Online Learning Creates "Community of Learners"

Without Walls
"Connections Next Door And Around the World"

IMSA Graduate Named Rhodes Scholar
Having recently announced my retirement from IMSA, I am writing my last letter for IMSA360 to share my appreciation and admiration for the engagement and support of the entire IMSA community, which includes each and every reader of this publication. During the past six years, our collaborative work has produced some exceptional results as evidenced by our students’ success in national and international competitions, publications, presentations and leadership conferences. In addition, other highlights include our institutional recognition—especially the 2009 Intel Star Innovator Award—our growing donor base, the expansion of programs and services for Illinois students and teachers, a growing network of productive partnerships, and continued support from the Illinois legislature and other funders.

Looking ahead, our shared mission of “igniting and nurturing creative, ethical, scientific minds that advance the human condition” is powerful and will propel IMSA on a trajectory resulting in sustained success in our next quarter century. I am confident that our highly capable leadership team, a talented and dedicated faculty and staff, a solid and growing alumni base, our incredible students and their supportive parents, a dynamic IMSA Fund Board, and a passionate, expert Board of Trustees will continue to advance our strategic agenda. With these resources, IMSA’s next President will be well positioned to fully realize our ambitious aspiration of being “the world’s leading teaching and learning laboratory for imagination and inquiry.”

While I trust I contributed much to IMSA, I have benefitted most from interacting with our extraordinary students and graduates. Their thinking, values and commitment to “advancing the human condition” inspired me every day the past six years and will continue to do so throughout my next professional journey. While I am retiring as IMSA’s President, I intend to remain involved in STEM education on an international level while having more time to devote to my ever growing family (grandchild number four, hopefully a member of the IMSA class of 2031, is due in July). Also, I hope to become a member of IMSA’s Fund Board next fall and thus continue to generate resources for the important and “most excellent” work of our IMSA community.

In closing, there are not enough superlatives to express how appreciative I am of being able to serve you during this incredible journey. I have learned so much from so many of you and really made some wonderful new friends for life. Throughout my career I have had several good jobs, but this has been one of the most rewarding and most fun. Being a member of the IMSA family I have also come to appreciate even more the sense of love and respect that permeates our community. While I will be moving on, the joy of IMSA will always be with me, and I will always feel connected to this amazing community. Thank you again for making this all possible.

An Incredible Journey
The Spring 2012 issue of IMSA360 reported on three new eLearning pilots to launch in 2012-13. One year later, IMSA’s new Director of Online Learning Frank Tomsic and Jacklyn Naughton, Online Education Specialist, explain why online learning is so powerful and why it holds so much promise for the future.

IMSA360: Online learning is not a new concept so what do you see as IMSA’s unique niche and contribution?

FT and JN: IMSA’s core competencies—problem-centered, inquiry-based, competency-driven and integrative learning—are our unique contribution to the online environment. This, coupled with its collaborative nature and environment, makes it very powerful. In addition, IMSA is seen as an innovator and leader in teaching and learning so by expanding outside the IMSA walls, we provide opportunities for teachers and students who would otherwise not have them.

IMSA360: What does online learning provide for students that a traditional classroom does not?

FT and JN: The online technologies allow us to enhance the learning to do more than just deliver materials. The goal is to create a community of learners – the technology facilitates the interactions in the community and should not limit it. The students are engaging, communicating and collaborating with each other. The teacher facilitates and guides the students and gives them the opportunity to collaborate, to inquire and to solve problems.

IMSA360: Jacki, as a former teacher of 40 years in a traditional classroom, how do you teach differently in the online classroom?

JN: In the online environment I communicate more individually and consistently with every student. In the online environment it is virtually impossible not to engage because communication is an essential component in the virtual environment. You hear all voices and not just some voices. In the online classroom it is impossible to be a passive learner—if you are not discussing and posting questions or comments, you are not meeting the class requirements. Many students are more comfortable expressing their thoughts in writing.

IMSA360: Currently IMSA has three online eLearning pilots – Summer Math@IMSA, Scientific Inquiries Biology (SI Bio) and RISE (Research Inquiry Skills and Experimentation). As the “world’s leading teaching and learning laboratory for imagination and inquiry,” what has IMSA learned in conducting these pilots so far?

