NPS PRESIDENT:

Rebalancing the Science and Art of War for Decision Advantage

(USNI 31 Aug 22) … Vice Admiral Ann Rondeau, U.S. Navy (Retired)

Creating the intellectual overmatch and mental agility that we require cannot be achieved by intermittent education or by past experience alone. It is created by the purposeful combination of education, training, rigorous exercises, and application in the real world… Today, strategic competition is fundamentally an innovation race. To prevail, we must quickly secure technological advantage, as well as the cognitive agility to employ it effectively. This is technological leadership, a term used in the revised mission statement for the Naval Postgraduate School (NPS), explained in an earlier Proceedings article. Since then, we have been thinking deeply across the Naval Education Enterprise about the character and nature of war, the role of education and research, and the future of learning for naval forces.

EDUCATION:

NPS, Partners Develop Executive Course on AI/ML Foundations for Senior Leaders

(Navy.mil 2 Sept 22) … Matthew Schehl
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The Naval Postgraduate School (NPS), in partnership with Stanford University and the Defense Innovation Unit in Silicon Valley, developed an intensive three-day course specifically for senior defense leaders on the emerging role of Artificial Intelligence and Machine Learning (AI/ML) in the military.

RESEARCH:

NPS Students Explore Naval, Defense Applications of Hybrid Airship Technology

(Navy.mil 1 Sept 22) … Rebecca Hoag
(NPS.edu 1 Sept 22) … Rebecca Hoag

Airships were once a common sight in the skies above America, Europe, Asia, and Australia. Airlines used these giants of the sky to convey passengers and freight across vast distances, while militaries used them to patrol vital sea lanes to provide early warning of trouble and a persistent deterrent to enemies. Explorers even used them to venture to places otherwise unreachable such as the North Pole.

FACULTY:

Innovation: People Are More Important than Technology

(USNI 14 Aug 22) … General Anthony Zinni, U.S. Marine Corps (Retired), Mie Augier, and Major Sean F. X. Barrett, U.S. Marine Corps

Innovation lies at the heart of American security. Now, huge advances in AI and edge computing and nanotechnology are already underway in America…Nobody innovates better than the United States of America. But we can’t take that for granted… Dr. Augier is a professor in the Departments of Defense Management and Defense Analysis at the Naval Postgraduate School. She is a founding member of the Naval Warfare Studies Institute and is
interested in strategy, organizations, leadership, innovation, and how to educate strategic thinkers and learning leaders.

**In Protecting The KGB, Gorbachev Laid The Foundation For Putin’s Gangster-State**

*The Federalist 3 Sept 22* … J. Michael Waller

The notorious KGB chairman Yuri Andropov recruited Mikhail Gorbachev, cultivated him, and placed him in the Kremlin leadership to ultimately take power. Once he led the Soviet Communist Party, Andropov’s recruit protected and rewarded the Soviet secret police by making it off-limits to any truth-telling, accountability, or reform… J. Michael Waller is senior analyst for strategy at the Center for Security Policy. His areas of concentration are propaganda, political warfare, psychological warfare, and subversion. He is a former professor at the Institute of World Politics, a graduate school in Washington, DC. A former instructor at the Naval Postgraduate School, he is an instructor/lecturer at the John F Kennedy Special Warfare Center and School at Fort Bragg.

**Read H. P. Lovecraft To Understand War**

*(1945 5 Sept 22)* … James Holmes

You take your wisdom where you find it. In 2020, on impulse, I incorporated the “weird fiction” of H. P. Lovecraft, the grandmaster of the genre, into my recreational reading. I can’t remember exactly why. After all, that year was creepy enough without marinating in tales of monsters, demons, and ghoulish folk plaguing New England cities and towns. Maybe it was a form of escapism, substituting wild stories of dread for the real stories of dread that dominated headlines that year… That August, perchance, Naval Postgraduate School professor Leo Blanken ran an article over at Strategy Bridge inspired in part by Lovecraft’s writings. Titled “The Weird and Eerie Battlefields of Tomorrow: Where Horror Fiction Meets Military Planning,” the article draws on a literary critic of whom I had never heard, the late Mark Fisher. After reading it I downloaded and devoured a copy of Fisher’s monograph The Weird and the Eerie through the wonders of Kindle. Together these works make a useful addition to your armory of implements for thinking about martial affairs, not to mention politics and life in general.

**ALUMNI:**

**Hedging with Humility: Reassessing China’s Power Projection Capabilities Against Taiwan**

*(War on the Rocks 1 Sept 22)* … Collin Fox, Trevor Phillips-Levine and Kyle Cregge

The Marine Corps tested the first Higgins boat with a bow ramp in June 1941, only 14 months before amphibious landings in Guadalcanal and only 24 months before Sicily. American industry churned out over 20,000 of these boats that Dwight D. Eisenhower singled out as decisive… Collin Fox is a U.S. Navy foreign area officer. He has participated in BALTOPS and BOLD ALLIGATOR live amphibious exercises as a staff operations and plans officer and is a graduate of the Chilean Naval War College and the Naval Postgraduate School. He has written for War on the Rocks, Proceedings, the War Room, and CIMSEC, where he is a senior editor.

**New San Ysidro Port Director Mariza Marin**

*(CBP 31 Aug 22)*

U.S. Customs and Border Protection is announcing the appointment of a new Port Director at the San Ysidro Port of Entry, Mariza Marin… Prior to her assignment as Port Director, Mariza Marin served as Chief of Staff for the CBP Office of Field Operations’ Executive Assistant Commissioner. She also worked as the Director for Border Security at the White House National Security Council. Her work included the development and implementation of policies to strengthen border security across the nation and curb irregular migration. Marin is a graduate of the Naval Postgraduate School, Center for Homeland Defense Studies, Executive Leaders Program.

**What Did You Sign Up For?**

*(USNI 1 Sept 22)* … Andrew Bishop

Leading up to my first day in officer training, I was given a copy of A Sense of Honor by James Webb. The book describes the lives of midshipmen at the U.S. Naval Academy during the Vietnam War. Webb grapples with the idea of the Academy changing from a place that trains “warriors” to one focused on creating technically and academically proficient officers… Lieutenant (j.g.) Bishop, a 2019 graduate of the U.S. Naval Academy, attended the Naval Postgraduate School after commissioning and earned a master’s degree in aerospace engineering. He is currently in the aviation training pipeline.
Alfred Poirier Named Deputy Fire Chief Of Beverly Hills
(Canyon News 1 Sept 22)

The city of Beverly Hills has selected Alfred Poirier, a veteran with 35 years of firefighting experience to become the next Deputy Fire Chief for Beverly Hills. According to a news release from the city… Chief Poirier earned his Bachelor of Science in Emergency Services Management from Union Institute and University, and Master of Arts in Security Studies from the Naval Postgraduate School in Monterey, CA.

Decision Lens Hires Michael J. Browne, Rear Admiral US Navy (Ret) to serve as Senior Vice President
(Ein news 1 Sept 22)

Decision Lens is excited to announce the appointment of Michael Browne to Senior Vice President. Mr. Browne brings a rich, well-aligned background of military and private sector experience which will be critical as Decision Lens expands its footprint across the Navy and beyond… Mr. Browne is a graduate of the U.S. Naval Academy and holds advanced degrees from the Naval Postgraduate School, the University of Chicago Booth School of Business (MBA), and the Eisenhower School at the National Defense University (in National Security Strategy and Resource Planning).

In his military career, Mr. Browne ultimately retired as a Rear Admiral, after serving on active duty as a nuclear engineer in operational assignments on fast attack and ballistic missile submarines, and in engineering duty reserve assignments across Navy Systems Commands. His roles included Senior Fellow at the CNO’s Strategic Studies Group, Deputy Chief Engineer at NAVSEA, SPAWAR, and NETWARCOM, Director of (OPNAV) Personnel Programs, NAVSEA Executive Director, and NAVSEA Vice Commander.

Edmonds City Council Set to Confirm New Public Works Director Sept. 6
(Edmonds News 2 Sep 22)

After nine months of being without a public works director, the City of Edmonds is set to hire Oscar Antillon, who currently is the public works director for the Town of Los Altos Hills, California…According to his Linked In profile, Antillon is a graduate of the University of Utah, receiving a bachelor of science in civil engineering, then earned a master’s degree in information systems and technology at Naval Postgraduate School. Prior to his work at Los Altos Hills, served as the public works director in the City of Soledad, California.

City Presents Conditional Offer To Garretty for City Manager
(EIN News 2 Sept 22)

The city of Graham Wednesday made a conditional offer to Eric Garretty for the position of city manager. If accepted, Garretty will step in the position vacated by former Graham City Manager Brandon Anderson and filled temporarily by Interim City Manager Larry Fields…Garretty has a Master of Science in Management from Naval Postgraduate School and a Bachelor of Arts in Political Science from the University of Mississippi. Additionally, he is a member of the Texas City Management Association and is enrolled in the Texas State University Certified Public Manager Program.

Navy Combat Aviator Chuck Sweeney: ‘Timing Is Everything’
(Flying Mag 22 Sept 22) … Kimberly Johnson

In 1972, the Douglas A-4 Skyhawk pilot was awarded three separate Distinguished Flying Cross medals for strikes against the North Vietnamese, all conducted in the span of a week.

Navy Commander Chuck Sweeney began his Naval career as an engineer, testing electronic equipment but quickly became interested in flying. He set his sights on becoming a tailhook pilot, and while in Naval Postgraduate school, applied to fly the Douglas A-4 Skyhawk. It was a fortuitous career goal. In 1972, Sweeney was awarded three Distinguished Flying Cross medals for strikes against the North Vietnamese, all conducted in the span of a week. The DFC citation is awarded to members of the U.S. armed forces for acts of heroism or extraordinary achievement during aerial operations. Here are excerpts from a recent conversation with Sweeney, who is the current president of the Distinguished Flying Cross Society, lightly edited for space and clarity, as told to FLYING.
UPCOMING NEWS & EVENTS:
Sept 12-13: Blockchain and Beyond: National Security Symposium
Sept 13: Summer Awards Ceremony
Sept 15: Naval War College Summer 2022 Graduation
Sept 23: Summer Quarter Graduation
NPS PRESIDENT:

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Creating the intellectual overmatch and mental agility that we require cannot be achieved by intermittent education or by past experience alone. It is created by the purposeful combination of education, training, rigorous exercises, and application in the real world.

- Joint Chiefs of Staff, Vision and Guidance for Professional Military Education and Talent Management

In today’s all-domain, high-tech maritime battlespace, decision advantage is arguably the difference to prevailing in war. While enabled by technology, the commander’s education, experience, and judgment become critical factors to making not only sound decisions, but to developing the cognitive capability to outthink an adversary and take decisive, bold actions—especially in combat. Intellectual overmatch is the goal. Decision advantage is the result.

Decision advantage in war results from the rapid discernment of trusted information for a decision-maker to act confidently—and first. In fact, the Chief of Naval Operations NavPlan 2022 establishes decision advantage as one of six Force Design Imperatives: “Generate Decision Advantage: Naval forces will out-sense, out-decide, and out-fight any adversary by accelerating our decision cycles with secure, survivable, and cyber-resilient networks, accurate data, and artificial intelligence. Connecting sensors, weapons, and decision-makers across all domains enables naval forces to mass firepower and influence without massing forces.”

Paradoxically, as the machine-driven pace and volume of information in the Cognitive Era rapidly increases beyond human speed and comprehension, the same technology enables the distillation of information into actionable knowledge. Technology can influence the speed of decision and effect, but can it eliminate chance? Can machine learning replace human judgment to navigate uncertainty?

We talk competently about the evolution of technology and development of the tools of naval warfare, but less confidently about the evolution of mind and development of the cognitive capability of the warrior. We work on trying to reduce war and decision-making to algorithms and yet do not focus so much on the humans for whom those algorithms are being developed. Think about the nature of war as the “art of war”—its human dimension. It is often suboptimized, managed in stasis and viewed as secondary or too expensive to design and do effectively. Think about the character of war as the “science of war”—its technical dimension. While the conditions of war change, the nature of war does not. When facing an equally equipped adversary, decision advantage is the decisive difference. Thus, the imperative is to develop platforms and people with equal measure to elevate the science and the art of war.

Today, strategic competition is fundamentally an innovation race. To prevail, we must quickly secure technological advantage, as well as the cognitive agility to employ it effectively. This is technological leadership, a term used in the revised mission statement for the Naval Postgraduate School (NPS), explained in an earlier Proceedings article. Since then, we have been thinking deeply across the Naval Education Enterprise about the character and nature of war, the role of education and research, and the future of learning for naval forces.

Innovation, co-creation, and agility of mind and application have been and always will be essential factors in warfare. Cognitive agility is the intersection point of effect that brings knowledge to capability and provides decision advantage. Technology enables outcomes when warfighters are trained and educated to employ it effectively, with individual proficiency, collective mastery, and adaptive application.

Human-machine teaming tends to focus on the character of war. Though useful and necessary, this is only the start. The next phase to true cognitive agility and intellectual overmatch is to understand, discern, and advance the human ability to make decisions and to delegate certain decisions to machines. Here is cognition as a modern warfighting problem—can we address the unavoidable uncertainties that emerge from war by leveraging the science and art of war more effectively to outthink and fight more decisively against a peer adversary?
This problem is complex and requires more than a training mindset or an organizational culture that too often falls short of its own aspirations in the discussion between character and nature of warfare. The strategic and operational target sets are technology and intellectual overmatch. We need new technology as well as methods of education, learning, and culture change to make better and faster decisions in warfare.

