

CASN News December 2010

CASN News is supported by the Career Academy Support Network and is based in the Graduate School of Education at the University of California Berkeley. CASN works primarily with high schools and districts engaged in high school redesign and with other stakeholders who support the college and career aspirations of youth.

To learn more about CASN and for free, down-loadable resources; videos about academy practices; an academy forms bank; and more, visit <http://casn.berkeley.edu> We also invite you to visit our new College Going Culture/College Access website at <http://collegetools.berkeley.edu>

ALL OF US AT THE CAREER ACADEMY SUPPORT NETWORK (CASN) WISH YOU AND YOUR FAMILIES THE JOYS OF THE SEASON.

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FY11 FEDERAL SPENDING TO BE DECIDED BY NEW CONGRESS

Democratic efforts to pass a FY11 omnibus spending package collapsed this week, deferring final funding decisions to the 112th Congress and the new Republican majority that takes control in January. The omnibus bill would have increased funding for Title I by \$290 million, special education by \$302 million, Head Start by \$314 million, and provided a \$550 million extension of the Race to the Top program.

Republicans plan to cut funding for government programs back to FY08 levels next month, which would result in reductions of \$600 million each for Title I, down to \$13.9 billion, and special education, down to \$10.9 billion. In a bizarre twist of fate, the omnibus package lost the support of key Republican senators because it contained earmark spending, including earmarks inserted by those very same senators who are now opposing the bill.

In the meantime, Senate Majority Leader Harry Reid (D-NV) is working with Minority Leader Mitch McConnell (R-KY) to come up with a short-term measure to continue funding government operations at current levels until Congress agrees on a more permanent solution. (source: Education Advocates)

IMPROVING TEACHING INITIATIVE SUPPORTED BY GATES FOUNDATION

A \$335 million effort to improve teaching is under way in several large school districts. The initiative is financed by the Bill & Melinda Gates Foundation and is focused on the way classroom instruction is evaluated. It also is looking beyond the value-added model of teacher evaluation by using videotaped lessons to create a more meaningful picture of teacher effectiveness. Approximately 3000 teachers in seven school districts have agreed to have their teaching videotaped. Researchers will then use the tapes to develop evaluation checklists and other new systems for evaluating teachers.

TWO HS STUDENTS WIN SIEMENS AWARD FOR WORK DEVELOPING SPEECH-RECOGNITION TECHNOLOGY

Two Oregon high-school students won top team honors in an academic competition sponsored by the Siemens Foundation for their work in developing speech-recognition technology that could be used to assist autistic children. The students, who said they were inspired by the movie "I, Robot," developed a more accurate algorithm for technology that recognizes emotions in a person's speech. The pair is working on a wristband device equipped with the technology that could be used by autistic children, who often have difficulties recognizing emotions in others. Another student won the top individual prize for his star-formation research.

REPORT: HOW 20 GREAT SCHOOL SYSTEMS CONTINUE TO GET BETTER

A new report from McKinsey & Company aims to answer questions prompted by their 2007 report, "How the World's Best Performing School Systems Come Out on Top." Their new study analyzes 20 systems from around the world, all with improving but differing levels of performance, and examines how each achieved significant, sustained, and widespread gains in student outcomes. In the U.S., the study looks at Boston, Massachusetts and Long Beach, California, as well as Aspire Charter Schools.

The authors found substantial improvement is achievable relatively quickly, regardless of student outcome level, geography, culture, or income. The majority of interventions in their sample were "process" in nature, and systems generally spent more time improving instruction rather than content. It also found a consistent cluster of

interventions moves systems from poor performance to fair, a second cluster does the same from fair to good, a third from good to great, and yet another from great to excellent. Though each stage is associated with a common set of interventions, systems varied substantially with regard to their sequence, timing, and roll-out; there was little evidence of a "one-size-fits-all" approach.

Research found six interventions common to all performance stages. These include:

- * Building instructional skills of teachers and management skills of principals;
- * Assessing students;
- * Improving data systems;
- * Facilitating improvement through the introduction of policy documents and education laws;
- * Revising standards and curriculum; and
- * Ensuring an appropriate reward and remuneration structure for teachers and principals.

Research also found that leaders took advantage of changed circumstances to ignite reforms, and that continuity of leadership was essential.

To download the full report and/or the executive summary, see: http://www.mckinsey.com/clientservice/Social_Sector/home.aspx You can also replay a recent webinar regarding the report.

STUDY: FEWER U.S. MATH STUDENTS AT ADVANCED LEVEL

A recent study finds that the United States is lagging far behind many of the world's leading industrialized nations in producing a strong cadre of high-achieving students in mathematics.

That conclusion is based on comparing the percentage of U.S. students in the graduating class of 2009 who were highly accomplished in math, based on standardized-test results, with percentages for 56 other countries. The analysis also broke down the results state by state and for 10 urban districts.

Looking at nations that participated in the Program for International Student Assessment, or PISA, math exam, the study found that, overall, 30 countries had a larger percentage of students who scored at the international equivalent of the advanced level on the National Assessment of Educational Progress, better known as NAEP, than did the United States.