FT: Due to the time it takes to fully realize the potential for quality for online courses, the design and development lead time is greatly increased. Within that development time frame, we have to ensure that we create a coherent learning space that allows faculty and students to engage in the learning content. We have to create an environment that is as open to faculty and students (both from learning and technology standpoints) as possible, and it takes time to get it right.

As the world’s leading teaching and learning laboratory for imagination and inquiry, online learning will provide IMSA with an effective tool to extend its reach in the future and help achieve both of its legislative charges.
MSA is the consummate host and leader in STEM education no matter where the teaching and learning occurs—within its walls or outside of them. IMSA faculty, staff and students find creative ways to deliver inquiry-based, effective education transferring relevant knowledge to all participants.

A recent demonstration of this commitment was Professional Development Day (PD) which offered more than 28 exciting, hands-on sessions in science, mathematics, technology and cross-disciplinary subjects for middle- and high-school teachers. More than 200 educators from eight Illinois counties attended. Now that’s relevant knowledge transfer.

IMSA knows scholarship also fits hand-in-hand with leadership. While no stranger to producing fine scholarship during its 26-year history, recently IMSA has made an even deeper commitment to it through building a stronger culture of support. This dedication and work comes directly from a team of faculty, staff and board members who are currently analyzing critical, institutional questions including creating better conditions to produce scholarship at the national and international levels. Scholarship is another great example of IMSA’s enthusiasm to expand its connections and expertise.

Visit the DigitalCommons@IMSA
http://digitalcommons.imsa.edu/

In every aspect of our lives, nothing is truer than thought precedes action, and we are inextricably connected to what we believe is what we can achieve. The IMSA Great Minds Program® was designed to encourage thinking and engagement. The most recent programs have featured Sam Yagan at 1871 in Chicago speaking about irrational entrepreneurship, Dr. Fred Janzen speaking about “Climate Change and the Temperature-dependent Sex Determination in Turtles” and Dr. Beth Shapiro: “Ligers, Tigers and Bears (Oh My!): The genomic consequences of inter-species hybridization.” It’s no wonder IMSA connects with every age.

In what ways could IMSA further serve and connect with the State of Illinois? One way is through the Illinois Science and Technology Coalition (part of the Illinois Science and Technology Institute) and IMSA’s innovation and entrepreneurship program. The ISTC/ISTI strategy for an “early win” for the State’s R&D STEM Learning Exchange led to interest in CoolHub.IMSA.

With funding from Tellabs Foundation and ISTI, IMSA is developing a robust eMentoring platform for personalized inquiry projects in STEM that connect students and mentors from industry or academia under teacher supervision.

Young students also love to connect with IMSA. Many of the Summer @ IMSA Programs were full within hours of opening registration this year. Parents and kids know science, mathematics and technology will take center stage as their children utilize discovery, exploration and problem-solving techniques in innovative ways that make it fun to learn.

To connect with students all around Illinois in grades 3 through 10 who have an interest or passion for math and science, programs are not only planned for Aurora, but also through field offices in Chicago, Metro East, Rock Island Region, and in Springfield.  

All that we are is the result of what we have thought. The mind is everything. What we think, we become.

- Guatama Buddha
LEGISLATORS, TEACHERS, STUDENTS CELEBRATE CHICAGO FIELD OFFICE OPENING AT BEASLEY

MSA welcomed government and community leaders to its Chicago Field Office Grand Opening at Beasley Academic Center, featuring enthusiastic state legislators, school officials and Beasley students who participated in a hands-on science demonstration.

Through its recently relocated Chicago Field Office, IMSA joins forces with Chicago Public Schools to deliver professional development in mathematics and science instruction that focuses on inquiry and discovery; provide after school, weekend and summer mathematics and science programs for students; and address local needs by building and sustaining relationships with the local Chicago community.

LEGISLATORS, TEACHERS, STUDENTS CELEBRATE CHICAGO FIELD OFFICE OPENING AT BEASLEY

IMSA TALENT UPGRade LANCHeS SECOnD SUMMEr ExPErIENCE

For the second year, IMSA will host the TALENT UPgrade Experience July 8 – 26, 2013, a residential camp for Illinois entrepreneurs entering grades 8-12 in the fall who have a business idea they want to take to the next level.