**Knowledge: Empowered Decisions**

Consider command and control (C2). Arguably, it is the first among equals for warfighting requirements with decision-making at its core. In the complexity of multidomain operations, an extremely capable C2 is essential, with human, hardware, software, and network aspects all working in harmony. We need to train and educate humans to discern the flow of information ahead of the pace of battle. Only then do we get to a C2 that leads rather than lags. To cite the 2018 Secretary of the Navy Education for Seapower Report:

In fact, the character of war has already changed, driven by the ever-accelerating application of technological innovation streams by an increasing number of nations and other groups, all designed to rapidly increase lethality. Further, increased machine-mind teaming and digitization of the battlespace will alter the nature, or human dimension, of future conflict. Without our proactive intervention, the balance between the character and nature of war may quickly grow out of balance, with strategic surprise as the result.

Multidomain operations require leaders versed in multidiscipline education and training. Former 10th Fleet Commander, Vice Admiral TJ White, put an even sharper point on the matter. In 2019, he expressed a need to teach a certain number of information warfare officers about anthropology and language, as knowledge essential to better understanding cyber. His premise was that cyber begins first as a math and computer science problem and then an analytical problem. The problem is then compounded and fractalized by language and meaning and understanding how the person who writes algorithms thinks. This deeper and more integrated knowledge results in better understanding to develop the meaning and application of cyber. Without that interdisciplinary knowledge, we are partially blind in cyber and will be left surprised by what we missed. Vice Admiral White understood the balance of technology and people, and the integration of the science and art of war.

In principle, technology could reasonably be expected to remove the fog of war. In fact, it can make the fog of war even more intense, disorienting, and debilitating. As Captain Gerald Roncolato noted in his May 2022 Proceedings article on the character of war: “There is little discussion of the chaos of war, little room for surprise, chance, uncertainty and fear. As a result, while there are doctrinal statements alluding to the need for low-level initiative and decision-making, the reality is that these qualities are often ignored, if not discouraged.”

We can again use C2 to best illustrate the point. War is chaos. Both the character and nature of war are imperfect; together, they reinforce chaos. No amount of technology, AI with genius-level algorithms, or ubiquitous surveillance and smart weapons can eliminate this. We constantly strive to get through the chaos when we should instead embrace it as the opportunity to gain cognitive agility for decision advantage.

A key issue is who is making the decisions and at what level. Perfect insight is impossible, and decision-making is ideally done at levels far down the organizational structure, closer to the issues and responsive to the need. Ironically, if we do have perfect C2, perfect intelligence, and perfectly functioning intelligent autonomous systems, then we tend to centralize decisions, which can limit agility and tactical initiative. Perfect C2 can achieve an optimal balance between the science and art of war, enabling decision-making authority at the right levels in complementary ways through a common operating picture. Trust in both the decision-making system and the competency of the decision-maker is a prerequisite.

If we accept that at some point in war chaos will ensue and centralized C2 will lag the problem, then we should be more accepting of local and distributed decision-making. However, that situation profoundly depends on the individual warfighter and organizational culture. The value proposition of investing in education (and training) is that no matter where you are on the decision stack (organization)
or the state of play in your tech, you can have confidence in your human component. An educated leader is better equipped to identify and navigate uncertainty.

**Learning: Enabling Initiative**

As Trent Hone points out in his superb book Learning War, before the nuclear age and Cold War and certainly present in World War II for the Navy in the Pacific, the Navy did not have voluminous standing OpTasks, OpOrders, preplanned responses, or vast doctrines: “The dominant theme of the Navy’s doctrinal development . . . was aggressive action to seize and retain the tactical initiative.”

We must extrapolate and adapt that naval culture and mindset into the modern era of techno-warfare in the base sea of uncertainty, deeply capable competitors, and the constantly changing character of war. The highly leveraged individual as warfighter is essential and must be the intellectual constant.

Technology, both military and commercial, in tandem with human traits of will, heart and spirit, instincts, curiosity, imagination, resilience, innovation, invention, problem-solving, and grit are the exquisite balance we need to perfect. The human-machine interface can be brilliant, but in warfare it must also be lethally effective.

Are we moving fast enough and organized efficiently enough toward learning war more effectively in this age of dynamic technological and technical means of warfare? Captain Roncolato makes a disturbing observation: “Belief in the power of information technology to allow efficient application of force—with lower echelons being merely executors of plans devised and managed above them—persists.” If he is right, we are in big trouble.

Creating a C2 and information sharing system that services the right decision-maker at the right time for the right effect should be the objective. It varies in context, of course. Sometimes the situation calls for fleet commanders to make decisions at their level, and sometimes for the non-commissioned officer (NCO). The situation is very different for an E-4 aircraft maintainer on a carrier or an E-4 who just landed via special operations to kill a high value target. Each case has different rule sets and latitude; each is correct in its operational context. Learning enables proficient knowledge-based and situational initiative, as well as acute instincts toward individual command initiative. The point is that decision advantage is both vertical and horizontal—and in demand in an increasingly complex and furiously-paced environment. The quality of decision-making, instinct, and initiative is imperative at every level of effect and impact.

**Warfighting: Gaining Intellectual Overmatch**

I do not think that any amount of algorithmic precision will ever deal with how to counter the best-of-class of human instincts to win and survive. It seems to me that this is the essence of what we refer to as the art of war, as contrasted to the science and technology of war. They are all critical to success.

– Bran Ferren, former Defense Science Board member

The paradox in warfighting is that while we prize, hail, and reward initiative, we organizationally expect initiative as a natural phenomenon, rather than as a deliberately leveraged manifestation of considering the human being the decisive element. The further paradox is that as we pursue technologies such as unmanned systems, we distance the human from the system while also counting on the human to design, intuit, and interact with the system. We expect and will demand accountability at the point of decision-making. As such, the local human element—properly equipped both technically and cognitively—is essential to achieving intellectual overmatch and gaining decision advantage.

So, how do we get to the optimal balance? The answer is in part by overhauling how we think about education, learning, and innovation at the enterprise level. Here are some suggestions:

**For Knowledge:**

Create a compelling learning environment. Our people want the learning skills and abilities to get things done, enrich their lives, and deepen their knowledge. They no longer wait to learn material that is presented in a class and seek out learning opportunities that meet their needs. For example, learners at all levels will seek out YouTube videos to learn a skill, acquire the knowledge to accomplish a task, or expand their knowledge in a field of interest. We also need to acknowledge and act on the principle that
adaptation is essential to decision-making in often unexpected situations. Human interaction in the education experience, to include diversity of perspectives and problem-solving, online or in person, propels leaders at all levels to be ready for uncertainty.

Increase the pace and decrease the distance between learning and applying. Integrate acquisition and procurement processes that separate the building of production lines of ships and aircraft from the building of capability of networks, digital systems, and decision-advantage technologies. Develop acquisition processes that advance rather than constrain what is learned into capabilities. Revise current DoD 5000 acquisition to better address IT and C5ISR. Force Navy Systems Commands to fully integrate cyber into platform design. Work with Congress to get more multiyear funding and more flexible funding sources.

Reform the official recognition of learning and skills development. There is an increasing demand for certifications to demonstrate that learning can be translated into practice. Corporations offer upskilling opportunities to increase the number of technically competent people that can work on or with the systems they are deploying and maximize the value of the systems. Universities and schools are offering certifications from Project Manager Program to Certified Ethical Hacker in short courses and boot camps. Once considered training, these certifications are now part of a continuum of learning that marries the practical skills of training with the understanding of the underlying fundamentals of traditional education. For the learners, the artificial delineation of education and training is not only irrational, but also unhelpful.

For Learning:

Create and deeply embed a culture of continuous learning. We must define requirements through graduate education for all communities to ensure alignment and resourcing. We need more “action-learning” opportunities, which come from prioritizing continuous learning to maintain our decisive edge. This includes the mindset that everyone in the Navy and Marine Corps should be enrolled in the Naval Education Enterprise as a warrior-scholar. We must acknowledge learning as rank-agnostic and offer qualified NCOs every opportunity for learning experiences provided to officers. The whole force needs both training and education delivered to the point of need in ways that our policy framework currently does not support.

Reform the means of delivering and receiving professional learning. The optimal learning environment will blend synchronous and asynchronous, in-residence and distance learning, as well as individualized instruction and cohort models. This learning environment, ashore and afloat, will increase the demand on faculty to empower students in the learning journey over time rather than sharply defined classroom experiences. The blending of distance learning with in-residence experiences will create opportunities to reach underserved communities across the DoD and increase the overall pool of potential students that can participate in resident education programs. This implies a complete overhaul of the quota system that currently drives the Navy’s talent management system.

Loosen the constraints and prohibitions on integrating public/private sectors in shared ventures of learning and problem-solving. The U.S. innovation enterprise needs to be involved in shared learning with military experts to decrease strategic and operational vulnerabilities and increase aggregated advantage to mutual benefit. Mindful of the expectation for exemplary ethics, we need to close the distance between the public and private sector and exemplify through practice what the U.S. business and military ethos can do together. Seek Congressional relief to enable greater attendance of industry to our war colleges and technical schools.

For Warfighting:

Understand the warfighting problem. Without sufficient preparation in the cognitive dimension, our technological overmatch will come up short when the test comes. Decision advantage requires not only science and technology experts, but humanists and historians who understand the problem(s) in front of them and the context of the entire DoD lethality enterprise (technology ecosystem plus human decision environment) as strategic advantage. Algorithms are not enough. We must invest and innovate for the warrior “in” and “on” the decision-making loop. This includes accepting and embracing the chaos of war
and that given a capable adversary and dynamism of technology, the best preparation is to educate our warriors.

Initiate a prototype-to-scale model. Teach innovation leadership at all levels to empower initiative, support new ideas, and accelerate capability adoption. Establish naval education and innovation centers at fleet concentration areas to enable user-driven applied solutions. Create prototype-to-scale boards to vet/select ideas with a view toward fast-paced development and scaling to need. Streamline transition of operator-informed solutions to warfare centers, NavalX, NPS’s Naval Innovation Exchange, and/or industry partners and rapidly iterate prototypes with warfighters.

“Embrace the Red” and replicate the VCNO Learning to Action Board. Ensure leaders convene Learning to Action sessions across Navy competencies as part of the Navy’s Get Real, Get Better campaign, which is about continuous learning and rapid improvement. “Learn from failure faster to succeed sooner” is a culture challenge, and one we must address. We need to understand intersections and opportunities for integrated learning, innovation and knowledge application that we share towards greater fleet impact, warfighting applications and realization of desired outcomes.

The Naval Education Enterprise is a key enabler of intellectual overmatch and a partner in these ideas. While the U.S. Naval Academy is focused on developing new officers, the Naval War College, Marine Corps University, NPS, and new Naval Community College provide relevant ongoing education for the active force. For my part, as President of NPS, I am working with my team to not only transform our school, but to make NPS transformative as a catalyst for technological leadership and decision advantage. NPS is “where science meets the art of warfare.”

Old habits are hard to break, and war has a way of clearing old thinking, but at a tragic price. We must avoid this by viewing education as equally vital to U.S. seapower as platforms and weapons systems. In the Cognitive Era, we can combine the strengths of computers and humans to better navigate uncertainty. The imperative in today’s strategic competition is to leverage innovation and invest more deeply in our warrior-scholar future to thrive in the inevitable chaos of war. We need to act now to integrate technology, knowledge, and learning for decision advantage in a more dynamic and holistic manner. The nature of war is, after all, a human endeavor—one we seek to deter, but when necessary, to fight decisively and win.

Acknowledgements: I want to thank several leaders for their time, feedback and deeply enriching conversations that informed my thinking for this article including Lieutenant General Mike Dana, USMC (ret); Vice Admiral TJ White, USN (ret); Bran Ferren, CEO of Applied Minds; and Captain Gerard Roncolato, USN (ret), with special thanks to Captain Bill Sherrod, USN, and Mr. David Nystrom for their edits and shaping.

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EDUCATION:

NPS, Partners Develop Executive Course on AI/ML Foundations for Senior Leaders
(Navy.mil 2 Sept 22) … Matthew Schehl
(NPS.edu 2 Sept 22) … Matthew Schehl

The Naval Postgraduate School (NPS), in partnership with Stanford University and the Defense Innovation Unit in Silicon Valley, developed an intensive three-day course specifically for senior defense leaders on the emerging role of Artificial Intelligence and Machine Learning (AI/ML) in the military.

Developed under the direction of the DOD’s Chief Digital and Artificial Intelligence Office (CDAO), the inaugural executive AI course, held June 7-9, provided approximately two dozen General and Flag Officers, Senior Executive Service (SES) and other senior executives with a foundational knowledge of AI/ML systems, including technical cornerstones, practical implications, ethical guidelines and DOD-
specific problems and solutions. With the success and positive feedback of the initial event, additional courses are planned for November 2022 and February 2023.

“This is not about a new thing, a new shiny object,” noted NPS President retired Vice Adm. Ann E. Rondeau in kicking off the inaugural course. “This is a fundamental belief in the existential condition of the nation.

“Data and digital literacy, especially combined with quantum technology literacy, is a daunting task,” she continued. “It’s not meant for all of us to master this, but it’s important to be able to ask those hard questions and bring our teams together so that they can do this collaboratively, because this is truly a collaborative, interdisciplinary challenge.”

Artificial intelligence can be defined as machines making rational decisions and actions, or augmenting human intelligence for making better-informed decisions. A subset of AI, machine learning represents machines’ ability to learn, often from large amounts of data, to make fast, accurate predictions. The technologies have already brought extensive changes to the nation, from Internet search engines to self-driving automobiles, speech and handwriting recognition to medical diagnoses, and precision agriculture to computational economics. And more!

