

FALL 2012

MAUREEN PALMER, Editor/Public Affairs Manager

United States Wins Four Gold Medals

Team USA 2012 honored this nation by winning four Gold Medals at the International Biology Olympiad (IBO) in Singapore. The high school scholars in the photo are (from left to right) Nikhil Buduma (CA), Kevin Ma (NJ), Jing Liu (CA), and Lei Ding (DE).



Team USA 2012 repeats Four Gold Medals at International Biology Olympiad.

At the IBO, students are evaluated on their theoretical knowledge of the biological sciences and their practical lab skills. U.S. team members Lei Ding (DE) and Jing Liu (CA) placed second and third in the world, respectively. "Practice, practice, practice! Before you come, definitely practice the practical skills," said Lei Ding.

The scholars were accompanied by Ms. Kathy Frame, Director USABO, Center for Excellence in Education and Dr. Clark Gedney, Director, Bio Media Center for Instructional Computing, Purdue University. All were flown to Singapore courtesy of Korean Air, the official airline of the USA Biology Olympiad.

"Team USA is an inspiration to each of us with their in-depth knowledge and abilities in biology, and the Center is proud of their superior academic performance at the IBO," said Kathy Frame. "They are academic athletes and future leaders who have a true passion for the science of biology."

Kathy Frame was elected to be one of six members of the Subgroup of Switzerland's Host Committee for the 2013 IBO in Bern, Switzerland by her fellow jurors of the 2012 International Biology Olympiad. The Subgroup will review the practical and the theoretical examinations that have been developed and focus on the quality of the questions for scientific correctness and conceptual formulation. They will additionally check the marking allocation plus the balance of topics of the theoretical examination according to the IBO Guide.

(continued on page 2)

Center for Excellence in Education
sponsors the
U.S. Physics Olympiad
2013
with the
American Association of Physics Teachers

Follow CEE on Facebook, Twitter, and YouTube!



Teacher Enrichment Program (TEP)

The Center's new and innovative Teacher Enrichment Program (TEP) offers scientific best practices and resources, as well as exposure to the breadth and depth of scientific discovery, to enrich the education of rural and urban high school teachers and their students. TEP was born out of CEE's 30 years of STEM experience and a solid foundation of educational programming.

The mission of TEP is to assure a future talented and diverse U.S. workforce in science, technology, engineering and mathematics (STEM).

TEP is available cost-free to science teachers as well as teachers of the humanities who are interested in broadening the perspective of science in their classroom. "The Center's Teacher Enrichment Program provides U.S. science teachers with opportunities that enhance their classroom teaching to the students. TEP is a fantastic program that will connect the research lab to the classroom and allow teachers to broaden science



*Dr. Natasha Schuh-Nuhfer,
Director, Teacher
Enrichment
Program*

teaching and discovery while encouraging students to become future STEM leaders," stated Natasha Schuh-Nuhfer, Ph.D., Director, Teacher Enrichment Program.

Over the past two years, CEE has convened top STEM leaders at meetings which included representatives of institutions of secondary and higher education, industry, and government, to formulate the components of the program.

Through teachers, TEP supports rural and urban secondary school students' readiness for STEM careers.

Teacher Enrichment Program Components:

The **Clearinghouse** is an online compendium of science resources within targeted states. Laboratory-based programs within

(continued on page 3)



Research Science Institute 2012 students and faculty at MIT.

Eighty-One Top Achieving Scholars at MIT for RSI

The world's most accomplished high school students gathered from June 24th – August 4th at the Massachusetts Institute of Technology (MIT) for the 29th annual Research Science Institute (RSI). The esteemed RSI program hosted 50 top-achieving U.S. scholars and 31 scholars from the nations of Australia, Bulgaria, Canada, China, Israel, Lebanon, Mexico, Poland, Saudi Arabia, Singapore, Spain, Sweden, and Switzerland. CEE proudly partnered for the first-time with Canada and Switzerland.

RSI is the first cost-free summer STEM program to combine on-campus course work in scientific theory with off-campus research in science and technology. Participating scholars are competitively selected high school students that experience the entire research cycle from start to finish.

While at RSI, scholars first participate in a week of intensive STEM classes with accomplished professors. The heart of RSI is the five-week research internship where students conduct individual projects under the tutelage of mentors who are experienced scientists and researchers. During the final week of RSI, students demonstrate their work through written academic papers and present oral findings to their peers and a panel of renowned judges.

The RSI Selection Committee, comprised of distinguished STEM professionals, met at CEE in mid-February 2012 to select students chosen for academic merit, demonstrated leadership, and scientific achievement. Selection also was based on standardized test scores, high school grades, essay submissions, teacher recommendations, and demonstrated potential to become future leaders in STEM.

Dr. Andrew Charman, RSI'86 alumna and lecturer of physics at University of California Berkeley, again led RSI 2012. Professors included:

- Dr. Steven Leeb, Massachusetts Institute of Technology - Engineering
- Mr. Lance Rhoades of the University of Washington - Humanities
- Dr. Sean Mulholland, Economics, Stonehill College
- Dr. Forrest Michael, RSI'90, University of Washington - Chemistry
- Dr. Rebecca Christianson, RSI'90, Olin College - Physics
- Dr. Christopher Skinner, RSI'88, Princeton University - Math
- Dr. Matthew Cain, RSI'97, Brown University - Biology

Prominent STEM representatives spoke to RSI scholars during the highly acclaimed RSI Distinguished Lecture Series. Dr. Jeremy Wolfe, Professor of Ophthalmology, Division of Sleep Medicine, Harvard Medical School and Director Visual Attention Lab, Department of Surgery, Brigham and Women's Hospital, Senior Lecturer, Department of Brain and Cognitive Sciences, Massachusetts Institute of Technology; Dr. Wolfgang Ketterle John D. MacArthur Professor of Physics Associate Director, Research Laboratory of Electronics Director, MIT-Harvard Center for Ultracold Atoms and 2001 Nobel Laureate; Dr. Michael McQuade, Senior Vice President, Science and Technology of United Technologies Corporation; and Dr. Tom Leighton, Co-Founder & Chief Scientist of Akamai Technologies.

Commended for top written papers at RSI 2012 were, Josh Brakensiek (AZ), Zera Ong (Singapore), Kalina Petrova

(Bulgaria), Karolina Trocka (Poland), and Jennifer Walsh (MA). Celebrated for oral presentations were Shyamal Buch (CA), Gil Goldshlager (GA), Jonah Kallenbach (PA), Henry Lin (LA), and Sara Volz (CO). The title "Rickoid of the Year" went to Connor Duffy (MN). He was selected by his fellow classmates for individual scholarship and RSI community participation.

The Center's RSI program continues to be nationally and internationally recognized with nations waiting for an opportunity to send scholars to RSI. ♦

United States Wins Four Gold Medals *(from page 1)*

CEE is proud that every U.S. team member has victoriously medaled in the International Biology Competition since 2003, bringing home 31 gold, seven silver, and two bronze medals.

The USABO is an academic competition that begins with an Open Exam that is administered nationwide to interested high school students at participating schools. Nearly 10,500 students registered nationally for the Open Exam representing 42 states. The Open Exam is a 50-minute/50-multiple choice question exam designed to identify the top 10% of biology students in the United States. The next round, the Semifinal Exam, is a two-hour multiple choice and short answer exam that focuses on application-based inquiry. From the Semifinal Exam, the top 20 students in the nation are invited to attend the USABO National Finals training session at Purdue where they compete for medals and the right to represent the USA at the IBO as Team USA. ♦

Research Science Initiative in India

The Research Science Initiative in Chennai, India hosted 43 (23 boys and 20 girls) young scholars from May 24th- June 8th. The intensive four-week program was held at the Indian Institute of Technology Madras (IITM) in collaboration with the PSBB Group of Schools Chennai (PSBB) and the Center for Excellence in Education (CEE).

