US Navy’s next warship will have an Italian accent

reader comments

14 with 13 posters participating

Share this story

Video transcript still processing but will be available soon.
The search for a replacement for the US Navy’s “little crappy ship” is over. On April 30, the US Navy announced that Fincantieri Marinette Marine, the US shipyard subsidiary of Italian shipbuilder Fincantieri, had beaten out the rest of the field to take on the FFG(X) frigate program, the shipbuilding effort that will replace the Navy’s Littoral Combat Ship (LCS).

Frigates were once the workhorses of the Navy—small, fast escort ships that hunted submarines, acted as part of the air defense ring around carriers and other big combatants, and could patrol the seas on their own when necessary. The Oliver Hazard Perry (FFG-7) class of frigates, the first US Navy ships with gas turbine engines, were worked far beyond expectations during their service; they survived attacks by errant Iraqi anti-ship missiles (in the case of the USS *Stark*) and Iranian sea mines (the USS *Samuel B. Roberts*) during the US Navy’s confrontation with Iran in the 1980s.

They were replaced by the LCS—a ship that was supposedly designed for multiple missions and the sort of close-ashore fighting that looked like the future in the late 1990s and early days of the Global War on Terror. But that didn’t turn

out too well.

Fiat of the sea

Fincantieri is well-known in the commercial shipbuilding world. It has built mega-yachts and cruise ships (including Disney Cruise Lines' *Magic*) along with more than 50 naval ships in the past 20 years. Marinette Marine has long been building boats and small ships for the US Navy and Coast Guard. Before partnering with Lockheed Martin to build the LCS class, the Wisconsin shipyard built minesweepers, fleet tugs, patrol craft and other workhorse craft.

The winning design is based on the FREMM ("Fregata europea multi-missione") frigate, already in service with the Italian and French navies. A total of 20 frigates will be delivered if the contract runs its course; the first ship will cost about $1.3 billion, with the price for future ships dropping to below $950 million.

The FFG(X) will differ from the French and Italian FREMMs in a few meaningful ways. They'll be fitted with sensor and weapons systems provided as off-the-shelf "government furnished equipment"—including COMBATSS-21, a combat management system built using the Aegis program's common source library of software, and Raytheon's AN/SPY-6 radar (designed for the third flight of Arleigh Burke(DDG-51) class guided missile destroyers. And they'll be built, at least at first, entirely at a shipyard in Wisconsin that has previously partnered with Lockheed Martin to build the now-unloved Freedom LCS class.

But when the competition began to build a new frigate for the US Navy, Fincantieri was considered a long shot by most analysts. The company was up against LCS incumbents Lockheed Martin and Austal, defense contracting heavyweight General Dynamics, and US' largest defense shipbuilder, Huntington-Ingalls (builders of the DDG-51 destroyers).

In hindsight, it seems obvious that the “advantages” the other companies had are exactly why Fincantieri Marinette won. Stung by the cost overruns on other recent combat ships, the Navy crafted the FFG X competition to reduce risk, favoring proven designs. Of the designs presented, Fincantieri’s is the most proven: 19 FREMM frigates are already afloat, 10 of them built by Fincantieri.

The other designs may have been seen as too risky. Huntington-Ingalls proposed a radical redesign of the US Coast Guard’s Legend-class National Security Cutter, which the Navy may have seen as too risky. General Dynamics’ Bath Iron Works, which is building the very expensive Zumwalt class destroyers, pitched a ship based on Spain’s cancelled F100 design. And Lockheed Martin and Austal had pitched up-sized versions of their LCS designs—designs that may have been seen as more of a liability (Lockheed dropped out of the hunt early, despite being seen as a favorite).

Bloated “Streetfighters,” begone

The LCS was the product of a late 1990s concept for small, inexpensive but heavily armed ships that could operate in shallow waters close to enemies’ coasts, dubbed “Streetfighter.” But the LCS concept evolved under President Bush’s administration into a larger ship that could accept swappable mission modules for tasks such as antisubmarine warfare, mine warfare, and combatting small armed boats.

What the Navy ended up getting instead, after long delays, was a pair of ship designs that cost more to operate than the frigates they replaced. They could not easily swap mission modules, they had totally different sensor systems than other ships, they were more vulnerable to air attack, and they had less “survivability” than the Perry class.

While the LCS ships got bigger, their crews (and damage control capabilities) remained small, and their designs

remained suited to taking on only low-intensity missions. By contrast (as if the survival of the *Stark* and *Roberts* wasn't enough evidence of the Perry class' superior ability to take punishment), the decommissioned Perry class frigate ex-USS *Thatch* was hit during a 2016 exercise with two Harpoon missiles, two hellfire missiles, a Maverick missile, two bombs, and a Mark 48 torpedo—and still took 12 hours to sink.

China's growing Navy and posture in the South China Sea, as well as other growing threats from "peer" powers and some angry words from Congress, eventually convinced the Navy that a more capable ship than the LCS was needed—and that it had to be one they could get quickly and inexpensively. At one point, the Navy considered bringing Perry class frigates out of mothballs because of the gaps in capabilities left by the LCS' shortcomings.

The FFG(x) won't arrive overnight. The first ship should be delivered in 2026 if all goes according to plan. But if it lives up to its design intentions, it may be the first ship in the last 20 years that delivers what the Navy has paid for.

Listing image by MediaNews Group/Long Beach Press-Telegram via Getty Images

https://arstechnica.com/?p=1683795