During the two-week immersive experience, student entrepreneurs will research, design, build and test a prototype of a new product or service. These may include websites, web applications, software or robotic devices, among others.

In the end, every student (or team) should have a working product or service to demonstrate to a potential investor. Submit your entrepreneurial business concept online to https://www3.imsa.edu/programs/SummeratIMSA before May 25th to be considered!

Join the IMSA TALENT Facebook Group!

IMSA STUDENTS RANK HIGH ON INTERNATIONAL TEST; REPORT SHOWS HIGH “ROI” FOR TALENTED STUDENTS

The results of a recent international assessment indicate IMSA students outperform three-quarters of the schools in Shanghai, China, the world leader on a similar test in 2009.

The results of the OECD Test for Schools (based on the Programme for International Student Assessment or PISA) “measures 15 year-old students’ applied knowledge and competencies in reading, mathematics and science as well as their attitudes toward learning and school.”

IMSA’s student mean performance scores on this 2012 pilot trial were more than 100 points higher each in reading, mathematics and science compared to U.S. students who took a similar test, the PISA 2009. In addition, in reading, mathematics and science, IMSA outperformed a group of 12 countries representing “a wide range of education systems and models as well as diverse policies and practices that are relevant to school improvement efforts.”

A 2010 report on 30 nations in the Organisation for Economic Cooperation and Development (OECD) noted that if the United States brought all students up to a “basic” level of performance on the assessment over the next 20 years the GDP would increase by an estimated $72 trillion, or 475%.
Rhiana Gunn-Wright

IMSA FOUNDED PRESIDENT NAMED LINCOLN ACADEMY TRUSTEE

Illinois Governor Pat Quinn appointed IMSA Founding President and President Emerita Dr. Stephanie Pace Marshall as a General Trustee of The Lincoln Academy of Illinois. In 2005, Dr. Marshall became a Laureate of The Lincoln Academy of Illinois, the highest honor the state can bestowed for outstanding achievement. The Order of Lincoln is awarded by the Governor to six distinguished Illinoisans every year during a special convocation. As a member of the Academy, Dr. Marshall will be encouraged to nominate potential recipients of the Order of Lincoln and will also vote on and select the six recipients of the Order of Lincoln, to be honored by the Governor 18 months later.

Rhiana Gunn-Wright

IMSA Class of 2007 graduate Rhiana Gunn-Wright of Englewood in Chicago joins the ranks of other IMSA alumni to be named a Rhodes Scholar and is one of only two students to be named from the State of Illinois this year. During an interview with IMSA, Rhiana thanked the Academy for helping her to hone her academic talents and gifts, and use them for the benefit of mankind. “IMSA was an incredibly formative experience for me,” said Gunn-Wright. “IMSA taught me to question, to analyze, and, most importantly, to work to change the things in the world that I thought were unjust,” she added.

Rhiana Gunn-Wright

Six IMSA Staff Members Receive NBPTS Certification; 33% of IMSA Faculty Now NBPTS-Certified

Six IMSA staff members completed the 2012 rigorous national certification process to become NBPTS-certified by the National Board of Professional Teaching Standards (NPBTS) bringing to 33% of IMSA teachers now NBPTS-certified.

Faculty and staff who received NBPTS certification were Dr. Mark Carlson, Peter Clancy, Dr. Peter Dong, Julia Husen, Dr. Jeong Hwang-Choe and Sarah O’Leary-Driscoll.

As part of the NBPTS certification process, IMSA staff members compiled and submitted a teaching portfolio which included videotapes of classroom teaching, lesson plans, student work samples and reflective written commentaries. They also had to complete an assessment involving a series of written exercises designed around challenging teacher issues such as curriculum design, student assessment and content knowledge.