RSI India offered academic lectures by eminent scholars from IITM, The Institute of Mathematical Sciences, Chennai Mathematical Institute, Anna University, and Sastra University (Thanjavur). The students studied a wide range of topics in math, computer science, physics, chemistry, biology, biotechnology, and other scientific fields.

The RSI India scholars visited the Department of Atomic Energy within the Government of India (IGCAR). Students toured the labs of Sastra University and the Ramanujan Mathematical Institute at Kumbakonam. They also visited the



Students of the Research Science Initiative 2012 meeting at the Indian Institute of Technology in Chennai.

labs at IITM, Anna University, M.S. Swaminathan Research Foundation, and Saint-Gobain Glass India, Ltd.

The alumni of RSI India 2012 have the opportunity to network with other RSI scholars in the U.S., China, Bulgaria, and Saudi Arabia through an active alumni network. The Center proudly welcomed RSI India alumni to a tight community of approximately 2,000 alumni from around the world. ♦



Children excitedly greet RSI Junior Ambassadors to their school.

CEE Sponsors Junior Ambassadors Program in India

The Center for Excellence in Education (CEE) and the PSBB Group of Schools Chennai sponsored the Junior Ambassadors Abroad Program in India from July 15th - July 27th. The RSI alumni, traveled with a CEE chaperone to Chennai, India where they visited The Sundara Cholavaram School.

RSI'11 Alumni Jonece Layne, Swetha Doppalapudi and Ramya Rangan interacted with hundreds of students who ranged in age from elementary level to post-secondary school. Accompanied by CEE's Business Manager, Dimitar Yankov, the Junior Ambassadors engaged with the students on topics of English, math, music and dancing. For fun, the ambassadors taught the children the "Hokey Pokey." The Junior Ambassadors also had the opportunity to partake in the PSBB Groups of Schools' anniversary celebration. This year's theme, "Poets and Composers-National and International," showcased cultures from around the world, while focusing on the underlying unity that exists amongst us.

This was yet another enlightening opportunity for CEE, brought to us by the guiding force of Dr. Y.G. Parthasarathy, Dean and Director of the PSBB Group of Schools Chennai, a long-time partner and friend to CEE. ♦



Swetha Doppalapudi (left) and Jonece Layne (right), RSI'11 Alumni, outline an English lesson for the village school children.

Teacher Enrichment Program (TEP) (from page 1)

the Clearinghouse include public/private partnerships that are cost effective, replicable, scalable and assessable.

Bite of Science is a dinner event that brings together 25 teachers and one to two leading scientists at each of the four sites in selected states. Teachers will receive enhanced professional development and the opportunity to interact with research scientists from industry, academia, or government. Scientists share information about current research, demonstrate hands-on experiments, and teachers are afforded the opportunity to ask questions and interact directly with the scientists and network with their peers.

Each teacher participating in *Bite of Science* will impact at least 3,125 students per year. CEE is hosting sessions in Virginia, California, Illinois, Indiana, and Texas, reaching at least 12,500 students in 2012-13.

Lab Bench is a collection of online resources for teachers that attend the *Bite of Science*. The Lab Bench is a scientific resource provided to teachers for use in their classrooms. It contains a "student" component which includes a

selection of *Lab Bench* content suitable for high school students.

TEP Blog will serve to encourage communication among STEM teachers and leaders in the U.S. and global communities. Contributions to the blog will come from U.S. and international educational leaders and academics.

CEE works with business organizations to create and strengthen public / private partnerships to better serve urban and rural STEM teachers and their students.

TEP/STEM Round Table

Discussions will be hosted regularly for science teachers by CEE in Virginia to discuss critical science and laboratory education.

Natasha Schuh-Nuhfer, Ph.D., is the Director of the Teacher Enrichment Program. Dr. Schuh-Nuhfer received a B.S. in Molecular Biology from Lehigh University, and her Ph.D. in Microbiology from the University of Virginia. Dr. Schuh-Nuhfer served as a National Cancer Institute Postdoctoral Fellow at the National Institutes of Health prior to joining CEE as the Academic Coordinator in 2011. ♦

Saudi Research Science Institute (S-RSI) 2012

The Saudi Research Science Institute (S-RSI) celebrated its second year at the King Abdullah University of Science and Technology (KAUST) from June 15th through July 25th. It is the first science, technology, engineering and mathematics (STEM) summer program for high school students in Saudi Arabia to combine theoretical course work and applied research for both female and male high school students.

The S-RSI program was developed as a partnership between the Center for Excellence in Education (CEE), Saudi Aramco, King Abdulaziz & His Companions Foundation for Giftedness & Creativity (MAWHIBA), and King Abdullah University of Science and Technology (KAUST).

S-RSI is modeled after the internationally acclaimed Research Science Institute (RSI), sponsored by the CEE and the Massachusetts Institute of Technology



Dr. William Stuart, Professor, University of Maryland and Director of the Saudi Research Science Institute.

(MIT). The S-RSI program aims to offer academically-motivated and scholastically-accomplished high school students the opportunity to conduct university level research under the mentorship of KAUST



Dr. John Dell, Physics Teacher, Thomas Jefferson High School for Science and Technology and Lead Academic Tutor at the Saudi Research Science Institute.

Technology, was the Lead Academic Tutor. The program offered classes in physics, biology, chemistry, and mathematics. The S-RSI students also participated in sessions on philosophy, ethics, and humanities. Workshops on computer science and oral/written communications were made available.

The select group of academically competitive high school students had the opportunity to conduct university-level research under the mentorship of KAUST professors. The students selected for S-RSI demonstrated a profound interest in the sciences and in technology, as well as leadership.

Like RSI at MIT, scholars participated in a week of college-level classes followed by five weeks of research in their men-

professors in state-of-the-art laboratories.

S-RSI was led by Dr. William Stuart of the University of Maryland and Ms. Yusra Safi of KAUST. Dr. John Dell, of Thomas Jefferson High School for Science and

tors' laboratories every weekday during the program. At the end, they composed papers summarizing their research and provided oral presentations of their work to their peers and mentors at an S-RSI Symposium. The program offered a guest lecture series, weekend trips, and recreational activities.

Dr. Wolfgang Ketterle, John D. MacArthur Professor of Physics, Associate Director, Research Laboratory of Electronics, Director, MIT-Harvard Center for Ultracold Atoms, and 2001 Nobel Laureate was a distinguished Guest Lecturer at S-RSI 2012 via a live webcast. Ketterle provided an overview of his work and answered questions from the students.

The Center takes great pleasure in realizing that S-RSI creates a community of scientists, entrepreneurs, and leaders who will make significant contributions to the advancement of science and technology in Saudi Arabia and the world. ♦

The Saudi Research Science Institute 2012 students and staff at KAUST.



CEE Receives Microsoft \$250,000 Software Grant

The Center for Excellence in Education (CEE) was the recipient of a \$250,000 software grant donation in celebration of the Microsoft Store Grand Opening at Tyson's Corner Center this past March. Mr. Mel Chaskin, Chairman of CEE's Board of Trustees, received the generous donation at the Microsoft Store.

"CEE is thrilled to be one of four local organizations chosen by the Microsoft Store for the donation," stated Joann DiGennaro, President of the Center for Excellence in Education. "It was wonderful to receive the support through votes from the Center's alumni, donors, and friends."

The Center will use this donation to assist its programs to nurture high school and university scholars to careers of excellence and leadership in science, technology, engineering and mathematics (STEM). The Research Science Institute (RSI), the USA Biology Olympiad (USABO), and the Teacher Enrichment Program (TEP) are the Center's flagship opportunities for students and teachers. ♦



Mr. Mel Chaskin, Chairman of CEE Board of Trustees, happily accepting the check from Microsoft.

