EDUCATION:
1. **Bring Back Education for Seapower**
   *(USNI Apr 21)* … Mark R. Folse
   In early 2018, the Donald Trump administration promulgated a new (and inherently naval) National Defense Strategy (NDS) aimed at peer competition with China and Russia. A key assumption of the NDS was that after two decades of fighting terrorism, the U.S. military’s advantage over peer adversaries has eroded. The Department of Defense sees itself operating in a new “Cognitive Age” where artificial intelligence, cyber, and remote-controlled weapon systems make warfare in the air, on land, or at sea more complex and dangerous than ever before. To reverse the effects of this erosion, service members will have to be highly trained to survive and succeed in this environment. Education is also needed, however, to best prepare officers and enlisted for the challenges of the 21st century… Under the E4S plan, the head of the university system could exercise budget authority and protect funding for education. This person would allocate funds to prospective schools and, in theory, act as an advocate to shield those funds from the Navy budgeteers who traditionally take money from the education pot whenever they deem necessary. Protected funding would make hiring freezes less frequent and improve faculty retention. Professors who are expected to be excellent teachers and leaders in their respective fields will have more support for travel and research. This funding will also better facilitate the upkeep and renovations of old buildings and classrooms. The DoN’s various schools such as the Naval War College, Naval Postgraduate School, the U.S. Naval Academy, and Marine Corps University will be able to strive toward being world-class learning institutions without their basic operating funds consistently being cut from under them.

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   On January 27, President Joe Biden signed an executive order to tackle climate challenges at home and abroad, which both elevates and frames climate concerns within a national security perspective. Responding swiftly, the Naval Postgraduate School (NPS) launched the Climate and Security Network, connecting NPS faculty with relevant expertise across campus together, along with staff, students and even alumni, ready to collaborate on important research and support related educational efforts.
FACULTY:
3. **Navy, Coast Guard Consider Network Tech to Hedge Against Illegal Fishing**
   *(Federal News Network 26 Apr 21) … Scott Maucione*
   *(PodCast One 21 Apr 21) … Tom Temin (Audio Interview)*

The Navy and Coast Guard spend a lot of time on the water, but few would associate the services with one of the most synonymous creatures of the sea: fish… “The local folks have no ability to monitor large fishing fleets moving through their areas, they're certainly not going to build a navy to go do those kinds of things,” Ray Buettner, director of the Sea, Land, Air Military Research initiative at the U.S. Naval Postgraduate School, told Federal News Network. “There’s the threat of organized crime, whether it be human trafficking or drug smuggling, the coastal areas are seeing a lot of traffic. Our ability to understand what’s going on there, not just as the United States, but including the island states, is challenged by these vessels.”

4. **Biden breaks with predecessors, calls 1915 mass killings of Armenians a genocide**
   *(The Week 24 Apr 21) … Tim O'Donnell*

While addressing Armenian Genocide Remembrance Day on Saturday, Biden said "the American people honor all those Armenians who perished in the genocide that began 106 years ago today." The statement fulfills a campaign promise Biden made to Armenian-Americans, and makes him the first president in 40 years to call the mass killings of Armenians by the Ottoman Empire in 1915 a genocide… Ryan Gingeras, a professor at the Naval Postgraduate School who focuses on Turkey, writes in The Washington Post that Biden's willingness to break with his predecessors likely stems from the fact that that his administration is losing patience with Turkey and its worsening human rights record. The decision "is as much a testament to changing political realities as it is a clear vindication of historical truth," he writes.

ALUMNI:
5. **ARHT Media Installs HoloPod™, HoloPresence™ and Capture Studios with two Military Organizations in Q1 2021 Valued at over $450,000**
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ARHT Media Inc. ("ARHT" or "the Company") (TSXV:ART), the global leader in the development, production and distribution of high-quality, low latency hologram and digital content, is pleased to announce that in Q1 2021 it installed its HoloPod™ and HoloPresence™ Display technology, as well as Capture Studio Kits with two military organizations in three separate countries with a value over $450,000. The primary uses of the technology will be for military training and education. In one case these permanent installations are a pilot program that has the potential to be rolled out to many additional countries… In April, ARHT Media engaged with retired NATO technology expert, Sean Midwood, to advise the company in its sales and marketing strategy with military organizations globally. Mr. Midwood, holds a Masters of Electrical Engineering Degree from the United States Naval Postgraduate School and prior to retirement was the Chief of Staff to the Director of Service Strategy (formerly Chief Technology Officer) at NATO’s C&I Agency (formerly C3 Agency) in the Netherlands following a distinguished career with the Royal Canadian Navy.

6. **Amphibious Squadron 3 changes command**
   *(Commander Pacific Fleet 21 Apr. 21) … Mass Communication Specialist 2nd Class Kristopher Haley*

U.S. Navy Capt. Henry Kim relieves Capt. Stewart Bateshansky as commander of Amphibious Squadron 3 during a ceremony aboard USS Makin Island (LHD 8). (U.S. Navy/MC2 Michael J. Lieberknecht)… Kim was commissioned in 1996 through the Naval ROTC program at the University of California, Los Angeles, where he received a bachelor's degree in international relations. He holds a dual master's degree in operations research from the Naval Postgraduate School and a master's degree in defense systems and technology from the National University of Singapore. He previously served as Commander, Mine Division 12 in San Diego.

7. **Sarcos Robotics and Rotor Acquisition Corp. Announce Board of Director Nominees for Post-Merger Public Company**
   *(Street Insider 21 Apr. 21)*

New board to be comprised of industry experts from a variety of industries covering the technology, software, manufacturing, aerospace, and defense sectors… Admiral Olson serves on the board of directors of Under Armour
and Iridium Communications and is an Adjunct Faculty Member at Columbia University’s School of International and Public Affairs. He is a graduate of the U.S. Naval Academy and Naval Postgraduate School.

