General Dynamics Tapped to Accelerate Navy Cloud Adoption

FAIRFAX, Va. – General Dynamics Information Technology (GDIT) will deliver commercial cloud services for the U.S. Navy to accelerate cloud adoption. The Navy's Program Executive Office for Enterprise Information Systems (PEO EIS) awarded CSRA LLC, a managed affiliate of GDIT, a $22.4 million blanket purchase agreement (BPA), the company said in a Nov. 19 release.

The award includes a one-year base period with four one-year options that, if exercised, would bring the estimated cumulative value to $96 million.

"GDIT will continue supporting PEO EIS as it executes the Navy's 'Cloud First' strategy of increasing data reliability and cost-effectiveness, while maintaining a robust security profile," said Leigh Palmer, senior vice president and head of GDIT's Defense Division. "Through this award, the Navy will gain access to premium commercial cloud services through GDIT's strategic relationships with Microsoft and Amazon. Our secure, scalable and containerized environment will enable the Navy to store its data securely, reap significant savings and gain impressive resources to accomplish their mission."

GDIT will deliver commercial cloud services to the Navy through the General Services Administration's Schedule 70, which includes Amazon Web Services and Microsoft Azure. Both companies are Strategic Alliance Partners with GDIT.

U.S. Navy Commissions Littoral Combat Ship Sioux City

ANNAPOLIS, Md. – The U.S. Navy commissioned USS Sioux City (LCS 11) – the nation's sixth Freedom-variant littoral combat ship – at the U.S. Naval Academy Nov. 17, Lockheed Martin said in a release.

"We are confident that LCS 11 will be what the Navy needs, when the fleet needs it," said Joe DePietro, vice president, Small Combatants and Ship Systems, Lockheed Martin. "We remain focused on delivering these ships as quickly as possible with increasing capability and lethality. These ships will have a long lifespan, and we're working with the Navy to make LCS even stronger and more resilient."

The Freedom-variant LCS integrates new technology and capability to affordably support current and future mission capability from deep water to the littorals. LCS 11 is equipped to support surface warfare.

LCS continues to increase in capability. This year, LCS 5 and 7 completed Longbow Hellfire missile testing, LCS 9 completed Rolling Airframe Missile testing and LCS 5 and 9 participated in Fleet Weeks around the United States.

The Freedom-variant LCS is designed to integrate modular weapons, as well as manned and unmanned vehicles to deliver critical warfighting capability to the fleet in mine counter measures, anti-surface warfare and anti-submarine warfare.

"LCS is our most effective fleet asset to counter asymmetric small craft threats," said Adm. John Richardson, chief of naval operations. "This ship and the ships like her are going to complicate any adversary's operating picture. You're going

to need to keep track of Sioux City when she's at sea, because if you don't, she's going to make you pay for that."

There are seven ships in various stages of production and test at Fincantieri Marinette Marine, where the Freedom-variant LCS is built. The next Freedom-variant in the class is LCS 13, the future USS Wichita, slated for commissioning in Mayport, Florida, in January. LCS 19 is scheduled for christening on Dec. 15.

"Two thousand men and women crafted this ship from flat steel to the capable and agile surface combatant being commissioned. The men and women who sail this ship have an enormous responsibility in protecting our nation and allies, and we consider it a privilege to support these missions," said Jan Allman, president and CEO of Fincantieri Marinette Marine. "I am confident that when called upon, the USS Sioux City will always prevail."

Austal Delivers Expeditionary Fast Transport Burlington to Navy

MOBILE, Ala. – Austal USA delivered the expeditionary fast transport ship USNS Burlington (EPF 10) to the U.S. Navy during a ceremony onboard the ship at the company's headquarters Nov. 15, the company said in a release. This is the fourth ship Austal has delivered to the Navy this year.

