

# NOTICIAS de TODOS

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**The mission of TODOS: Mathematics for ALL is to advocate for an equitable and high quality mathematics education for all students—in particular, Hispanic/Latino students—by increasing the equity awareness of educators and their ability to foster students' proficiency in rigorous and coherent mathematics.**

## Introducing the New President of TODOS: Nora Ramirez

As I write my first column as President of TODOS, I reflect on how we founded this organization in 2003 and how much has been accomplished by this organization under the leadership of Miriam Leiva. As you know Miriam was honored as the recipient of the 2008 TODOS Iris Carl Award in April (see page 10), and her leadership continues to be recognized. In October, she received the North Carolina 2008 Latino Diamante Award in honor of her contributions to the Latino Community. I know that I speak for our members in saying to Miriam, congratulations again and thank you for the dedication and hours upon hours of work for the organization, our membership and the many students we are organized to support.



This past spring we published our first research monograph, *Promoting High Participation and Success in Mathematics by Hispanic Students: Examining Opportunities and Probing Promising Practice*, which was sponsored by the National Education Association (NEA). I hope that you found the articles informative and useful in your work. The NEA is generously supporting the development and publication of a second monograph, which will focus on assessment. We are grateful to NEA and Andrea Prejean, Senior Professional Associate of Science and Mathematics for Student Achievement for her support and efforts in publishing and disseminating the monograph. Please consider submitting an article for the second research monograph (see page 10).

In addition, I wanted to let you know that TODOS has been involved in some initial work both for and with classroom teachers. Two examples of this are the TODOS/TI project and lesson studies in schools with TODOS members. In collaboration with Texas Instruments, TODOS teachers and T<sup>3</sup> instructors developed middle school mathematics lessons requiring the use of the TI-Navigator and emphasizing strategies for English Language Learners. The lessons are currently in the pilot stage primarily in California under the leadership of TODOS members Michael Lutz, Susie Håkansson, and José Franco from TODOS and Rick Tunstall and others from TI. You will hear more about these lessons as they are perfected and ready for the next phase.

Ramirez, continued on p.2

This past school year, the Cartwright School District in Phoenix with the support of TODOS initiated a professional learning community (PLC) of middle school teachers who taught mathematics to English Language Learners (ELLs). Meeting monthly for a year the middle school teachers learned strategies to teach ELLs, discussed issues of equity, dug into mathematics, and tried strategies in their classrooms. They attended a Lesson Study conference and then planned two lessons, which culminated in public research lessons in September. The lesson observers and members of the PLC found both collecting and discussing data to be an effective method of focusing on teaching mathematics to English learners. A comprehensive report is forthcoming. Similar professional development activities were supported by TODOS at Navajo Elementary School in Albuquerque, New Mexico in the past (see the Spring 2005 *Noticias de TODOS* for additional information). While these projects in Arizona and New Mexico address our goals, they are impacting a small number of teachers and students. It is the intent that these pilot projects be used to gain information and make strategic decisions on what TODOS can do to directly impact teachers and students possibly laying the foundation for planning for and requesting funding for future projects.

Some encouragements to our membership:

- In renewing your membership to NCTM online ([www.nctm.org/membership](http://www.nctm.org/membership)), consider identifying TODOS as the affiliate to receive a rebate.
- Please respond to the survey later this fall requesting your input on areas of involvement that interests you.
- Continue to use [memberclicks.com](http://memberclicks.com) to bring up discussions, answer inquiries and give your opinion.
- Encourage others to join TODOS and to use the TODOS website as a resource.
- Actively participate in the nominations and elections process. A President-Elect and Member-at-Large will be elected this year (see page 6).

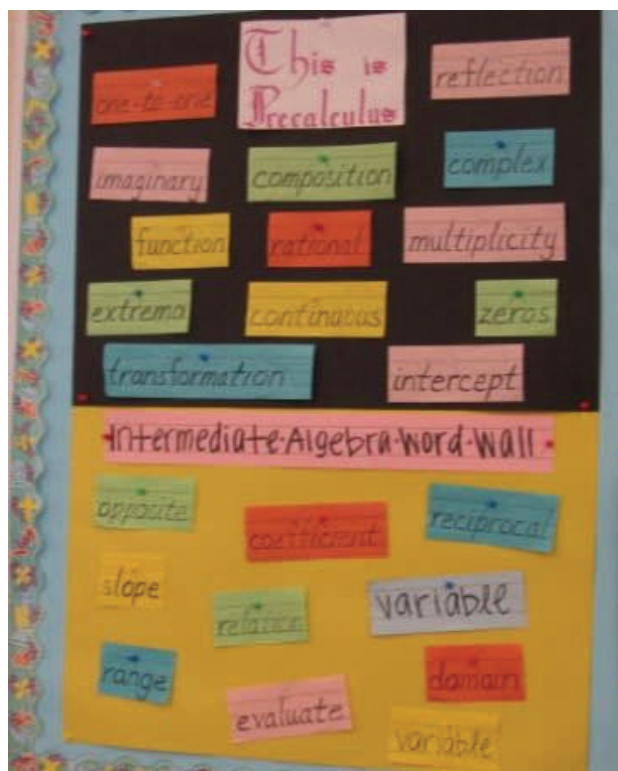
As TODOS continues to grow, we will focus on developing opportunities for our membership to be involved in working on our common goals of enhancing teaching and learning, building leadership capacity, linking research and practice, and informing and engaging the community. It will take us ALL—TODOS—to reach these goals.