AI/ML systems have had a profound impact on the Armed Forces as well. Virtually every aspect of the military has been affected, not only in the emergence of new forms of warfare (e.g., unmanned and autonomous weapon systems, cyber warfare, and intelligence, surveillance and reconnaissance [ISR] platforms) but also in logistics, maintenance, procurement, global communications, operations research, manpower affairs, program management as well as new ethical considerations.

“Technologies like artificial intelligence and machine learning are going to play a key role in our national defense, and in our ability to keep pace with our adversaries,” noted course attendee U.S. Air Force Maj. Gen. Mark Slocum, Director of Global Operations, U.S. Air Force Air Combat Command. “Understanding these technologies is paramount, but not just from a technical perspective.

“This course was uniquely valuable in that it focused on providing critical information on AI and ML from the perspective of leadership, and how best we can shape our organizations and support our capable teams in leading the fight through the inception, implementation, and fielding of systems that embed this critical emerging technology,” Slocum continued. “The course content and speakers drew from a wealth of DOD examples, experiences and insights, which made it immediately relevant to my command’s mission and challenges.”

The CDAO was formally stood up in February 2022 to accelerate the DOD’s adoption of data, analytics and AI to generate decision advantage “from the boardroom to the battlefield,” notes the organization’s website. The organization is charged with building a strong foundation for data, analytic and AI-enabled capabilities to be developed and fielded at scale. A key part of this responsibility is ensuring the DOD has the “necessary people, platforms and processes needed to continuously provide business leaders and warfighters with agile solutions.”

Accomplishing this goal is what brought CDAO to NPS, Stanford University’s Human-Centered AI Institute and the Defense Innovation Unit in Silicon Valley to develop the initial executive AI course. Subjects covered included neural networks, DOD-specific ethical considerations, program management, operational experimentation and deployment, classified AI/ML projects and research, AI in the future of warfighting, and human-machine teaming, amongst others.

“Our speakers brought their wealth of experience in AI and ML to the table, and before a discerning audience who bear a lot of responsibility for adopting this new technology to keep our nation secure,” noted Associate Professor Mathias Kolsch in the NPS Department of Computer Science, the university’s lead on course development.

“The relevancy of the presented content was exceptional,” he added. “Faculty from NPS and Stanford’s Human Centered AI Institute (HAI), the Gordian Knot Center for National Security Innovation, and the Defense Innovation Unit, as well as three distinguished entrepreneurs of the Silicon Valley tech industry were able to convey it in a concise, highly informative, and engaging fashion.”

For U.S. Air Force Maj. Gen. Stacey Hawkins, Commander of the Air Force Sustainment Center, this was transformational.
“Not only did it strengthen connective tissue between key stakeholders within the USAF Air Combat Command senior directorate leaders [at the general officer level], it provided strategy recommendations for brokerage across the Air Force sustainment enterprise leveraging AI/ML as an enabler to the Air Force warfighting mission,” said Hawkins.

“The NPS lecturers were extraordinary as well as the key collaboration with Stanford University in broadening the academic discussion accounting for geopolitical factors,” he continued. “The symposium accelerated USAF Air Combat Command organization’s journey toward making AI/ML a part of our Combat Air Forces mission culture.”

As the development team shifts focus to future planned executive courses, Kolsch says the partners are well positioned to continue providing this critical support of the CDAO’s mission.

“We are very thankful for HAI to hosting us for one of the three days, to DIU’s essential contributions, and of course to the Workforce Education group, education staff, and organizers at the CDAO – and previous Joint AI Center – who shaped this course together with us and who extended their trust to NPS to hold this event,” he said.

NPS, Partners Develop Executive Course on AI/ML Foundations for Senior Leaders - Naval Postgraduate School

NPS Students Explore Naval, Defense Applications of Hybrid Airship Technology
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(NPS.edu 1 Sept 22) … Rebecca Hoag

Airships were once a common sight in the skies above America, Europe, Asia, and Australia. Airlines used these giants of the sky to convey passengers and freight across vast distances, while militaries used them to patrol vital sea lanes to provide early warning of trouble and a persistent deterrent to enemies. Explorers even used them to venture to places otherwise unreachable such as the North Pole.

Now fixed-wing, jet-powered airliners dominate air travel, but they’re a difficult technology to decarbonize. As the world looks to reduce emissions and consumption of fossil fuels, airships are getting a second look, specifically hybrid airships.

U.S. Marine Corp Capt. Benjamin Cohen and John Schmaltz Jr. initially stumbled across hybrid airships due to a different aspect of the climate crisis: wildfires. Around the time they began attending the Naval Postgraduate School (NPS) in mid-2020, the August Complex fire began burning in Northern California. They wondered if there were better ways to help put out the flames, and this led them to one of the many uses of hybrid airships. Their thesis, published in March 2022, ended up being a guide to help the DOD integrate a large-capacity mobility platform, through the example of a hybrid airship, into its fleet by partnering with the commercial sector, where hybrid airship innovation is occurring.

“We realized there’s a whole lot more we can and should do with this, so our thesis includes not only an analysis of the aircraft performance and how the DOD’s potential procurement of these aircrafts would affect the development cost and operating costs over time, but also when is the appropriate time for the DOD to join the process,” Cohen explains.

The students, with help from their advisors Drs. Nick Dew and Eva Regnier of the NPS Department of Defense Management, looked to modernize DOD’s approach to working with the commercial sector from just buying prototypes to developing a longer-term relationship with innovative companies. They specified in their thesis that they want the atlas to be a living document that “should be edited, adjusted, and improved as a technology proceeds forward.”
Cohen and Schmaltz presented the emissions-reduction aspect of hybrid airship technology as the second presentation in the Net Zero Briefings series presented by the NPS Climate and Security Network.

Hybrid airships are part of the “lighter-than-air” aviation family, which get their lift from helium (not flammable hydrogen like the Hindenburg.) Hybrid airships get their name because they combine conventional airship design with aerodynamic attributes, which give them forward momentum. Without it, the ship slowly sinks back down to Earth because the payload makes the airship a bit heavier than air, so it doesn’t just float up like a balloon. Because energy consumption is only needed for forward momentum and not lift, hybrid airships produce 75 percent less carbon dioxide emissions compared to similar conventional aircrafts like the C-5 Galaxy, and airship companies are working to reduce emissions by 90 percent. They’re not as fast as competing airplanes but they are faster than most sea-going vessels, thus creating new options for environmentally friendly ways to move cargo that is needed in 48 hours, not five weeks.

Another important feature of a hybrid airship is that it’s able to land on any reasonably flat surface, not requiring any formal landing platforms or runways. They’re also quieter than comparable aircrafts, while still carrying heavy payloads. This could allow for stealthy and remote drop offs of equipment. Landing anywhere and carrying heavy payloads, with precision equipment and suppressants to engage fires, is what made hybrid airships look appealing for fighting wildfires.

Schmaltz, an amphibious assault vehicle officer, saw the potential for airships to improve the supply lines necessary to keep the aging amphibious assault vehicle functional.

“We don’t know where we’re going necessarily, so we don’t have supply lines established to service the old, expensive vehicles,” Schmaltz explains. “I saw value in the airship as a way to get things we needed where they need to go in a reasonable amount of time instead of waiting two or three months to get to certain locations to send out or receive parts.”

While there have been exploratory programs in the past, hybrid airships are not being used for military operations anywhere in the world right now, likely because they’re slower and the technology has only been fully developed in the past decade. The only lighter-than-air vehicles being used by the DOD are aerostats, which are smaller, low-level airborne ground surveillance systems used as radar platforms.

Hybrid airship innovation is taking off in the commercial space instead. Recognizing this, Schmaltz and Cohen worked with defense contractor Lockheed Martin and the British company Hybrid Air Vehicles (HAV), the latter having built and flown a full-scale hybrid aircraft prototype, leading to a Cooperative Research and Development Agreement (CRADA) with NPS.

“It was an ideal opportunity to work with the USMC and NPS to test the Airlander, modeling multiple scenarios to demonstrate how the aircraft could support missions in the Indo-Pacific command theater,” says Neil Gee, HAV Senior Project Manager.

As part of the CRADA, HAV and the NPS students created objectives they’d work separately and others they’d take on together. One project they worked on modeled multiple scenarios to demonstrate how the airships could support stability in the Indo-Pacific command theater. They found that the hybrid aircraft could decrease the travel time for infantry and equipment and reduce associated emissions in the process. Beyond improving logistics chain responsiveness, the group also recognized that hybrid aircraft could be used to provide humanitarian aid, disaster relief, and remote research. HAV gained access to more weather data to expand their databases and they were also connected to Faculty Research Associate Christian Fitzpatrick and the NPS Modeling, Virtual Environments and Simulation (MOVES) Institute, who they are still working with today.

Since NPS prioritizes bridging academics with operational applications, both parties learned a lot from each other in the process. The students gained a better understanding of the commercial process of producing a hybrid airship from the prototype to production phase. And Schmaltz and Cohen’s research sharpened HAV’s focus on the digital technology side, like producing a digital twin, which is a virtual representation of an object or system that spans its lifecycle.

HAV brought the University of Sheffield Advanced Manufacturing Research Centre (AMRC) into the project to help improve their understanding of digital engineering, augmented reality for maintenance and operation support, and generating 3D virtual reality environments to improve production efficiency. The NPS students and HAV staff learned there were many more industry uses for digital twins than they
initially thought. The relationship between AMRC and NPS will likely continue beyond this thesis project.

Forming all these partnerships was good preparation for Cohen for his current assignment. After graduating, Cohen moved to Southern California to lead the NavalX SoCal Tech Bridge, which works to form partnerships between the Naval enterprise and the commercial sector in and around San Diego. HAV plans to continue research work with Cohen through his new role. Schmaltz now works as a program analyst for Deputy Commandant, Programs and Resources, a role that he found he is well prepared for because of his research efforts on hybrid airships.

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NPS Students Explore Naval, Defense Applications of Hybrid Airship Technology - Naval Postgraduate School

FACULTY:

Innovation: People Are More Important than Technology
(USNI 14 Aug 22) … General Anthony Zinni, U.S. Marine Corps (Retired), Mie Augier, and Major Sean F. X. Barrett, U.S. Marine Corps

Innovation lies at the heart of American security. Now, huge advances in AI and edge computing and nanotechnology are already underway in America…Nobody innovates better than the United States of America. But we can’t take that for granted.

—Secretary of Defense Lloyd Austin III Remarks at the 2021 Reagan National Defense Forum

Today’s strategic environment features rapid technological change coupled with the increasing accessibility of cutting-edge technologies to more and more actors. These changes, and the threats they pose to U.S. national security, span presidential administrations and cross party lines. The 2018 National Defense Strategy, for example, notes that maintaining U.S. technological advantage requires significant changes across the “National Security Innovation Base” and calls on the Department of Defense (DoD) to “organize for innovation” and “out-innovate revisionist powers.”1 In his Interim National Security Guidance, President Joe Biden pledges to “sustain America’s innovation edge” and encourages “the culture of innovation required to address today’s complex challenges.”2 Over the past several years, DoD has attempted to adapt to this dynamic technological landscape by establishing organizations and concepts such as the Defense Innovation Unit, the Chief Digital and AI Office, Joint All-Domain Command and Control, Project Convergence, Project Overmatch, the Rapid Defense Experimentation Reserve fund, and a network of “tech bridges” focused on leveraging artificial intelligence, machine learning, and other advancements to develop sensor networks and shorten kill chains.3

The 2018 National Defense Strategy specifically mentions China’s military modernization, which has been so massive in scale and rapid in speed, that it threatens the U.S. military’s technological edge. Innovation, therefore, is a must. Since before the Spanish-American War, innovation has been a key “way” of U.S. military strategy. Out-innovating our adversaries has been a hallmark of the U.S. military—think stealth, high-bandwidth communications, space-based intelligence, surveillance, and reconnaissance, and precision-guided munitions. But just as sea power was taken for granted after the end of the Cold War, the Pentagon’s ability to innovate faster than its adversaries became a given—one that is no longer. Witness China’s antiship ballistic missiles, hypersonic weapons program, informationized warfare, and military space capabilities. The imperative to innovate is back.

Integrating new technologies into U.S. warfighting capabilities is vital to national security. However, in today’s security discourse, innovation is often conflated with new technology and disruptive change, which leads to misunderstanding and misconceptions regarding innovation and a certain degree of “technologitis,” or overreliance on technology. In addition, there is an inclination to view new or big
ideas as innovative by their very nature, although innovations often evolve from the accumulation of little ideas and combinations that are tested and refined over time. The iPhone, for example, was not a big new thing but rather a recombinant innovation. This tendency also overlooks the importance of people and the organizations in which they operate. Steve Jobs reminds us, “Technology is nothing. What’s important is that you have a faith in people, that they’re basically good and smart, and if you give them tools, they’ll do wonderful things with them. It’s not the tools that you have faith in—tools are just tools.”

Often a new idea, concept, invention, or process deemed “innovative” is assumed to be indicative of progress or a “good” thing. People forget that Fortune named Enron “America’s most innovative company” six years in a row before its epic failure. Simply adding technology also is not always the right solution, and innovation should never be viewed as an end in itself. For militaries in particular, an overemphasis on technology can lead people to conclude that technological innovation matters more than tactical and organizational capabilities and competencies. It undervalues warfighters’ ability to think creatively and critically and act and lead decisively. The German military’s defeat of a technologically superior French military in a matter of six weeks in 1940 is a sobering reminder of the folly of this assumption.