The EPF program provides the Navy with a high-speed intra-theater transport capability. The 338-foot long Burlington is an aluminum catamaran capable of transporting 600 tons, 1,200

nautical miles at an average speed of 35 knots and is designed to operate in austere ports and waterways, too shallow and narrow for the larger ships in the surface fleet, providing added flexibility to U.S. warfighters worldwide. The ship's flight deck can also support flight operations for a wide variety of manned and unmanned aircraft, including a CH-53 Super Stallion.

"Today's delivery of Burlington marks the 10th EPF we have delivered to the U.S. Navy, a milestone achieved as a result of the dedicated shipbuilding team made up of Austal employees, our Navy partners, industry suppliers and both local and state community and legislative support," said Austal USA President Craig Perciavalle. "These ships continue to deliver exceptional capability around the globe. The U.S. Navy is taking these great ships and expanding their work to support a variety of operational needs, demonstrating their significance, flexibility and value to the future 355-ship Navy."

Upon delivery of USNS Burlington, two additional Spearhead-class EPFs are under construction at Austal's Mobile shipyard. Puerto Rico (EPF 11) was launched this week and will now prepare for sea trials and Newport (EPF 12) is being erected in final assembly. Austal also recently received instruction from the Navy to order long lead-time materials for EPF 13.MIAMI – The crew of the Coast Guard Cutter James offloaded approximately 18.5 tons of cocaine Nov. 15 in Port Everglades worth more than an estimated $500 million wholesale seized in international waters in the Eastern Pacific Ocean, the 7th Coast Guard District said in a release.

The drugs were interdicted off the coasts of Mexico, Central and South America by multiple U.S. Coast Guard cutters.

The offload represents 15 separate, suspected drug-smuggling vessel interdictions by the Coast Guard:

■ James was responsible for nine cases seizing an estimated 19,288 pounds of cocaine.
■ Bear was responsible for one case, seizing an estimated 44 pounds of cocaine.
■ Stratton was responsible for one case, seizing an estimated 440 pounds of cocaine.
■ Active was responsible for two cases, seizing an estimated 3,148 pounds of cocaine.
■ Dauntless was responsible for two cases, seizing an estimated 2,050 pounds of cocaine.
■ Venturous was responsible for two cases seizing an estimated 3,100 pounds of cocaine.
■ Spencer was responsible for one case seizing an estimated 4,497 pounds of cocaine.
■ Campbell was responsible for one case seizing an estimated 5,441 pounds of cocaine.

Numerous U.S. agencies from the Departments of Defense, Justice and Homeland Security are involved in the effort to combat transnational organized crime. The Coast Guard, Navy, Customs and Border Protection, FBI, Drug Enforcement Administration, and Immigration and Customs Enforcement, along with allied and international partner agencies, play a role in counter-drug operations. The fight against transnational organized crime networks in the Eastern Pacific requires unity of effort in all phases from detection, monitoring and interdictions, to prosecutions by U.S. Attorneys in California, on the East Coast and in Puerto Rico.

Bear is a 270-foot medium-endurance cutter homeported in Portsmouth, Virginia. Stratton is a 418-foot Legend-class cutter homeported in Alameda, California. Active is a 210-foot Reliance-class cutter homeported in Port Angeles, Washington. Dauntless is a 210-foot Reliance-class cutter homeported in Pensacola, Florida. Venturous is a 210-foot Reliance-class cutter homeported in St. Petersburg, Florida. James is a 418-foot Legend-class cutter homeported in North Charleston, South

Carolina. Spencer is a 270-foot medium-endurance cutter homeported in Boston. Campbell is a 270-foot medium-endurance cutter homeported in Kittery, Maine.

Naval Strike Missile System Planned for Installation on LCS 27

ARLINGTON, Va. – Lockheed Martin is in the process of integrating the Over-the-Horizon (OTH) Weapon System on its Freedom-variant littoral combat ship (LCS) and has identified the ship to be built ready for the missile system.

The first Freedom LCS to be built ready to receive the Naval Strike Missile (NSM), the weapon of the OTH system, will be LCS 27, the future USS Nantucket, Joe DiPietro, vice president of Small Combatants and Ship Systems, said Nov. 15 in a teleconference with reporters from Annapolis, Maryland.