## Supporting Vocabulary Development in the Secondary Mathematics Classroom

By Marika Manos and Deandrea Murrey

According to NCTM, “all students should have the opportunity and the support necessary to learn significant mathematics with depth and understanding” (2000, p. 50). A mathematics teacher with the goal of providing significant learning opportunities in mathematics for all students must also provide explicit language instruction for students learning English (Rothenberg & Fisher, 2007). One part of language instruction is vocabulary development. Primary school teachers commonly use “word walls” (Cunningham, 1995) to assist in students’ understanding of vocabulary. In mathematics, students learning English are also learning the vocabulary of mathematics. A word wall can serve as a support for the development of mathematical academic language.

A word wall is a designated area of a classroom selected to post vocabulary words and can be in a variety of forms. A word wall can be a physical wall in the classroom or a chalkboard or whiteboard. Words could also be suspended on a line, on a free-standing screen, on a paper banner, on a bulletin board, or across a window. Initially, the word area should be empty, and vocabulary words are introduced to the area as they are



Word Walls created by  
Precalculus and Intermediate Algebra classes

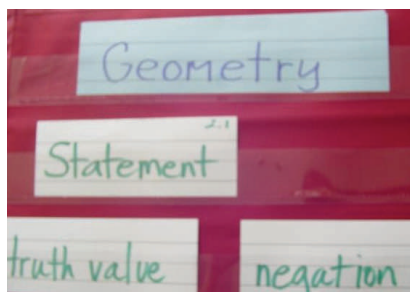
used and discovered in the mathematics classroom.

There are many ways to learn vocabulary in mathematics. Vocabulary can be introduced before a lesson for words related to known concepts. Mathematics vocabulary for known concepts may be added to the word wall as they are used in classroom discussions. The teacher must make sure all students understand the meaning of the word. The word can be translated, students can offer a synonym, the teacher can point to the object or a picture or an explanation of the meaning of the word may be offered. Since the concept is known before the word is added to the word area, the student is learning the word to label the concept.

It is important to introduce words related to unknown concepts during the lesson as the concepts are being learned (Garrison & Mora, 1999). Once a concept has been learned, the teacher may offer the word used for the concept, such as slope, and ask the students to decide on a more formal definition. The students work in groups to define the word, share their definitions and decide on a class definition. After the class has decided on a definition, the word and the definition can be posted on the word wall.

Another way to introduce vocabulary during a lesson is through the presentation of an example and a non-example. The use of an example and non-example can be found in *Discovering Geometry* (Serra, 1993). For instance, students are given pictures of angles and objects that are not angles. Again, the students work in groups to write a definition and then, the class comes to consensus. The class then posts the word on the wall.

Words can remain on the wall for the unit, semester or year depending on the needs of the students. Students refer to the wall as they are working in the mathematics classroom. Teachers can refer to the wall and ask students to use the words on the wall when they are talking, writing or reading in the mathematics classroom. Even after the word has been removed from the wall, students use the word wall as a visual cue. In this way, all learners, especially English language learners have a cognitive tool to utilize as a reminder of the learning of a concept.



Moreover, it is the responsibility of every mathematics teacher to provide access to the mathematics for all students. The mathematics teachers must teach the mathematics academic English to all students, especially to English language learners, and a word wall is a strategy to promote understanding of the academic language of mathematics. Students can use the word wall to support their understanding of the language of mathematics that is written, spoken, read or heard.