In fact, 16 countries had at least twice the percentage of high-achievers in math, including Taiwan, South Korea, Japan, New Zealand, the Czech Republic, Canada, Australia, and Germany.

Eric A. Hanushek, an economics professor at Stanford University and a co-author of the analysis, said that what sets this study apart is its emphasis on those students performing at an advanced level in math, rather than average achievement across the population. “We haven’t seen research that really focuses on how we’re doing at the top end,” Mr. Hanushek said.

The report also finds that the results for many states are at the level of developing countries. Even Massachusetts, often held up as a U.S. model, is significantly behind 14 nations in its percentage of high-achievers in math, according to the study.

“I think it’s important to recognize that we have a real problem, and it’s going to have long, long impacts on the U.S. economy and our society,” Mr. Hanushek said.

REPORT: ALIGNING INSTRUCTION WITH NEW CORE STANDARDS

A new report from ACT provides a research-based estimate of current student performance relative to the Common Core State Standards, which 44 states have now adopted. The report gives a look at current student performance relative to the standards, which can guide states in their implementation and indicate where to target instructional resources to effectively support them. ACT recommends state and local policymakers begin now to align current curricula to the standards, with states providing training and resources to districts and teachers to create instructional units and curricular tools. Teachers will also need access to formative assessment item pools, which provide feedback about student progress, and will need to use these assessments to guide instructional interventions for students. Policymakers should consider the complex implications of the shift from existing standards to the Common Core Standards, since the shift will affect state accountability models. Policymakers should also use this opportunity to leverage research to better define goals on academic growth. Finally, policymakers should thoroughly consider how to more effectively align funding programs to meet these goals, particularly with respect to instructional and curricular practices. <http://www.act.org/research/policymakers/email/FirstLook.html>

REPORT: WHEN FAILURE IS NOT AN OPTION: DESIGNING COMPETENCY BASED PATHWAYS FOR NEXT GENERATION LEARNING by MetisNet, iNACOL (International Association for K-12 Online Learning), and the Nellie Mae Education Foundation,

makes the case for moving away from the factory-model of high school and for mastery-learning approaches to learning.

"In a proficiency system, failure or poor performance may be part of the student's learning curve, but it is not an outcome." - Proficiency-Based Instruction and Assessment, Oregon Education Roundtable

"Once we free ourselves from a factory model and the time practices handcuffed to that structure, we must rethink such unquestioned time-honored practices as:

- * Grouping kids in grades;
- * Grading as a way to communicate what has been learned;
- * Moving kids around based on bell schedules'
- * Separating subjects divided into discrete time blocks; and
- * Connecting high school graduation with Carnegie units.

Schools can no longer be expected to change and still look the same. It's time to get away from the legacy of the factory that imprisons us, as educators, as well as the students we teach. We know that 'a cage for every age' is an archaic and dysfunctional way to group students. It's for us to start questioning the sacred rituals of schools and school systems. We can use time as the catalyst to do just that." - Dr. Ellen Bernstein, President of the Albuquerque Teachers Federation

Design Principles for Competency-Based Pathways:

- * Students advance upon mastery (demonstration of learning)
- * Explicit and measurable learning objectives that empower students
- * Assessment is meaningful and a positive learning experience for students

You can download the report at: <http://www.inacol.org/research/competency/index.php>

FROM THE BLOGS: CURRICULUM MATTERS: SHAPING CURRICULUM FROM COMMON CORE STANDARDS (source: Catherine Gewertz)

"One of the observations I often hear about the common-core-standards movement is that it seems to have moved very quickly from standards to assessments, skipping past the meat of the sandwich: curriculum. What is the content that should be assessed?"

The American Federation of Teachers explores this landscape in the new issue of its magazine, *American Educator*.... (See <http://www.aft.org/newspubs/periodicals/ae/>) The union, which recruited teachers to help design the standards, delivers something of a clarion call for a common core curriculum.

In an opening essay, the editors argue that the United States has fallen behind higher-achieving nations because it has failed to define and pursue what is fundamental to education, rather than what is peripheral.

"While we have been dabbling in pedagogical, management, and accountability fads, [other countries] have written common-core curricula—and that has made all the difference," the editors write. "A common-core curriculum is not just a piece of paper that guides the teacher; it is a living document that guides and brings coherence to the *whole educational endeavor*."

A curriculum, it says, defines the skills and knowledge students need to be economically productive and socially responsible citizens, and a common curriculum, shared by all schools, would ensure that everyone in education is working toward the same goals. And since a common core curriculum would occupy only two-thirds of instructional time, the editors say, that leaves teachers plenty of room to build on students' interests and respond to local priorities.

In such a system, teachers don't have to guess what will be tested, because teaching the curriculum would be sound test preparation. Students will not lose ground if they switch schools, and textbooks focus on what's most important, they argue. Teacher-preparation programs are built to ensure mastery of the curriculum, and teachers work together—in person and through the Internet—to design methods and materials for teaching it.