Recent IMSA NBPTS-certified faculty included (l-to-r) Dr. Jeong Hwang-Choe, Sarah O’Leary-Driscoll, Dr. Peter Dong, Dr. Mark Carlson and Peter Clancy. (not pictured: Julia Husen)
This spring, IMSA will graduate its 25th class. My daughter will be among those new students we welcome into the IMSA Alumni Association (IAA). I know staying connected to IMSA will be as important to her as it has been for me. As these IMSA students move on to their next step in life, the IAA helps them keep connected to other alumni as well as the IMSA community through our alumni programs. Firstly, the IAA hosts regional events throughout the country to help alumni to stay in touch with one another and network with others outside of their class years. This past winter, we held events in the San Francisco area on Facebook’s campus and more recently in Seattle hosted by author Ramez Naam ('90). This spring will feature events in New York as well as Chicago.

For those who can’t always get together in person, the IAA has increased our presence in social networks. Our presence on Facebook, Twitter, LinkedIn and Google+ helps alumni to connect with others, share stories, and plan events. We’ll continue to expand our networking efforts and services to help connect alumni to school internships, career opportunities, relocation assistance, and other professional development.

And of course, the IAA helps our classes plan their milestone reunions. This year’s IMSA Alumni Weekend will be held July 20 and feature our classes from ’93, ’98, ’03, and ’08. Our Saturday campus activities will include a luncheon for all of the IMSA community, tours of the campus, our annual IAA meeting where we will elect our new cabinet members, and much more!

Lastly, I want to thank Dr. McGee for his continued support of alumni long after they have left IMSA. As Dr. McGee moves on to his next phase in life, we hope our programs will also play a part in keeping him connected to IMSA as well.

To learn more about IAA activities or to get involved, please visit the IAA website at http://www.imsaalumni.org.

Melvin Bacani ’90  
IMSA Alumni Association President  
president@imsaalumni.org

Interested in serving on the Alumni Association cabinet? Elections will be held this summer for all positions. To learn more, visit www.imsaalumni.org.
Dr. Jill Mitchell ’89 is working as an oncology social worker in Boulder, CO, and is Vice President on the Board of Directors for MyLifeLine.org, a social networking tool for people living with cancer.

Dr. Sanza Kazadi ’90 recently served as the IMSA Hollister Leadership Lecture keynote speaker. The lecture, named in honor of Bernie Hollister, charter history and social sciences faculty, is part of IMSA’s Annual Leadership Symposium.

Christina Booker ’91 was named the Department Chair for Special Education for a middle school in Missouri.

Richard Tung ’93 and Kana Mizuno welcomed son and first child, Dean Takashi Tung, in August 2012.

Sam Yagan ’95 was named CEO of Match.com and was an IMSA Great Minds speaker at 1871 in Chicago, speaking about “The Need for Irrational Entrepreneurship.”

Joanna Messer ’97 is engaged to Tom Jordan, IMSA Physics faculty 1994-1998. The couple is planning a wedding for summer 2013.


Dr. Daniel Murariu ’99 was awarded a House of Legislature, State of Hawaii Proclamation and the 2012 Rotary Club Jerry Chang Peacemaker Award for local and international volunteer work.

Pearl Phavisaied ’99 served as a guest speaker at IMSA’s Veterans Day Program in November, sharing her experiences with the students, faculty and staff.

Jessica McAlear ’00 was inducted into the Worcester Polytechnic Institute Athletic Hall of Fame last October. She is the first rower to be given this honor.

Christopher Tessone ’00 and Sue Massey ’01 welcomed daughter Eleanor Blythe Tessone on March 7, 2013.

Mark Wrzyszczynski ’92, Stephen Paige ’00, and Alex Surasky-Ysasi ’03 spent a day with IMSA students in October for the Great Minds Program Alumni Panel on Engineering.

New books written by IMSA alumni:
Ramez Naam ’90 published Nexus: Mankind Gets an Upgrade and Ryan Littrell ’92 published his first book Reunion: A Search for Ancestors. Read more about these books and other alumni authors at: https://www3.imsa.edu/news/releases/2012/12/20/imsa-alumni-authors-release-recent-books

IMA Alumni Gather Nationwide

Seattle Alumni event featuring author Ramez Naam ’90 (March 2013)

San Francisco Bay Area alumni event hosted by Facebook (Dec 2012)

Chicago Students and alumni gather for the Chicago premiere of Jenny Deller’s (’94) film “Future Weather” (Feb 2013)

What’s New in Your Life?
Submit your class note online at: www.imsaalumni.org/notes
2013 ALUMNI AWARD WINNERS

The following honorees and alumni volunteers will be recognized at the Board of Trustees Alumni Awards Ceremony on Friday, July 19, 2013, which kicks off the activities of Alumni Weekend (July 19-20, 2013).