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### NOTICIAS de TODOS

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**Please send news or articles of interest (teaching or research related) to: Larry Lesser, Lesser@utep.edu.** Submissions are accepted on a ongoing basis. The submissions should be no more than 4 pages, double spaced and 12 pt font. Pictures and graphs are welcome. The articles can be on any topic related to the mission of TODOS. Use the subject line: TODOS NOTICIAS

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# Mayan Mathematics: Connecting History and Culture in the Classroom

By Joseph M. Furner

Just south of West Palm Beach, FL, in the City of Lake Worth, is one of the largest populations of Mayans outside of México and Guatemala. Schools like Highland Elementary School in Lake Worth on average have 93% English Language Learners (ELL), many whose parents are from México, Guatemala, and Central America originally, but with their children born here in South Florida. It is important that schools recognize the heritages of their populations now in the USA. Math can be made more meaningful for these ELL students and all students when educators make meaningful historical and cultural connections to the math they are learning while valuing the heritage of a large population of the students.

The study of the cultural and historical contexts of ancient civilizations can be an intriguing way to introduce students to the evolution and logic of today's mathematics (Bidwell, 1993; Furner, Doan-Holbein, & Scullion-Jackson, 2000; Furner, 2008; Zaslavsky, 2002; Farmers & Powers, 2005). While people in Europe were struggling with the Roman numeral system whose symbols lacked both representation for zero and a calculated correlation with the numbers they represented, the Mayans in Mesoamerica were developing a system which modern day scholars find to be sophisticated, beautiful, and logical (Gilbert, 2006; Hand Clow, 2007). The Mayans invented a counting system which could represent very large numbers by using only 3 symbols: a dot, a bar, and a shell symbol for zero (see Figure 1).

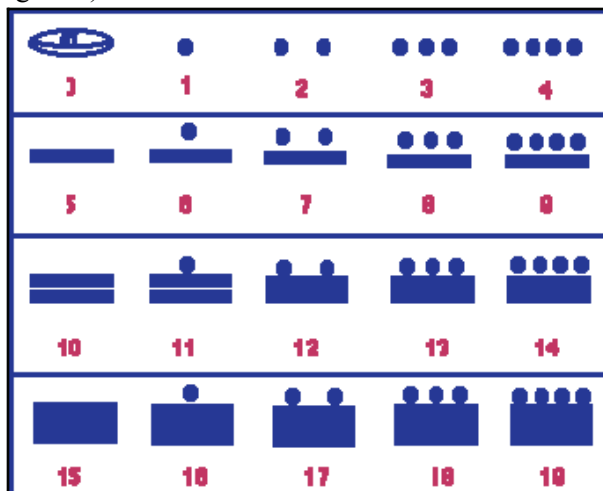


Figure 1.  
Mayan Number base-20 System

The following lesson can serve to bridge historical and cultural connections while our students learn mathematics:

## Mayan Mathematics Lesson Plan

The following are suggestions for incorporating the historical context and symbolic notation system of the Mayans into a teaching unit (see Figure 2). The lessons might be taught from an interdisciplinary, integrated curriculum perspective, and modified to meet age appropriate needs of the students. This lesson too can serve in reinforcing concepts related to place value and number systems with different bases in mathematics. The strategies specifically include effective learning techniques for ELL students or English for Speakers of Other Languages (ESOL) but also brings to the learning meaning for all students involved.



Figure 2.  
Students making base-20 corn stick counters

The students create base-20 Mayan counters with corn kernels and popsicle sticks as the teacher guides and questions them. The students make base-20 Mayan corn stick counters to learn about place value and base-20. The students glue corn kernels on popsicle sticks to make base-20 counters to learn about Mayan mathematics and place value.

## Objectives

Students will:

1. Explore similarities and differences of number systems from other cultures, particularly the Mayan system.
2. Calculate place value with base-10 and base-20 systems.
3. Reinforce student understanding of place value.
4. Apply student technology skills.
5. Develop an appreciation for the culture and math of the Mayans.

## Menu of Motivation (Initiating) Activities

1. Pairs of students (one of which is an ESOL student) will take a web quest and visit websites to read about Mayan numerical systems.

2. Students view the video *Mystery of the Maya*
3. Students meet in discussion groups. Possible topics for discussion might be:
  - a. defining terms such as decimal system, non decimal system, place value.
  - b. describe similarities and differences between (among) systems.