RSI and USABO Alumni Accolades

- The Center extends a round of congratulations to **Jessie Rosenberg**, RSI'01, and **Jeremy England** and **Ben Silbermann** RSI '98, named rising stars by Forbes in the 30 Under 30 Project. The magazine recognizes individuals who are making a positive influence in the world.
- Congratulations to **Low Kay Yi**, RSI'11, a Gold medal at the Singapore Science and Engineering Fair for her research project 'Treatment of B-RAF(V600E) Colorectal Cancer' which she completed at RSI.
- The Center congratulates **Harrison Chen**, RSI'06, for receiving financial support to complete his graduate studies in the Mathematics Department at the University of California, Berkeley.
- CEE proudly congratulates **Mark Kantrowitz**, RSI'84, for his company, Fastweb, named "Organization of the Year" by the Institute for Financial Literacy.
- Applause for **Paul Kominers**, RSI'07, for receiving the prestigious Karl Taylor Compton Prize, award given to an MIT student in recognition of excellent achievements in citizenship and devotion to the welfare of MIT.
- Kudos to **Daniel Bork**, USABO'12, and his North Hollywood High School team for placing second at the National Science Bowl in Washington D.C.
- Congratulations to **Greg Gunn**, RSI'86, recognized by *FAST Company*, as being one of the 100 Most Creative People in Business 2012. His goal is to find effective practices in one school that can be replicated across the system in order to reinvent the education system.
- CEE proudly recognizes **Max Uhlenhuth**, RSI'07, for being in the MassChallenge 2012 which is the largest startup accelerator and competition. The Center wishes him good luck with Silvia Terra.
- The Center extends a round of congratulations to the following RSI'11 alumni, named in the U.S. Presidential Scholars:
 - **James Lim**, Phillips Academy in Andover, MA.
 - **Rebecca Chen**, Park Tudor School, Carmel, IN.
 - **Siddhartha Jena**, International Academy in Bloomfield Hills, MI.
 - **Amy Chyao**, Plano East Senior High School, Richardson, TX.
- **Swetha Doppalapudi**, Morgantown High School, Morgantown, WV.
- Congratulations to **Chris Krueger**, USABO '04 and '05, for being accepted into the joint Ph.D. program in biomedical engineering between Georgia Tech and Peking University (PKU).
- CEE congratulates **Dr. Jamie Wells**, RSI'91, named one of the New York City's Top Doctors 2012.
- CEE proudly congratulates **Percy Liang**, RSI'99, who joined the Stanford Faculty in Fall 2012. He completed his undergraduate degree at MIT and his Ph.D. at Berkeley in Computer Science.
- RSI '07 Alumna, **Christina Chang**, was awarded a 2012 Marshall Scholarship. She plans to pursue a master's degree in sustainable energy futures at Imperial College London, followed by a master's degree in inorganic chemistry at the University of Cambridge. She also received the 2012 Spirit of Princeton Award sponsored by the Office of the Dean of Undergraduate Students for her positive contribution to the University community.

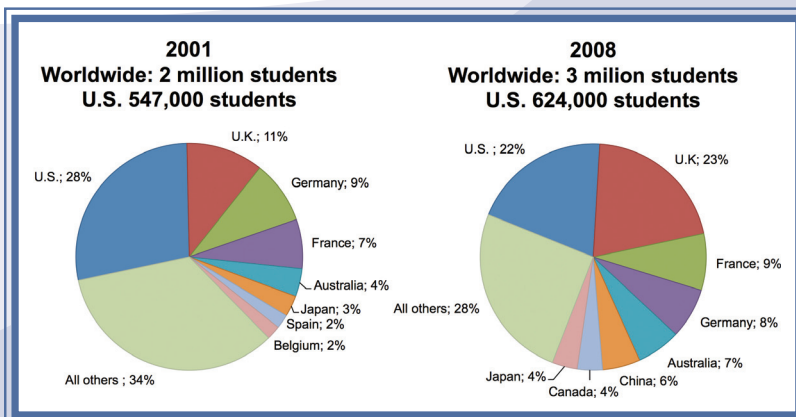
Teacher Enrichment Program Workshops

CEE's Teacher Enrichment Program (TEP), in partnership with the Tyson's Microsoft Store, is sponsoring monthly workshops for STEM teachers of northern Virginia. Through these workshops, CEE provides a platform that empowers teachers to further their educational training, strengthen their organizational skills, and increase their technology base to engage their students. ♦



Teachers participating in the "Manage Data with Ease" workshop.

Research Universities and the Future of America



Foreign students in tertiary education by country of enrollment, 2001 and 2008.

Source: IIE Atlas of Student Mobility.

Spotlight on CEE Board of Trustees



Dr. Tom Leighton co-founded Akamai Technologies in August 1998. Serving as Chief Scientist and

as a member of the Board of Directors, Dr. Leighton is Akamai's technology visionary and works with the senior management team to set the companies direction. Akamai has created the world's largest distributed computing platform that dynamically routes content and applications across a network of over 95,000 servers.

Dr. Leighton's technology achievements at Akamai earned him recognition as one of the Top 10 Technology Innovators in U.S. News & World Report.

A Professor of Applied Mathematics at MIT, Dr. Leighton has been a member of the Computer Science and Artificial Intelligence Laboratory (CSAIL) since its inception in 1996. He has published more than 100 research papers, and his leading text on parallel algorithms and architectures has been translated into several languages.

Dr. Leighton graduated summa cum laude from Princeton University with a B.S. in Engineering. He received his Ph.D. in Mathematics from MIT.

What is the importance of CEE's mission on education? "By providing rich educational experiences for the world's most promising high school students, CEE plays an important role in the advancement of science."

Why are you serving on CEE's Board? "I serve on CEE's board so that I can help CEE in its mission to provide enriching opportunities for the nation's

most scientifically talented high school students."

M.s. Kathy Feegel is the Executive Director, State Government Affairs, at Amgen. She joined Amgen in 2000 and is responsible for leading the company's State Government Affairs activities such as influencing legislation that affects Amgen's business within the state market segment (including Medicaid, state uninsured programs, tax initiatives, environmental, and regulatory issues).

Prior to joining Amgen, Kathy was Senior Director of the Strategic Consulting Group at PAREXEL International. In this role, she was responsible for overseeing all aspects of the business unit which provided its pharmaceutical manufacturer clients with reimbursement and product launch planning, health outcomes and health policy projects. Kathy also worked for six years on Capitol Hill and focused on healthcare issues such as Medicare, Medicaid, welfare reform, managed care and other social services.



What is the importance of CEE's mission on education?

"To me, the importance of CEE's mission on education is simple. Numbers. The U.S. currently ranks 25th in Mathematics and 17th in science among its global counterparts. Yet, despite this, we continue to be an innovation engine for the world with increasingly complex challenges requiring STEM leadership. However, this widening gap between educational preparedness and societal need for innovation is unsustainable. To continue

to be first class in innovation, we have to be first class in education and that requires us to go beyond the classroom in science, technology, engineering, and mathematics. CEE provides crucial supplemental experiences that can both fill in gaps in traditional education and/or reinforce what is being learned in the classroom. Through this reach beyond the classroom, the experiences we provide connect our students in collaboration and allow them to unleash the promise of the burgeoning globalization of shared thought in STEM. In a nutshell, we take foundational breadth in the classroom, bring it on to the global collaboration grid, and drive experiential depth."