8. **From cliffs to the sky, Chickasaw John Herrington’s journey as an astronaut**  
(Oklahoman 22 Apr. 21) … Melissa Rosenfelt

   As children we all look up to the stars with wonder and amazement as our eyes cast over the vast limitless sky, imagining what it would be like to float weightlessly among the stars… Born in Wetumka and a graduate of Plano High School in Texas, Herrington was climbing cliffsides as a surveyor before being encouraged to pursue engineering and mathematics by a friend and mentor. After graduating from the University of Colorado and then a master’s degree in aeronautical engineering from the Naval Postgraduate School in 1995, Herrington was selected by NASA for the astronaut program in 1996. Two years later, he was assigned as mission specialist for the Endeavor.

9. **L.A. school board names Megan Reilly, head of business services, as interim superintendent**  
(Los Angeles Times 23 Apr. 21) … Howard Blume

   The Los Angeles Board of Education has appointed Megan Reilly, who oversees the district’s massive finance, business and operations arm, as interim superintendent two days after schools chief Austin Beutner announced he would not seek a new contract when his current agreement expires on June 30… Reilly has a bachelor’s degree in history from Loyola University, a master’s in management from Naval Postgraduate School and a law degree from Monterey College of Law.

10. **The Lessons of Service Squadron TEN, with Ryan Hilger [Audio Interview]**  
(Blog Talk Radio 25 Apr. 21)

   Home is thousands of miles away on the other side of the great Pacific Ocean. A deadly and relentless enemy is challenging ships and sailors for every island, cove, sea and shipping lane… Ryan is a Navy Engineering Duty Officer stationed in Melbourne, Florida. He has served on USS Maine (Gold) and USS Springfield as Chief Engineer. He holds a master’s degree in mechanical engineering from the Naval Postgraduate School.

**PUBLISHED BOOKS:**

**Security and Privacy -Select Proceedings of ICSP 2020**

   Professor Pante Stanica, NPS Applied Mathematics Dept.; along with Prof. Sugata Gangopadhyay, Indian Institute of Technology-Roorkee; and Prof. Sumit Kumar Debnath, National Institute of Technology Jamshedpur, India, co-edited Security and Privacy -Select Proceedings of ICSP 2020 (an International Conference on Security & Privacy), published by Springer-LNEE. Prof. Stanica served as the General-Chair for the conference, as well. The book is focused on the state-of-the-art developments of network security, secure cryptographic protocols, post-quantum cryptography, quantum cryptography, blockchains and cryptocurrency, IoT security and privacy, cloud security, machine learning in cybersecurity, and other disciplines related to security and privacy. In this book, a wide variety of basic security primitives are discussed along with recent developments in some advanced topics like functional encryption, two-party/multi-party computation, bitcoin, cryptocurrency, and post-quantum security.

**UPCOMING NEWS & EVENTS:**

April 27: **V-SGL with Mr. Joseph Bryan: The Security Implications of Climate Change**

April 29: **Ask an Astronaut!**

May 11–13: **18th Annual Acquisition Research Symposium**

May 14: **NPS Students’ Big Idea Exchange 2021 (BIX21)**
EDUCATION:

Bring Back Education for Seapower
(*USNI Apr 21*) … Mark R. Folse

In early 2018, the Donald Trump administration promulgated a new (and inherently naval) National Defense Strategy (NDS) aimed at peer competition with China and Russia. A key assumption of the NDS was that after two decades of fighting terrorism, the U.S. military’s advantage over peer adversaries has eroded. The Department of Defense sees itself operating in a new “Cognitive Age” where artificial intelligence, cyber, and remote-controlled weapon systems make warfare in the air, on land, or at sea more complex and dangerous than ever before. To reverse the effects of this erosion, service members will have to be highly trained to survive and succeed in this environment. Education is also needed, however, to best prepare officers and enlisted for the challenges of the 21st century.

The Army, Air Force, and Marine Corps have university systems that oversee and unify the educational efforts of their various schools. The Department of the Navy (DoN) does not, which leaves it disadvantaged. The DoN should revive the Education for Seapower (E4S) initiative because it will allow the Navy to see education for what it is: a decisive edge in warfare. E4S would evolve the Navy into a force peopled by sailors and Marines better educated to adapt to the vicissitudes of warfare in the cognitive age against peer adversaries. It would protect funding for education, unify the various efforts of DoN schools, and foster a culture of learning within the Navy and Marine Corps.

E4S 2018–2020

In 2018, then–Undersecretary of the Navy Thomas B. Modly formed a team of executive board members and staff to do a “clean sheet” review of the DoN’s educational institutions. The board found several systemic problems. Navy budgeteers frequently reallocate money devoted to naval education to pay other, more pressing expenses. It observed that while the various schools educate students well enough, there is no strategic unity among them. Probably the biggest problem the E4S study found, however, was cultural. It put in print what many naval officers have been saying for a while: that the Navy assigns relatively little value to professional military education (PME) among its officer corps, compared to training, operations, and command experience.

The report concluded with recommendations to foster a more vibrant and healthy culture of learning within the Navy. It advised the creation of a Naval University (NU) system led by a president to oversee and guide the collective education efforts of all the major DoN schools and schoolhouses. The president of the university would be a three-star Marine or Navy officer who would also hold the role as President of the Naval War College. Among other things, the board also recommended the hiring of a chief learning officer (CLO), and the creation of a Naval Community College.

Modly, who went from “Under” to “Acting” Secretary of the Navy, set things moving in 2019 by establishing a campaign plan to implement parts of the E4S initiative. Modly hired the DoN’s very first chief learning officer, John Kroger, a former enlisted Marine and Harvard-educated president of Reed College in Portland, Oregon. The Department also broke ground on the new Naval Community College in Quantico, Virginia.

