1. Federal STEM Policy this Month by Della B. Cronin, Principal, Washington Partners, LLC

The headlines in Washington, DC, this month covered a lot of issues. STEM education policy wasn’t really one of them. That isn’t to say that there aren’t discussions and announcements important to stakeholders, it can just be hard to get to them.

First, Secretary of Education Betsy DeVos released her proposed priorities for competitive grant programs at the Department of Education. Not surprisingly, school choice headlines the priorities as its first, but the Secretary proposes 11 total priorities. STEM education and computer science are featured in priority number 6, which echoes the goals of the Presidential Memorandum President Trump sent to the Secretary last month. The public has 30 days to comment on the priorities; they will then be finalized and used in the development of solicitations for grant proposals. To date, only 42 comments have been received, and none of those have commented on STEM education or computer science substantively. Want to comment? You can right here—but do it before November 13, 2017.

On Capitol Hill, the STEM education, research, K-12 education and higher education communities are still waiting for Congress to decide about FY 2018 spending. The tax reform debate is center stage right now, but there are (tenuous) rumors that budget deals are being made as well. It seems that appropriators and leadership would like to see the budget for the fiscal year that started October 1 resolved by late November. There could then be a very temporary continuing resolution passed to get the federal government through the December 8 expiration of the current one and through the end of the year to allow for the details of a deal to be finalized. Of course, there are so many issues and surprises that could slow or change this course of action that few are willing to place any bets. Regardless, the STEM education community continues to meet with lawmakers to press for sufficient investments in research agencies and Department of Education programs like professional development for classroom teachers and the new, flexible Title IV-A grant program (Student Support and Academic Enrichment Grants) that supports STEM and other activities.

And, while the discussion around career and technical education has a definitive “Groundhog Day” element to it, a recent missive from 59 senators to leaders of the Senate Health, Education,
Labor and Pensions Committee suggests that folks on the Hill are getting as frustrated as those off it regarding the lack of action in that chamber on an issue that has broad bipartisan support and programs that are important to STEM education efforts nationwide. A similar letter is expected from House lawmakers and those pleas combined with recent collaboration between Senator Lamar Alexander (R-TN) and Senator Patty Murray (D-WA) on healthcare leaves some hope for movement. Some hope sounds like a lot these days.

2. STEM Tidbits

NSF AWARDS 59 GRANTS TO STUDY EFFECTS OF RECENT HURRICANES

On October 10, the National Science Foundation (NSF) announced that it would be awarding $5.3 million to 59 awardees to study the effects of Hurricanes Harvey, Irma, and Maria and to help scientists understand how such disasters happen and how the government can best respond to similar events in the future. In a statement, NSF Director France Córdova explained, “NSF-funded scientists have a long history of advancing our understanding of large-scale disasters and their aftermath. These researchers have increased our ability to predict the paths of tropical cyclones, found ways of improving flood water decontamination, and enhanced our understanding of the mechanisms that may cause levee failures. NSF’s new awards will result in similar advances critically needed in the face of such disasters.” The 59 grant awardees are studying the effects of the hurricanes in various subject areas. For example, a few awardees are studying the actual climate and weather science related to hurricanes, some are studying the impacts on environmental habitats for plants, animals, and humans, and others are studying the societal responses to the hurricanes. For more information, click here.