Articles in the magazine explore various facets of standards implementation, all focusing on the power of the curriculum—as distinguished from the standards themselves or the assessments—to improve learning."

WEB RESOURCES FOR TEACHERS AND STUDENTS

Creating Dramatic Monologues Based on Grapes of Wrath

In this lesson, intended for use after students have read *The Grapes of Wrath*, students work in groups to collaboratively write a dramatic monologue in poetic form for one of the characters. In addition to the using the novel, primary sources provided at the site help them understand what life was like for migrant workers. The monologues, written in a voice authentic to the character, may also reveal some previously unknown facet of the character's life. This lesson also provides discussion questions for the novel, audible vocabulary support, suggestions for adaptations, extension activities, and numerous links to resources on John Steinbeck, the 1930's and the Dust Bowl experience.

<http://school.discoveryeducation.com/lessonplans/programs/grapesofwrath>

The Joy of Pi

Math enthusiasts have been known to celebrate the joys of Pi, and this website offers many opportunities for celebration! The site is based on David Blatner's book of the same name; in addition it contains many links and resources for learning about Pi. The most in-depth portion is the links section which contains a long list of Pi links around the web such as Pi History, Pi Mysteries, and Fun with Pi. <http://www.joyofpi.com>

MathTrain TV (for grades 5 - 9)

This site is part of the [Mathtrain.com](http://mathtrain.com) Project and was created to host student-created math video lessons all in one place. It was created by Mr. Marcos and his students at Lincoln Middle School in Santa Monica, CA. Videos are searchable by topic or by most

viewed, most recent, or most discussed. The site is highly interactive and has an option to subscribe to their free podcast through iTunes. In addition to the student-created videos, there are also teacher-created videos with explanations on different math topics. Most videos are under 2 minutes in length making them perfect to use for introduction or review with different math topics. This site runs in conjunction with mathtrain.com. (Follow-up learning might include engaging students in creating pod-casts using a site such as Podomatic or in creating their own math videos to post on a site such as SchoolTube.)

<http://www.mathtrain.com> <http://mathtrain.tv> (houses all the video lessons)

Math Interactives

Find great math resources on this free site on countless topics. Click each resource to find sites useful on individual computers or projected on a whiteboard screen. (Note: Some interactives may require Flash or a similar program.) Find great games about Numbers and Operations, Algebra, Geometry, Probability, and Money. Be aware of the icons next to the resource for the required plug ins to use. Click on an activity and then explore the tabs above. Click the "Learner" tab to view information about the topic. Click "Help" for information on how to use the activity. Find resources in the "Instructor" tab.

<http://mathematics.hellam.net/>

Physics for Students

NOTE: This is a recommendation from the field - (Thank you to Laura Jackson)

This site includes links to many physics sites and resources.

<http://www.guidetoonlineschools.com/library/physics-for-students>

FEATURED CASN WEB RESOURCES - ACADEMY VIDEOS

The Academy video playlist begins with a 12-minute video that describes key features of California Partnership Academies. Shorter videos follow, each highlighting a different academy. These videos were recorded and edited by students, under the direction of teachers in academies that teach video and other media production. They are examples of the work academy students are learning to do. Full credits, with names of students and teachers, are at the end of each video

See <http://casn.berkeley.edu/video.php>

National Council of Teachers of English Ning

The *NCTE Ning* is an online platform that English and Language Arts teachers will appreciate knowing about. It is “one-stop free shopping” for information on what is current, quick links to interesting sites, announcements for upcoming events and conventions, as well as a means to keep connected with other ELA teachers. You do not have to be a member of the National Council of Teachers of English to take advantage of this Ning. <http://ncte2008.ning.com/>

In Their Own Words - British Novelists

This remarkable collection of interviews with 20th century British writers enables readers and audiences to explore the imaginations of some of the most read authors, as they reveal their personalities and inspirations for the characters, settings, and plots they have created. Approximately forty digital interviews are available from this web site, including Virginia Woolfe, Elizabeth Bowen, Robert Graves, JRR Tolkien, and more. <http://www.bbc.co.uk/archive/writers/>



Digital Is: National Writing Project - Grades 0 - 12 - [permalink](#)

This collection is an attempt to unpack the wide range of technology-based writing, show what it might look like in practice, and explore new multi-media authoring tools and websites that redefine the kinds of writing students can compose in our classrooms. The *Digital Is* website hosts resources, reflections, and stories about what it means to teach writing in our digital, interconnected world. It explores how we write, share, collaborate, publish, and participate today and in the future, and what that means for the teaching of writing. It is an emerging knowledge-base created and curated by its

community of educators, kindergarten through university level. In today's world of texting, tweeting, blogging, and social networking, young people are learning new literacies to succeed in the information rich, fast paced world, and schools need to embrace exciting challenges by adapting teaching practices and equipping students with the technology-related communication skills they need to thrive in school and in the global workplace.