But as of February 2021, E4S was effectively dead. I do not know the exact reasons for this, but the answers lie likely somewhere within the following details. Secretary Modly, the man who provided the impetus driving E4S to fruition, resigned in controversy in April 2020 after relieving the commanding officer of the USS Theodore Roosevelt (CVN-71). When Secretary Kenneth Braithwaite took over in late May 2020, it was not long before Kroger, the Navy’s first and only CLO, resigned and took a job as head of the Aspen Institute.

Education for Seapower’s top cover disappeared, leaving the entire plan unprotected. The Navy removed the report and supporting memos from the Department’s website, and the plan never recovered. By the looks of it, Braithwaite either killed it or allowed it to perish. He did not seek a replacement for Kroger, he dismantled the office responsible for education, and it looks like the funding and budget measures for the plan no longer exist.
Other than the establishment of the Naval Community College at Quantico, the Navy has remained an institution that cares relatively little for education. Therefore, no university system will be created to harmonize its various schools, and no leader will be in the Pentagon to advocate for and protect their funding. A “culture of learning” seems as distant as ever. What started out as an exciting idea that was professionally researched and well supported and articulated has ended up as another vanished initiative within the halls of the Pentagon.

But there is now an opportunity to correct the Navy’s current course. With Braithwaite gone, the new incoming leaders appointed by the Joseph Biden administration (whoever they are) should revive E4S because it is clear now that they Navy will not do it on its own. Doing so will accomplish several things that will give the Navy an edge in military readiness and capability.

**Promotes a Culture of Learning**

The Navy values officers and sailors on platforms, whether it be on aircraft, on surface warfare vessels, or on submarines, much more so than in the classroom. This is a cultural problem that is supported by the numbers. According to the E4S review, the Navy, out of all the other services, is worst at filling quotas to the various schools within the DoN and elsewhere. When it does send students, they are disproportionately underqualified. The Navy sends junior officers into higher echelon programs, and staff corps officers (dentists and chaplains) to the war colleges instead of surface warfare officers and aviators. It has been said as a joke that “the Naval War College is the school to which every branch but the Navy sends its best and brightest.” The E4S study found that from 2008 to 2018, the percentage of Navy students who graduated with distinction from the Naval War College was consistently at or below ten percent of attendees, well below the rate for students from the other services.

The revival of E4S would better foster a culture of learning by giving officers and enlisted more frequent and accessible education opportunities. It would allow for greater integration of educational achievements into the Navy’s force and talent management framework. Essentially, this means a more careful selection of officers with a talent for command for school attendance. It also means rewarding those who have excelled academically by placing them in positions where their skills and education could enhance the Navy and Marine Corps’ missions. It could also entrench a Naval University system within the DoN, which would start the Navy down a path to becoming a great “learning organization.” All of this would help imbue the Navy with a culture of learning, one pervading the officer and enlisted ranks, and allowing the service to view education as a crucial aid to readiness and warfighting.

**Education and Training**

The Navy values training over education. This is understandable, because modern day sailors, Marines, and naval officers must be highly trained. I used to tell my students at the Naval Academy that training is about preparing for the expected and learning what to do and how to do it within a vocation. Education is preparation for the unknown, learning how to think and how to solve problems by figuring out how to ask the right questions. Asking the right questions leads to appropriate analysis and research to provide answers. To be effective and lasting, both training and education require continual practice. Both forms of learning could save lives in the future, but education is best fostered in an environment conducive to study and the exchange of ideas—in a classroom setting.

Time spent pursuing an education to whatever end, however, is shore duty, and too much of it is viewed as an impediment to a naval officer’s career. The incentive for a Navy officer to go to school and excel there does not go much further than checking a box for promotion. From my own teaching experience, students who interpret education as an opportunity for personal and professional improvement perform much better than those who believe it is just another rung in their career ladder.

Education for Seapower could assuage other problems, too. Since at least the early 1900s, the Navy has used education as a means to attract the kind of talent it needs. If the Navy brings back the E4S initiative, it will enhance its ability to lure people interested in becoming experts in fields the service needs, such as cyber, computer science, nuclear, and mechanical engineering, and retain them. Sailors, Marines, and naval officers would also return to the civilian world as better educated and credentialed members of society.
Through a university system, the Navy could educate its officers and sailors on sexual harassment and assault much more effectively than annual sexual assault and prevention response (SAPR) training. SAPR training, is just that, training. Students learn what sexual assault and harassment is, what to do if they know of it, and who to report to. A naval university system could work through all its major schools and colleges to educate its students on how to think about cultural concepts like gender, misogyny, and masculinity, which are crucial to understanding what causes sexual harassment and assault in the first place. The better leaders understand the forces behind this problem and the more experienced they are in thinking about causes and potential solutions, the better equipped they will be to prevent it and to make effective policy. This can only be done through real education, and it would go far in helping solve a deleterious and pervasive problem that continues to plague the Department of Defense.

**Protect Funding**

Under the E4S plan, the head of the university system could exercise budget authority and protect funding for education. This person would allocate funds to prospective schools and, in theory, act as an advocate to shield those funds from the Navy budgeteers who traditionally take money from the education pot whenever they deem necessary. Protected funding would make hiring freezes less frequent and improve faculty retention. Professors who are expected to be excellent teachers and leaders in their respective fields will have more support for travel and research. This funding will also better facilitate the upkeep and renovations of old buildings and classrooms. The DoN’s various schools such as the Naval War College, Naval Postgraduate School, the U.S. Naval Academy, and Marine Corps University will be able to strive toward being world-class learning institutions without their basic operating funds consistently being cut from under them.