SECRETARY DEVOS ANNOUNCES DISCRETIONARY GRANT PRIORITIES

On October 11, Education Secretary Betsy DeVos announced new priorities for distributing funds through existing discretionary grant programs. These draft priorities target an expansion of school choice while promoting STEM (science, technology, engineering, and mathematics) and computer science education among other subject areas. The announcement focuses on choice was familiar but the announcement was notable as it marks the first time the new secretary specifically outlined policy priorities for grant recipients. DeVos’ department is seeking comment for the next 30 days on the 11 new proposed priorities and sub priorities. STEM and computer science made the cut after the Trump administration released a Presidential Memorandum directing the Department of Education to spend at least $200 million in existing grant funds per year (starting in FY 2018) on the promotion of high-quality STEM education and, in particular, computer science education. Published and announced in the federal register and on the department’s blog, the 11 priorities are titled: Empowering Families to Choose a High-Quality Education that Meets Their Child’s Unique Needs; Promoting Innovation and Efficiency, Streamlining Education with an Increased Focus on Improving Student Outcomes, and Providing Increased Value to Students and Taxpayers; Fostering Flexible and Affordable Paths to Obtaining Knowledge and Skills; Fostering Knowledge and Promoting the Development of Skills that Prepare Students to be Informed, Thoughtful, and Productive Individuals and Citizens; Meeting the Unique Needs of Students And Children, including those with Disabilities and/or with Unique Gifts and Talents; Promoting Science, Technology, Engineering, and Math Education, With a Particular Focus on Computer Science; Promoting Literacy; Promoting Effective Instruction in Classrooms and Schools; Promoting Economic Opportunity; Encouraging Improved School Climate and Safer and More Respectful Interactions in a Positive and Safe Educational Environment; Ensuring that Service Members, Veterans, and Their
Families Have Access to High-Quality Educational Choices. To view the full announcement published in the Federal Register, click here.

59 SENATORS CALL FOR PERKINS CTE REAUTHORIZATION

On October 12, a bipartisan group of 59 senators sent a letter to Chairman Lamar Alexander (R-TN) and Ranking Member Patty Murray (D-WA) of the Senate Health, Education, Pensions, and Labor (HELP) Committee urging them to take up the Carl D. Perkins Career and Technical Education Act “as soon as possible during the 115th Congress.” “It is crucial that the Senate work in a bipartisan effort to help our nation’s students acquire the skills needed to be successful in today’s work environment,” the senators wrote in the letter, which was signed by Jim Inhofe (R-OK), Claire McCaskill (D-MO), Heidi Heitkamp (D-ND), Rob Portman (R-OH) and 55 other senators. A spokesperson for Sen. Alexander’s office said that Perkins CTE reauthorization is a “top priority.” The house passed their reauthorization bill earlier this year. Education Secretary Betsy DeVos has previously said she’s looking forward to working with Congress on reauthorizing the Perkins Act, though the Trump administration hasn’t weighed in on legislation. President Trump has signaled support for apprenticeship programs and recently nominated state representative Timothy Kelly (R-MI) to be Assistant Secretary of Career, Technical, and Adult Education. For more information and to read the letter, click here.

SENATOR RAND PAUL SUGGESTS AN OVERHAUL TO FEDERAL RESEARCH GRANTS

On October 17, Senator Rand Paul (R-KY) introduced legislation that could effectively alter the way the government funds research. Specifically, this bill— the Basic Research Act (S.1973)—would modify how research grant proposals are peer reviewed at government agencies by adding unbiased members of the public that have no relation to or expertise in the research being conducted. According to Senator Paul, including an “expert … in a field unrelated to the research” and a “taxpayer advocate,” would ensure independent judgments on the considered research, as well as voices that “can weigh the value of the research to society.” In addition to adding two new peer-review panelists, the new legislation would make federal grant applications available to the public, as unfunded/submitted proposals aren’t necessarily available. The proposal would also eliminate the National Science Foundation’s (NSF) Office of Inspector General and replace it with an office that would specifically examine grant applications to assure that the research is delivering “value to the taxpayer.” If the so called “Taxpayer advocate” deems the research unworthy, the office has veto power over applications. Paul also intends to scratch certain rules permitting applicants to choose or recommend who reviews their applications, which would ensure in his opinion that the review process remains objective, rather than allowing for potential conflicting interests. Similar to Paul, Senator James Lankford (R-OK) believes the question is whether or not the research is available to everyone, and the selection teams are diverse. Meanwhile, Senator Gary Peters (D-MI) “suggested that his colleagues were missing the bigger picture,” thereby defending the current system of how government funds research proposals. After a Senate hearing on oversight for federal research the previous week, the future of Paul’s legislation is uncertain. Senator Lankford contended that the bill does have bipartisan support, but as of yet, there are no cosponsors. Even so, both Lankford and Paul asserted that change is coming to the academic research community. For more information, click here.