Why are you serving on CEE's Board? "In short, to help CEE build capacity to effectively deliver on its mission. I am serving because I feel a responsibility to both my community and my company. At this intersection lies a vital part of CEE's mission in nurturing "careers of excellence and leadership in science". Organizationally, this presents a win-win situation where I can fulfill a personally important obligation to serve our students while taking even more heart in the fact that they may someday overlap with our industry's scientific leadership needs. As mentioned before, the community needs CEE to help drive continued innovation progression by bolstering our current traditional educational efforts. For CEE to realize its mission, it has outlined a bold agenda built on deep investment. This requires significant capacity to truly proliferate its impact. It is a tall order; but, to this end, I feel lucky to be part of helping CEE realize this mission by applying my business experience; and understanding of our industry's vision to mold our future innovation leaders." ♦

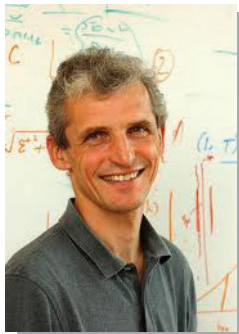
"45% of students showed little or no evidence of learning gains in the first two years of college, and 36% failed to show significant intellectual growth in four years. Previous research revealed that students today spend little more than half as much time studying as they did 50 years ago, but the average student's GPA has risen from 2.5 to 3.1 over approximately the same period."

Academically Adrift
Richard Arum, New York University
Josipa Roksa, University of Virginia

RSI Parent Support Group Announcement

Roger Pellegrini, of New York, is the new Chairperson of the RSI Parent Support Group. Mr. Pellegrini's son, Roger J. Pellegrini, attended RSI 2011.

Dr. Wolfgang Ketterle



Dr. Wolfgang Ketterle has been a supporter of the Center for several years and a lauded speaker during the Guest Lecture Series at the Research Science Institute. CEE is pleased to announce that he has joined the Center's Board of Trustees. His son, Jonas Ketterle, is a 2003 Research Science Institute (RSI) alumnus.

Dr. Ketterle received the Nobel Prize for Physics in 2001 for discovering a new ultra-cold state of matter, the Bose-Einstein Condensate (BEC), with Eric A. Cornell and Carl E. Wieman. He was among the first scientists to observe this phenomenon in 1995, and realized the first atom laser in 1997.

Dr. Ketterle is a John D. MacArthur Professor of Physics at the Massachusetts Institute of Technology (MIT) and Associate Director of the Research Laboratory of Electronics at MIT. He also serves as the Director of the MIT-Harvard Center for Ultra-cold Atoms. His research is in atomic physics and laser spectroscopy, particularly in the area of laser cooling and trapping of neutral atoms.

Dr. Ketterle received a Master's Degree from the Technical University of Munich. He earned a Ph.D. in experimental molecular spectroscopy under the supervision of Herbert Walther and Hartmut Figger at the Max Planck Institute for Quantum Optics. Dr. Ketterle conducted postdoctoral research at Garching, the University of Heidelberg, and at MIT. ♦

Highlights

Joann DiGennaro, President of CEE, was a speaker at the Saudi Petroleum International, Inc. reception held in New York on May 29th. This dinner honored Mr. Khalid A. Al-Falih, President & CEO of Saudi Aramco, and The Saudi Aramco, Management Development Group. At the event, Joann highlighted the S-RSI program and stated, "CEE is proud and gratified to share Saudi Arabia's Future."



At the State Council of Higher Education (SCHEV) and the Virginia Assessment Group on June 13, 2012, Joann DiGennaro was a keynote speaker. She presented an overview entitled, *Policy Issues in Education*.



Joann DiGennaro, President, Center for Excellence in Education (CEE), was honored by U.S. News and STEMConnector as one of 100 Top Women Leaders in STEM on June 28th in Texas at the U.S. News STEM Solutions Leadership Summit. She was inducted in the 100 Women in STEM Hall of Fame.



In Jerusalem, Israel, Joann DiGennaro was a Guest Speaker at the International Conference *Excellence in Education: Theory, Research, Practice*. She provided information about the Center and its programs and discussed Policy and Politics of Education.



Speaking about U.S. educational issues and policy, Joann DiGennaro participated as one of ten U.S. individuals at the Third Chinese U.S. Civilian Dialogue in Beijing, China, August 24-26. ♦



Mr. Khalid A. Al-Falih, President & CEO, Saudi Aramco, with Joann DiGennaro, President of CEE.



Joann DiGennaro speaking to attendees at the International Conference in Education: Theory, Research, Practice about CEE's programs.

Summer Interns at CEE

CEE welcomed Sarina Rapini, a graduate student at the George Bush School of Government and Public Service at Texas A&M University, and Fariha Kabir, a pre-law student at the University of Virginia. *Beyond Textbooks and Lectures: Digital Game-Based Learning in STEM Subjects* was written by Sarina. Fariha discussed her research in *US Gifted Education: A Status Report*. ♦

The opposite of being educated is not so much being ignorant as being 'one-sided', in the grip of partial knowledge, over-zealous and lacking in that calm meditateness which is the mark of philosophic cultivation.

What Are Universities For?
by Stefan Collini

CEE Honors Senator Lieberman, Welcomes Members of Congress, and Celebrates the Center's Programs

CEE's Annual Congressional Luncheon, underwritten by General Dynamics and Purdue Pharma, was held on Wednesday, May 9, 2012 at the Dirksen Senate Office Building.

The Center welcomed Members of Congress including Senator Joseph Lieberman (CT) and Representatives Judy Biggert (IL), James McGovern (MA), and Randy Hultgren (IL).

The Center honored Senator Joseph Lieberman with a special tribute for his eighteen years of service as a CEE Honorary Board Member. Joann DiGennaro, President of CEE, proudly presented Senator Lieberman with a Meritorious CEE Service Certificate. Also, CEE will present the Senator Lieberman Award each year to an alumnus of the Center's RSI or USABO programs for outstanding achievement in science and technology. Senator Lieberman has championed CEE's mission to nurture high school and university scholars to careers of excellence and leadership in science, technology engineering and mathematics



Research Science Institute Alumni with Senator Joseph Lieberman (CT), at the CEE Congressional Luncheon 2012.

(STEM), and to encourage international collaboration between and among leaders in the global community.

Senator Lieberman stated, "I am so thrilled to be here. I have been really proud to be associated with the Center since Senator Sam Nunn told me about it many years ago. Two of the words that appear in the title are Excellence and Education. Admiral Rickover was all about excellence. He not only demanded the best of everyone around him but also the best of himself. The advances in the Nuclear Navy were part of Admiral Rickover's legacy, and the second best part of his legacy is the Center. He left both to this this country. CEE draws talent from all over and helps to advance the economic standing of this country. In turning to the next chapter, I am grateful to have been an Honorary CEE Board Member. I thank the sponsors, Joann, and Center for its work. This is why I love America."

The luncheon celebrated the success of the Center's Research Science Institute (RSI), offered in partnership with the

Massachusetts Institute of Technology; the USA Biology Olympiad (USABO), collaboratively sponsored with Purdue University; and the Teacher Enrichment Program (TEP) to assure a talented and diverse U.S. workforce. The event also highlighted the success of the alumni from the RSI and USABO programs. Speaking at the event about their personal experiences at RSI, their accomplishments, and future goals were Dr. Shamik Das, RSI'94 and Jonece Layne, RSI'11. ♦



Dr. Shamik Das, RSI'94 discussed his work at Mitre and how RSI impacted his career.



Jonece Layne, RSI'11 tells attendees about the impact of RSI on her life.

Nationally, less than 58% of today's students graduate in six years: 54.9% of the students in public institutions and 64.6% of the students in private, non-profit colleges and universities. Such low rates put the U.S. behind global competitors. Despite spending more per student on high education than any other Organization for Economic Co-operation and Development (OECD) country, the U.S. ranks 16th in the percentage of young adults who have completed college.

USABO Jointly Sponsored by Purdue University and CEE



Dr. Victor Lechtenberg

In 2002, the Center developed and implemented the first-ever USA Biology Olympiad (USABO) to train future leaders in the biological sciences. The

USABO is jointly sponsored with Purdue University to stimulate young scholars' intellectual curiosity and to develop their critical thinking skills in biological reasoning. The competitive program culminates with the U.S. Team's participation in the International Biology Olympiad.