**Unify Effort**

The presence of a common unifying educational system will bolster the networks between DoN schools, foster better engagement among learning institutions, and allow the Navy to better tailor its educational efforts to the NDS. It will also mitigate professional parochialism within the officer corps. Naval officers tend to immerse themselves within their own vocational communities. The separate DoN schools mitigate this some by bringing members of these communities together temporarily in the classroom for PME. But without a university system, these schools, instead of being able to collaborate, exchange, and work in better harmony with each other in support of what the Navy needs, are left on their own. And there is no one whose specific job it is to care about and advocate for their collective importance.

**Balancing the Urgent with the Important**

Without E4S (or something like it) the DoN, the Navy in particular, will continue to operate as an institution that does not see education as a vital warfare capability. The Navy has lots of bills to pay. Sixty percent of its fiscal year 2020 budget went to operations and maintenance and personnel. $120.6 billion out of a total $205.6 billion. But retrenchment is likely coming. In terms of dollars, investing in a university system would be a relatively cheap and effective way to continue to work toward greater naval readiness and integration. It would allow the Navy to better balance the urgent (training, operations, personnel, and procurement) with the important (education). E4S clearly needs a new champion for this to work. The new Secretary of the Navy could hire another CLO, reengage with the reforms started in 2019, and rescue the endeavor from oblivion.

As a military/naval historian and educator who taught at the Naval Academy for two years, I am biased. I want this to happen for my former students who are entering a world fraught with new challenges. They will be required to sacrifice more than they (or we) know to serve their country and lead and train their sailors and Marines. If the Navy takes steps to become a true learning institution that places greater value on education, they will be more successful for those endeavors and better prepared for the future.
I am not alone. The instructors and professors at these schools want their students to succeed in their careers. They want these students able to think critically, analytically, and strategically. They also want their institutions to better serve students by fostering their educational growth. This is important, because if their students can grow and succeed via education, then the Navy and Marine Corps will succeed. When that happens, despite rather dark clouds gathering over the Pacific Ocean once again, this country has a brighter future.

Bring Back Education for Seapower | Proceedings - April 2021 Vol. 147/4/1,418 (usni.org)

Return to Index

RESEARCH:

NPS Establishes Climate and Security Network for Research Collaboration, Accessibility
(Navy.mil 22 Apr 21) … Mass Communication Specialist 3rd Class James Norket
(NPS.edu 22 Apr 21) … Mass Communication Specialist 3rd Class James Norket

On January 27, President Joe Biden signed an executive order to tackle climate challenges at home and abroad, which both elevates and frames climate concerns within a national security perspective. Responding swiftly, the Naval Postgraduate School (NPS) launched the Climate and Security Network, connecting NPS faculty with relevant expertise across campus together, along with staff, students and even alumni, ready to collaborate on important research and support related educational efforts.

The network was established March 12 to connect faculty, students and researchers at the university who are engaged in climate and security issues, and provide opportunities for interdisciplinary learning and problem-solving. In this way, the network bridges experts from different organizations, including the Meteorology and Oceanography departments, the Energy Academic Group, the Center for Infrastructure Defense and others. The network presents the collective, relevant expertise at NPS to the Pentagon, to help solve climate change challenges in the Navy and the Department of Defense (DOD) as a whole.

“We wanted to pull together the folks at NPS who are doing this work and to give them a way to collaborate easier on these issues, and to share information about their research and expertise,” said Kristen Fletcher, a faculty associate for research in the Energy Academic Group (EAG). “Someone in oceanography may be doing something that’s particularly relevant to someone in systems engineering or national security affairs and meteorology.

“We also wanted to present this network to the Navy and DOD to help meet the mandates of these new executive orders,” she continued. “This is the research and expertise that NPS can bring to the table.”

NPS approaches climate change and its effects from many different angles, such as how can the university help develop new, or utilize already-discovered technologies, to reduce the greenhouse gases that the DOD produces? In other words, how can NPS help combat problems that climate change creates?

According to Dr. Tom Murphree, an NPS research professor in meteorology, NPS is the perfect place to study all things related to climate.

“We have people like me who deal with the science of change in the the physical environment,” said Murphree. “But then we have other people who focus on the operational impacts of climate change, and look at how climate change could destabilize countries. Other people take an engineering perspective and look at how we can engineer our bases, equipment, ships and planes so that we have less of an impact on the climate system.”

One of the first actions of the Climate and Security Network was to create a speaker series.

“We want to bring experts in from the outside who can give us different perspectives and then highlight for them the research that's going on at NPS,” said Fletcher.

The first speaker was John Conger, director of the Center for Climate and Security and chair of the Climate and Security Advisory Group.
Conger spoke about the administration’s executive orders on climate change and how it will affect the DOD. He spoke on the strategic advantages that come with studying changes in the environment, as well as the humanitarian benefits. After his presentation, he took time to answer questions from students and faculty.

“The benefit of having Mr. Conger kick off our Speaker Series is that he provided details on the Executive Orders and climate and security mandates of the Biden Administration and put it into context by drawing on his experiences at Department of Defense,” said Fletcher. “That helped spark discussions about how DOD will meet its mission in the future while considering climate and security priorities.”

The network is still in its early stages, but Fletcher has big hopes for the program. She said that while the first few speakers will be from external sources, by the summer, it will focus on research conducted by NPS students and faculty who can share their expertise with the Navy and Department of Defense.

The creation of the Climate and Security Network is a step forward for NPS in climate and security, highlighting the work that has been conducted here for decades.

“My hope is that the network will advance the research and expertise from NPS that goes back decades, both in terms of scientific expertise as well as security policy,” said Fletcher. “By integrating climate and security issues better into our curriculum, then our students will be better prepared on their next assignment. So when they leave they can start integrating those changes wherever they go, and they will have a broader impact as leaders.”