Menu of Core Activities:

1. Create Mayan manipulatives to use in Mayan calculations.
2. Calculate and solve problems using their Mayan manipulatives.
3. Create and solve coded puzzles (see Example 1).
4. Read literature which relates to cultural differences in mathematics (particularly Mayan Mathematics). Suggested books are *Arithmetic in Maya* and *Skywatchers of Ancient Mexico*.
5. Develop and refine discussion groups and paired activities. Possible questions:
  - a. Can you translate Mayan numbers into our numeral system?
  - b. How about translating our numbers into Mayan numbers?
  - c. Why do you think the Mayans chose a base-20 numeral system?
  - d. How does the Mayan system compare to that of the Egyptians or Romans?
  - e. Why do you think the Mayans chose a seashell to symbolize zero?
  - f. What symbol for zero would you choose? Why?
6. Practice writing Mayan numerals 0 to 100.
7. Write reflective essays on web site visits.
8. Create a fictional number system with a unique base and symbols.
9. Keep a journal of math activities and ideas.
10. Illustrate Mayan mathematics with a selected artistic medium such a magazine photo collage, penciled sketch, etc.
11. Locate additional books and websites about Mayan math and other math systems.
12. Invite parents and selected community guest speakers who are knowledgeable about the Mayan or other number systems (in Lake Worth, FL we have the Guatemalan-Mayan Center).

Example 1 Can you translate this into an equation using our base-10 number system?



Example 2 Can you write the number 103 using the base-20

## Notes from the Membership Committee

By Bob MacDonald, Membership Committee Chair

Be on the lookout for a monthly email from Noemi Lopez, one of TODOS' Members-at-Large. This Electronic News is sent through our online database hosted by memberclicks.com. A few members have stated that they are not receiving electronic communication from TODOS. If this is the case and you have an institutional email address, you might need to check with your IT department and request that mail from memberclicks.com not be blocked.

The website has a number of areas accessible only to members. To reach these, you will need to login with a user name and password. When you go to the website [www.todos-math.org](http://www.todos-math.org), you will see a small "login" link in the upper left hand corner. If you don't know your username and password, there is a "forgot your password" link that will ask you to enter your email address. You will be sent the information you need. Once you are logged in, you will see a number of new choices under the members tab at the top of the page. The FAQ tab is very helpful if you wish to change your password, email address or mailing address.

One item on the members area of the website is discussion boards. The thought was that discussions previously on the E-list would occur there. While this has not yet been the case, there are some interesting posts on the boards, and perhaps over time the some discussions will move there. When you have some time, I encourage you to visit this section of the website.

From time to time, the TODOS E-List, or listserv, has generated a lot of activity and interesting and thought provoking discussions. If this email activity is not what you want, please do not "reply all" asking to be taken off of the E-List, as this generates more email and does not add anything to the discussion taking place. You can remove yourself from the list serv once you have logged into the website by following the directions on the FAQ tab. Or, you can email me at [mac@todos-math.org](mailto:mac@todos-math.org) and I will change your listserv preference. Another option is to join the digest E-List - a weekly compilation of E-List activity.

Most of us are members in our state and local NCTM affiliates, and some are in leadership positions. While TODOS is well represented at the large conferences in California and Texas, there are many smaller conferences where we would like to get the word out about TODOS. If you are able to help in this area, let me know and we will provide you some materials for your conference.

Thanks for being a member of TODOS: Mathematics for All.  
Your support is important and truly appreciated!

Furner, continued on p. 6

(Furner, continued)

Mayan Number system? (Remember to write from top to bottom, group in 20's, and use Mayan symbols.)

#### ANSWERS:

Example 1:  $6 + 7 = 13$

Example 2:

(Remember to leave a little space between the 20's place and 1's place.)



The lesson plan suggestions include provisions which are appropriate for all students/grade levels and especially ELL students. Realia and demonstrations develop vocabulary through WebQuests, literature, and study of artifacts of the culture. Prior knowledge and background are enriched through the study of the historical context of the evolution of number systems while developmentally appropriate activities using manipulatives provide concrete examples which reinforce concept development.

Exploring various media such as drawing, painting, sketching, and creating collages addresses learning styles and promote creativity. Discussion about readings, web quests/field trips (actual or Internet), activities, and guest speakers prompt analytical and critical thinking as well as metacognition by encouraging students to verbalize their perceptions of learning. Interdisciplinary and cultural connections are established through historical and literary readings, discussions of economic and marketplace functions, and explorations of artistic and scientific contributions such as the Mayan calendar.

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Sanchez, G. (1971). *Arithmetic in Maya*. San Diego, CA: Author.

##### Video/Film:

Howell, B. (1995). *Mystery of the Maya*. In Canada: Developed jointly from The National Film Board of Canada and The Canadian Museum of Civilization and in México: The Instituto Mexicano de Cinematografía.