FEDERAL STEM EDUCATION ADVISORY PANEL SEEKING MEMBERS

On October 18, under the authority of the American Innovation and Competitiveness Act, which was enacted back in January 2017, the STEM Education Advisory Panel was officially
established to advise the federal government on matters related to Science, Technology, Engineering, and Mathematics (STEM) Education. In an announcement via the Federal Register, the National Science Foundation (NSF) outlined that “The role of the STEM Education Advisory Panel is to provide advice and recommendations to the Committee on Science, Technology, Engineering, and Mathematics Education (CoSTEM as established in 2011 under the prior COMPETES authorization), assess CoSTEM’s progress in carrying out responsibilities related to the America COMPETES Reauthorization Act, and help identify need or opportunity to update the Federal STEM Education 5-Year Strategic Plan.” The National Science Foundation, the Department of Education, the National Aeronautics and Space Administration, and the National Oceanic and Atmospheric Administration are currently requesting recommendations for membership on the panel, which will have at least 11 individuals from academic institutions, nonprofit organizations, and industry. NSF encourages interested parties to submit their recommendations by November 30, 2017. Selected members may serve on the panel for up to three-year terms. For more information, click here.

HOUSE JOINT COMMITTEE HOLDS HEARING ON IMPROVING THE CYBER WORKFORCE
On October 24, the House Homeland Security Committee’s Cybersecurity and Infrastructure Protection Subcommittee and the House Education and the Workforce Committee’s Higher Education and Workforce Development Subcommittee held a joint hearing on “Public-Private Solutions to Educating a Cyber Workforce.” The purpose of the hearing was to identify best practices from academia and the private sector on how to streamline the entry of cybersecurity students into the workforce and narrow the gap of qualified cybersecurity professionals. Chairman John Radcliffe (R-TX) noted the shortage of workers during a turbulent time in cybersecurity and advocated for a robust pipeline to fill the 200,000 currently open jobs in the field. Ranking Member Cedric Richmond (D-LA) mentioned that in 2012, the Bureau of Labor Statistics (BLS) said that by 2020, there would only be 400,000 computer scientists to fill 1.4 million available computing jobs, in order to demonstrate the urgency of the situation. Dr. Stephen Cambone, Associate Vice Chancellor, Texas A&M University System, stated that his university is looking to develop a strong cybersecurity program to prepare more students to enter the cyber workforce immediately upon graduation. He also noted that as a land grant school, it is the university’s mission to develop programs that address workforce needs identified by employers across the public and private sectors. Douglass Rapp, President, Cyber Leadership Alliance, insisted that lawmakers and industry leaders need to support collaborative efforts that tie data on higher education institutions to employers within the cybersecurity industry and that “government needs to understand that businesses can only participate in partnerships if they can afford to work at the rate at which the government is willing or able to pay.” David Jarvis, Security and CIO Lead, IBM Institute of Business Value, mentioned that the Carl D. Perkins Career and Technical Education Act is an important statute that provides IBM with flexibility to support hands-on apprenticeships and internships through their P-TECH program. Jarvis also pointed out that over the next four years, IBM will hire 2,000 highly skilled veterans trained in cybersecurity because they are some of the most obvious candidates to fill jobs in the sector. He also noted the importance of teaching cybersecurity in elementary schools and engaging children, especially girls and children of color, early on regarding information technology in and out of school. For more information about the hearing, click here.