New technology is important, but it is not a silver bullet solution that can be added at random when an organization confronts a challenge. Rather, it must be built into an organization’s capabilities, resources, and processes by collaborative, charismatic leaders who can think strategically, critically, and creatively but also encourage, lead, and manage teams to adopt, integrate, and maintain technologies over time. Military leaders must move beyond using “innovation” merely as a buzzword and establish a better understanding of what innovation is and is not, the organizational characteristics and features of innovation, what it takes to lead innovative organizations, and the traits and skills of innovative leaders.

An Organizational Process, Not a Buzzword

“Our infatuation with technology was a reflection of our own mirror imaging and an unrealistic desire to dictate the conduct of war on our own terms.”

– James N. Mattis and Frank Hoffman


An organization’s ability to innovate, adapt, learn, lead change, and ultimately survive depends on how well it balances “the exploration of new possibilities and the exploitation of old certainties.” Exploration entails discovery, experimentation, innovation, and play, whereas exploitation is more focused on efficiency, refinement, and executing existing processes. Steadily improving existing capabilities or products while exploring new opportunities and achieving breakthrough innovations is the hallmark of an “ambidextrous organization.” Today’s U.S. military service chiefs tend to frame this balancing act as one between maintaining military power and “legacy capabilities” that are available today and building the modern capabilities needed for the future competition. It often involves divesting “outdated” capabilities to invest in modernization efforts and “accelerate change.”

Overemphasizing innovation, however, can blur the distinction between actual innovation and “innovation-speak.” Real innovation is managing the adaptive dilemma, adding value to organizations and society, and giving proper consideration to the processes and capabilities that are needed.

Innovation-speak has created a market for easy recipes and checklist-style shortcuts that promise to help organizations innovate. Even if this were possible, it does not necessarily help with long-term adaptation or agility and can even work against it. It also can conceal some of the downsides or tradeoffs and, in the military, can lead to assumptions that ignore the fact that the enemy gets a vote in any fight. For example, a hyperfocus on “newness” or novelty can lead to the belief that most novel ideas are good or lead to good outcomes and thus overestimating the probability of success. DoD is littered with programs that have failed spectacularly due to this predisposition. Innovation-speak also can lead to the erroneous assumption that novelty is easy to implement. Former Defense Secretary Robert M. Gates, who laments the bureaucratic wars he constantly fought in the Pentagon, begs to differ.
Real innovation is not simply an idea, but rather a process built into an organization. It is driven by the organization’s strategy and the need to address an empirical problem. It is led and implemented with an eye toward developing and exploring synergies with the organization’s capabilities, as well as for maintaining a balance between exploration and exploitation, even though each has the tendency to extinguish the other. It requires free and open inquiry and feedback mechanisms for learning and adapting, to help identify new strategies and organizational structures. Organizations must create new knowledge through a “continual dialogue between explicit and tacit knowledge” that “drives the creation of new ideas and concepts.”

Tacit knowledge is created through socialization and bringing together shared experiences. This might include informal discussions immediately following an operation or exercise or discussions over beers after work. Tacit knowledge must be articulated into explicit knowledge in the form of a presentation, information paper, or article so it can be shared with others. Such forms of explicit knowledge are then collected, combined, and disseminated so they can be edited, tested, and promulgated by those in authority.

This vetted, explicit knowledge takes the form of doctrine, field manuals, and other training and instructional materials, which are then internalized by members of the organization to inform training. Their subsequent learning-by-doing embodies this knowledge in action and practice. This is an ongoing process, facilitated by activities such as gaming, scenarios, exercises, and experiments that emphasize free play and explore new paths to the future. The process prepares an organization to innovate and implement by building buy-in from the participants. It cultivates critical and innovative thinking skills and attitudes as members participate in “the gentle art of reperceiving” reality.

Seemingly disruptive and revolutionary changes are often incremental, evolutionary, and organizational. The development of the Marine Corps’ Advanced Base Force, for example, took decades of agitation on the part of junior and midgrade officers in the Navy to repurpose Marine ships’ guard detachments for the advanced base mission. Similarly, the rise of U.S. special operations forces into the force of choice during the war on terrorism was a gradual evolution and uphill battle during the first 75 years of their existence. Incremental innovations might undermine the idea that innovation can be big and fast, but small steps ensure continuing strategic fit not only between the organization and its environment, but also between the resources and capabilities in the organization. Leaders who can sense and perceive changes in the environment also are needed to ensure this strategic fit and cultivate, build, and lead innovation in organizations.

**Leading Innovation and Innovative Leaders**

Given the rapid change in, and complexity of, today’s security environment, leaders must be able to sense the strategic environment, think creatively and critically, and transfer knowledge or skills from one domain or experience to a new and possibly unforeseen one. Leading innovative organizations thus requires involved leaders who are themselves learners who constantly seek feedback and collect ideas. This desire to learn necessitates a certain amount of humility, which should also inform how we think of leadership. While traditional notions of leadership focus on the role of the individual building and motivating a team, broadening the concept to include the leader, the followers, and the organization might prove more fruitful. Such “we-leadership” is selfless and is centered on nurturing collectivity, strengthening commitment to the organization, and inspiring and motivating people. As a result, leaders and followers become less concerned with their careers. We-leaders lead by intent and are less hierarchical in their thinking. They attract innovative thinkers and doers because they emphasize ideas over rank.

Former Marine Corps Commandant General Alfred Gray embraced we-leadership. He took a bottom-up approach to explaining his rationale for, winning converts to, and teaching the core tenets of maneuver warfare to change the Marine Corps’ approach to warfare. Members of an organization need to feel part of what it is doing and be excited about the change. Otherwise, they will tend to respond with apprehension and resistance. As Commanding General, 2d Marine Division, Gray established the Maneuver Warfare Board to collect, codify, and spread ideas on maneuver warfare. The board consolidated relevant material for Marines to read and established professional study groups. At these
sessions—which often took place after working hours—maneuver ideas were debated, and the tacit knowledge of the participants was pooled to inform and improve the organization. These debates spilled over into the pages of the Marine Corps Gazette, where they took explicit form. The ideas were then vetted in experiments before ultimately being incorporated into tactics, techniques, and procedures, doctrine, and service manuals.

General Gray sought to balance exploitation and exploration by making exercises “free-play” or “force-on-force” to make training environments more realistic. Exercises thus served as experiments rather than scripted or “canned” scenarios that simply validated concepts and desired capabilities or tested a unit’s ability to perform a list of tasks. To mitigate a “box-checking” mentality that is prone to risk aversion and doing just enough, commanders were forced to try to outwit their peers, since there were definite winners and losers. The competition remained open-ended, spurring innovative ideas and approaches as opposed to playing it safe and settling for accomplishing the minimum.

Seeking to mitigate risk aversion and fear of failure, General Gray emphasized process over result. During after-action reviews, he was always more concerned about why Marines did what they did (i.e., what they were thinking) rather than with what they did. He challenged and empowered his leaders to think through alternative outcomes, learn from their mistakes, and experience the merits of the maneuver philosophy firsthand. In doing so, he won converts who took ownership of the new warfighting philosophy. Marines also became more likely to think outside the box and take chances because they were given the grace to fail and had a collective commitment to improving the organization.

Implicit in learning from failure is the humility to admit one is wrong or that one’s ideas can improve with the ideas and input of others. General Gray embraced this humility by democratizing the after-action review process, breaking down traditional notions of hierarchy and nurturing an open and collaborative environment. Marines removed their rank insignia before gathering to reinforce the importance of ideas over rank, foster the free exchange of ideas, and empower junior Marines to speak up, trust their instincts, and correct those more senior. This helped build support for change throughout the organization because everyone was involved. It was the opposite of a select brain trust, so it cultivated a stronger sense of organizational belonging and identity.

General Gray also welcomed the input of outsiders, including notably retired Air Force Colonel John Boyd, a maverick who had been largely ostracized by his own service, and Bill Lind, a brash and outspoken legislative aide to Senators Robert Taft Jr. and Gary Hart. General Gray and other maneuverists considered even the most ardent critics useful in the knowledge-generation process and in improving their concepts and arguments. Thus, at the individual level, the freedom to learn from failure, encouraged by we-leadership, improves the cognitive skills of future leaders. At the organizational level, it empowers the organization to explore new possibilities, adapt, and innovate.

Build and Maintain Competitive Advantage

Innovation is an organizational process, central to developing and maintaining competitive advantages. Real innovation differs from innovation-speak along many important dimensions that would be helpful to remember the next time DoD announces another Hacking 4 Defense competition or small business outreach event that seemingly encourages innovation as an end in itself or as a niche undertaking that contributes tangentially to the mission. Real innovation entails more than untested ideas or helping new capabilities navigate the “valley of death.” Rather, real innovation must be tied to a strategy and focused on a particular problem or challenge. The possibility of peer-level conflict against China’s People’s Liberation Army should serve as that focusing function today.

To successfully innovate, all of DoD, not simply a small cadre of experts, must feel part of the effort, or change will inevitably be met with resistance. This requires leaders to articulate the rationale for change and develop and implement innovations. They must be able to blend new technology and capabilities with existing ones. Innovation inevitably involves failures along the way and requires continued evaluation and refinement.

Innovation is not something that can be planned or achieved quickly or by following prescribed checklists. Enduring organizational changes take significant time and effort. The road to progress is often
messy, lengthy, meandering, and unpredictable, which is why everyone in the organization must understand the goal and why people are more important than technology.

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In Protecting The KGB, Gorbachev Laid The Foundation For Putin’s Gangster-State  
(“The Federalist 3 Sept 22”) … J. Michael Waller

The notorious KGB chairman Yuri Andropov recruited Mikhail Gorbachev, cultivated him, and placed him in the Kremlin leadership to ultimately take power. Once he led the Soviet Communist Party, Andropov’s recruit protected and rewarded the Soviet secret police by making it off-limits to any truth-telling, accountability, or reform.

Gorbachev has died, but the KGB that he nurtured and protected lives on under an ungrateful Vladimir Putin.

Until the day he passed away at age 91, Gorbachev got an international pass for saving the core of Soviet power: the ever-watching secret police and its global spy and active measures networks.

Gorbachev didn’t stand up for the KGB’s victims. While he opened Soviet society, he protected the tormentors. He shielded the KGB from the “openness” of glasnost, keeping it unaccountable for decades of industrial-scale crimes. He insulated it from the reorganization of perestroika. Gorbachev even preserved the KGB’s cult-like devotion to the Bolshevik Cheka. To this day, Russian intelligence and security officers still call themselves chekisti or chekists.

He kept the KGB’s entire archives secret to save the chekists’ reputation and prestige.

The internal repression and informant files? Gorbachev kept them secret and the networks operational. The international subversion files? All secret. The Soviet terror network files? Secret. Indeed, as the USSR was collapsing, Gorbachev promoted one of the architects of the Soviet terror network, Yevgeny Primakov, to run KGB foreign intelligence.

He knew the big names in Western business, politics, journalism, and culture who worked for the KGB or the Soviet Communist Party. He could have known all the names had he chosen too. He could have exposed them all. But he protected them. And they heap praise on him today.

Gorbachev could have un-done the KGB’s ghoulish presence with the stroke of a pen. But he didn’t do it.

When, under perestroika, Gorbachev authorized the creation of joint ventures with foreign companies, he required a KGB officer to be assigned as a vice president of each enterprise. This undermined enduring economic reforms, subverted western companies, and built the foundation for the KGB gangster-state that would beget Putin.

Gorbachev made sure that glasnost and perestroika would keep the KGB on top. He never permitted lustration, the screening out of KGB assets from holding posts of public trust, the way the post-Communist Czechs and East Germans were doing. He did not permit the KGB’s victims to see their files. He protected every last KGB informant.

He never truly sought to become part of the civilized world by ripping out the KGB’s peerless global human intelligence networks, subversive political warfare penetrations and operations, and putting it all out on the table so such cancer could never spread again.

Indeed, Gorbachev gave the KGB so much power that the chekists, under KGB Chairman Vladimir Kryuchkov, led the coup to overthrow him in August 1991.
And when Gorbachev returned to the Kremlin, in a meeting with the presidents of the union republics of the USSR, he did nothing to punish the secret police. Instead, it was Boris Yeltsin who gleefully forced a reluctant Gorbachev to sign a decree dividing the KGB into separate parts. Gorbachev’s handwriting on the decree, never meant for public view, is strained, as if under duress.

Even so, the splitting up of the Soviet KGB kept the hated old chekist apparatus in place. Nothing was torn out by the roots. No perpetrators were investigated, let alone put on trial. Gorbachev held nobody accountable – and his fans in the West didn’t hold him accountable, either.

The KGB’s First Chief Directorate that did the foreign spying was simply renamed Foreign Intelligence Service (SVR). The chekisti Second Chief Directorate responsible for “internal security” changed its name to what is now called the Federal Security Service, the FSB.

The world today is confronting the results of Gorbachev’s strategy to preserve the chekist legacy and the KGB itself, to protect all perpetrators and deny justice to its victims, and to merge KGB officers into the rising gangster state. Gorbachev paved the way for the rise of Vladimir Putin. He had thirty years to reconsider. Thirty years to expose. He never did.

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In Protecting The KGB, Gorbachev Paved The Way For Putin (thefederalist.com)

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Read H. P. Lovecraft To Understand War
(1945 5 Sept 22) … James Holmes

You take your wisdom where you find it. In 2020, on impulse, I incorporated the “weird fiction” of H. P. Lovecraft, the grandmaster of the genre, into my recreational reading. I can’t remember exactly why. After all, that year was creepy enough without marinating in tales of monsters, demons, and ghoulish folk plaguing New England cities and towns. Maybe it was a form of escapism, substituting wild stories of dread for the real stories of dread that dominated headlines that year.