NPS Establishes Climate and Security Network for Research Collaboration, Accessibility - United States Navy - News - Stories

NPS Establishes Climate and Security Network for Research Collaboration, Accessibility - Naval Postgraduate School

Return to Index

FACULTY:

Navy, Coast Guard Consider Network Tech to Hedge Against Illegal Fishing [Audio Interview]
(Federal News Network 26 Apr 21) … Scott Maucione
(PodCast One 21 Apr 21) … Tom Temin (Audio Interview)

The Navy and Coast Guard spend a lot of time on the water, but few would associate the services with one of the most synonymous creatures of the sea: fish.

However, as the United States continues to view China as a global threat, fishing is becoming a hot button issue, and the Navy and Coast Guard are looking to state-of-the-art technologies to address it.

Late last year, a Chinese fishing fleet of more than 300 boats showed up off the western coast of South America. The move drew the ire of countries that claimed that area as economically exclusive.

“The local folks have no ability to monitor large fishing fleets moving through their areas, they’re certainly not going to build a navy to go do those kinds of things,” Ray Buettner, director of the Sea, Land, Air Military Research initiative at the U.S. Naval Postgraduate School, told Federal News Network. “There’s the threat of organized crime, whether it be human trafficking or drug smuggling, the coastal areas are seeing a lot of traffic. Our ability to understand what’s going on there, not just as the United States, but including the island states, is challenged by these vessels.”

In early April, the Navy and Coast Guard started a joint mission to combat illegal, unreported and unregulated fishing.

“Independence-variant littoral combat ship USS Tulsa, with an embarked Coast Guard law enforcement detachment from the Pacific Tactical Law Enforcement Team are conducting maritime law enforcement operations through the enforcement of international law and the Western and Central Pacific Fisheries Convention in order to protect United States and Pacific Island Nations’ resource security and sovereignty,” a statement from the U.S. Navy Pacific Fleet states.
Buettner said it’s estimated that 30% of global fish catches are unreported, coming out to about $50 billion lost in global revenue. It also endangers the well-being of threatened species and environments.

While the military is giving more attention to the issue and deploying troops, it can’t be everywhere at once. Buettner said one way to better intelligence without deploying more ships to the vast expanse of the ocean is using networks. “One option is we can physically put a maritime domain awareness solution using radar, artificial intelligence, thermal and optical cameras,” he said. “We put these on top of this power generating buoy or a platform with high speed, high bandwidth communications, whether it’s through 4G, if we’re within range of an asset that has that capability, or through satellite.”

George Kirby, CEO of Ocean Power Technologies, says buoys like these have persistent power sources and therefore can detect waves, dark vessels and then use that information to find patterns. “The fact that you can put a sustainably powered buoy out into the ocean environment and use it to power and operate and increase awareness through a fleet of autonomous vehicles, subsurface and surface area is a really powerful idea,” Buettner said.


**Biden breaks with predecessors, calls 1915 mass killings of Armenians a genocide**

(Th eWeek 24 Apr 21) … Tim O’Donnell

While addressing Armenian Genocide Remembrance Day on Saturday, Biden said "the American people honor all those Armenians who perished in the genocide that began 106 years ago today." The statement fulfills a campaign promise Biden made to Armenian-Americans, and makes him the first president in 40 years to call the mass killings of Armenians by the Ottoman Empire in 1915 a genocide.

Biden's gesture is significant for Armenia and its diaspora, and it's not controversial among most historians, who estimate that 1.5 million Armenians were systematically killed in 1915. But, as is often the case, politics have rendered the language debate more challenging for the U.S. For instance, former President Barack Obama also made a campaign promise to call the killings a genocide; ultimately, though, he refrained from using the politically-charged term. Former President Ronald Reagan was the last commander-in-chief to do it, but he too backtracked, Bloomberg notes. Their reason? Turkey, the successor state to the Ottoman Empire and a strategic, complicated U.S. ally that claims the killings were in response to an armed Armenian rebellion.

There's no doubt Biden's decision to follow through — despite the fact that he warned Turkish President Recep Tayyip Erdogan about what was coming — will drive a wedge between Washington and Ankara. Turkey's Foreign Minister Mevlut Cavusoglu has already said the government rejects Biden's statement, and his ministry said the U.S. had "opened a deep wound that undermines our mutual trust and friendship.”

Ryan Gingeras, a professor at the Naval Postgraduate School who focuses on Turkey, writes in The Washington Post that Biden's willingness to break with his predecessors likely stems from the fact that that his administration is losing patience with Turkey and its worsening human rights record. The decision "is as much a testament to changing political realities as it is a clear vindication of historical truth," he writes.

Biden breaks with predecessors, calls 1915 mass killings of Armenians a genocide (theweek.com)
ARHT Media Installs HoloPod™, HoloPresence™ and Capture Studios with two Military Organizations in Q1 2021 Valued at over $450,000

(Original News Wire 20 Apr. 21)

ARHT Media Inc. ("ARHT" or "the Company") (TSXV: ART), the global leader in the development, production and distribution of high-quality, low latency hologram and digital content, is pleased to announce that in Q1 2021 it installed it’s HoloPod™ and HoloPresence™ Display technology, as well as Capture Studio Kits with two military organizations in three separate countries with a value over $450,000. The primary uses of the technology will be for military training and education. In one case these permanent installations are a pilot program that has the potential to be rolled out to many additional countries.

“Education and training are two very strong use cases of ARHT’s technology suite,” stated ARHT CEO Larry O’Reilly, “and if this initial pilot program delivers on the client’s expectations, then it could possibly lead to the build out of a very large network within the organization. The program is expected to save the organization hundreds of thousands of dollars annually by reducing the need for air travel.”

In April, ARHT Media engaged with retired NATO technology expert, Sean Midwood, to advise the company in its sales and marketing strategy with military organizations globally. Mr. Midwood, holds a Masters of Electrical Engineering Degree from the United States Naval Postgraduate School and prior to retirement was the Chief of Staff to the Director of Service Strategy (formerly Chief Technology Officer) at NATO’s C&I Agency (formerly C3 Agency) in the Netherlands following a distinguished career with the Royal Canadian Navy.