HOUSE HOLDS HEARING ON ADMINISTRATIVE COSTS OF NIH-FUNDED RESEARCH
On October 24, the House Appropriations Labor, Health and Human Services, Education, and Related Agencies Subcommittee held a hearing to discuss the role of facilities and administrative costs, sometimes referred to as “F&A” or “indirect” costs, in supporting NIH-funded research at
universities and independent research institutions across the country. In his opening statement, Chairman Tom Cole (R-OK) voiced support for the cost-sharing relationship between government and research institutions that has “made the U.S. a leader in innovation and economic competitiveness.” He continued by expressing “great concern with the Administration’s proposal in the fiscal year 2018 budget to cap NIH indirect cost reimbursement at 10 percent of total research costs, a large reduction from the 28 percent spent by NIH in fiscal year 2017.” Cole held the hearing to allow for the biomedical research community and other lawmakers to defend the cost-sharing program without proposed caps. The witnesses all referenced and spoke strongly of the “compact” forged during World War II in which the federal government agreed to fund academic research through competitive grants in return for universities training “the next generation of scientists.” Throughout the hearing, members from both parties showed support and tossed easy questions to panelists that highlighted the dividends this arrangement has paid to both the nation and the globe toward improving public health, curing disease, and raising living standards. While the hearing was a bipartisan attempt to highlight the effectiveness of the partnership, one member, Andy Harris (R-MD), was in full disagreement with his colleagues, asserting that universities are profiting heavily off of the current levels of indirect cost reimbursement. In his questioning, Harris contended that other funding sources don’t pay as much as NIH and that’s “why everybody applies first to NIH, because NIH is the most generous funder.” In response to these critiques, which are in line with the White House, Chairman Cole explained, “We can always learn to do things better, but when you look at the evidence, you come to the conclusion that the system isn’t really broken in the way that they have suggested it is. So I hope that they back off.” For more information, go here.

3. Announcements, News, and other Notable Updates

NASA Glenn Hosts 25th Annual Young Astronaut Day
SpaceRef (Oct. 25, 2017)

White House, Tech Companies Pledge $500 Million to Increase STEM Opportunities
EdTech Magazine (Oct. 25, 2017)

Why We Still Need to Study the Humanities in a STEM world
Washington Post (Oct. 18, 2017)

Amazon's Headquarters Hunt a Wake-Up Call on US Education
The Hill (Oct. 18, 2017)

Black members of Congress push for more diversity in Silicon Valley hires
ARS Technica (Oct. 16, 2017)

Scientists Detect Gravitational Waves from a New Kind of Nova, Sparking a New Era in astronomy
Washington Post (Oct. 16, 2017)

Are International Students Next On The Menu?
Forbes (Oct. 15, 2017)

Project Aims to Increase STEM Access for Native American Students
The Journal (Oct. 12, 2017)
A Five-Year Status Report on the AAU Undergraduate STEM Education Initiative
American Association of Universities (Oct. 12, 2017)

National Academy of Sciences Starts Framing Data Science Education
Campus Technology (Oct. 12, 2017)

DeVos touts school choice, STEM for $4 billion in grants
Virginian Pilot (Oct. 12, 2017)

Deputy Secretary of State Welcomes 48 International Women Leaders in STEM to the US
Department of State (Oct. 11, 2017)

Mastercard Commits to Bring STEM Education Opportunities to 200,000 Girls by 2020

Revived Bill Would Grant STEM Visas to U.S.-Educated Immigrants
MeriTalk (Oct. 5, 2017)

Ivanka Trump: Why we need to start teaching tech in Kindergarten
New York Post (Oct. 4, 2017)

4. Upcoming Deadlines and Events
Council on Undergraduate Research Call for Posters on the Hill Abstract Submissions
Date: Due November 1, 2017

2017 DC STEM Summit
Date: November 8, 2017

AAU University Innovation & Entrepreneurship Showcase
Date: November 13-14, 2017

Federal STEM Education Advisory Panel Recommendations Due
Date: November 30, 2017

5. About WPLLC
Washington Partners, LLC is a full service government affairs and public relations consulting firm that has built a reputation for producing results. We partner with clients committed to excellence in education and other social services to achieve policy and advocacy success by:

- leveraging our expertise and passion;
- strategizing intelligent solutions; and,
- creating meaningful impact.

Our team includes long-term insiders in education policy from PreK through higher education, innovative thinkers and savvy strategists that provide a comprehensive array of customized client services. We have the knowledge, skills, and relationships that are necessary for successful advocacy at all levels. From grassroots to grasstops and everything in between, our broad-based legislative practice approaches every project with the same degree of determination and professionalism. WPLLC provides expertise in a variety of services:

- Government Relations
- Research and Analysis
- Advocacy Training
- Association Management
- Strategic Communications
- Policy Events

For more information, please call us at 202.289.3900 or visit our website at wpllc.net.