##### Internet Websites for Mayan Mathematics:

<http://www.hanksville.org/yucatan/mayamath.html>  
<http://hanksville.phast.umass.edu/Yucatan/mayamath.html>  
<http://www.michielb.nl/maya/math.html>  
<http://mathforum.org/k12/mayan.math/>

#### Elections for President-Elect and Member-at-Large

By Ed Dickey,

Nominations and Elections Committee Chair

The Nominations and Elections Committee is CALLING for NOMINEES for the office of President-Elect and a Member-at-Large of TODOS. Please survey potential nominees for approval and acceptance of nomination. Self-nominations are also acceptable.

Email the two-page nomination form (available at <http://www.todos-math.org/elections.html>) to [elections@todos-math.org](mailto:elections@todos-math.org) or fax to 803-777-3193 no later than **November 15, 2008**.

#### Qualifications:

Candidates must be members in good standing of the organization for at least one year before being placed in nomination. Candidates should have held or should currently be holding a position of mathematics education leadership at either the local, state, or national level, and they should support the TODOS Mission.

Candidates for the office of **President-Elect** should be committed to holding the position for one year, commencing April 2009, before assuming the office President in April 2010 for a two-year term.

Candidates for the office of **Member-at-Large** should be committed to holding the position for the entire term of three years, commencing April 2009.

#### Internet Websites for Mayan Numbers:

<http://www.niti.org/mayan/lesson.htm>  
[http://www.vpds.wsu.edu/fair\\_95/gym/UM001.html](http://www.vpds.wsu.edu/fair_95/gym/UM001.html)  
<http://www.cmcc.muse.digital.ca/membs/civiliz/maya/mc05eng.html>

#### Internet Websites for History of the Mayans:

<http://www.cancunsteve.com/mayan.htm>  
[http://www-groups.dcs.st-and.ac.uk/~history/HistTopics/Mayan\\_mathematics.html](http://www-groups.dcs.st-and.ac.uk/~history/HistTopics/Mayan_mathematics.html)  
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**Joseph M. Furner, Ph.D.** is an Associate Professor of Mathematics Education at Florida Atlantic University in Jupiter, Florida. His research interests are related to math anxiety, teaching to diverse learners, and best practices for teaching mathematics. Dr. Furner has worked as a K-12 educator and teacher trainer for the past 20 years in New York, Florida, México, and Colombia.

## Introducing the New Vice President of TODOS: Tod Shockey

Dr. Tod Shockey ([Shockey@math.umaine.edu](mailto:Shockey@math.umaine.edu)) is a mathematics educator in the Department of Mathematics and Statistics at the University of Maine. Prior to working in higher education, Shockey was a secondary school teacher. Shockey's research focus is in the field of ethnomathematics and in that vein he is a co-editor for the *Journal of Mathematics and Culture* (<http://nasgem.rpi.edu>), an online refereed journal sponsored by the North American Study Group on Ethnomathematics.



The ethnomathematics agenda situates itself toward a more equitable mathematics education for all students. One of Shockey's goals working for TODOS is the development of a set of ELL/Mathematics standards that he was asked to spearhead at the Spring 2008 TODOS board meeting. This endeavor is a collaboration of TODOS members that bring their rich expertise together in a meaningful way that will serve the Mathematics for All agenda exceptionally well.

## Equity, Social Justice, and the Mission of TODOS

By Larry Lesser

Equity has recently drawn much attention in mainstream mathematics education, as reflected by the first Mathematics Education Equity Summit (hosted by NCTM in February 2008 and also attended by representatives of AMTE, BBA, NASGEM, NCSM, TODOS, and WME), the first leadership principle of NCSM (2008b), the position statement by NCTM (2008), the inauguration of the Iris M. Carl Equity Address (at NCTM's 2008 Annual Meeting), the professional development focus for 2008-09 by NCTM, and classroom explorations (e.g., McCoy 2008).

TODOS' mission advocates for an *equitable* mathematics education. Having to ask for something equitable, however, suggests that there have been inequities and that addressing them is a matter of social justice. Indeed, the first *Standards* document of NCTM (1989, p. 4) asserts: "The social injustices of past schooling practices can no longer be tolerated." Unfortunately, some inequities persist in varying degrees and forms. For example, public schools in heavily-minority neighborhoods are less likely to be well-funded or have teachers who are highly qualified or certified in the subject they are assigned to teach (Flores 2008). And the report by The Education Trust (Arroyo 2008) shows that high-ELL districts generally receive less financial support than do districts with few or no ELL students.

Complete understanding and attainment of equity, therefore, is not possible without the perspective of social justice. An explicit connection between equity and social justice also appears in the position paper of NCSM (2008a, p. 1):

"We believe inequities caused by lack of student access to mathematical knowledge and the opportunity to learn this mathematics knowledge must be addressed using a systematic process. This can best be accomplished when all mathematics educators respond to equity as a meaningful process to address social justice issues of race, language, gender, and class bias."