Alumni Trailblazer Award Winner:
B. SCOTT GAUDI, PH.D. ‘91

Dr. B. Scott Gaudi is an internationally acclaimed astronomer who has been involved with the discovery of nearly two dozen extrasolar planets. In 2008, Dr. Gaudi received worldwide media attention for leading a team of 69 international astronomers in the discovery of a “sized-down” Solar System. He was awarded the Helen B. Warner Prize for “significant contribution to observational or theoretical astronomy” by the American Astronomical Society and was named one of the “10 Rising Stars of Astronomy” by Astronomy Magazine. In 2011, Dr. Gaudi received the Presidential Early Career Award for Scientists and Engineers (PECASE), the highest honor given by the U.S. Government for science and engineering professionals in their early research careers. Dr. Gaudi has a B.S. in astrophysics from Michigan State University, and a M.S. and Ph.D. in astronomy from Ohio State University where he is an associate professor.

Alumni Titan Award Winner:
DWAN LAMAR PRUDE ‘97

Dwan LaMar Prude has unselfishly, tirelessly and graciously shared his time, talents and Titan spirit with the IMSA community. He has been a servant leader as he promotes IMSA, our PROMISE Programs, and the benefits of attending the Academy with great pride, passion and confidence. In 2012, Prude served as IMSA’s Convocation Speaker and that summer, he dedicated time to driving students from the Metro East area to/from IMSA, allowing their participation in the SEAMS program. In 2011, he co-coordinated an alumni mentoring and tutoring program in the Metro East area for 9th graders interested in math, science and IMSA. In addition, Prude regularly serves as an Admissions Review Committee member and his experience, knowledge and insights have been an invaluable asset to IMSA. Prude has a B.S. in Engineering Management – Industrial Engineering and an M.S. in Engineering Management – Quality Engineering from the Missouri University of Science and Technology (MS&T). He is currently pursuing his Doctorate of Biblical Theology from the Midwest College of Theology (MCT).

Alumni Distinguished Leadership Award Winners:
GRETCHEN E. GREEN M.D., M.M.S. ‘92

Dr. Gretchen E. Green is a physician leader who brings a combined focus on science and technology. Through her work with the American Medical Association (AMA), she achieved a modification to the existing AMA policy to help cover mammography reimbursement for breast cancer patients. Dr. Green has a Sc.B in neuroscience, M.M.S. in the history of medicine and pharmacology and an M.D. from Brown University.

KATHLEEN PLINSKE, ED.D. ’97

Dr. Kathleen Plinske is a distinguished educational leader with a passion for providing access to higher education to traditionally disadvantaged students. At a young age of 32, Dr. Plinske serves as President of Valencia College’s Osceola and Lake Nona Campuses in Kissimmee and Orlando, Florida, is responsible for all academic, administrative and fiscal leadership of the campuses. Recently named as the top community college in the nation by the Aspen Institute, the Osceola Campus serves 12,000 students per term, about 45% of whom are Hispanic. In 2009, she was selected to serve as the Interim President of McHenry County College and was named one of McHenry County’s “Top 10 Under 40.” Dr. Plinske has a B.A. in Spanish and physics from Indiana University, an M.A. in Spanish from Roosevelt University, an M.B.A. from the University of Florida, and an Ed.D. from Pepperdine University.

See photos and profiles of all of the 2013 IMSA Board of Trustees Alumni Award Winners!
IMSA TOPS IN WORLD MATH CONTEST

One team from IMSA received the highest ranking possible in the 15th annual international High School Mathematical Contest in Modeling (HiMCM). Their performance placed IMSA among the top eight schools in the world in this year’s competition.

