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Awards and Recognitions

Office of Research

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12-9-2009

## Office of Research, Awards & Recognition, December 09, 2009

University of Tennessee Office of Research

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## AWARDS AND RECOGNITIONS

<http://research.utk.edu>

DECEMBER 9, 2009

### AWARDS FOR NOVEMBER 20–DECEMBER 3, 2009

INVESTIGATOR	TITLE	SPONSOR	AWARD
<b>COLLEGE OF ARCHITECTURE &amp; DESIGN</b>			
Stach, Edgar	Solar Decathlon Competition	UT-Battelle - ORNL	\$20,397
<b>COLLEGE OF ARTS &amp; SCIENCES</b>			
Breinig, Marianne	First Principles Theory of Complex Materials	UT-Battelle - ORNL	\$51,037
Bui, Hoan Ngoc	Internship from the Tennessee Commission of Children and Youth	Tennessee Commission on Children and Youth	\$50,000
Dai, Pengcheng; Plummer, Earl Ward; Thompson, James R.	Growth and Characterization of Magnetic Nanostructures	UT-Battelle - ORNL	\$9,215
Decorse, Elizabeth Kellar	Phase I Archaeological Survey of the Proposed Veterans Cemetery, Knox County, Tennessee	Quantum Environmental & Engineering Services, LLC	\$19,447
Graham, David E.	Coenzyme B and Acetamidoglycine Biosynthesis in Methanogens	National Science Foundation	\$237,848
Hollenbach, Kandace Renee	Geophysical Study of a Portion of the Lynch-Bethel Cemetery, Powell, Knox County, Tennessee	Lynch-Bethel Cemetery	\$1,675
Kovac, Jeffrey D.	2009 Governor's School for the Sciences and the Governor's School for Engineering	TN Dept. of Education	\$495,195
Macek, Joseph H.	Distinguished Scientist	UT-Battelle - ORNL	\$29,036
Mays, Jimmy W.	Hydrocarbon Based Membranes as Alternatives to Nafion	UT Research Foundation	\$67,224
Moersch, Jeffrey E.	ASU Subcontract: Spectral Mapping and Thermophysical Characterization of the Martian Surface	Arizona State University - Payables and Reimbursements	\$53,000
Peterson, Cynthia B.	Analysis Of Proteomic And Genomic Data	UT-Battelle - ORNL	\$11,355
Sokolov, Alexei P.	Cooperativity in Dynamics of Soft Matter	UT-Battelle - ORNL	\$50,000
<b>COLLEGE OF BUSINESS ADMINISTRATION</b>			
Miller, Alex; Barton, Rhonda W.; Riblett, John E.	Continuous Process Improvement in Air Force Acquisition	Air Force	\$2,188,000
Riblett, John E.	Intergovernmental Personnel Act Agreement - Terry Balven	Air Force	\$150,709
<b>COLLEGE OF COMMUNICATION &amp; INFORMATION</b>			
Tenopir, Carol; Baker, D Gayle; Wise, Norman K.	Value, Outcomes, and Return on Investment of Academic Libraries ("Lib-Value")	Institute of Museum & Library - Office of Museum Services	\$1,000,000
<b>COLLEGE OF EDUCATION, HEALTH &amp; HUMAN SCIENCES</b>			
Bassett, David R.	Validation of Omron HJ-303 GoSMART Tri-Axis Pedometer	Omron Healthcare, Inc.	\$22,999
French, Russell; Skolits, Gary	Evaluation of Drexel University DPAC T2T Project	Drexel University	\$51,825
Gardner, Diane P.	EFF Professional Development Initiative for OK Lifelong Learning	Oklahoma State Department of Education	\$110,000
Mulligan, Geraldine Ann; Ponder, Beth Ann; Stephens, Jean	LINCS Regional Resource Center, Region II	US Department of Education - National Institute for Literacy	\$398,076
Mulligan, Geraldine Ann; Ponder, Beth Ann; Stephens, Jean	LINCS Program Planning Resource Collection	US Department of Education - National Institute for Literacy	\$275,627
Polite, Fritz Gerhardt; Waller, Steven N.	Peer Mentoring and Leadership Academy	Project GRAD Knoxville	\$50,000
Raynor, Hollie Anne	Increasing Sleep Duration: A Novel Approach to Weight Control	Miriam Hospital	\$20,115
<b>COLLEGE OF ENGINEERING</b>			
Bhat, Gajanan S.	Testing and Analysis of Melt Blown Nonwovens	Ethicon, Inc.	\$20,000
Clarke, David Bruce	Fuel Economy Web Site	UT-Battelle - ORNL	\$131,069
Dongarra, Jack	Matrix Algebra for GPU and Multicore Architectures (MAGMA)	Univ. of California - Berkeley	\$141,107
Everett, Jerry D.	Law Enforcement Liaison Program	TN Dept. of Transportation - Division of Planning	\$1,194,253
Everett, Jerry D.	Media Evaluations	TN Dept. of Transportation - Division of Planning	\$178,666
Hayward, Jason Peter	Alternative Detector System to Replace He-3 Detectors for Neutron Sciences	UT-Battelle - ORNL	\$24,950
Irick, David K.; Benson, Robert Donald; Madhukar, Madhu S.	SULTAN Test Samples for ITER	UT-Battelle - ORNL	\$160,262
Liaw, Peter K.	Study of Deformation Mechanisms in TWIP Steel	Battelle Memorial Institute - Pacific Northwest National Lab	\$20,000
Liaw, Peter K.	Prediction of the Fatigue Lifetime Behavior of Engineering Alloys by the Measurement of Crystallographic Texture of Second Phase Particles	VEXTEC Corporation	\$32,700