The equity model of Gutiérrez (2008) entails not just equality on conventional measures of access and achievement, but also empowerment of students to use their dis-

Lesser, continued on p.8

Lesser, continued

tinctive strengths and mathematics tools to address social problems or injustices where they live.

Nevertheless, some individuals express discomfort about connections between equity and social justice, labelling the latter as unduly radical, communist, etc. So the aim of this article is to reflect on how social justice connects to the TODOS mission in more than just a narrow “radical” way. Last year, at the first annual Conference on Math Education and Social Justice (attended by over 500 participants from a broad spectrum nationwide), TODOS was an official partner/exhibitor and had members who gave talks, including plenary panel speaker Rico Gutstein. Gutstein is a prominent leader in social justice math and his work (e.g., Gutstein and Peterson 2005, Gutstein 2006) inspired the first comprehensive application to the context of statistics education (Lesser 2007).

Those new to the topic could start with Murrey and Sapp (2008) and then move on to the aforementioned Gutstein or Lesser references. Two distinctive features of Lesser (2007) are its extensive, readily browsable resources (because the article is electronic) and also how it situates the topic among mainstream precedents -- as potentially neutral or apolitical as mainstream curriculum. Lesser (2007, p. 10) illustrates this claim with this question from Long Island University Professor Kathleen Kesson:

“Why is there an assumption that people who wish to bring real world social justice issues into the math curriculum are any more ‘ideological’ than teachers who teach from a math textbook in which the word problems feature product placement for Nike shoes, Barbie dolls, or Cocoa Frosted flakes? Both approaches claim that their goal is ‘relevance’. While the former might actually get students to think about housing patterns or the incidence of asthma in their neighborhoods, the other seems geared to encourage mindless consumption. Now isn’t that just a tad ideological?”

In a related spirit, Eglash (2008, p. 11), while making a case for ethnomathematics in the classroom, states:

“While the political right has a tradition of covering up the human rights violations of capitalism, the political left has been guilty of avoiding critique of human rights violations of socialism.....We need not worry about imparting some particular political line in order to convey social justice; it is enough to provide students with the tools of thought and the information about the

world that will allow them to make their own decisions.”

And regardless of an educator’s own beliefs about any particular context, she can always play devil’s advocate to encourage students to develop their own reasoning skills by asking questions like “What other interpretations are consistent with this data?” or “What further data would you need to collect to investigate that conjecture you just made?”

Educators can integrate social justice into curricula in a variety of ways and there is a continuum of levels of involvement, ranging from having students apply predetermined statistical methods to predetermined datasets to offering students opportunity to discuss the context, choose the social justice topic(s), and find (or even collect) the data.

While offering equal opportunities to learn is itself a matter of social justice, social justice can also play a role in helping engage less-motivated students by offering curricular contexts authentically and perhaps connected intimately with their own reality. For example, there was recently a story in the *El Paso Times* with the headline “Study: Hispanics, blacks pay more for mortgages.” Students seeing such articles should feel empowered to apply their mathematics knowledge to explore what this story says and doesn’t say. Perhaps this is one way to move students toward “rigorous and coherent mathematics” as the TODOS mission demands. When Kitchen (1999, p. 321) asked his pre-service high school teachers to look at each day’s local newspaper over a two-month period to examine what types of articles incorporate statistics, they found the most common theme in the articles was race or ethnicity and that “the more relevant that the data were to the students, the more willing that they were to analyze the data.”

Finally, all teachers – regardless of their level of commitment to social justice -- must be prepared to address how students’ concepts of “fairness” may impact how they encounter standard mathematics concepts. For example, consider the “fairness” of random assignment of treatments in the context of doing experiments. Vogt (2007) presents a counterargument some students may believe that treatment resources should be assigned to be neediest students or patients, not the luckiest. Also, Shaughnessy (2007, p. 985) reports on research by himself and others that shows that precollege students do not value randomization in surveys because they find it “unfair” that each student doesn’t get to choose whether to be in the survey or if a random sample does not happen to pick students



from all possible subgroups.

Even when eight inservice secondary school teachers in the author's graduate mathematics education research class were asked to evaluate the results of a random sampling process from a given hypothetical school population, five of them gave answers that focused not on the purpose of the survey or on the randomization in the process, but on the bottom line of whether all demographic groups were represented or represented in proportion to the population. So, the values of social justice people already have when they enter the classroom can impact the learning process.