Or maybe it was my oddball form of virtual travel amid the lockdowns. Lovecraft was a Providence native and a resident for much of his short life, dwelling in a house just off the Brown University campus. In fact, his gravestone bears the inscription “I Am Providence.” Much of his work is set there. In 2020 the family and I went many months without venturing into that fair and nearby city, among our favorite places on the planet. Maybe fiction furnished a partial substitute.

Anyway. So it was.

That August, perchance, Naval Postgraduate School professor Leo Blanken ran an article over at Strategy Bridge inspired in part by Lovecraft’s writings. Titled “The Weird and Eerie Battlefields of Tomorrow: Where Horror Fiction Meets Military Planning,” the article draws on a literary critic of whom I had never heard, the late Mark Fisher. After reading it I downloaded and devoured a copy of Fisher’s monograph The Weird and the Eerie through the wonders of Kindle. Together these works make a useful addition to your armory of implements for thinking about martial affairs, not to mention politics and life in general.

Fisher postulates that Lovecraft and other purveyors of uncanny literature and film—sci-fi author H. G. Wells and moviemaker Stanley Kubrick also make his roster of artists—rivet readers’ attention less by making their works horrific than by making them strange. Both the weird and the eerie have to do with things outside the ordinary. The weird, says Fisher, “is that which does not belong.” It “brings to the familiar something which ordinarily lies beyond it, and which cannot be reconciled with the ‘homely.’”

Weirdness, then, is about presence—the presence of something freaky and possibly otherworldly in normal surroundings. Fisher, in fact, deems “the irruption into this world of something from outside” to
be “the marker of the weird.” He maintains that “the weird is a particular kind of perturbation. It involves a sensation of wrongness: a weird entity or object is so strange that it makes us feel that it should not exist, or at least it should not exist here. Yet if the entity or object is here, then the categories which we have up until now used to make sense of the world cannot be valid. The weird thing is not wrong, after all: it is our conceptions that must be inadequate.

So weird fiction is as much about how human beings react to the presence of an anomaly as it is about the anomaly itself.

Nowadays, Lovecraft is probably best known for his tales of Cthulhu. According to one compilation of these stories, “the Cthulhu Mythos was H. P. Lovecraft’s greatest contribution to supernatural literature: a series of stories that evoked cosmic awe and terror through their accounts of incomprehensibly alien monsters and their horrifying incursions into our world.” These supernatural forays take place in such familiar settings as Providence or Boston, or in New England small towns like the make-believe Innsmouth, on the North Shore of Massachusetts.

So weirdness injects phenomena that are radically foreign to daily life into daily life, while weird stories are about how ordinary folk respond to these phenomena. (Typically with dismay—at least at first.) Zombie literature and films—The Walking Dead, World War Z, and Pride and Prejudice and Zombies, to name three recent entries—probably comprise the most popular genre of weird fiction these days. Think about it. Reanimated, mindless, murderous corpses by definition do not belong in regular life and cannot be reconciled with it. Their existence defies all natural laws. Yet their menace compels the living to come to terms to something utterly beyond everyday experience in order to combat it, and try to restore some semblance of normalcy.

Weird!

If the weird is about presence, the eerie is more about absence. In particular, it’s the absence of something familiar and expected—people in particular. Writes Fisher, “a sense of the eerie seldom clings to enclosed and inhabited domestic spaces; we find the eerie more readily in landscapes partially emptied of the human. What happened to produce these ruins, this disappearance? What kind of entity was involved? What kind of thing was it that emitted such an eerie cry?” An empty or ruined house, church, or fortress is eerie. So is a desolate cityscape in post-apocalyptic fiction. Think the Statue of Liberty jutting out of an isolated beach in the old Planet of the Apes, or the ruins of Washington DC in the 1976 sci-fi flick Logan’s Run.

H.P. Lovecraft excels at weird fiction because he expertly weaves the eerie with the weird. His stories tend to start off eerie and build to a weird climax. My favorite among the Cthulhu stories—and apparently the last of his writings—is “The Haunter of the Dark.” The story follows the typical pattern. Horror author Robert Blake lives just off the Brown campus. From his study window he can gaze across Providence at Federal Hill, these days a mecca for Italian dining. For Blake it was a “spectral, unreachable world,” abounding in “bizarre and curious mysteries.”

An abandoned, decrepit church transfixes him. “A vague, singular aura of desolation hovered over the place,” writes Lovecraft, “so that even the pigeons and swallows shunned its smoky eaves.” Foliage on the church grounds remains stunted even amid the lush Rhode Island spring. That’s a quintessential eerie atmosphere. Blake makes his way across the city to Federal Hill to investigate the edifice, only to unearth evidence of past demonic practices. Worse, his presence seems to reawaken a sleeping malice of old, the haunter of the dark. Ghastly events ensue. From there the story progresses toward its weird and terrifying crescendo.

What does this all have to do with warlike endeavors? Blanken posits—and I agree—that consuming weird fiction primes military practitioners and analysts to notice weird or eerie anomalies in the profession of arms. Detecting a phenomenon is the first step toward adapting to it or turning it to advantage. Weird fiction can help us make sense of the past, survey the world around us, and potentially glimpse the future. Fisher credits World War I with ushering in a “traumatic break from the past” that allowed Lovecraft’s brand of weird fiction to flourish. Blanken examines the Great War through the weird/eerie prism, finding anomalies—things missing that should have been there, or things egregiously out of step with prewar reality—that should have been apparent to military folk at the time.
Let’s peer through that prism at the present. Doing so helps us ask good questions. Uncrewed, autonomous aircraft and ships? Eerie; no people. Artificial intelligence that learns faster than human beings, and could outwit and outfight them? Weird; machines are supposed to be our servants. Cyberspace that exists everywhere and nowhere? That’s both weird and eerie.

Or look at the ongoing Russian war on Ukraine. Imagery of Ukrainian towns or cities emptied of people following Russian air or missile bombardment is eerie. Inhabitants are supposed to be there but aren’t thanks to Russian aggression. That’s disturbing and affronts the conscience. Such images rally sympathy among Ukraine’s outside supporters, prompting them to make major outlays of funding and military implements of all types. The eerie can have political ramifications.

The Ukrainian armed forces’ ability to stand against Russia is frankly weird considering the lopsided disparity between the two combatants by any measure, whether it’s GDP, numbers of platforms and weapons, or manpower. Acknowledging the conflict’s weird character directs our attention to the importance of training, to the excellence of Western-supplied armaments, and above all, to the advantages that go to the combatant bestriding its home ground. The weak could even win. Life imitates weird fiction.

Such insights alert us to tenets of operations and strategy.

Or look at China. Beijing’s claim to sovereignty over the South China Sea is weird, especially considering that it’s party to a charter that specifically rules out such claims, and has been smacked down by an international tribunal charged with interpreting that charter. How do you explain and respond to something so bizarre? Photos out of Chinese cities locked down under Xi Jinping’s “zero covid” policy are eerie, as are photos Hong Kong following the Chinese Communist Party’s crackdown on democracy. Chinese citizens should be thronging the streets, but they aren’t. Why?

And on and on. So pick up some Lovecraft—and discover the weird and eerie around you.

Read H. P. Lovecraft to Understand War - 19FortyFive

ALUMNI:

Hedging with Humility: Reassessing China’s Power Projection Capabilities Against Taiwan

*War on the Rocks 1 Sept 22* … Collin Fox, Trevor Phillips-Levine and Kyle Cregge

The Marine Corps tested the first Higgins boat with a bow ramp in June 1941, only 14 months before amphibious landings in Guadalcanal and only 24 months before Sicily. American industry churned out over 20,000 of these boats that Dwight D. Eisenhower singled out as decisive.

Today, China enjoys a similar position of latent industrial strength as it contemplates a cross-strait invasion of Taiwan, but many observers fixate instead on the seeming insufficiency of China’s existing military fleet for an amphibious assault. We offer a broader analysis of how China’s industrial base and civilian fleet might catalyze other operational approaches and timelines for taking Taiwan by rapidly erasing these supposed deficits in lift and firepower. With U.S. intervention, Taiwan can be defended and China can be deterred through this decade and beyond, but China’s capabilities should first be seen holistically for what they are and appreciated for what they can soon become.

The Ways of Conquest

Forecasting China’s power projection capabilities against Taiwan is contentious, to say the least. Michael Pietrucha juxtaposes an amphibious assault on Taiwan with the Allied invasion of Sicily in 1943, arguing from this historical benchmark that the People’s Liberation Army would fail for lack of experience, competence, amphibious lift, port access, and naval gunfire support. Using the invasion of Sicily as a case study for the invasion of Taiwan ignores valuable lessons from other historical examples, but these lessons are not lost on China. People’s Liberation Army Air Force doctrinal
writings cite Operation Starvation, the U.S. military’s strategic mining campaign that anticipated the invasion of Japan, and hint at how a similar strategy could work against Taiwan. The Pentagon’s annual report on China’s military power presents many scenarios, including a blockade, and we examine how a strategy with a slightly longer timeline that first incorporates these other options could plausibly lead to Taiwan’s downfall.

Taiwan imports all of its energy and most of its food through vulnerable maritime supply lines, which a Chinese blockade, or “quarantine,” could quickly strangle. This campaign might start with harassment and then build to live-fire military exercises in shipping lanes, like a persistent version of China’s response to Rep. Nancy Pelosi’s recent visit. China could escalate to interdicting ships with its substantial Coast Guard, mining the approaches to Taiwan’s ports, attacking blockade runners with its large submarine fleet, and conducting an air blockade campaign to completely isolate the island.

After eroding Taiwan’s defenses over the course of a blockade while trying to avoid wider escalation, China could suddenly launch its best imitation of Operation Desert Storm’s air campaign to gain local air superiority. Joint air and amphibious assaults could then gain strategic terrain, along with valuable combat experience, by taking the many operationally significant islands around Taiwan in sequence. The island bases themselves would then help reinforce the blockade, defeat external interventions, and support the subsequent invasion. They would also be extremely difficult to recapture.

Counter-Invasion Intervention

No analysis of China’s invasion threat would be complete without addressing the likelihood and impact of external intervention. The vignette above portrays China as preparing Taiwan for invasion through blockade while also trying to avoid a timely coalition response. Given ambiguous public sentiment, we assume that the United States would first attempt to deescalate such a blockade through diplomacy while solidifying its coalition, rather than firing the first shot. However, China must eventually launch an amphibious assault because blockades are not decisive. We assume that the United States would only go to war with China some days or weeks after direct attacks on Taiwan or immediately after attacks on U.S. forces — though the latter would also pull America’s extensive network of treaty allies towards war. In any case, external military intervention would likely hazard an invasion attempt.

Coalition forces would concentrate their attacks on the invasion fleet and its logistical support. Unclassified wargames conducted by the Center for Strategic and International Studies, games which one of us joined, strongly suggest that both sides would suffer heavy losses over the first four weeks. In the games, China’s surface fleet frequently lost about 150 ships to a combination of Taiwan’s anti-ship missiles, U.S. submarines, and stand-off weapons deployed from U.S. bombers and Japan-based aircraft.

Even with these losses, Chinese forces were always able to establish a lodgment. In one wargame iteration, they were able to land “more than 30 battalions” in less than three weeks. Mark Cancian, a senior advisor with the Center for Strategic and International Studies, noted that “[t]he attrition of [China’s] amphibious fleet limits the forces they can deploy and sustain. In a few instances, the Chinese were able to hold part of the island but not conquer Taipei or the entire island.” Meanwhile, the United States might lose a carrier, an expeditionary strike group, and half of the U.S. fighter inventory in the span of weeks.

It should be noted that these preliminary results come from defense scenarios in which the United States intervenes, and changes to the remaining rounds might be decisive for either side during the game’s limited duration. However, a longer war might defy all reasonable prediction, as Russia’s war against Ukraine has shown.

Pietrucha conjures China’s rapid failure with almost deterministic certainty while only implicitly hinting at an intervention. In contrast, the games suggest that the United States could deny China’s objectives over the war’s opening four weeks at an extreme cost, but also that China’s growing capabilities are on the cusp of establishing and even sustaining a lodgment on Taiwan. It might be a near-run thing. In correspondence with the authors, Matt Cancian, one of the game’s designers, agreed that “the PLA would probably be able to take Taiwan in the absence of U.S. intervention.” Consequently, analysts should reexamine underlying assumptions about China’s capabilities for industrial base, lift, and fires — and how they could be checked.
Time as Industrial Maneuver Space

Recognizing the importance of amphibious lift and foreseeable attrition, China would likely accelerate its build-up prior to the blockade or surge during the war. The American maritime industrial experience in World War II is instructive.

The U.S. Navy did not have any amphibious ships in commission on Dec. 7, 1941. Only 19 months later, it had enough amphibious shipping to invade Sicily after having already conducted major amphibious assaults against Guadalcanal and North Africa. The U.S. Navy had over 2,500 amphibious ships by the end of the war, only 45 months after Pearl Harbor.

