

OHIO MATYC NEWS

SPRING 2012

MESSAGE FROM THE PRESIDENT SANDY FRANZ, UNIVERSITY OF CINCINNATI

Dear OhioMATYC Member,

I want to thank everyone for their efforts in making this past year a success.

Our spring meeting will be at Maumee Bay Resort and Conference Center from April 20 – 21. This year we will be holding a joint meeting with MichMATYC, and the Statistics traveling workshop is tentatively scheduled to be part of the conference. I hope to see many old friends and look forward to making new ones. Please consider being a presenter. The speaker proposal form can be found on the back page of the newsletter.

I would like to encourage you to nominate a colleague for our teaching award, which will be given at the spring meeting. Many excellent teachers fill the ranks of our membership. Joel Helms was the recipient of the AMATYC scholarship for a first time attendee to the national conference in Austin, TX this past year.

Our 2011 Spring Conference at Punderson was a huge success. I would like to thank T.J. Duda for all of his efforts in organizing the event. A huge thank you also goes to Cengage Learning for hosting the Friday evening reception at the conference.

Finally, I would like to recognize a few OhioMATYC members for their involvement at the national level as project ACCCESS fellows. This year, the number of ACCCESS fellows who are also OhioMATYC members increased again as Derek Hiley (Cuyahoga) became a member of cohort 8. He joins past cohort members Jessica Lickeri (Columbus State), Kathryn Cerrone (Akron), Aaron J. Altose (Cuyahoga), Heather Bubnick (Lorain), Kris Ramsey (Columbus State) and Donna J. McNatt (Cuyahoga).

~Sandy Franz, OhioMATYC President



**OhioMATYC/MichMATYC
Joint Meeting
April 20-21 at Maumee Bay
near Toledo, OH
Register early and save \$10!**

Title: Sunset on the Marsh
Location: Maumee Bay State Park
By John K. Spears of Oregon, Ohio
2008 Life on Lake Erie Photo Contest

2011 OHIO MATYC SCHOLARSHIP WINNERS



OhioMATYC scholarships recognize outstanding mathematics students at two-year colleges in Ohio. The OhioMATYC student scholarship recognizes exceptional achievement, while the Rudy Sattler Memorial Scholarship recognizes outstanding developmental mathematics students. Congratulations to this year's scholarship recipients.

OhioMATYC Student Scholarships

Chase Maness, Columbus State (*pictured with Dr. Jonathan Baker*)
 Benjamin Christian, Edison Dakota McConaha, Zane State
 Bethany Potter, Rhodes State Britta Sharp, Columbus State

Rudy Sattler Memorial Scholarships

Latoya Alexander, Zane State
 Samuel Swisher, Rhodes State

UNIVERSITY OF TOLEDO'S MATH STUDY SKILLS COURSE

The need to learn mathematics is increasingly urgent for students today. Careers with good employment prospects that require neither college algebra nor statistics are increasingly rare. The challenge for college and university math teachers is to help students bridge the gap between their level of preparation and their aspirations. We observe from the attitudes and behaviors of students in developmental courses that many of them have not learned how to study math.

In the fall of 2010, we decided to pilot an 8-week, 1 credit hour math study skills course, Math 1190, to be a partner course with a credit-bearing, entry-level algebra course, Math 1200. Our initial statistical analysis of Math 1200 revealed that we could predict the likelihood of success based solely on a simple linear combination of ACT math score and High School GPA. Furthermore, for students whose placement score was low, especially those with relatively high ACT math but low GPA, we found that success was predicted solely by attendance in Math 1200. It became obvious that potentially successful students needed support to start developing study skills. For the pilot study, after adjusting for High School GPA and ACT math, students passing Math 1190 showed an increase of $\frac{1}{4}$ of a full grade point over students who did not take Math 1190.