In summary, social justice is not only a goal consistent with the TODOS call for equity, but it can even also be a vehicle, through supplying meaningful real-world contexts that motivate commitment to mathematics/statistics as a set of tools (e.g., proportional reasoning, expected value, probability, regression, etc.) that allow us to identify and quantify inequities that help us understand (and maybe even improve) some of our society's most profound or pressing problems. Engaged by these topics, students may want to be more meaningfully engaged with our subject and with our world and thus help make our subject matter (Lesser 2007).

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**Larry Lesser**, a TODOS member and University of Texas at El Paso Associate Professor since 2004, has given TODOS-strand talks at CAMT, NCSM, and the Conference on Math Education and Social Justice. His homepage ([www.math.utep.edu/Faculty/lesser/](http://www.math.utep.edu/Faculty/lesser/)) includes many resources for making mathematics more interesting, meaningful, and accessible, including a webpage on Equity/Social Justice.

*Editors' Note:* Dr. Lesser was asked to become a co-editor of *NOTICIAS de TODOS* after this piece was accepted for publication in the Fall 2008 issue.

## TODOS Iris Carl Equity and Leadership Award 2008

*This is a copy of the talk presented at the Annual Meeting of TODOS in Salt Lake City in April 2008.*

Buenos Tardes,

I am Carey Bolster and was privileged to serve as Chair of the Iris Carl Leadership and Equity Award for 2008. We had an outstanding committee and I would like to recognize each person who served on the committee: Naomi Lopez, Rochelle Gutierrez, Madeleine Long, Guillermo Mendieta, Cathy Seeley, Ed Silver, and Rick Silverman.

Naomi, Rochelle and Shirley Frye did a lot of the behind the scenes work to keep me straight ...they had limited success. Thanks to all the members of the Selection Committee for their valuable contributions.

The TODOS Iris Carl Leadership and Equity Award was established to recognize an individual who has made significant contributions to the quality of mathematics education provided to underserved students, in particular to Hispanic/Latino students. The honoree is a mathematics educator who exhibits commitment to improving the mathematics education for all students and has made, or is making, unique contributions that have impacted equity and access for underserved students. The individual's work in improving mathematics has influenced the school, community, leaders and practitioners and its impact has been sustained.

The first winner was Guillermo Mendieta in 2006 and last year's winner was Ed Silver for 2007.

In the next 4 hours I will briefly outline the accomplishments of this year's winner. The winner is a secret that even the committee doesn't know. I will give you a list of clues, and as soon as you know the recipient of the Iris Carl Leadership and Equity Award for 2008, shout out the name!

OK, Clue #1 only has a few words: "She helped found TODOS and served as its first president."

The audience shouted, "*Miriam!*"

I said, "I guess the rest of the clues aren't important."



**Miriam Leiva receives the 2008 Iris Carl Award at NCTM 2008 in Salt Lake City. (From left to right: Katie Leiva, Miriam Leiva, and Carey Bolster)**

## Call for Articles for the Second TODOS Research Monograph

Introduction to the second TODOS Monograph:

*TODOS: Mathematics for All* is an affiliate of NCTM that was initiated in 2003 to advocate for an equitable and high quality mathematics education for all students, particularly Hispanic/Latino students. The Research and Publications Committee, a standing committee of TODOS has initiated an annual research-based monograph that focuses on issues related to diversity and equity in mathematics education. The second TODOS monograph is a joint effort of TODOS and the National Educational Association (NEA). The monograph will appear in print in 2009.

Focus of the second TODOS Monograph:

The Research and Publications committee of *TODOS: Mathematics for All* requests the submission of manuscripts for potential inclusion in the second monograph of TODOS. The focus of the monograph will be on the assessment of Hispanic/Latino students in mathematics. The monograph will inform the education community and policy makers about large-scale assessment formats and classroom-level assessment strategies that foster or have the potential to foster greater achievement and learning of Hispanic/Latino students in mathematics. Although much has been written that documents the assessment results of Hispanic/Latino students, this monograph has a different goal. Specifically, a goal of this monograph is to offer theoretical, conceptual, and historical analyses of key issues associated with mathematics assessments of Hispanic/Latino students in U.S. schools. Another objective is to promote and inform the education community about assessment formats that promote student achievement and learning for all students, particularly Hispanic/Latino students.