The NSM, developed by Norway's Kongsberg, is a ship- and ground-launched anti-ship cruise missile that will be integrated by Raytheon Missile Co. into the OTH system. It will give the LCS an OTH anti-ship capability as an initiative to improve the lethality of the Navy's warships.

"We're working on the design and integration of that," DiPietro said. "[The Navy] had us do space and weight on our previous hull that was awarded for the Naval Strike Missile and now we're working on the modernization package to be able to put that in to an in-service asset as well."

Rear Adm. Joseph P. Neagley, program executive officer,

Unmanned and Small Combatants, told Seapower last month that the NSM will be installed on all LCSs, regardless of which mission package is installed.

DiPietro said Lockheed Martin also is working on a backfit of the NSM, but that the Navy will determine the schedule of ships to be fitted with the NSM.

DiPietro also said the company is working on the integration of the Surface Electronic Warfare Improvement Program Block II Lite into the Freedom variant.

“We actually already have put that test asset on LCS 1 Freedom and ran through the range and tested it with our COMBATSS21 configuration, being a derivative of Aegis,” he said.

Navy Orders F-35s Under Contract Modification

ARLINGTON, Va. – The Navy has awarded Lockheed Martin a $22.7 billion contract modification for 255 F-35 Lightning II joint strike fighters, the Defense Department said in a Nov. 14 release. Of the order, 42 aircraft are for the Navy and Marine Corps.

Naval Air Systems Command awarded the low-rate initial production contract modification for Lot 12 aircraft plus more added by Congress for fiscal 2018-2019.

The 255 Lightning IIs in this order include 36 F-35Bs for the U.S. Marine Corps and 16 F-35Cs for the U.S. Navy. The order includes 64 F-35As for the U.S. Air Force; 60 F-35As for Foreign Military Sales; and 71 F-35As and 18 F-35Bs for

nations partnered in the F-35 program. Work under the contract is expected to be completed by March 2023.

The F-35's production remains in low rate because it has not yet completed its operational test and evaluation.

The Marine Corps' F-35B made its first operational shipboard deployments this year and on Sept. 27 Marine Fighter Attack Squadron 211 conducted the Lightning II's first combat missions, over Afghanistan in support of Operation Freedom Sentinel. The Navy's first F-35C fleet squadron, Strike Fighter Squadron 147, has been formed and is training in its new aircraft.

Navy Super Hornet Crashes in Philippine Sea; Crew Rescued

PHILIPPINE SEA – A Carrier Air Wing 5 (CVW-5) F/A-18F experienced a mechanical issue that resulted in the crew ejecting while conducting routine operations in the Philippine Sea Nov. 12, Task Force 70 public affairs said in a release.

"The crew was immediately and safely recovered by USS Ronald Reagan search-and-rescue aircraft and brought back to the ship for evaluation by medical personnel, the release said. "Both aviators are in good condition."

The F/A-18F was flown by Strike Fighter Squadron 102, one of four Super Hornet squadrons assigned to Carrier Air Wing Five.

Two other CVW-5 aircraft have been lost in mishaps over the past year. On Nov. 22, 2018, a C-2A Greyhound assigned to Fleet Logistics Support Squadron 30 Detachment Five crashed

into the Philippine Sea while en route to Ronald Reagan, killing three Sailors. On Oct. 19, an MH-60R Seahawk assigned to Helicopter Maritime Strike Squadron 77 crashed on the flight deck of the carrier, injuring 12 persons.

CVW-5 is embarked onboard Ronald Reagan and is currently underway in the U.S. 7th Fleet area of operations in support of security and stability in the Indo-Pacific region.

Ronald Reagan has resumed normal operations and the crash is under investigation.

Navy Submarine Force Boss: All Submarines to Get 3D Printers

ARLINGTON, Va. – The Navy is moving to equip all of its submarines with additive manufacturing capability, also known as 3D printing, as part of an initiative to increase at-sea repair capability for the submarine force.