Personally, I have had the chance to teach the course each semester. This fall we also added a couple online sections. I have seen more or less 2 basic responses from students who regularly attend, complete the work in, and pass Math 1190. The first is a basic nominal attitude. Students feel much of the study skills content is common sense, but they appreciate the extra help and review of the foundational algebra skills covered in the course. The second response is very positive in regard to all the content including students expressing their appreciation of how to study math and having some better tools to deal with issues like math anxiety and effective preparation for tests. We plan to give more extensive reports and to give a presentation at the next meeting in April about the Math 1190 course and our additional findings.

Submitted by Greg Lewis, Dr. Paul Hewitt, Dr. Donald White, University of Toledo

PROBLEM CORNER

The following are sample problems from the AMATYC Faculty Mathematics League Competition held each year during the national AMATYC conference. This year, faculty contestants had 50 minutes to complete 18 problems and the top three scorers were recognized at the awards breakfast. Congratulations to OhioMATYC's own T.J. Duda for placing 2nd this year! Solutions can be found on our website, www.ohiomatyc.org.

1. If the line with equation $y = 2x + 5$ is reflected about the line with equation $y = x + 1$, the reflected line has the equation $y = mx + b$. Find $m + b$.
2. Different shades of pink, red, and white can be made by mixing whole numbers of quarts of red and/or white paint. Shades are different if the ratio of red to white paint is different. Find the number of different possible shades that can be made from at most 6 quarts of red and 5 quarts of white paint.
3. If $x + y = a$ and $x^2 + y^2 = b$, the expression $x^4 + y^4$ can be written as a polynomial of the form $pa^4 + qa^2b + rb^2$ where p , q , and r are rational constants. Find pqr .

A MESSAGE FROM THE MIDWEST VICE PRESIDENT OF AMATYC NANCY SATTLER, TERRA COMMUNITY COLLEGE

Greetings from your Midwest Vice President, Nancy Sattler! I hope that you are looking forward to the New Year and the start of a new term. If you are not a member of the American Mathematical Association of Two-Year colleges (AMATYC) I would like to make you aware of some of the activities that you may participate in as an AMATYC member. The Annual AMATYC Conference, a series of webinars and the AMATYC committees offer many opportunities for you to advance your mathematical knowledge and network with your peers across the United States and Canada. In addition, AMATYC members receive the *AMATYC News* and *MathAMATYC Educator* publications during the year.

AMATYC has begun a series of free webinars for its members. The first webinar was offered this past February entitled *Unleash the Power of Your Tablet PC* presented by AMATYC member Fred Feldon. Other webinars offered and now captured for viewing include *Action Research*, *Sequence Convergence*, *Statway and Quantway*, *Mathematics of Video Games*, *Wolfram Alpha*, *The Common Core*, *Teaching Developmental Mathematics*, *Making Calculus Come Alive*, *Flipping the College Classroom*, *Using Angle Measure to Foster Connections in Trigonometry*, *Guided Reinvention of Series Convergence and Taylor Series Convergence*, and *Playing with Multivariable Calculus using 3D Glasses*. If you missed any of these webinars, you can find them on YouTube by going to <http://www.amatyc.org/publications/webinars/index.html> and clicking on the appropriate link. Watch your email for future attractions!

AMATYC has 9 committees: Developmental Mathematics, Division/Department Issues, Innovative Teaching and Learning, Mathematics for AAS Programs, Statistics, Mathematics Intensive/College Mathematics, Placement/Assessment, Teacher Preparation, and Research in mathematics Education for Two-Year Colleges. Although the committees meet annually in person at the AMATYC conference, they do most of their work during the year through emails, websites, and Google groups. If one of these areas is of particular interest to you, read more about the committees at <http://www.amatyc.org/committees/index.htm>. Contact information for each committee chair is listed on the website.