Even though the United States lacked amphibious forces in 1941, contemporary German and Japanese analysts would have been mistaken to discount the future threat of invasion. Pietrucha’s fixation on China’s unlikely invasion of Taiwan today is similarly flawed because it fixates on the military fleet but ignores industrial capacity. The armada for a major amphibious assault, like that against Sicily or Taiwan, is built for the occasion and scrapped shortly thereafter, not maintained in readiness for decades. China is the world’s largest builder of seagoing vessels, having produced over 26 million tons of civilian shipping in 2021. By comparison, the American assault force directed against Sicily, which Pietrucha uses as a benchmark, only had a “combined tonnage of around 780,000 tons.” China is also the world’s second largest arms producer. Like the United States before World War II, China has a large but latent industrial base that could quickly produce what its military needs at scale and speed. Moreover, America’s amphibious challenge in World War II was global, whereas China’s is relatively local. China already has 57 major military amphibious ships and a significant civilian fleet, which we discuss below. The additional production from Chinese shipyards in 19 months, or in more than 50 months, would likely be more than enough to invade an island only 100 nautical miles away despite the attrition anticipated by wargames.

Just like so many amphibious ships in World War II, many of China’s new ships would burn and sink, going from raw steel to charred hulks in under a year, but ships are only a means to an end.

Defining Lift

Inadvisable never meant impossible: China’s political leadership could demand an amphibious assault against Taiwan for any number of reasons, forcing the Chinese military to attack with the forces of today and without the operational benefits of a blockade or island bases. In this challenging but less likely scenario, China’s combined lift capacity, including civilian vessels, could plausibly land enough forces to seize a lodgment, as anticipated by recent wargames, but could easily fail against stiff resistance and its own internal friction.

Taiwan’s geography, meteorology, and hydrography significantly impact the lift required for an amphibious assault. The island is naturally well-suited for defense, having only 14 suitable landing sites, each one defended in depth. After the beach, Taiwan’s mix of urban terrain, marshy rice paddies, and mountains would inhibit rapid mechanized mobility, albeit for all sides, while favoring both regular and irregular defenders. Assuming that Taiwan’s defenses could be sufficiently suppressed to execute an amphibious assault, does China have enough lift to even establish a lodgment?

Yes and no. It all depends on the definition of “lift.”

Several reports from the U.S. Naval War College’s China Maritime Studies Institute focus on this question. Its report on the People’s Liberation Army amphibious forces notes that “despite efforts to bolster [its] amphibious capabilities, the force currently lacks the capacity to execute a large-scale assault on Taiwan,” appearing to settle the question. Pietrucha highlights this limitation in military amphibious forces and describes that the People’s Liberation Army as an unprofessional and inexperienced force that “still struggles with joint operations.” On this basis, he discounts the rest of China’s civil-military maritime forces as disjointed and therefore irrelevant. The fragile linchpin of this argument is that China cannot integrate joint and civilian forces into a landing operation.

However, the same report on amphibious forces goes on to describe the leadership of the People’s Liberation Army as seeking:
Other reports in the series describe additional forces, including special operations forces, airborne forces, and airmobile forces, that are likely to be employed in seizing critical ports.

Pietrucha cites the entire series to claim that “China lacks the capability and the capacity to handle a full-scale invasion against a defended island country.” A report in this series released on the same day of Pietrucha’s article describes “civilian shipping and maritime militia” as the “The Logistics Backbone of a Taiwan Invasion.” This newer report uses extensive Chinese sources to show that these civilian ships and maritime are “a central feature” of the Chinese military’s plan rather than a “stopgap measure.”

Chinese military writings describe their large and multifaceted militia force as playing many roles in an invasion: at-sea support, medical support, engineering support (e.g., port repair), reconnaissance, deception, helicopter relay platforms, assault landing phase participants, and over-the-shore logistical support. These last three roles are most salient for initial amphibious lift.

Large merchant ships could serve as “lily pads,” allowing helicopters to refuel and rearm as they shuttle airmobile troops ashore and provide close air support. Although civilian semi-submersible ships have typically served this role during exercises, many other large vessels could be retrofitted with aviation facilities, following the model of the Atlantic Causeway and M/V Astronomer during the Falklands War. China’s fleet of civilian semi-submersible heavy lift ships also might supplement their military counterparts in deploying amphibious vehicles and hovercraft during the assault phase.

Pietrucha calls China’s civilian fleet “next to useless in an assault phase” even though China’s civilian ferries frequently deployed assault boats and amphibious fighting vehicles at sea during military exercises. This capability is no accident: China built its “first civilian [roll-on/roll-off] ship … to military specifications in 1997” and has since promulgated guidance for vessel conversion to military specification, such as retrofitting strengthened ramps to allow the deployment and recovery of amphibious armored vehicles at sea. Even so, only a fraction of invasion forces could be flown, be carried, or swim ashore. Many more would drive over deployable floating causeways. China’s shipyards could replicate these sectional barges at scale and speed, which would allow China’s substantial civilian ferry fleet to onload forces to the beach. These forces would then try to secure more port facilities for sustainment. The report on civilian shipping and maritime militia concludes that “if first echelon forces succeed at [capturing enough ports and keeping them open], the rest of the operation has a reasonable chance of success.” In the recent wargames cited above, game developers Matt Cancian and Eric Heginbotham specifically incorporated civilian maritime lift units into each Chinese amphibious task group unit for the hypothetical invasion, including in the assault phase.

The latest report in the series, on invasion logistics, is more circumspect for China’s near-term prospects and echoes the preliminary results of the abovementioned wargames: “[I]t is likely the PLA does not currently possess the requisite logistics capabilities to successfully support a large-scale amphibious landing on Taiwan and a possible protracted conflict involving the United States and allies.” That said, the report draws heavily from a 2017 PLA book on invasion logistics, meaning the PLA has identified and at least started to remedy these deficiencies. It also notes that “problem areas might be resolved with several years of sustained effort and complex training.” Failure is not fated.

The Pentagon’s annual China report echoes these reports’ sober capability assessments but with a broader perspective, underscoring that “an attempt to invade Taiwan would likely strain [the] PRC’s armed forces” and calling “an amphibious invasion of Taiwan a significant political and military risk for Xi Jinping and the Chinese Communist Party.” An invasion attempt in the next few years would be incredibly risky and difficult for China, likely ending in failure, but it would not be impossible — especially in the absence of a timely intervention. However, China’s rapid gains in recent years suggest that the odds are tilting towards them.

More Than Gunfire

Just as amphibious shipping is not the only way to land forces, naval artillery is not the only way to provide fire support. Advances in weapons technology in the 79 years since the invasion of Sicily have simultaneously increased the vulnerability of ships providing naval gunfire support and created potent alternatives.
Shortly after supporting the invasion of Sicily, the USS Savannah became one of the first combat casualties of a precision-guided weapon while supporting forces near Salerno. Naval gunfire support tethers a ship to a hostile shore — often within visual range — and increases its vulnerability to enemy fires. The high volume of fires provided by tube artillery is offset by its shorter range, especially when compared to rocket and missile systems.

Large, fast, and expensive cruisers like the Savannah were primarily designed to fight other warships, not support landings. So when the war’s accelerating tempo of amphibious operations demanded more fire support, the cruiser fleet stagnated relative to the amphibious fleet’s explosive growth. Instead, the Navy created several classes of more affordable rocket shore bombardment ships, along with escort carriers that deployed strike aircraft for close air support. Naval gunfire seemed critical in Sicily because the only “aircraft carrier” was a converted tank landing ship that only launched spotting planes, leading “ground commanders [to complain] about the lack of close air support.”

In contrast, the Battle of Okinawa saw naval guns, naval rockets, and close air support combined to terrifying effect. Rocket bombardment ships fired 33,000 rockets in just three hours of pre-landing fires. Throughout the three-month battle, surface ships fired almost 300,000 shells of 5-inch or larger, and aircraft delivered 8,500 tons of bombs and 50,000 rockets. Japan replied with 1,900 kamikaze attacks. The U.S. Navy suffered 36 ships sunk, hundreds more damaged, and 4,900 sailors killed in the war’s final battle, underscoring the vulnerability of ships in the littorals to precision guided munitions.

These searing combat experiences and the recent proliferation of anti-ship missiles informed the Marine Corps’ 2002 requirement for naval fire support from 97 nautical miles, but tube artillery fell short of this ambitious target. This trend points to a global future for naval fire support in which tube artillery plays a limited role and aircraft, missiles, rockets, and loitering munitions take up the slack.

China’s Approaches to Fire Support

Today, militaries provide fire support in dramatically different ways than they did in the early 1940s. Nevertheless, Pietrucha only focuses on China’s dearth of naval guns, perhaps under the rationale that China’s incompetence in joint operations would negate the rest of its extensive strike arsenal. Japan’s National Institute of Defense Studies reached a less dismissive conclusion in its 2022 report, assessing that the People’s Liberation Army’s reforms over the past decade “succeeded in deepening its joint operations.” Consequently, the supporting role of China’s other fires within a joint landing campaign deserves consideration.

With the present caveat that the People’s Liberation Army’s aerospace forces have become notably more capable in the past decade, a 2011 RAND monograph describes the opening role for China’s air and rocket forces in a joint landing campaign:

After the first strikes, China could grind down Taiwan’s air defenses through sheer attrition. China could exhaust Taiwan’s finite missile stockpiles with swarming attacks while striking arms factories in Taiwan and interdicting reloads by sea and air. Absent such deliberate tactics, high-intensity warfare has a perennially voracious appetite for munitions. China could surge production of weapons systems and munitions before and during the operation. Yet even today, the People’s Liberation Army has the means to attack nearly anywhere in Taiwan at scale, using hundreds to thousands of bombers, attack aircraft, missiles, rockets, and loitering munitions. The limited capacity of short-range naval gunfire support should not be confused with a joint incapacity to provide comprehensive fire support.

China would not need complete air supremacy before conducting a joint landing operation and gaining a lodgment. As in the Falklands, local air superiority would be sufficient, allowing China’s recently improved close air support capabilities to help suppress local defenses during a joint landing campaign. Many of Taiwan’s mobile air defense systems, especially man-portable air defense systems, would continue to destroy aircraft and especially helicopters throughout the operation, mirroring American experiences in Iraq. This “good enough” level of air superiority would allow manned and unmanned aircraft to employ numerous munitions against Taiwan’s anti-invasion defenses while sustaining an acceptable but significant level of attrition.

Recent combat experiences and Marine experimentation underscore the value of loitering munitions in both attack and defense. When defending against a hypothetical adversary that possessed loitering
munitions, entire Marine platoons were eliminated. China’s growing arsenal of loitering munitions could supplant naval artillery against armor, vehicles, artillery, bunkers, missile systems, and other point targets from a distance.

Precision munitions work best against discrete and localized targets. They are not a panacea. Massed fires dominate precision fires for effects such as reconnaissance by fire, suppression of area targets, illumination, and smoke/concealment. Naval rocket artillery, similar to China’s experimental shore bombardment frigate, can supplant naval tube artillery for these missions. A vessel combining the deliberate precision of a sea-launched loitering munition system with the deep magazines of rocket bombardment ships would allow China to support an invasion despite its dearth of naval guns. China has many vessels it can retrofit for launching swarms of loitering munitions or rocket barrages, though it can also construct bespoke drone carriers.

**Defusing Explosive Conclusions**

Given the stakes and growing tensions, every aspect of a Taiwan contingency deserves close examination. Pietrucha gives a clear thesis, ripe for debate: “[T]he People’s Liberation Army lacks the necessary power projection and sustainment capability and capacity to execute an opposed occupation of a densely urbanized island packed with citizens who have no interest in living under Communist rule.” However, it cannot be proven one way or the other by comparing military amphibious shipping and naval gunfire with the invasion of Sicily.

The thesis could nevertheless encourage dangerous over-confidence: If the People’s Liberation Army has no chance of taking Taiwan, then why double down on its defense? An equal error in the opposite direction, however, is only as expensive as unused insurance. Concerned allies and partners should therefore hedge towards deterrence by denial. Initial operational failure would likely compel President Xi to go all in, not quit. Good execution at the start of a war is nice, but the capacity to simply keep going and learn from failure is necessary for eventual victory. China has the manpower and industrial capacity to start with an imperfect operation, amphibious or otherwise, and possibly muddle through to victory.

In closing, Pietrucha finally hedges on the inevitability of China’s failure: “The defense of Taiwan is not a burden the Republic of China need shoulder alone, and an expanded, overt, American advisory effort might well provide both an improved deterrent and a much more lethal defense, should deterrence fail.” To end a rebuttal with concord, this is a position with which we heartily agree.

**CORRECTION:** The description in paragraph nine of an August CSIS wargame has been updated after a clarifying discussion with one of the conveners.

Collin Fox is a U.S. Navy foreign area officer. He has participated in BALTOPS and BOLD ALLIGATOR live amphibious exercises as a staff operations and plans officer and is a graduate of the Chilean Naval War College and the Naval Postgraduate School. He has written for War on the Rocks, Proceedings, the War Room, and CIMSEC, where he is a senior editor.

**Hedging with Humility: Reassessing China’s Power Projection Capabilities Against Taiwan - War on the Rocks**

**Political Notebook: Gay Monterey Councilman Williamson Aims to Be Mayor**

*(Bay Area Reporter 31 Aug 22)*

When Monterey City Councilman Tyller Williamson took his oath of office December 4, 2018, he became the first known LGBTQ person to help lead the global tourist destination along California's Central Coast. He was also the first Black council member in the city's history, and at 31 years of age, the youngest.

Now, Williamson is aiming to become the first Black and first gay mayor of Monterey and its nearly 29,000 residents. Elected citywide to a two-year term, the mayor works closely with the city manager and the other four members of the City Council.
The seat is open this year as Mayor Clyde Roberson, who was born in Oakland, decided not to seek a fifth consecutive term. Williamson officially launched his mayoral campaign in front of City Hall last Saturday, August 27, and was also named last week an "Essential Voices for Equality" fall candidate endorsed by the LGBTQ Victory Fund, which works to elect LGBTQ people to public office across the country.