The Center posed questions about Purdue's joint sponsorship of the USA Biology Olympiad with CEE to Dr. Victor Lechtenberg, Special Assistant to the President and Director of the Purdue Center for Regional Development at Purdue University, and to Dr. Suresh Garimella, Associate Vice President for Engagement and the R. Eugene and Susie E. Goodson Distinguished Professor in the School of Mechanical Engineering at Purdue.

Why was the USABO program selected for Purdue University's joint sponsorship?

"Purdue has long had strong programs in biological sciences—across several departments and colleges. Purdue faculty had also been associated with the

program previously. The opportunity to work with USABO allowed our faculty and staff to work with the nation's best and brightest biology students, some of whom we hope to recruit to Purdue. We also hope that USABO will complement Indiana's very strong bio-sciences industry and provide opportunities for some of our bio-industry leaders to meet tomorrow's bio-science stars."

What impact has the USABO program had on the Purdue University campus academically or with issues surrounding biology?

"These impacts are yet to play out. This year we have more Indiana schools participating and hope to have even more next year."



Dr. Suresh V. Garimella

How does the USABO program compliment the mission of Purdue University?

"Purdue University's work with USABO is aligned with the "New Synergies"

strategic plan and Purdue's overall mission as a land-grant institution. In particular, USABO provides an opportunity for Purdue to "Launch Tomorrow's Leaders" (one of the three key pillars of the strategic plan) by connecting world-class researchers and instructors with the most promising biology students in the United

States. The students learn about current innovations in biology and support their learning with work in research laboratories in preparation for the competition. By working with these students, Purdue faculty and staff have an opportunity to explore means of advancing biology instruction in secondary and post-secondary schools."

How is Purdue impacting the focus of STEM for the future U. S. workforce?

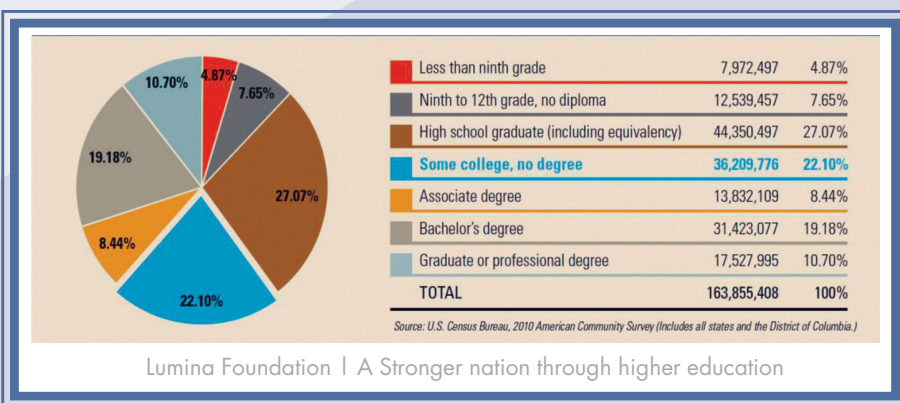
"Purdue programs like the I-STEM (Indiana – Science, Technology, Engineering, and Mathematics) Resource Network, INSPIRE (the Institute for P-12 Engineering Research and Learning), and the Discovery Learning Research Center work closely with government and industry to align P-16 STEM education policies, curriculum, and practices to college and career readiness factors. For example, INSPIRE designs and assesses engineering learning opportunities for students in Grades P through 6. I-STEM and the Discovery Learning Research Center have investigated the impact of research-based science instruction on student learning and teacher instruction in Grades K through 8. Purdue representatives from the Office of Engagement, College of Science, College of Engineering, and College of Education regularly investigate how teacher effectiveness policies, state accountability testing, and national STEM education standards impact teaching, learning, and college and career readiness." ♦

CEE Expands Its Web Presence

The Center for Excellence in Education (CEE) launched a new website as part of its commitment to inform alumni, supporters, and friends about the Center's programs and activities.

CEE invites its friends and supporters to actively explore the new website features to learn more about the Research Science Institute (RSI), the USA Biology Olympiad (USABO), the Teacher Enrichment Program (TEP), and to contribute to CEE! ♦

Levels of education for United States residents, ages 25-64



The Center for Excellence in Education's Donors

From September 1, 2011 to August 31, 2012

With Our Thanks!

Donors up to \$25,000

The Black Horse Foundation Inc.
Circle Pleasure Corporation
Cubist Pharmaceuticals Inc.
The Milton L. & Betty J. Dranow Family Foundation
Mr. and Mrs. Juan Enriquez ExxonMobil Corporation
Gilead Sciences, Inc.
Ms. Romy Barberi
Hariri Foundation
Ms. Kari K. Lee
Mr. and Mrs. Sam Leung
National Science Summer School Inc.
SAP America, Inc.
D.E. Shaw & Co., L.P.
Social Work of Caixa Catalunya
St. Jude Medical, Inc.
Sts. Cyril & Methodius International Foundation
Swedish Federation of Young Scientists
TE Connectivity
Two Sigma Investments

Donors up to \$10,000

American Mathematical Society
Association Philippe Jabre
Association for the Promotion of Especially Gifted Children
Capital One Financial Corporation
Mr. Andrew Chatham
Arnold and Kay Clejan Charitable Foundation
Combined Federal Campaign
Corning Incorporated Foundation
Robert E. Curry, Ph.D.
Mr. Daniel A. D'Aniello
General Dynamics Corporation
IAI North America
ION Corporation
Ms. Susan Lee Ko
Mr. David T. Leighton
Psychemedics Corporation
Purdue Pharma L.P.
Research Development Corporation
Technion - Israel Institute of Technology
Dr. and Mrs. Nathan J. Waldman

Donors up to \$5,000

Allied Converters, Inc.
Allied Converters, Inc.
Mr. Peter L. Beebe
Mr. Mel Chaskin
Mr. David Cheng
Mr. Mark Churchill and Dr. Laurie Witters-Churchill
Mr. Klee Dienes
Ms. Joann P. DiGennaro
Mr. John M. Dorffler
Dr. James C. Ellenbogen
Ms. Kathy Feegel
First Virginia Community Bank
Gen-Probe Incorporated
Mr. Chad M. Gerson
Mr. David J. Gladstone and Dr. Lorna J. Gladstone
Dr. Jeffrey Y. Gore

Donors \$25,000 AND ABOVE

Akamai Technologies
Biogen Idec Foundation
Cabot Family Charitable Trust
U.S. Department of Defense/Building Engineering and Science Talent (BEST)
U.S. Department of Defense Education Activity
Dr. Tom Leighton and Dr. Bonnie Berger
The Leonetti/O'Connell Family Foundation
Massachusetts Institute of Technology

MAWHIBA
Microsoft Corporation
PepsiCo, Inc.
Purdue University
Saudi Aramco
Singapore Ministry of Education
Dr. Diane Tang
United Technologies Corporation

Mr. Daniel Haspel
Dr. Doug Humberger
Mr. and Mrs. Steven Hipsman
Mr. Ron Hohauser
Ms. Chienlan Hsu-Hoffman
Dr. Noreen Hynes
Admiral and Mrs. Bobby R. Inman, USN (Ret.)
Alan Kane Charitable Trust
Mr. Barry Tanner and Dr. Pam Krahl
Mr. Raymond C. Kubacki, Jr.
Mr. and Mrs. Brent T. Lin
Mr. Albert C. Lin
Dr. and Mrs. Binshan Lin
Madlin Stevenson Foundation
Micron Technology, Inc.
The Milken Family Foundation
Mr. and Ms. Michael J. Miller
Kenneth & Myra Manfort Charitable Foundation Inc.
Northern Virginia Electric Cooperative
Mr. Kalani Oshiro
Dr. Feng Ouyang and Dr. Zheng Chen
Admiral William A. Owens, USN (Ret.)
Mr. and Mrs. Arthur Pasternak
Mr. Jerome H. Powell and Ms. Elissa A. Leonard
Dr. Soham Roy
Professors Joseph and Nell Sedransk
Drs. Clay and Janice Semenkovich
Mr. Umesh Shankar
Dr. Michael Sipser
Mr. Geoffrey Smith
Drs. Phillip and Gina Smith
Dr. Amy Szczepanski
Mr. and Mrs. San Y. Wang
Mr. Tian Zhong Ding and Dr. Yun Yang