The IMSA team of Summer Wu, Mary Do, Zi-Ning Choo and Grace Li received the rank of “National Outstanding.” Only eight teams out of 518 that competed worldwide received this ranking. The HiMCM is a 36-hour contest where each team is expected to solve a mathematical modeling problem.

IMSA JUNIOR WINS GOLD IN ROMANIAN MATH COMPETITION

IMSA Junior James Tao finished among the best in an international math competition, tying for 3rd place and winning a Gold Medal at the Romanian Master of Mathematics competition.

Held in Bucharest, this Olympiad level international mathematics contest featured 15 teams and 91 participants. The test consisted of a total of six questions that the contestants had nine hours to solve, the first half on March 1st and the second half on March 2nd.

James’s score was more than double the average score of the 91 participants, which was 16.6. In part because of his efforts, the US team finished first, edging out Russia 105-101.

IMSA STUDENT ONE OF FIVE INTEL SEMIFINALISTS IN ILLINOIS

IMSA senior Carrie Sha was among only five from Illinois and 300 in the nation who were named Intel Science Talent Search (Intel STS) Semifinalists in the Annual Intel Science Talent Search.

Often considered the “junior Nobel Prize,” the Intel STS recognizes the most accomplished students and their schools for excellence in science and mathematics. Sha, of Plainfield, was named a semifinalist based on her research project Development of Novel Sensor to Reduce Postural Kyphosis. Postural Kyphosis, or excessive spinal curvature (sometimes called hunchback) can be caused by poor posture, such as sitting at a desk.

IMSA SCIENCE BOWL TEAM QUALIFIES FOR NATIONALS

IMSA’s Science Bowl team, coached by Peter Clancy, received an all-expense paid trip to compete in the 23rd Annual U.S. Department of Energy National Science Bowl in Washington, D.C. after winning the regional Science Bowl tournament.

The IMSA Science Bowl team of Zi-Ning Choo, Siva Gangavarapu, Cammille Go, Saiyesh Rao, and Abhishek Sethi will now compete at the National Science Bowl which brings together thousands of middle and high school students from across the country to compete on a range of science disciplines including biology, chemistry, earth and space science, physics, energy and math in a fast-paced Jeopardy-style format.

SCHOLASTIC BOWL TEAM

For the third consecutive year, the IMSA Scholastic Bowl team won first place (Class AA) in the IHSA Scholastic Bowl State Tournament. IMSA’s championship Scholastic Bowl team members included: Sabrina Lato (captain), Saieesh Rao, Anton Karpovich, Siva Gangavarapu, Waleed Ali, Lael Costa, Rajiv Patel-O’Connor, Daniel Pechi, Molly Fane and Daniel Collins.

In the championship match, IMSA’s team defeated Loyola Academy with a score of 380-370.

IMSA JUNIOR NAMED RUSSIAN SCHOLAR LAUREATE

IMSA junior Anna Krzywiec was one of only 41 Russian students from throughout the country to be selected as the American Council of Teachers of Russian (ACTR) Russian Scholar Laureate for 2012.

Established in 2004 by the Board of Directors of the American Council of Teachers of Russian, the ACTR Russian Scholar Award provides an opportunity for schools and teachers of Russian to recognize one sophomore or junior each year as an outstanding Russian scholar.

IMSA STUDENTS EARN 1ST PLACE AT MODEL UN

IMSA students competed against 2,500 others at the Midwest regional competition of the national Model UN and walked away with first place awards. The students were Kevin Zhang, Lydia Auch, Taylor Imburgia and Kaylee Karumanchi.

www.imsa.edu
SAve THE DATE for the Following IMSA Events!

- **IMSA Class of 2013 Commencement**  
  June 1, 2013

- **Alumni Weekend**  
  July 19-20, 2013

**IMSA360** goes green

Help the IMSA360 magazine go green! If we have your current e-mail address, you will now receive a full color version to view online. If you’d still like IMSA360 mailed to you in print form and need to update your contact information, visit www.imsaalumni.org/360.

**View IMSA360 Online!**  
www.imsaalumni.org/360

---

**IMSA360**: Recipient of the National School Public Relations Association Award of Excellence, the Illinois School Public Relations Association Award of Excellence, the American Graphic Design Award and the Hermes Creative Award.