"[We're] actively experimenting with additive manufacturing and working expediently to provide this capability to all my ships," Vice Adm. Chas Richard, commander, Submarine Forces, said Nov. 7 at the Naval Submarine League's symposium. "All my boats will get 3D printers in the near term."

Richard said that the crew of the attack submarine USS Virginia "went and got their own 3D printer and, using that, built themselves apart at sea to help keep their boat on deployment. It is that type of problem-solving that happens daily across the force."

Navy: Torpedo Tube-Launched Version of Razorback UUV Planned

ARLINGTON, Va. – The Navy is on track to deliver an operational unmanned underwater vehicle (UUV) for routine submarine deployment but also plans to develop the capability to launch it from a submarine's torpedo tubes.

The Razorback is a submarine-launched version of the Hydroid-built Littoral Battlespace Sensing Autonomous Underwater Vehicle, a version of the REMUS 600 UUV that entered full-rate production for the Navy in 2013. Details of the Razorback's payloads and capabilities are classified, but it is planned for launch and recovery from a Dry Deck Shelter, a compartment than can be carried on top of the hull of certain submarines.

"We're currently fielding those vehicles for integration with the Dry Deck Shelter and we have plans to develop a torpedo tube-launched version of that in the near future," said Capt. Peter Small, the Navy's program manager for UUVs and unmanned surface vehicles, Nov. 7 at the Naval Submarine League's symposium.

Navy Submarine Programs

Facing Many Pressing Challenges, Deadlines

ARLINGTON, Va. – The Navy's submarine production enterprise is besieged by growing demands as it moves Virginia-class construction to two a year, is building payload models for future Virginias and is designing new models, and is working on refueling some of the Los Angeles-class attack boats, while focusing on the No. 1 priority – keeping the Columbia-class program on the tight schedule to replace the aging Ohio-class boomers.

On top of all that is the urgent requirement to overcome the "debacle" of faulty welding in new ballistic-missile tubes that will impact the narrow schedule margin to meet the Columbia's firm 2031 start of patrols, and the possibility that Virginia production could be increased to three a year in the near future.

Adding to that staggering array of challenges described by the top submarine program officials Nov. 7, the Navy program managers and the sub building industry are confronted with a need to not only expand their workforces to meet the growing demands, but to find new skilled builders and designers to replace an aging cadre of workers.

But during their presentations at the Naval Submarine League's annual symposium, the Navy officials returned repeatedly to the crucial requirement to have the first Columbia-class ballistic-missile submarines ready for their nuclear-deterrence missions before the current Ohio-class boats hit their already extended service life.

"We're doing everything we can to deliver Columbia on patrol, on time," said George M. Drakeley, executive director in the submarine program executive office. "Beside keeping the

Columbia program at an affordable cost, “our biggest challenge is to deliver on time.”

History shows that the first of class in any ship program does not deliver on time, Drakeley said, noting “We don’t have that luxury.”

“It’s very important we get the Columbia out by 2031 as the Ohios retire,” he said, because “we’ve extended the Ohios [service life] from 30 to 42 years.”

Navy officials have said that they cannot guarantee that the oldest of the Ohio boomers would be able to submerge for a strategic patrol after 2031.

Earlier in the day, Adm. Frank Caldwell, director of Naval Nuclear Propulsion, showed the importance of the Columbia program by noting the ballistic-missile submarines were “the only survivable component” of the nuclear deterrent triad and would carry 70 percent of the warheads allowed by the New Start treaty with Russia.

Capt. Jonathan Rucker, program manager for Columbia, said they were “in full swing” with detailed design and advanced procurement underway and would be ready to start construction in 2021. In addition to focusing on keeping on schedule, Rucker said, “to ensure the Navy gets 355 ships … we need to get Columbia down to an affordable program cost.”

To do that, he said, “my staff is working on how to get to ‘no,’ which means don’t change requirements.”

To get a head start on Columbia construction, the program started production of the common missile compartments, which also will be used in the Royal British Navy’s Dreadnaught ballistic missile submarines.