Donors up to \$1,000

Mr. and Mrs. Charles Adelman
Aerojet
Dr. and Mrs. Valery Alexeev
Dr. Fredric D. Ancel and Dr. Esther Ancel
Mr. Kyle R. Antonini
Mr. and Mrs. Bala Balakrishna
Mr. and Mrs. Joaquin I. Ballester
Mr. Peter J. Barrer and Mrs. Judith A. Nichols
Dr. and Mrs. William S. Beebe
Mr. and Mrs. Werten Bellamy
Ms. Ela Ben-Ur
Professor Edmund Bertschinger
Dr. and Mrs. Subroto Bhattacharya
Ms. Blanche Blatt

Mr. Charles Douglas Blewett and Mrs. Margaret Kilduff
Mr. and Mrs. Gary Boeka
Drs. Ravi B. and Rany Boppa
Mr. Marc Borkan
Robert Bosch, Ph.D.
Mr. Judson Bowman
Mr. Hiroshi C. Bowman and Ms. Morag S. Fulton
Emily Brodsky, Ph.D.
Mr. and Mrs. L. Michael Brunt
Mr. Christopher Cai
The Honorable and Mrs. Vincent F. Callahan
Dana Caulder, Ph.D.
Dr. Wenyang Chan and Dr. Alice Zu-Po Chuang
Dr. and Mrs. Frederick R. Chang
Dr. and Mrs. Philemon D. Chang
Dr. KC Chellamuthu and Ms. Pasumponni Karuppanan
Mr. Harry H. Chen and Mrs. Hanfei Yu
Dr. Melissa Chen
Dr. and Mrs. Tar Timothy Chen
Dr. Frederick Chen
Mr. Jifang "Jeff" Chen and Ms. Yanxi "Kathy" Gong
Mr. Mark Chiang
Dr. Alan Christensen
Mr. Gerald J. Churchill and Mrs. Diane Foley Churchill
Mr. Ian S. Cinnamon
Mr. Kenneth M. Cinnamon and Ms. Karen Leslie Wengrad
Clydes' Restaurant Group
Mr. and Mrs. Eric P. Cody
Jacinta C. Conrad, Ph.D.
Mr. and Mrs. Christopher Cook
Mr. and Mrs. Steven Corkran
Dr. David H. Crandall
Dr. David Palmer and Ms. Clare G. Crawford
Dr. Shamik Das
Dr. and Mrs. Sankar Das Sarma
Mr. and Mrs. Lou DeBergalis
Dr. and Mrs. Adarsh Deepak
Dr. Youping Deng and Ms. Ming Lu
Mr. Tian Zhong Ding and Dr. Yun Yang
Ms. Rachel Donovan
Mr. Robert Doory
Mr. and Mrs. David Drucker
Mr. John Edwards
Ms. Sandra C. Eltringham
Dr. and Mrs. Thomas E. Everhart
Dr. Zhen Fan and Ms. Jiandong Zhou
Law Office of Philip J. Farina
Mr. and Mrs. Ralph Faust
Mr. F. Joseph Feely, III
Mr. David Finkel
Ms. Julie N. Finkelstein
Drs. Robert and Terry R. Finkelstein
Dr. Mario P. Fiori
Ms. Helen M. Foster

Mr. David Galkowski
Dr. Xiang Gao and Dr. Li Tong
Mr. and Mrs. Arthur Glick
Mr. and Mrs. Marshall Glick
Colonel and Mrs. Karl M. Goetzke
Dr. David Goldhaber-Gordon
Dr. and Mrs. Herbert Golomb
Mr. Henry Gong and Dr. Liming Gong
Dr. and Mrs. Harold F. Goodman
Dr. Joseph Gootenberg and Dr. Susan Leibenhaut
Dr. John D. Gordon and Dr. H. Allison Smith
Mr. and Mrs. Edward B. Greenberg
The Greendale Lynn Family Foundation
Mr. Matthew B. Grice
Dr. Guangyu Gu and Ms. Jiang Shi
Mr. Yiping Liu and Ms. Kaining Gu
Mrs. Janet R. Gum
Mr. Owen G. Gwilliam
Professor Robert Hansen
Dr. and Mrs. Abraham Haspel
Ms. Andrea J. Hawksley
Mr. and Mrs. Edward L. Hoffman
Mr. Graham N. Horkley and Dr. Katharine G. Abraham
Mr. and Mrs. Gerald Horowitz
Dr. Edward C. Hsiao
Dr. and Mrs. Tien-Sheng Hsu
Dr. Kezhong Hu and Dr. Ping Xia
Mr. Mark L. Huang
Dr. Xiaoguo Huang and Ms. Ningming Han
Mr. Ken Lee and Dr. Joy R. Hughes
Dr. John Z. Imbrie and Dr. Marcia M. Moore
Mr. and Mrs. Jeffrey Janaskie
Dr. and Mrs. Bhanu Jena
Dr. and Mrs. Matthew Jenkins
Ms. Lili Jiang
Mr. Charles Kallenbach and Ms. Alison Rosenberg
Mr. Nolan Kamitaki
Mr. Sean Kanuck
Dr. and Mrs. Ryoichi Kawai
Colonel and Mrs. John Samuel Kem
Mr. Patrick M. Kenny
Dr. and Mrs. David Keyes
Dr. and Mrs. Raman Khanna
Mr. and Mrs. Richard Kilgore
Dr. and Mrs. Seung Tae Kim
Mr. and Mrs. Tong-Hui Kim
Dr. In Tae Kim and Ms. Helen Pak
Dr. Ray Kishony and Dr. Talia Berman-Kishony
Drs. Keng-Tai and Catherine Ko
Mr. and Mrs. Stan Komander
Mr. Johann Komander
Mr. Paul Kominers

Mr. William Kominers and Mrs. Ellen Dickstein Kominers
Mr. and Mrs. Bharat Lakhanpal
Mr. and Mrs. Gregory S. Lauer
Mrs. Ila F. Lauer
Ms. Ruth Lavine
Mr. and Mrs. Gregory C. Lawhon
Dr. and Mrs. William M. Layson
Mr. Christopher Le
Dr. Dean J. Lee
Dr. and Mrs. Jong Keel Lee
Laurence Lee, Ph.D.
Dr. Yueh Lee
Irwin Lee, Ph.D.
Dr. and Mrs. Jung-Keun Lee
Irwin Lee, Ph.D.
Peter Y. Lee, Ph.D.
Dr. and Mrs. Ding-Hwa Lei
Mr. and Mrs. Sui-Hing Leung
Mr. Guanghai Li and Ms. Jane T. Eng
Ms. Yunfang Li
Dr. and Mrs. Berwyn J. C. Lin
Dr. Bin Lin and Dr. Xiangfei Zeng
Dr. and Mrs. Neal Lisann
Dr. Jian Liu and Ms. Jian Yao
Mrs. Julia V. Lobel
Dr. James Magyar and Dr. Elaine S. Magyar
Mr. George Mannes and Dr. Marge Levin
Dr. Chengye Mao and Ms. Lin Wang
Dr. John C. Mather
Mr. Benjamin B. Mathews
Mr. and Mrs. John A. McCormack
Mr. and Mrs. Frank D. McDermott, Jr.
Mr. and Mrs. Brian McNamara
Gregory Minton
Mr. John Missik and Dr. Christine Missik
Drs. Myron and Bobbi Mitzenmacher
The Honorable Michael Montelongo
Ms. Julie P. Neerken
Ms. Christie Nelson
Dr. Vishal Nigam
Mr. and Mrs. Dong Kil Noh
Mr. and Mrs. Edward Noonan
Ms. Roberta Novick
Mr. and Mrs. John T. O'Connell
Professor Eli V. Olinick
Olympiad School, Inc.
Mr. and Mrs. Lloyd Y. Oshiro
Dr. Mark Osterman
Mr. Jiabei Pan
Mr. Zaito Pan and Mrs. Jian Hua Li
Mr. and Mrs. Seungho Park
Mr. Arvind Parthasarathi
Pasquale Trucking Company, Inc.
Mr. and Mrs. Thomas A. Pasquale, Jr.
Mr. David Patrick
Mr. and Mrs. James C. Paul
Mrs. Mariana Pestana
Dr. and Mrs. Frank O. Petkovich
Mr. Galen E. Pickard
Dr. and Mrs. Michael L. Rahn
Dr. and Mrs. Roger Rains
Dr. Eric Rains
Ms. Emily E. Riehl
Drs. Scott A. and Dena E. Rifkin
Mr. Mark C. Roh
Mr. and Mrs. David Rosenthal