“I could only dream of being able to deploy a capability like ARHT Media’s, when I was in the military and with NATO, that had the ability to deliver meaningful enriched communication without having to travel. This would be a key asset and force multiplier for any military organization today,” commented Sean Midwood. “I am looking forward to strategically advising the entire ARHT team to help showcase this revolutionary technology for a number of military and whole of government applications.”

Amphibious Squadron 3 changes command

(Commander Pacific Fleet 21 Apr. 21) … Mass Communication Specialist 2nd Class Kristopher Haley

U.S. Navy Capt. Henry Kim relieves Capt. Stewart Bateshansky as commander of Amphibious Squadron 3 during a ceremony aboard USS Makin Island (LHD 8). (U.S. Navy/MC2 Michael J. Lieberknecht)

U.S. Navy Capt. Henry Kim assumed command of Amphibious Squadron 3 (CPR 3) from Capt. Stewart Bateshansky during a ceremony held aboard the amphibious assault ship USS Makin Island (LHD 8) April 20.

Bateshansky assumed command of CPR-3 in January 2020, and will go on to serve at the Office of the Chief of Naval Operations at the Pentagon in Arlington, Virginia.

"We expected to be here in the Pacific," said Bateshansky. "ARG and MEU together. However, the entire journey from that day to now, nothing went according to what was drawn up, what we expected. But yet here we are, finishing with the precision and style this team has built over that time."

As CPR-3 commanding officer, Bateshansky guided warships under his command through all phases of advanced and integrated training and deployment, and led the amphibious ready group during the COVID-19 pandemic, assisting the first west coast ship to suffer from an outbreak while away from homeport. He led the crew of the Makin Island Amphibious Ready Group while underway in the U.S. 3rd, 5th, 6th, and 7th Fleet areas of operations and was awarded the Legion of Merit.
"I am proud to be able to take over your legacy, and I promise to continue and build upon what you have made here," said Kim. "Along with the PHIBRON 3 staff, I feel really well prepared to take over what we have all built. My goal here is to get you home on time and safely. I'm here to serve you; I am here to serve the Sailors and the Marines of the ARG."

Kim was commissioned in 1996 through the Naval ROTC program at the University of California, Los Angeles, where he received a bachelor's degree in international relations. He holds a dual master's degree in operations research from the Naval Postgraduate School and a master's degree in defense systems and technology from the National University of Singapore. He previously served as Commander, Mine Division 12 in San Diego.

The Makin Island Amphibious Ready Group and the 15th Marine Expeditionary Unit are operating in the U.S. 7th Fleet area of operations as part of a scheduled deployment to the region. As the U.S. Navy's largest forward-deployed fleet, 7th Fleet routinely operates and interacts with 35 maritime nations while conducting missions to preserve and protect a free and open Indo-Pacific Region.

Amphibious Squadron 3 changes command | Commander, U.S. Pacific Fleet (navy.mil)

Sarcos Robotics and Rotor Acquisition Corp. Announce Board of Director Nominees for Post-Merger Public Company

(Street Insider 21 Apr. 21)

New board to be comprised of industry experts from a variety of industries covering the technology, software, manufacturing, aerospace, and defense sectors.

Director nominees include the VP Operations at Apple Priya Balasubramaniam; former CEO of Credit Suisse USA, and CEO of Rotor Acquisition Corp. Brian Finn; former Microsoft CFO Peter Klein; VP of Operations Technology and Innovation at Delta Air Lines Matt Muta; former USSOCOM Commander Admiral (Ret) Eric Olson; former VP of The Boeing Company Laura Peterson; former Nextel CEO and Sotheby's CFO Dennis Weibling; and Sarcos CEO Ben Wolff.

Sarcos Robotics ("Sarcos"), a leader in the development of robots that augment humans to enhance productivity and safety, and Rotor Acquisition Corp. (NYSE: ROT.U, ROT, and ROT WS) ("Rotor"), a publicly-traded special purpose acquisition company, today announced the nominees for the board of directors of the combined company. The director nominees have extensive experience both in the industries that Sarcos intends to serve as well as in the production and delivery of complex hardware and software solutions. The pending merger between Sarcos and Rotor is expected to close in Q3 2021, with the combined company’s common stock expected to trade on Nasdaq under the ticker symbol STRC.

Sarcos Chairman and Chief Executive Officer Ben Wolff would continue to lead the new board of directors. Joining Wolff on the combined company’s board of directors after closing would be:

**Priya Balasubramaniam**
Vice President, Operations, Apple

Ms. Balasubramaniam is a very experienced executive with nearly 20 years of experience in a range of senior Procurement and Operations roles at Apple. She currently oversees all Core Technologies Operations and iPhone Operations for the company.

Ms. Balasubramaniam holds a Bachelor’s in Mechanical Engineering from Bangalore University and an MBA from Michigan State University.

**Brian Finn**
Chief Executive Officer of Rotor and former CEO of Credit Suisse USA

Mr. Finn is a 35+-year veteran of the financial services industry. In addition to his role as CEO of Rotor, Finn serves as Chairman of Covr Financial Technologies, an Investment Partner at Nyca Partners,
Chairman of Star Mountain Capital, and a member of the boards of directors of Scotts Miracle-Gro and Owl Rock Capital, along with several early-stage companies.

Mr. Finn also served in a variety of roles for Credit Suisse, including as CEO of Credit Suisse USA and Chairman and Head of Alternative Investments.

Peter Klein
Former Chief Financial Officer of Microsoft

Mr. Klein served as CFO of Microsoft for four years, from 2009 through 2013. He began at Microsoft in 2002 and served as the CFO of several business units within the company prior to becoming the company CFO.