But last summer, inspectors discovered “this missile tube debacle,” he said, referring to a large number of substandard

welds. The program office is working with industry to address the flawed welding and to impose a more stringent oversight regime, but correcting the flaws has taken 10 months from the schedule.

Capt. Christopher J. Hanson, program manager for the Virginia submarines, noted that they were now steadily producing two boats a year, were building the first of the Virginia Payload Modules, which will increase the boats' strike capabilities, and were working on designs for improved future versions.

And Drakeley noted that "Congress has put into law" the requirement to negotiate with industry on increasing the construction rate to three a year, which might happen by 2022 or '23.

Meanwhile, they are working on ways to refuel the nuclear reactors on five of the older Los Angeles-class attack boats to extend their service lives as part of an effort to expand the sub fleet from 48 to 60 to meet the demands from regional combatant commanders.

Strategy Drives Undersea Warfare Programs

ARLINGTON, Va. – The Navy is working on greater integration of all aspects of undersea warfare, including strategic deterrence, attack submarines, unmanned undersea vehicles, seabed infrastructure and the surface and air anti-submarine assets, to ensure its investments and tactics all will contribute to a possible fight, the director of Undersea Warfare said Nov. 8.

“We are, no kidding, having the strategy drive the programs … to make sure we’re not buying things we don’t need to win the war,” Rear Adm. John Tammen told the Navy Submarine League’s annual symposium. The directions from the National Defense and National Security strategies are guiding an Integrated undersea investment strategy, he said.

A crucial focus of those investments is the modernization of the sea-based strategic deterrence with the Columbia ballistic-missile submarine to replace the current Ohio-class boomers.

“There really is no margin for Columbia,” to be on patrol by 2031, Tammen said, repeating a message heard earlier in the day from Vice Adm. Johnny Wolfe, director of Strategic Systems Programs. The ballistic-missile subs are “the only survivable component” of the strategic deterrence triad and provide 70 percent of the nuclear deterrent warheads, he said.

Keeping Columbia on schedule is critical because the Navy is extending the service life of the Ohios out to 42 years and “we’ve never taken a submarine out to 42 years.” To ensure the Ohio-class boats can remain operational for 42 years, the Navy stood up a study that will use the four early Ohios now serving as guided-missile subs as a test, he said.

They also will continue to modernize the Ohios to keep them relevant out to 42 years, Tammen said, using technology going into the new models of Virginia-class attack subs.

Tammen also discussed the little-known fact that the new Nuclear Posture Review said the sea-based strategic deterrence program would have “at least 12 Columbia” boats. It has been widely understood that the program called for only 12 of the new boomers.

Without going into any details, Tammen said “we’re going to keep the Columbia [production] line hot after the 12th boat, so if we need to build more than 12, we can.”

The limit on 12 Columbias is generally based on the number of nuclear warheads and delivery vehicles allowed under the New Start arms control treaty with Russia.

Tammen put considerable focus on the efforts to develop a family of unmanned undersea vehicles noting that they have consolidated unmanned underwater vehicle (UUV) programs into his N-97 office, while closely cooperating with Expeditionary Warfare (N-95), which plans to use unmanned underwater systems in its mine warfare missions.

“Every day we have conversations on how we can move faster with UUVs,” he said.

In apparent response to some criticism of the slower development of UUVs, compared the aerial or ground unmanned systems, Tammen said, “unmanned undersea vehicles are truly autonomous. There is no joystick [controller] and no lawyer standing behind the joystick.” And they “have to ensure we can get the data off of them, to make them relevant.”

Although the primary purpose of producing the Virginia Payload Modules was to increase the Tomahawk strike capabilities of the attack subs, Tammen said the modules also could launch smaller UUVs. And the Navy is looking at other weapons that could go into the modules as part of the increased focus on tactical warfare capabilities.

Looking ahead, Tammen said his office was working on designs for block 5, 6 and 7 Virginia-class subs, but after that “we get to a new SSN,” which will “put fast back into fast attack. Fast with stealth.”