Mr. Brian Rubineau
Mr. David Runkler and Dr. Susan Phillips
Mr. Charles E. Sane
Mr. and Mrs. Thomas K. Scelfo
Dr. Marnie Schroer
Dr. and Mrs. Stuart Sealfon
Ms. Renee T. Sheehy
Dr. and Mrs. Robert M. Shellenbarger
Dr. and Mrs. Wei Shen
Mr. David Shiner and Ms. Nancy Wallace
Mr. Edward Silver and Ms. Judith Westerman
Mr. Richard Simon and Dr. Olgica B. Bakajin
Professor Susan Rundell Singer
Drs. R. Todd and Catherine Snowden
Dr. Jennifer Sun
Ms. Kejia Sun
Dr. and Mrs. Nicholas R. Szumski
Dr. and Mrs. Hengming Tai
Mr. and Mrs. Richard Tam
Dr. Liqing Tao and Dr. Li Zuo
Mr. Aurelio A. Telemán
Mr. and Mrs. Jacob Philip Thomas
Mr. Mathew Thomas and Mrs. Rama Madhavarao
Professor and Mrs. Neil Todreas
Mr. and Mrs. Jack Tseng
RADM and Mrs. Douglas Volgenau
Dr. Samuel Gilbert and Dr. Elisabeth Vrahopoulou
Dr. Jon Wade
Mr. Eamon Walsh
Dr. Clark Wang and Dr. Huiji Wang
Dr. Zhengnan Wang and Dr. Yanyun Chen
Dr. Clark Wang and Dr. Huiji Wang
Mr. Brien L. Wheeler
Ms. Elizabeth Williams
Mr. and Mrs. Sigmund Wissner-Gross
Mr. and Mrs. Daniel Witte
Mr. Jeremy S. Woodburn
Dr. Chang-Hong Wu and Mrs. Biyu Pan
Mr. Alex Wu
Mr. and Mrs. Thomas Wulf
Dr. Guochen Yang and Ms. Liwen Han
Dr. Xian-Cheng Yang and Ms. Ping Yin

Dr. Jun Ye and Ms. Huiqing Wang
Dr. and Mrs. Albert Y. Yoshiyama
Drs. Gang and Cong Yu
Dr. Wenning Zhao and Ms. Feifei Liu

Donors up to \$100

Drs. Venkataraman and Kalyani Amarnath
Mr. Kapil Amarnath
Mr. and Mrs. George Au
Mr. and Mrs. Ken Aull
Dr. Etienne S. Benson
Meghana A. Bhatt, Ph.D.
Mr. and Mrs. William B. Carr
Mr. Matthew F. Cesario
Mr. and Mrs. Chaim Chachkes
Mr. Samidh Chakrabarti
Mr. Yiwei Chen
Mr. Allen Cheng
Mr. and Mrs. Gary Chiu
Ms. Rolla Chuang
Mr. Michael Coulter
Aidan Craigwood, Ph.D.
Mr. Jasper Danielson
Ms. Martha DeWeese
Mr. George T. Dewey, III
Dr. Wei Du and Dr. Minfang Gong
Mr. and Mrs. Stanley C. Feuerberg
Mr. William Fithian
Ms. Eleanor J. Fraser
Dr. Gerald Froehner and Mrs. Ingrid Ortega Froehner
Mr. and Mrs. Arnold B. Galperin
Dr. Shea Gardner
Mr. Shantanu Gaur
Ms. and Mr. Allison Gilmore
Dr. and Mrs. Paul Ginsburg
Professor and Mrs. Alfred Goldhaber
Melissa Graebner, Ph.D.
Mr. and Mrs. Timothy Grammel
Ms. Victoria Gu
Mr. Brent Halsey
Mr. and Mrs. Stanley I. Hanover
Mr. Christopher Hansen and Ms. Marie Jacobellis
Mr. Glenn Harris and Ms. Anne Katten
Mr. Michael Barlow and Ms. Charlotte Hetherington
Jennifer E. Hoffman, Ph.D.
Dr. Faqing Huang and Mrs. Zhili Yang

Dr. Xiaojie Huang and Ms. Ningning Han
Mr. Paul E. Hurwitz and Mrs. Rosanne Apfeldorf Hurwitz
Mr. Ryan Jamiolkowski
Mr. and Mrs. Donald Jensen
Mr. Jinsoo Jeon and Ms. Namsuk Kim
Ms. Emily A. Kendall
Dr. Aaron S. Kesselheim
Mr. Jonas Ketterle
Mr. and Mrs. Surinder Kohli
Mr. and Mrs. Stan Komander
Mr. Justin Komisarof
Dr. Jerome H. Komisarof and Dr. Leslie Stein Komisarof
Mr. Ken Kumler
Drs. Sarma and Prabha Kunda
Dr. and Mrs. Robert J. Laird
Mr. Amit Lakhanpal
Daniel T. Larson, Ph.D.
Ryan Seungjoo Lee, Ph.D.
Mr. and Mrs. Jeff Longcore
Ms. Margaret M. Lynch
Mr. Paul Magyar
Dr. Robbie Majzner
Marco Polo Restaurant & Caterers
Mr. and Mrs. David J. Marcus
Mr. and Mrs. James P. Markan
Mr. Advay Mengle
Mr. Christopher C. Mihelich
Mr. Peter L. Millman and Dr. Marie E. Cantino
Mr. Piotr Mitros
Dr. Dongho Moon and Mrs. Heejeon Hyung
Mr. and Mrs. William S. Moore
Ms. Eran Mukamel
Ms. Suzanne Murr
Professor and Mrs. Shamkant B. Navathe
Mr. Amandeep Singh and Ms. Katerina V. Ossenova
Drs. Juraj and Neda Osterman
Ms. Beatrice S. Parker
Mr. Parth Patwari
Ms. Sara Peek
Ms. Molly S. Peebles
Mr. and Mrs. Rankin E. Powell
Dr. and Mrs. James M. Rafferty
Dr. and Mrs. Walter Reich
Mr. and Mrs. Edward Riehl
Ms. Viviana Risca

CONTRIBUTE TO CEE WITHOUT EXTRA EFFORT OR COST

The Center is a recognized 501 (c) 3 non-profit organization that receives a percentage of funds through a number of online retail sites. Before you begin to shop, please be sure to choose the **Center for Excellence in Education, McLean, VA** as your designated charity.