He currently serves on the board of directors of Accolade, Inc., Denali Therapeutics, and F5 Networks.

Mr. Klein holds a Bachelor’s degree from Yale University and an MBA from the University of Washington.

Matthew Shigenobu Muta
Vice President, Innovation of Delta Air Lines

Mr. Muta has over 30 years of experience with roles in Leadership, Emerging Technologies, Envisioning, and Innovation.

Mr. Muta oversees an organization within Delta that drives innovation through exploration, rapid prototyping, envisioning and the development or investment in new technology.

Prior to Delta, Mr. Muta served as Global Managing Director for Hospitality and Travel for Microsoft. He has served on and advised on various boards over the years.

Mr. Muta holds a Bachelor’s in Communications from Boise State University.

Admiral (Ret) Eric Olson
Former Commander of U.S. Special Operations Command

Retired Admiral Eric Olson served in the U.S. Navy and special operations forces for 38 years. He was Commander of U.S. Special Operations Command (USSOCOM) from 2007 through 2011 and Deputy Commander from 2003 through 2007. He currently leads a consulting company that supports several public and private corporations and non-profit organizations.

Admiral Olson serves on the board of directors of Under Armour and Iridium Communications and is an Adjunct Faculty Member at Columbia University’s School of International and Public Affairs. He is a graduate of the U.S. Naval Academy and Naval Postgraduate School.

Laura Peterson
Former Vice President of The Boeing Company

Ms. Peterson’s experience spans the industrial, technology, transportation, and logistics sectors.

Ms. Peterson served as Vice President, China Business Development, for Boeing Commercial Airplanes from 2012 to 2016. From 1994 to 2012, she held a series of executive roles at Boeing in aircraft sales, international business development, government relations, and homeland security. She currently serves on the board of directors of Air Transport Services Group.

Peterson holds a B.S. in Industrial Engineering from Stanford University and an MBA from The Wharton School.

Dennis Weibling
Managing Director of Rally Capital

Mr. Weibling is Managing Director of Rally Capital, a private equity firm based in Kirkland, Washington, which primarily invests in telecommunications companies.

Mr. Weibling previously served on Sotheby’s board of directors and as Chairman of the audit and finance committees. He served as interim CFO at Sotheby’s until March 2016. Mr. Weibling also served as CEO of Nextel Communications and was on the board of directors for Nextel.
**Ben Wolff**
Sarcos Chairman and CEO

Mr. Wolff serves as the Chairman, CEO, President and is the largest shareholder of Sarcos Robotics. Previously Mr. Wolff served as CEO, President, and Chairman at Pendrell Corporation, co-founder and co-chairman of Clearwire Corporation, and as President of Eagle River Investments, a telecom and technology investment fund. Additionally, Mr. Wolff served as a director of the Cellular Telecommunications Industry Association (CTIA) and is currently a member of the board of directors for Globalstar.

Mr. Wolff earned his law degree from Northwestern School of Law, Lewis & Clark College in Portland, Oregon in 1994, and his Bachelor of Science degree from California Polytechnic State University in 1991.

[Sarcos Robotics and Rotor Acquisition Corp. Announce Board of Director Nominees for Post-Merger Public Company (streetinsider.com)](streetinsider.com)

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**From cliffs to the sky, Chickasaw John Herrington’s journey as an astronaut**
*(Oklahoman 22 Apr. 21) … Melissa Rosenfelt*

As children we all look up to the stars with wonder and amazement as our eyes cast over the vast limitless sky, imagining what it would be like to float weightlessly among the stars.

John Herrington was fortunate to see those stars up close as the first Indigenous NASA astronaut to step from Mother Earth and walk with Father Sky.

Back on Earth, Herrington is still immersed in wonder and amazement with his latest project, "Into America’s Wild," an IMAX film narrated by Morgan Freeman that unveils the little-known wild and lush landscapes across the country. In the film, Herrington trailblazes across the nation and immerses viewers in discovery of the most fascinating and ancient locations in the United States.

A member of the Chickasaw Nation of Oklahoma, Herrington flew aboard the STS-113 Endeavor in 2002 and took a feather, a hand carved flute and the Chickasaw Nation flag on the 16th shuttle mission to the International Space Station. The flute and feather can be seen on display at the National Museum of the American Indian in Washington, D.C.

Born in Wetumka and a graduate of Plano High School in Texas, Herrington was climbing cliffsides as a surveyor before being encouraged to pursue engineering and mathematics by a friend and mentor. After graduating from the University of Colorado and then a master’s degree in aeronautical engineering from the Naval Postgraduate School in 1995, Herrington was selected by NASA for the astronaut program in 1996. Two years later, he was assigned as mission specialist for the Endeavor.

An Indigenous Scientific Storyteller, Herrington now travels the world to talk about his experiences as an astronaut for NASA and recently participated in the Bold Frontiers production with the Apollo Chamber Players in Austin, Texas. He narrated the story of the historic Earthrise photo at the 50th anniversary celebration of the Apollo 11 moon landing. Chickasaw member and music composer, Jerod Impichchaachaaha’a Tate's music accompanied the performance.

When asked why he is compelled to combine his oral storytelling traditions with his love for science, Herrington said: “Our ancestors survived so we can be here; they were natural problem solvers and engineers. The structures they built and the decisions our ancestors made speaks volumes to me, as an engineer and from a leadership perspective.”

Ancestral Indigenous people used engineering, astronomy and science to build structures that stand to this day — Mesa Verde built by the ancestral Pueblo people and the Gila Cliff Dwellings in New Mexico where Mogollon built dwellings into the mountain in the 1200s.
Even though these wonders of the world were built by ancestral Indigenous engineers, only .6% of Indigenous students pursue master’s degree in STEM fields today, a percentage that Herrington is determined to change through his work with the American Indian Science and Engineering Society.