AMATYC offered two publications to its members: the *MathAMATYC Educator* and the *AMATYC News*. The *MathAMATYC Educator* is a referred publication of AMATYC. Abstracts of the articles in past issues of the *MathAMATYC Educator* can be found at <http://www.amatyc.org/publications/mathamatyceducator/index.html>. The *AMATYC News* contained articles on teaching, activities used in the classroom, results of grants and hints to help mathematics faculty spend their professional time more productively. An archive of past newsletter articles can be found at <http://www.amatyc.org/publications/AMATYC-News/index.htm>. AMATYC welcomes articles for each of these publications. If you have an article of interest, please be sure to submit it following guidelines available on the web.

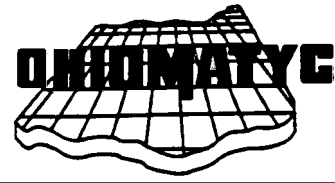
Next year's AMATYC Annual Conference will be held November 8 through 11 in Jacksonville Florida. The theme, *River of Knowledge, Ocean of Dreams* reflects both the unique physical setting for the conference as well as the professional development available through a wide variety of outstanding presentations designed to challenge and inspire conference participants. Proposals for the conference are now being accepted electronically through the AMATYC website. Ohio has always had great representation at the AMATYC conference. I hope that you will consider submitting your proposal or consider volunteering to be a presider at the Jacksonville conference.

Jim Ham will become the new Midwest Vice President as of January 1, 2012 and I will become President-Elect. I thank you for your support of AMATYC in the past and look forward to seeing many of you in April at Maumee Bay State Park for the Annual OhioMATYC meeting!

If you are already a member of AMATYC, you are well aware of what AMATYC has to offer. If you are not yet a member, I encourage you to visit the website at <http://www.amatyc.org/> and become a member.

TEACHING ANNOUNCEMENT

Owens Community College will be accepting applications for three new full-time teaching positions in the Mathematics Department. One position is for teaching credit mathematics at the Findlay Campus while the other two positions are for developmental mathematics at the Toledo (Perrysburg) Campus. Application instructions and detailed requirements and expectations are found on the Owens website at www.owens.edu.



2012 OHIO MATYC SPRING MEETING INFORMATION

Location: Maumee Bay Lodge and Conference Center

Website: <http://www.maumeebaystateparklodge.com/>

Tentative Schedule Lunch and registration begin at 11 AM on Friday, April 20, with sessions beginning at Noon. The sessions will conclude at 12:30 PM on Saturday, April 21.

Lodging Info:

Manor rooms are \$105/night + tax. Make your reservations by calling 800-AT-A-PARK (800-282-7275). Ask for the OhioMATYC block at Maumee Bay.

Registration: \$40 before March 19/\$50 after March 19

2012 OHIO MATYC TEACHING AWARD

Consider nominating one of your colleagues for the 2012 OhioMATYC Teaching Award, designed to recognize an OhioMATYC member who has made outstanding contributions in the classroom. More details and the nomination form can be found at www.ohiomatyc.org.

Send nominations to:

Sandy Franz
2855 Campus Way ML 0025
Cincinnati, OH 45206

Nominations are due March 1, 2012.

**OHIO MATYC / MICH MATYC JOINT CONFERENCE
SPEAKER PROPOSAL FORM
MAUMEE BAY LODGE & CONFERENCE CENTER
APRIL 20 & 21, 2012**

Name _____ Mailing Address _____

School/ Institution _____ Phone _____

Email (required) _____ Co-Presenter (s) _____

Title of Proposed Session _____

Description (50 words or less) _____

Proposed Session Length: 20 minute 50minute

Preferred Day of Presentation: Friday Saturday

Equipment Needs: _____

You can fill out this form online at www.ohiomatyc.org or return a written copy to: **Sandy Franz, University of Cincinnati,**

3445 Drake St., Newtown, Ohio 45244 Phone: (513) 556-4286, e-mail: sandy.franz@uc.edu.

DEADLINE FOR SPEAKER PROPOSALS IS February 29, 2012