He is one of two out councilmembers running this year to be mayor of their city in the South Bay and Central Coast regions. Gay Santa Clara City Councilmember Anthony Becker is also vying to be elected in November to lead his city in the heart of Silicon Valley.

Speaking to the Bay Area Reporter by phone August 26, Williamson said he felt compelled to run for mayor at such an important moment for his city and region on the Monterey Peninsula. Like the Bay Area, the Monterey metro area is also dealing with a lack of affordable housing, strains on its local workforce, an increasing unhoused population, and the repercussions of climate change.

"I just felt like this was an opportunity for me to either step up or step back. I ran for City Council in 2018 to make a difference in the community and to help Monterey move forward. I feel I have been able to do that and achieved a lot of the things I ran on in 2018," said Williamson, 34, who works in human resources at the Naval Postgraduate School. "I feel if the council remains with the same makeup then I am not sure how much more I will be able to get done. This really presented an opportunity to change things up."

This year, the city is transitioning to electing its councilmembers by district, with two of the four seats on the November 8 ballot. Williamson is hoping to see Kim Barber, a Black straight ally, succeed him on the council in the District 1 seat.

An administrator at California State University, Monterey Bay, where she is director of the pre-college and early outreach support programs, Barber would be the only woman serving on the council if elected. She would also double representation by people of color on the council if Williamson becomes mayor, as he is currently the only non-Caucasian council member.

"I think she is going to do a great job providing a different perspective, and a much-needed perspective, on the council," said Williamson.

Councilmember Ed Smith is running unopposed for the new District 2 seat, while Councilmember Dan Albert Jr. is competing against Williamson to be elected mayor. His father had served as mayor in the 1980s and 1990s alongside Roberson, who was a City Council member for 16 years and is now supporting the younger Albert to succeed him as mayor.

(Albert could remain in his council seat should he lose his mayoral bid, as his seat and the fourth council seat won't be up until 2024.)

Williamson, who will find out in October if readers of the Monterey County Weekly chose him as the newspaper's "Best Local Politician in Monterey County 2022," told the B.A.R. he is undaunted running against someone whose family has such long ties to the local community. (The school district named its football field and stadium after the elder Albert, its longtime football coach.)

"I feel I have a really good chance of being successful with this experience and moving Monterey forward," said Williamson, who owns a home with his domestic partner, high school history teacher Ivan Quiroz Bautista, in the city's Old Town section that they share with their long-haired dachshund Sasha.

Raised by a mom serving in the Navy, Williamson lived in different cities across the globe as a child. He first moved to the Monterey area in 2010 for a job with the Naval Postgraduate School and graduated from Cal State Monterey Bay in 2013. He went on to earn a master's of business administration from the naval school.

As he told the B.A.R. four years ago during his City Council campaign, Williamson found inspiration to run for elected office as a campaign staffer on Barack Obama's presidential campaigns. During Obama's 2012 reelection bid, Williamson won a campaign fellowship and helped organize outreach efforts in Monterey.

It led to his being hired as the deputy regional field director for the Obama campaign in the Bay Area. Williamson relocated to Oakland then San Francisco for several months for the job, which resulted in his working daily in the Castro and coming out of the closet.
When he returned home to the coast, Williamson helped launch the Monterey Peninsula Pride event. It held its 2022 celebration in late July and is planning to host the 2023 event on July 15.

He plans to employ his local organizing skills onto his mayoral bid with a "very strong" field campaign at the center of his electoral efforts. He is targeting the 66% of residents who rent in Monterey as well as younger residents of the city.

"I plan to go out and talk to voters and have conversations about why moving Monterey forward is what I have heard is wanted in the community and why I think I am the better candidate to represent the city in trying to bring us into the 21st century here," said Williamson.

Housing is a major issue of his campaign, as it impacts many of the people who work in the local tourist industry and struggle to afford to live near their jobs. Monterey has seen its new housing requirement go from 650 units to nearly 3,700 units, a target that Williamson is committed to meeting as mayor.

"One of the things I was able to achieve during my council term was we did a rezoning that allowed additional housing development in the city of Monterey. Broadly speaking, that was something I don't think would have happened if I wasn't on the council and bringing that forward," said Williamson, who has pushed the city to work with developers to build affordable housing on city-owned land.

He is also an advocate for a "housing first" approach when trying to move unhoused people off the streets. Providing them with permanent housing can also be coupled with access to various services, he argued, that can assist them in remaining housed and leading productive lives.

It is just one of the issues as mayor Williamson would want to take a regional leadership role on, he told the B.A.R.

"How do we work with other leaders within our community to not only take care of the issues important to the residents of Monterey but do look at it with a regional perspective while being mindful of how our taxpayer dollars are being used?" he asked.

He is eschewing corporate donations for his mayoral campaign and is capped at receiving $525 from donors, a limit he pushed for as a council member. Williamson is almost halfway toward raising his goal of $40,000 for his campaign coffers, he told the B.A.R.

Even if someone can only donate $20 toward his campaign, Williamson hopes they will support his bid to break through several political glass ceilings in his city.

"Representation matters," noted Williamson, adding that in particular for "queer kids in our community to see someone in a position of power leading the city from a mayoral seat has a huge impact."

New San Ysidro Port Director Mariza Marin

U.S. Customs and Border Protection is announcing the appointment of a new Port Director at the San Ysidro Port of Entry, Mariza Marin.

“It is truly an honor to have the opportunity to serve the communities of Tijuana and San Diego, my hometown. The women and men of CBP at the San Ysidro Port of Entry work tirelessly to keep our nation and communities safe, while ensuring the prosperity and health of our binational communities. I am privileged and humbled to lead such an amazing workforce into the future,” said Port Director Mariza Marin.

The San Ysidro Port Director oversees all operations, budget, personnel, and enforcement at the nation’s busiest border crossing, located between San Diego and Tijuana, Mexico. CBP officers at San Ysidro process approximately one out of every ten people who enter the U.S. nationwide, inspecting almost 100,000 persons for entry into the U.S. daily at the 24-hour crossing, while providing safety and
security at the border, stopping illegal activity. Port Director Marin will also oversee CBP operations at the Cross Border Xpress, a first of its kind public/private venture that serves as an enclosed pedestrian bridge directly connecting San Diego with the international airport in Tijuana, Mexico. Port Director Marin will also have oversight of the Port of San Diego which covers international commercial and private air operations and maritime commercial and cruise ship operations.

San Ysidro is the largest and busiest border crossing within the San Diego Field Office, which covers the six land border crossings between California and Mexico. The ports within the San Diego Field Office are responsible for seizing approximately half of all fentanyl and half of all methamphetamine seized by CBP nationwide, and about 45% of all heroin. CBP officers at San Ysidro also routinely stop and process individuals inadmissible to the U.S., with CBP officers throughout the San Diego Field Office stopping and processing 60,721 inadmissible persons in fiscal year 2022 through June. In addition to facilitating legitimate travel into the U.S., stopping illegal narcotics at the border, and stopping and processing inadmissible persons without legal status to enter the U.S., CBP officers enforce hundreds of laws for more than 40 different government agencies at the border, including agriculture restrictions, customs law, apprehending fugitives with active warrants, and more.

In her new position, PD Marin is the first woman port director at San Ysidro, joining other women in leadership positions within the San Diego Field Office (SDFO), including Anne Maricich, Deputy Director of Field Operations for SDFO, and Rosa Hernandez, Port Director for the Otay Mesa commercial crossing. The previous San Ysidro Port Director, Sidney Aki, left his post in January 2022 when he became the new Director of Field Operations for the San Diego Field Office.

“Ms. Marin’s leadership will help to enrich the San Diego Field Office and her selection reflects our unwavering commitment to serve the local communities and ensure bi-national economic prosperity,” said Anne Maricich, CBP Acting Director of Field Operations in San Diego. “I have no doubt that with Port Director Marin’s significant level of work experience, she will seek new and innovative ways to make the San Ysidro Port of Entry more effective and efficient while balancing our mission priorities of border security and the facilitation of lawful trade and travel.”

PD Marin began her career with CBP in December 2008 at the LA/Long Beach seaport, transferring to the Otay Mesa port of entry in 2010. She has spent more than half of her public service in varied leadership positions to include: Supervisory CBP Officer, Branch Chief, Watch Commander and Assistant Port Director. Throughout her years with the agency, her various posts have encompassed the land, sea and air passenger environments.

PD Marin currently serves as an advisor on the University of California Riverside’s, Design Think Executive Program Advisory Board. The program explores innovation and design of products and services that benefit both internal and external stakeholders. The format is designed to develop creative and critical thinking skills to lead innovation initiatives. Many of the participating organizations are listed on the Fortune 500 list.

Beginning in October 2015, Marin had leadership and direction over the administrative and criminal enforcement actions of all immigration interdictions to include pre and post criminal investigations of individuals suspected of violating criminal or civil laws enforced by CBP. In September 2019, until she left for a temporary duty in Washington, DC, Marin held the position of Assistant Director Border Security (ADBS), for the San Diego Field Office.

Prior to her assignment as Port Director, Mariza Marin served as Chief of Staff for the CBP Office of Field Operations’ Executive Assistant Commissioner. She also worked as the Director for Border Security at the White House National Security Council. Her work included the development and implementation of policies to strengthen border security across the nation and curb irregular migration. Marin is a graduate of the Naval Postgraduate School, Center for Homeland Defense Studies, Executive Leaders Program.

U.S. Customs and Border Protection is the unified border agency within the Department of Homeland Security charged with the comprehensive management, control, and protection of our nation’s borders, combining customs, immigration, border security, and agricultural protection at and between official ports of entry.

New San Ysidro Port Director Mariza Marin | U.S. Customs and Border Protection (cbp.gov)
What Did You Sign Up For?
(USNI 1 Sept 22) … Andrew Bishop

Leading up to my first day in officer training, I was given a copy of A Sense of Honor by James Webb. The book describes the lives of midshipmen at the U.S. Naval Academy during the Vietnam War. Webb grapples with the idea of the Academy changing from a place that trains “warriors” to one focused on creating technically and academically proficient officers.

One scene stood out for me: Photos of the men killed in Vietnam, some who had graduated less than a year before, were placed in the Rotunda, a central, sacred place midshipmen walk through on the way to their rooms or classes. The photos were a constant reminder of what the midshipmen could face after graduation, maybe in a matter of months.

For some, these men were heroes. But the main character in A Sense of Honor, a plebe, views the photos with apprehension and goes out of his way to avoid them. He thinks, “I get out of here in 1971. It won’t happen to me, it can’t happen to me. The war will be long over by 1971.”

A soldier places flags at gravesites at Arlington National Cemetery. Credit: U.S. Army (Elizabeth Fraser)

Because of the perspectives on officer training in Webb’s novel, I asked my underclassmen mentees at the Academy to read it. I then asked, If planes were being shot out of the sky, ships were being sunk, and Marines on the ground were dying today like in Vietnam, would you still sign up to commission? In short, are you prepared to die for your country?

Often, I was met with uncomfortable looks and half-hearted answers. It seemed like the gravity of what we were signing up for had not really sunk in for many. I would venture to say only a handful of midshipmen knew any recently commissioned officers killed in training, let alone combat.

Dying for country is not often explicitly addressed during officer training. Typically, candidates are asked about sending their enlisted sailors into harm’s way or taking lives in defense of the nation. Rarely is the prospect of dying oneself seriously discussed—even in the leadership and ethics curricula.

The Navy is a dangerous place. Accidents happen: surface ship collisions, submarine casualties, aviation training accidents. Compared to the Vietnam era, however, training is markedly safer and combat deaths less common. Does this relative lack of risk mean those volunteering for service do not think about the ultimate sacrifice? If aircraft were being shot down over Taiwan in a full-scale war with China, would current candidates still sign up?

General George Patton said winning a war does not mean dying for your country but “making the other bastard die for his.” But in reality, as soon as officers take the oath, they write a check for their lives to the U.S. government.

It would be interesting to survey candidates on their first day of training at the Naval Academy, ROTC, or Officer Candidate School and ask if they would be willing to die for their country tomorrow. If they say no, a commission is not for them. Send them on their way.

This is unrealistic, of course, but it would make sense to have new officers reflect more. I was not asked explicitly during the application process to the Naval Academy, during my time as a midshipman, or during flight training if I was ready to die for my country—and why. Mentors talked about friends and colleagues who had died, and past Navy and Marine Corps heroes were mentioned, but no one asked if I was ready.

Asking this question on admission essays for officer training would be a good start. It could replace the generic “Why do you want to serve” prompt, forcing candidates to at least think about the possibility of dying for their country. In addition, the topic should be emphasized in the leadership and ethics curriculum, with a focus on serious reflection.
Finally, all officers should rewrite their “why” before they take the oath of office and at each subsequent promotion ceremony. The possibility of making the ultimate sacrifice is not reflected on enough. The Navy should not be afraid to ask new officers to consider it.

Most officers would willingly lay down their lives for their fellow Americans, but some might hesitate. Incorporating more reflection in officer training and in the fleet would ensure the Navy recruits the people it needs. This is important, as there is potential for significant loss of life in a conflict with peer adversaries such as Russia and China.

The first time to think about the ultimate sacrifice is not on the battlefield.

Lieutenant (j.g.) Bishop, a 2019 graduate of the U.S. Naval Academy, attended the Naval Postgraduate School after commissioning and earned a master’s degree in aerospace engineering. He is currently in the aviation training pipeline.