## AWARDS FOR NOVEMBER 20–DECEMBER 3, 2009 (CONT.)

INVESTIGATOR	TITLE	SPONSOR	AWARD
Penumadu, Dayakar	A Novel Method for Synthesis and Manufacturing of Cellular Polymeric Foam	UT Research Foundation	\$81,751
Pharr, George M.	Piezoceramic and Piezoceramic Multilayer Actuator Characterization	UT-Battelle - ORNL	\$45,139
Prowell, Stacy J.; Poore, Jesse H.; Smith, Bradford Carl; Swain, William Thomas	SNS Analysis Software Architecture and Prodess Definition	UT-Battelle - ORNL	\$35,009
Rack, Philip D.	Center for Nanophase Materials Science (CNMS)	UT-Battelle - ORNL	\$10,000
Simerly, Karen L.	TN Traffic Safety Resource Service - A Statewide Program	TN Dept. of Transportation - Division of Planning	\$449,042
Tolbert, Leon M.	Basic Circuit Cells to Reduce Stray Inductance in Power Electronics Packages	UT-Battelle - ORNL	\$85,000
Urbanik, Thomas; Clarke, David	Support to Transportation Policy Analysis Research Program	UT-Battelle - ORNL	\$35,990
Urbanik, Thomas; Clarke, David	DOE/EPA Fuel Economy Information	UT-Battelle - ORNL	\$82,646
Urbanik, Thomas; Clarke, David	Fuel Economy Program & Clean Cities Activities	UT-Battelle - ORNL	\$96,771
<b>COLLEGE OF SOCIAL WORK</b>			
Campbell, Paul M.; Black, Brenda J.; Cunningham, Maryanne Lynch	Families First	TN Dept of Human Services	\$1,327,997
Campbell, Paul M.; Patterson, David A.	HMIS HUD City of Knoxville CDBG Matching Funds 2009-2010	City of Knoxville - Community Development Division	\$10,000
<b>CAMPUS CENTERS &amp; JOINT INSTITUTES</b>			
Bell, Larry L.	Administrative Support for East Tennessee Clean Fuels Coalition - 08	East Tennessee Clean Fuels Coalition	\$45,000
Ezzell, Timothy	Appalachian Teaching Project 2009	East Tennessee State University	\$4,000
Gentry, Randall W.	Archilles Heel Project: Earthquakes and Water Resources	UT-Battelle - ORNL	\$20,000
Layton, Alice Camille; Williams, Daniel E.	Fecal Source Identification Laboratory Training	Metropolitan Government of Nashville and Davidson County	\$30,000
Nichols, Jeffrey Alan; Zacharia, Thomas	Memory Subsystem if a PetaScale Computer Platform	UT-Battelle - ORNL	\$53,319
Overly, Jonathan G.	I-75 Green Corridor Project	US Dept. of Energy - Energy and Technology	\$736,887
Parker, Jack; Parker, John Charles	Doe-Ersp Frc Multiscale Investigations of Immobilization and Natural Attenuation	UT-Battelle - ORNL	\$30,000
Parker, John Charles	Verification of Methods for Assessing the Sustainability of Monitored Natural Attenuation	Virginia Polytechnic Institute & State University	\$61,554
Thonnard, Norbert	Laser Spectroscopy of Nanomaterials Synthesis and Carbon Nanohorn Decoration for Hydrogen Storage	UT-Battelle - ORNL	\$37,889

## RECOGNITIONS

**Igor Alexeff**, emeritus professor in the Department of Electrical Engineering and Computer Science, recently presented two distinguished speaker lectures on thermonuclear fusion and ball lightning sponsored by IEEE in Kharkov, Ukraine.

**Guoxun Chen**, assistant professor in the Nutrition Department, received the new-investigator award from the American Heart Association's Council on Nutrition, Physical Activity, and Metabolism. His research focuses on the role of vitamin A in glucose and lipid homeostasis.

**Jackie Johnson**, associate professor at the UT Space Institute, recently had an article commissioned and published by SPIE, the international society for optics and photonics. The article, "Upconverting glasses for high-efficiency solar cells," concerns solar and alternative energy solutions.

**Michael Simpson**, professor in the Department of Materials Science and Engineering, has been elected to the College of Fellows of the American Institute for Medical and Biomedical Engineering.

**Carol Tenopir**, professor of information sciences and director of the Center for Information and Communication Studies, is serving on the House Committee on Science and Technology Scholarly Publishing Roundtable to study how the results of federally funded research can be more widely disseminated.

An article by researchers at the UT Space Institute (UTSI) has been published in the *Proceedings of the Royal Society A*, the society's journal for the mathematical, physical, and engineering sciences. The journal includes a review article by doctoral candidate **Tony Saad** and UTSI professor **Joe Majdalani** titled "On the Lagrangian optimization of wall-injected flows: from the Hart-McClure potential to the Taylor-Culick rotational motion." The study details new concepts for modeling gaseous motions in solid and hybrid rocket motors.

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**Disclosures** — The UT Research Foundation filed disclosures in November 2009 on the following inventions on behalf of UT Knoxville faculty:

- "Expression media for proteins in yeast" by Nitin Jain and Seth Albright
- "Heat-scavenging micropump for cooling applications" by Jie (Jayne) Wu

**Patents** — A patent was received in November for "A Method of Enhancing Expert System Decision-Making" by John Birdwell, Tse-Wei Wang, Dale Stansberry, and Jared Pendleton.