T08-073 Adiabatic Two-Phase Flow in Scaled Microchannel Heat Sinks with Cross Links. M. Dang and Ibrahim Hassan, *Concordia University, Canada* (22, 4, p. 587) Article
- T08-074 Surface Tension Effects in Turbulent Film Boiling on a Horizontal Elliptical Tube. Hai-Ping Hu, National Taiwan Ocean University, Taiwan (ROC); Chi-Chang Wang, Hsing Kuo University of Management, Taiwan (ROC); and Cha'o-Kuang Chen, National Cheng Kung University, Taiwan (ROC) (22, 4, p. 598) Article
- T08-075 Heat Transfer Investigation in Evaporator of Loop Heat Pipe During Startup. B. Kundu, *Jadavpur University, India* (22, 4, p. 604) Article
- **T08-076** Heat Transfer Investigation in Evaporator of Loop Heat Pipe During Startup. M. A. Chernysheva and Y. F. Maydanik, *Institute of Thermal Physics, Russia*; and J. M. Ochterbeck, *Clemson University* (22, 4, p. 617) Article
- **T08-077** Flow Visualization and Heat Transfer Characteristics for Sphere-Packed Pipes. Stéphane Launay, Valerie Sartre, and Jocelyn Bonjour, *Universite de Lyon, France* (22, 4, p. 623) Article
- T08-078 Flow Visualization and Heat Transfer Characteristics for Sphere-Packed Pipes. Kazuhisa Yuki, Masumi Okumura, Hidetoshi Hashizume, and Saburo Toda, *Tohoku University, Japan*; Neil B. Morley, *University of California, Los Angeles*; and Akio Sagara, *National Institute for Fusion Science, Japan* (22, 4, p. 632) Article based on AIAA Paper 2006-5426
- **T08-079** New Criterion for Local Thermal Equilibrium in Porous Media. Xuewei Zhang and Wei Liu, *Huazhong University of Science and Technology, China (ROC)* (22, 4, p. 649) Article
- T08-080 Influence of Spanwise Pitch on Local Heat Transfer for Multiple Jets with Crossflow. Vadiraj V. Katti and S. V. Prabhu, *Indian Institute of Technology, Bombay, India* (22, 4, p. 654) Article
- **T08-081** Aerothermodynamic Study of Ultrahigh-Temperature Ceramic Winglet for Atmospheric Reentry Test. Raffaele Savino and Mario De Stefano Fumo, *University of Naples, Italy* (22, 4, p. 669) Article
- T08-082 Critical Discharge in Actively Cooled Wing Leading Edge of a Reentry Vehicle. L. Mongibello, Ente per le Nuove Tecnologie l'Energia e l'Ambiente, Italy; and L. de Luca, University of Naples "Federico II," Italy (22, 4, p. 677) Article
- **T08-083** Spectroscopic Flow Evaluation in Inductively Coupled Plasma Wind Tunnel. Kazuhisa Fujita, Masahito Mizuno, Kiyomichi Ishida, and Takeshi Ito, *Japan Aerospace Exploration Agency, Japan* (**22**, 4, p. 685) Article based on AIAA Paper 2005-0173
- T08-084 Simulation of Homogeneous Ethanol Condensation in Nozzle Flows Using a Kinetic Method. Alison G. Gallagher-Rogers, Jiaqiang Zhong, and Deborah A. Levin, *Pennsylvania State University* (22, 4, p. 695) Article based on AIAA Paper 2007-4159
- T08-085 Mathematical Modeling of Impinging Hydrogen–Air Flows Augmented by Catalytic Surface Reactions. Timothy W. Tong, Mohsen M. Abou-Ellail, and Yuan Li, *George Washington University* (22, 4, p. 709) Article based on AIAA Paper 2007-4624
- **T08-086** Equilibrium Properties of High-Temperature Air for a Number of Pressures. Sean J. Henderson and James A. Menart, *Wright State University* (**22**, 4, p. 718) Article based on AIAA Paper 2004-2159
- T08-087 Characterizing High-Energy-Density Propellants for Space Propulsion Applications. Timothy S. Kokan, Georgia Institute of Technology; John R. Olds, SpaceWorks Engineering, Inc.; Jerry M. Seitzman and Peter J. Ludovice, Georgia Institute of Technology (22, 4, p. 727) Article

T08-088 Computer Simulation of Realistic Three-Dimensional Cemented Hip Arthroplasty: Thermal Osteonecrosis Analysis. Mauricio A. Sanchez, *IMTEC Corporation*; Wagdy Rizk, *Beaumont Bone and Joint Institute*; Carlos A. Sanchez, *Riskmetrics, Inc.*; and Robert E. Cooper, *Western Autonomous University* (22, 4, p. 741) Article

T08-089 Modeling of Processing for Slot and Discrete Port Tapered Resin Injection Pultrusion. A. L. Jeswani and J. A. Roux, *University of Mississippi* (22, 4, p. 749) Article based on AIAA Paper 2007-4104

T08-090 Non-Newtonian Fluid Flow on a Flat Plate Part 1: Boundary Layer. Lun-Shin Yao, *Arizona State University*; and M. M. Molla, *University of Glasgow, United Kingdom* (22, 4, p. 758) Article

T08-091 Non-Newtonian Fluid Flow on a Flat Plate Part 2: Heat Transfer. Lun-Shin Yao, *Arizona State University*; and M. M. Molla, *University of Glasgow, United Kingdom* (22, 4, p. 762) Article

T08-092 Inverse Hyperbolic Conduction Problem in Estimating Two Unknown Surface Heat Fluxes Simultaneously. Cheng-Hung Huang and Chien-Yu Lin, *National Cheng-Kung University Taiwan (ROC)* (22, 4, p. 766) Article

T08-093 Finite Propagation of Heat Transfer in a Multilayer Tissue. Kuo-Chi Liu and Po-Jen Cheng, Far East University, Taiwan (ROC) (22, 4, p. 775) Article

T08-094 Damped-Wave Conduction and Relaxation in a Finite Sphere and Cylinder. Kal Renganathan Sharma, *Prairie View A&M University* (22, 4, p. 783) Technical Note

T08-095 Temperature–Heat-Flux Integral Relationship in the Half-Space by Fourier Transforms. Jay I. Frankel, *University of Tennessee* (22, 4, p. 786) Technical Note