Alfred Poirier Named Deputy Fire Chief Of Beverly Hills
(Canyon News 1 Sept 22)

The city of Beverly Hills has selected Alfred Poirier, a veteran with 35 years of firefighting experience to become the next Deputy Fire Chief for Beverly Hills. According to a news release from the city,

Poirier recently served as the Chief Deputy of Emergency Operations for the Los Angeles Fire Department and will start his role with the Beverly Hills Fire Department (BHFD) on September 6. As Deputy Fire Chief for BHFD, he will oversee Emergency Response Operations, the Safety and Training Division, and System Integration. Also, he will serve as second in command at BHFD.

“All is one of the most respected leaders in our industry,” said Beverly Hills Fire Chief Greg Barton. “We received applications from dozens of sitting Fire Chiefs and Deputy Chiefs nationwide and I am thrilled to bring Al’s extensive background and expertise to our team and our community.”

While with the LAFD, Chief Poirier oversaw a service area of more than 100 fire stations served by 1000 firefighters and paramedics on duty each day. The responsibility included executive level decision making related to fire and emergency medical resource deployment, organizational policies and budget management.

“The Beverly Hills Fire Department has an outstanding reputation for its level of service and innovative programs,” said Poirier. “I am grateful for the opportunity to join Chief Barton and work with this incredible team as we serve the world-class community of Beverly Hills.”

Poirier worked across the Los Angeles region in a variety of assignments and is a veteran of several dozen large scale emergency events including multiple devastating wildland fires, the 1992 Civil Disturbance and the 1994 Northridge Earthquake. He was a member of the FEMA Urban Search & Rescue Team (CATF-1) in Los Angeles for over 20 years with deployments that included the World Trade Center event in NYC on 9/11, and to the Gulf Hurricane Disaster in 2005.

Chief Poirier earned his Bachelor of Science in Emergency Services Management from Union Institute and University, and Master of Arts in Security Studies from the Naval Postgraduate School in Monterey, CA.
Decision Lens is excited to announce the appointment of Michael Browne to Senior Vice President. Mr. Browne brings a rich, well-aligned background of military and private sector experience which will be critical as Decision Lens expands its footprint across the Navy and beyond.

Mr. Browne is a graduate of the U.S. Naval Academy and holds advanced degrees from the Naval Postgraduate School, the University of Chicago Booth School of Business (MBA), and the Eisenhower School at the National Defense University (in National Security Strategy and Resource Planning). In his military career, Mr. Browne ultimately retired as a Rear Admiral, after serving on active duty as a nuclear engineer in operational assignments on fast attack and ballistic missile submarines, and in engineering duty reserve assignments across Navy Systems Commands. His roles included Senior Fellow at the CNO’s Strategic Studies Group, Deputy Chief Engineer at NAVSEA, SPAWAR, and NETWARCOM, Director of (OPNAV) Personnel Programs, NAVSEA Executive Director, and NAVSEA Vice Commander.

In his industry career, Mr. Browne held consulting, sales, and technology positions at IBM Corporation, and ultimately served as a Director of Strategic and International Government Programs for IBM Research in the areas of Intellectual Property and Watson Technologies. Mr. Browne later served as CEO of Lumina Analytics, a specialty AI Company for government and financial services companies. He now advises CEOs and Corporate Boards on their technology and marketing strategies.

Mr. Browne has a long history with Decision Lens having met the founder’s father as a student in 2005. According to Mr. Browne, “As a student at the Industrial College of the Armed Forces, I was introduced to Dr. Saaty. I was mesmerized by Dr. Saaty’s description of using Analytic Hierarchy Process concepts to solve complex strategic problems including mitigating geopolitical conflicts. I have been amazed at how over the last 15 years, John and Dan have integrated their father’s decision science concepts into software which is revolutionizing government decision making.”

Ted Reynolds, Chief Revenue Officer of Decision Lens, “Michael’s background in national security strategy and resource planning will be a boon to our prospects and customers. He will be able to connect the value of Decision Lens to the challenges the market faces in a way only an Eisenhower school graduate and retired officer can. We couldn’t be more excited to have him join the team.”

Mr. Browne will be a critical voice amongst Decision Lens senior leadership providing input on business development, product, marketing, as well as go-to-market strategy.

About Decision Lens: Decision Lens develops integrated planning software which modernizes how government prioritizes, plans, and funds. We have been transforming public sector planning since 2005, delivering the people, process and technology which empower agencies to effectively meet the needs of today while delivering the cutting-edge capabilities of tomorrow. Customers across the Department of Defense, intelligence community, federal civilian agencies and state and local government achieve a sustained operational advantage through superior long-term planning, continuous medium-term prioritization, and short-term funding execution.

Decision Lens Hires Michael J. Browne, Rear Admiral US Navy (Ret) to serve as Senior Vice President - EIN Presswire (einnews.com)

Edmonds City Council Set to Confirm New Public Works Director Sept. 6
(Edmonds News 2 Sep 22)

After nine months of being without a public works director, the City of Edmonds is set to hire Oscar Antillon, who currently is the public works director for the Town of Los Altos Hills, California.

The Edmonds City Council is scheduled to vote on confirming Antillon at its Tuesday, Sept. 6 business meeting — the same day that it will also pick a new councilmember to fill the Position 1 council seat left vacant with the death of Councilmember Kristiana Johnson.

According to his Linked In profile, Antillon is a graduate of the University of Utah, receiving a bachelor of science in civil engineering, then earned a master’s degree in information systems and
City Presents Conditional Offer To Garretty for City Manager

(EIN News 2 Sept 22)

The city of Graham Wednesday made a conditional offer to Eric Garretty for the position of city manager. If accepted, Garretty will step in the position vacated by former Graham City Manager Brandon Anderson and filled temporarily by Interim City Manager Larry Fields.

Garretty was one of three candidates presented to the city council in a day-long interview process Wednesday, Aug. 31 at the Graham Visitors and Business Center. During the process, each city council member had 30-minute, one-on-one sessions with each potential hire and later had group interviews with each candidate.

Since 2017, Garretty has been the city manager of Mexia. Prior to his city manager service in Mexia, he worked as the budget manager for the city of Fort Worth, strategic performance coordinator for the city of Hallandale Beach, Fla., and management and budget analyst for Broward County, Fla. He served as a member of the U.S. Marines where he received multiple meritorious service awards.

Garretty has a Master of Science in Management from Naval Postgraduate School and a Bachelor of Arts in Political Science from the University of Mississippi. Additionally, he is a member of the Texas City Management Association and is enrolled in the Texas State University Certified Public Manager Program.

City presents conditional offer to Garretty for city manager | Graham Leader

Navy Combat Aviator Chuck Sweeney: ‘Timing Is Everything’

(Flying Mag 22 Sept 22) … Kimberly Johnson

In 1972, the Douglas A-4 Skyhawk pilot was awarded three separate Distinguished Flying Cross medals for strikes against the North Vietnamese, all conducted in the span of a week.

Navy Commander Chuck Sweeney began his Naval career as an engineer, testing electronic equipment but quickly became interested in flying. He set his sights on becoming a tailhook pilot, and while in Naval Postgraduate school, applied to fly the Douglas A-4 Skyhawk. It was a fortuitous career goal. In 1972, Sweeney was awarded three Distinguished Flying Cross medals for strikes against the North Vietnamese, all conducted in the span of a week. The DFC citation is awarded to members of the U.S. armed forces for acts of heroism or extraordinary achievement during aerial operations. Here are excerpts from a recent conversation with Sweeney, who is the current president of the Distinguished Flying Cross Society, lightly edited for space and clarity, as told to FLYING.

I was determined I was going to get into a jet. [The Navy] sent me to Naval Postgraduate School, trying to make me smarter. I tried avoiding that, but they said no. But while I was there, I applied to go fly
the A-4 Skyhawk. My wife said, “You’re too old. They won’t take you.” I said, “Yes, they will.” I was 33 at the time. But they were losing so many pilots that they took me. I said, “They were looking for cannon fodder, and I can do that.” That got me into A-4s.

[In late summer 1972 during the Vietnam War, Sweeney was abruptly reassigned to a carrier to replace the executive officer of Attack Squadron 212, who had been shot down and was listed as missing in action.]

I was out there, probably two weeks or so. We had had a storm. We were launching the aircraft, and it was the last flight of the day. I was leading three other airplanes, and then we broke off. Two went one way and two the other. We were looking for targets.

The other two found targets. They found some trucks. They did a no-no and they made multiple runs. On the third time they went to bomb the trucks, the wingman got hit. It was dusk, it was a heavy overcast. It was the last flight of the day—it wasn’t dark but it wasn’t light. And you could see his plane was on fire. It looked like a Roman rocket coming out, and it was climbing, trying to get altitude but also trying to get over the water. He managed to get maybe 3 miles offshore. The plane’s engine had quit and so he was losing altitude but when he felt he was overwater, he ejected. It worked perfectly.

He landed in the water. I became what they call the on-scene commander. The SAR—search and rescue commander. I was in charge of getting him back.

The rescue helicopter had shut down for the night, but they launched it from the destroyer. And I sent two A-4s to escort the helo up to where we were.

I assigned four other aircraft to go after—I knew there would be some [North Vietnamese anti-aircraft artillery] sites. I assigned my wingman because I figured there was a coastal defense gun that would open up some time, and I assigned him to take that out. But I was doing all this, writing everything down on my keyboard, just a 5-by-7 piece of paper, trying to keep tabs of everything.

The helicopter finally shows up. They flew over and they went maybe 1,000 yards, and then they dropped their smoke light. Usually the helicopter drops a smoke light so that they can get the direction of the wind down at water level.

When they went over him, the swimmer jumped out of the helicopter and landed in the water with the survivor. He’s only 2 and a half miles offshore of Vietnam. That took guts, that really did.

They finally picked him up. I was circling, all of us, we’re orbiting out over the water. One of the times, I guess I wasn’t paying attention, and I got a little too close to land. One of the AAA guns opened up on me. [They had figured out] who was in charge. And I thought, “I still have my six bombs, maybe when this is over, maybe I’ll find a place to get rid of them.” It was kind of a dumb thought, but I thought it.

[The rescue helicopter] picked up the swimmer and the pilot. They reported that they were in the helo and they were on their way back to the destroyer. So I reported [that back] to the admiral. I thought, everything’s hunky dory. Nobody’s been hurt. It’s time to get rid of my six bombs. And I started heading to work. I was only maybe 3 miles from the AAA site. And this voice came up on the radio. It was the deepest voice I had ever heard. And it said, “Flying Eagle 312, this is Jehovah. Report all chicks feet wet.” Well, Flying Eagle 312 was my call sign. Jehovah is a personal callsign of the admiral. And he was asking for me to report that everybody was out of the water and that everybody was safe. I thought, “Should I drop my bombs?” In microseconds, I processed it. He can’t see me. He only knows what I’m telling him. So I went in and dropped my bombs, got some secondaries and I actually saw the gun barrel come up. And then I got back over the water and reported, “all chicks feet wet.”

So it was a very successful rescue. I was awarded the DFC for it. The pilot of the helicopter was awarded the DFC, and the swimmer was awarded a DFC. That was my first DFC. I basically didn’t know about any of these until once we got back after the end of the cruise.

Alpha Strike

A couple of days later, they assigned me to lead what was called an “Alpha strike,” which I called a gaggle. It’s about 35 aircraft going after a single target in North Vietnam. It was the first time I had ever led one in combat. I’d say it was a successful mission, we got pretty good coverage on the target. I can’t say we got it all, but they weren’t going to be operating for quite a while.
Then the next day, I led another Alpha strike. I had three other aircraft with me, but we were on the very left side of the whole flight. We were headed in, and then we were supposed to make a right hand turn. About that time, SAMs—surface to air missiles—we got signals that they were launched. And you could actually see them take off. And you couldn’t tell for a while who they were tracking. You just knew it was coming toward our group.

As one got closer, I realized that it had my name on it. The rule with how you handled that was—back in those days, and they still do it against that particular missile—was when it looks like a flying telephone pole, you do a barrel roll around, and it can’t follow you.

In training] I kept asking, “I’d like something more definite than that.” They said, “Trust us. You’ll know it when you see it.”

Sure enough, this thing came up, and by this time it was close enough, I could tell we were the target. The four of us. When it looked like a flying telephone pole, I did a barrel roll to the left and the other three planes stuck with me. They knew that was their salvation too. And the missile didn’t hit us.

It went somewhere and probably blew up, or maybe went up and then came back down and blew up. I don’t know. Once it passed us, I didn’t care.

In the meantime, the whole rest of the group made their right turn, so now I had to catch up. I did just as they were turning in toward the target. We had some more SAMs and AAA come up. We got to the target area and our target was actually underwater so had to pick it out on another target. We hit a couple of trains and we got some secondaries and survived, and came back out. I was awarded another DFC. I ended up with three of them in a week. I wasn’t bored.

Timing is everything.

The training kicked in, absolutely. The rescue went smoother than any of the rescues I had done in training. All my training kicked in. I’m no different than anybody else. I’m no more of a hero than anybody else. The junior officers in the squadron on the flights with me, I feel they all should have gotten DFCs. But somehow the decision always seemed to be the more senior people got them. My training kicked in, and I did exactly what I was trained to do.

To me, it didn’t change anything. I was very, very glad I kept my squadron mate out of the Hanoi Hilton. That was a big thing to me. I was just glad everything worked out. We were able to do that. But everybody else that was on that flight with me did what they were trained to do.


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