Listing of several shopping websites

- CommonKindness** – www.commonkindness.com
- eBay's Charitable Partner Mission Fish** - www.missionfish.org/index.html
- Gift Back.com** – www.giftback.com
- GoodDining** – You dine, we give - www.gooddining.com
- GoodSearch** – www.goodsearch.com
- iGive.com** – www.igive.com
- We-Care.com** – cee.we-care.com/Start

Thank you for choosing CEE as your charity and have fun shopping!

Follow CEE on Facebook, Twitter, and YouTube!



Drs. Douglas and Susan R. Rose
Mr. Brad M. Rosen
Mr. Paul Steigewald and Ms. Susan Schmidgall
Mr. Evan M. Schwartz
Dr. and Mrs. Theodore S. Schwartz
Mr. and Mrs. Walter W. Schwartz
Mr. Benjamin M. Schwartz
Ms. Julia I. Silvestri
Mr. and Mrs. John Brandon Stone
Professors Daniel and Rose Subotnik
Dr. and Mrs. Michael A. Sullivan
Dr. and Mrs. Ronald Szczepanski

Dr. Qin Tang and Mrs. Xiaonigh Jiang
Mr. and Mrs. W. Cabot Thomas
Mr. Shane Treadway
Mr. Robert R. Tupelo-Schneck
Mr. and Mrs. Avinash Velingker
Mr. and Mrs. Edward Vitek, Jr.
Mr. Andrew Wang
Drs. Clifford and Georgia Weinstein
Mr. and Mrs. John S. Westrick
Ms. Linda B. Westrick
Ms. Deborah Wheeler
Mr. John Wheeler
Mr. Kevin Yang
Dr. Yunchang Zhang and Mrs. Jianchu Huang
Mr. John Zhu and Mrs. Jie Zhang

CEE in Your Charitable Giving

The charitable bequest is one of the most flexible ways to make a major gift to the Center for Excellence in Education (CEE). Charitable bequests are easy to make. You enjoy full use of your property during life. And there is no disruption of your lifestyle, no immediate cost to you.

With a charitable bequest, you simply direct that part of your estate to go to one or more of your favorite charities. However, without a will in place, no money or property can go to the charities you wish to help, despite your best intentions.

A charitable bequest can take many forms: you can designate a certain dollar amount, or a certain percent-

age of the value of your estate; or the residue (what is left of value in your estate after all administrative costs and other bequests have been made) goes to CEE. You also can designate exactly how you want your bequest to be used (to fund a particular endowment or program), or you can leave your gift unrestricted so we have the flexibility to meet our changing needs.

It is important to know that you remain in charge of the planning process. You can amend your will by codicil or prepare an entirely new will, giving you the flexibility to meet changing needs and remain a firm supporter of the Center for Excellence in Education. ♦

To Make A Gift From Your IRA:

1. Contact your IRA custodian immediately. Many plans require 2-3 weeks to make distributions.
2. Tell your IRA custodian to make a gift to the Center for Excellence in Education (CEE), tax identification number 52-1256563, before December 31, 2012.
3. Save taxes by taking an IRA "rollover" gift instead of declaring your withdrawal as income on your 2012 income tax return.

Matching Gifts double your contributions to the Center! Please visit www.cee.org to donate online. Ask your employer if your annual contribution is matched by your company. **CEE occasion cards** also are now available. Contribute to CEE to honor life's special occasions. **For more details**, contact Jackie Ortiz at jortiz@cee.org

CEE is a member of the United Way (#2474). Our CFC number is 11002. Please consider the Center when making your next contribution.

BOARD OF TRUSTEES

President Jimmy Carter
Senator Joseph Lieberman
 Connecticut
Senator Lindsey Graham
 South Carolina
Congressman Eric Cantor
 Virginia
Congresswoman Susan Davis
 California

CHAIRMAN

Mr. Mel Chaskin
 President & CEO, Vanguard Research, Inc.

Dr. Frederick Y. Chen
 Director of Cardiac Surgery, Brigham and Women's Hospital

Dr. Robert E. Curry
 General Partner, Alliance Technology Ventures

Ms. Joann P. DiGennaro
 President, Center for Excellence in Education

Mrs. Betty Dranow
 President, The Dranow Family Foundation

Mr. Juan C. Enriquez
 Managing Director, Excel Venture Management

Ms. Kathy Feegel
 Executive Director, State Government Affairs, Amgen

Mr. Nicholas S. Gouletas
 Chairman of the Board, American Invscio

Mr. Gregory Gunn
 Entrepreneur in Residence, City Light Capital

Her Excellency Bahia El Hariri
 Member of Parliament, Lebanon

Dr. Douglas E. Himberger
 Senior Vice President, National Opinion Research Center,
 University of Chicago

Mr. Ronald E. Hohaus
 Chief Financial Officer, Summit Entertainment, LLC

Dr. Noreen A. Hynes
 Director, Geographic Medicine Center, Division of Infectious
 Diseases, Johns Hopkins University

Mr. Dean Kamen
 President, DEKA Research & Development

Mr. Mark Kantrowitz
 Publisher, FinAid.org

Mr. Sean Kanuck
 International Consultant

Dr. Wolfgang Ketterle
 John D. MacArthur Professor, Department of Physics,
 Massachusetts Institute of Technology

Mr. Raymond C. Kubacki
 Chairman & CEO, Psychemedics Corporation

Ms. Susan Lavrakas
 Director, Workforce Aerospace Industries Association

Dr. Tom Leighton
 Co-Founder & Chief Scientist, Akamai Technologies, Inc.

Mr. Wendell Maddox
 President & CEO, ION Corporation

Dr. J. Michael McQuade
 Senior Vice President, Science & Technology, United
 Technologies Corporation

Dr. Anthony G. Oettinger
 Chairman, Program on Information Resources Policy, Harvard
 University

Admiral William A. Owens, USN (Ret.)
 Managing Director, AEA Investors LP

Mr. Arvind Parthasarathi
 Senior Vice President & General Manager, YarcData

The Honorable Thomas R. Pickering
 Vice Chairman, Hills & Company

Ms. Cynthia Pickett-Stevenson
 Doyle, Restrepo, Harvin & Robbins, LLP

Mr. Ronald W. Simms
 CEO, Petroleum Service Company

Dr. Michael Sipser
 Professor & Head, Department of Mathematics, Massachusetts
 Institute of Technology

Excellence

Center for Excellence in Education

8201 Greensboro Drive, Suite 215
 McLean, Virginia 22102
 Tel: 703-448-9062 Fax: 703-448-9068

NON-PROFIT ORG.
 U.S. POSTAGE
PAID
 McLEAN, VA
 PERMIT NO. 392

About the Center for Excellence in Education

The Center for Excellence in Education (CEE) nurtures careers of excellence and leadership in science, technology, engineering, and math (STEM) for academically talented high school and college students and encourages collaborations between and among leaders in the global community. Founded in 1983 by the late Admiral H.G. Rickover and Joann DiGennaro, President of the Center for Excellence in Education, the Center's programs help keep the United States competitive in science, technology, engineering, and mathematics (STEM). CEE challenges young scholars and assists them on a long-term basis to become the creators, inventors, scientists, and leaders of the 21st century.

As a private non-profit organization, CEE is not subject to federal and

state mandates or political pressures. All CEE programs are open to students and teachers regardless of race, color, creed, or economic background; the only criterion is academic excellence. CEE sponsors the Research Science Institute (RSI), the USA Biology Olympiad (USABO), and the Teacher Enrichment Program (TEP).

To date, CEE has received funds from the U.S. Department of State, the U.S. Agency for International Development, the National Science Foundation, the United States Information Agency, the National Endowment for the Humanities, the National Security Agency, the Bureau of Indian Affairs, the Department of Agriculture, the Department of Energy, and the Department of Defense. Private individuals and corporations, however, provide most of CEE's funding. ♦