Papers are encouraged that address any issue related to the general theme. Examples of questions that submissions might address include the following:

- What has been or should be learned from research about external assessment formats that foster or inhibit the demonstration of mathematical knowledge and proficiency by Hispanic/Latino students?
- What has been or should be learned from research about classroom-level assessment formats (both formal and informal) that foster or inhibit the demonstration of mathematical knowledge and proficiency by Hispanic/Latino students?
- What strategies being implemented in P-12 schools hold great promise to document and assess the achievement and learning of Hispanic/Latino students in mathematics?
- What has been or should be learned from research about the use of external assessments for English Language Learners (ELLs)? What issues and challenges need to be identified? What advances have been made? How should the mathematics education community address these challenges and advances?
- How can alternative assessment formats be utilized to capture student "learning" or "growth" over time (e.g., moving beyond mere standardized testing and other quantitative measures as the primary means to classify student achievement)? In what ways would this approach complement or challenge the portraits of learning and growth that are available from standardized achievement tests?
- What theories and methods offer promise to understand the role and effects of assessment with respect to larger societal issues, such as the socio-political context of student learning/performance in mathematics? How has high-stakes testing (e.g., No Child Left Behind legislation) influenced classroom-level assessments in classes attended by large numbers of Hispanic/Latino children? What are the policy implications for the mathematics education community?

Guidelines for the second TODOS Monograph:

Manuscripts will be reviewed by members of the TODOS Research and Publications committee for potential inclusion in the TODOS Monograph. Members include: Marta Civil, Gil Cuevas, Rochelle Gutiérrez, Richard Kitchen, Carl Lager and Edward Silver. Submission of a paper does not guarantee acceptance. Guidelines for paper submission follow:

- Papers should be no more than 35 pages in length (double spaced, 12-point font), including references, appendices, photographs, endnotes, figures and tables;
- Papers should follow the recommendations of the 5<sup>th</sup> edition of the American Psychological Association (APA) manual for style and formatting; and
- Papers should be in Microsoft Word.

Note that "Hispanic/Latino" used throughout the guidelines does not mean that the two terms are synonymous or that the phrase must be used in your submission. For us, the phrase provides flexibility and demonstrates our trust in your ability to identify the population(s) of individuals in your work.

**The deadline for submission is extended to December 31, 2008.** Send manuscript electronically to Richard Kitchen [kitchen@unm.edu](mailto:kitchen@unm.edu). Author information should not appear in the manuscript. Be sure to include the following information in an accompanying cover sheet: names, professional affiliations, and positions of all authors, and contact information of first author (including email address, mailing address, and work phone number).

## Duke Energy Foundation Travel Scholarship Awards

By Bill Jasper, Awards Committee Chair

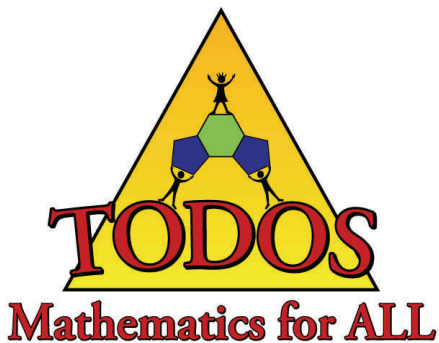
The Duke Energy Foundation has established a generous grant to benefit members of TODOS. Funds are designated for Travel Scholarship Awards for at least five members in 2009. Each award will provide financial support up to \$1400 for attendance at the annual meetings of the National Council of Teachers of Mathematics and/or the National Council of Supervisors of Mathematics in Washington, DC, the week of April 20-24, 2009. This professional development activity is an opportunity for educators to enhance knowledge of content and instruction and equity awareness as related to mathematics education for all students.

TODOS members who are interested in applying for these travel awards will be required to complete a short application sheet, provide a personal statement about expected benefits from attending the conference(s) and the relationship to the current assignment, and provide a **one**-page letter of support from the school principal or responsible administrator with approval for the applicant's plan to attend the conference(s), if funded. **Application packages will be due on December 1, 2008.** Additional information and application instructions will be provided on the TODOS website in the near future or may be obtained by emailing the selection committee chair, Lisa Mesple, at [lisamesple@gmail.com](mailto:lisamesple@gmail.com).



**From left to right, distinguished attendees at 2008 NCTM:  
Hank Kepner, President of NCTM  
Miriam Leiva, Past-President of TODOS  
Nora Ramirez, President of TODOS  
Skip Fennell, Past-President of NCTM**





# NOTICIAS de TODOS

News from TODOS: Mathematics for ALL  
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*The mission of TODOS: Mathematics for ALL is to advocate for an equitable and high quality mathematics education for all students — in particular, Hispanic/Latino students — by increasing the equity awareness of educators and their ability to foster students' proficiency in rigorous and coherent mathematics.*