A passionate advocate for AISES, he participates in the annual conference where he encourages Indigenous students to change the world through innovation and science.

“I’ve been able to go out and share my story with others since 1995, and I’ve been fortunate to talk to people who as kids didn’t know they could become engineers and are now coming back years later as engineers,” Herrington said. "It’s been a huge part of my life to be able to speak and encourage people, and I’m really fortunate to have that."

How John Herrington became first Indigenous astronaut in space (oklahoman.com)

L.A. school board names Megan Reilly, head of business services, as interim superintendent
(Los Angeles Times 23 Apr. 21) … Howard Blume

The Los Angeles Board of Education has appointed Megan Reilly, who oversees the district’s massive finance, business and operations arm, as interim superintendent two days after schools chief Austin Beutner announced he would not seek a new contract when his current agreement expires on June 30.

Beutner had suggested that the board should choose a current member of his senior staff for the permanent job — for the sake of continuity. But the Board of Education is not prepared to go that route. Instead, Reilly will serve while the board begins a formal search.

It was not immediately clear whether Reilly wishes to be a candidate for superintendent. Beutner is expected to stay on through June and coordinate closely with Reilly. No major departures in policy would be expected under Reilly during this interim period.

Superintendent searches can take a year or more, but can sometimes be concluded quickly. Beutner said an insider could be in place in time to welcome students back in the fall.

Reilly is deputy superintendent and, based on her current responsibilities, appears to be the most senior administrator after Beutner. She has frequently served in his place at meetings of the Board of Education. Her specific areas of responsibility have been business services and operations, which include facilities, finances, technology, school culture and safety, according to a recent district organization chart. She has not had responsibility over instruction and for services to students with special needs.

Reilly, 55, is on her second tour of duty with the nation’s second-largest school system.

She had served as chief financial officer for L.A. Unified before becoming chief business officer for the Santa Clara County Office of Education in 2017. The veteran business manager returned to L.A. Unified in 2019 to become deputy superintendent.

“I am excited to return to Los Angeles Unified,” Reilly said at the time. “I love the work. I know many of the people and the communities we serve. I believe in the strength and beauty of Los Angeles Unified’s community of schools, which is all about the people. This work has taught me the social and moral responsibility that we adults must make a positive difference in a child’s life. I look forward to the work ahead with the team on behalf of students.”

Her previous departure from L.A. Unified appears to have been amicable. She had been notable, in part, as the town crier of bad financial times ahead. When she left, L.A. Unified faced budget challenges from declining enrollment, high fixed costs, rising pension obligations and costly retiree health benefits.

As befitting her role of financial steward, Reilly spoke publicly of potentially dire consequences to come and spoke even more bluntly behind the scenes, sometimes warning that current spending practices and union contractual obligations were unsustainable.
“It’s scary,” Reilly said about looming retiree healthcare obligations in 2015. “It has been a growing concern that our liabilities have been increasing year after year and slowly becoming larger than our assets. We’re not there yet, but we probably have a couple of years to go.”

She later oversaw the work of an independent panel of experts that, in the end, essentially agreed with her concerns about the future.

That same year, she warned internally that the district’s first pay raise in years was too generous. She lost that argument.

She returned to the school system in the wake of the January 2019 teachers strike, which resulted in a contract that district critics called unsustainable.

The district avoided the predicted day of financial reckoning thanks to a growing state economy. That growth came to an abrupt end with the economic shutdowns of the COVID-19 pandemic, but imminent financial peril was avoided due to state and government aid. This assistance has brought substantial resources to the district, at least for the next two years. The picture after that is uncertain.

During the pandemic, Reilly helped oversee the district’s Grab & Go meal distribution centers, the allocation of computers and internet hot spots to students and educators, and the planning for reopening campuses. Elementary schools opened with a half-time in-person schedule over the last two weeks. Middle and high schools open next week, also on a half-time schedule.

Reilly has more than three decades of experience in business services, working in various roles including as a budget analyst and comptroller. But she’s not an L.A. Unified lifer. She spent 17 years in the federal civil service in Northern California, holding administrative positions with the Naval Postgraduate School and the Fleet Numerical Meteorology and Oceanography Center, including as chief business executive.

She first joined the school system in 2007, one of the district’s last major imports from the Navy, during the administration of Supt. David Brewer, a retired admiral. The Navy connection, however, was well established before Brewer’s 2006 arrival. By then, the district had brought in a fleet of former naval officers to resurrect the district’s school construction and modernization program, which became the largest such effort in the nation.

Reilly has a bachelor’s degree in history from Loyola University, a master’s in management from Naval Postgraduate School and a law degree from Monterey College of Law.

L.A. school board picks interim superintendent, launches search - Los Angeles Times (latimes.com)

The Lessons of Service Squadron TEN, with Ryan Hilger [Audio Interview]

Home is thousands of miles away on the other side of the great Pacific Ocean. A deadly and relentless enemy is challenging ships and sailors for every island, cove, sea and shipping lane.

There is no time – or yardspace – for damaged ships for travel home for repairs or resupply. Large shore facilities and ports anywhere near the fight are either under enemy control, or too dangerous and damaged to be useful.

How can the US Navy fight and win under these circumstances? We know the answer. We’ve been here before.

How can the war games of a century ago, and the war they helped win less than two decades later, help us today as we face another rising power in the Western Pacific?

For the full hour this Sunday from 5-6pm Eastern to discuss this and related questions, will be Lieutenant Command Ryan Hilger, USN. We will use as a starting point for our conversation his recent article over at CIMSEC, Service Squadron TEN and the Great Western Naval Base.

Ryan is a Navy Engineering Duty Officer stationed in Melbourne, Florida. He has served on USS Maine (Gold) and USS Springfield as Chief Engineer. He holds a masters degree in Mechanical Engineering from the Naval Postgraduate School.