

Pacific Power

Air Force Begins to Embrace Maritime Strike Role

BY JAN TEGLER

Defense analysts assert that the Air Force is embracing maritime strike in a way it hasn't for decades.

Over the last year, the service has announced multiple efforts aimed at bolstering its capability to combat Chinese naval forces. They include an additional buy of Lockheed Martin's sophisticated Long Range Anti-Ship Missile, integration of the weapon with new and existing fighter fleets and fast-track development of less costly, more rapidly producible maritime strike munitions.

The moves are a logical response to the challenges China's ballistic, cruise and hypersonic missiles present for the U.S. Navy in the Pacific, said retired Air Force Lt. Gen. David Deptula, dean of the Mitchell Institute for Aerospace Studies.

"The best way to achieve maritime dominance in the event of conflict in the Indo-Pacific is from the air, not from the sea," he said.

It's a notion Pacific Air Forces Commander Gen. Kevin Schneider acknowledged when *National Defense* asked how the Air Force views its role in maritime strike.

"The component commands of each combatant command operate under a joint warfare construct, which brings together all capabilities to bring effects. As such, the air component plays an integral role in joint warfare — one aspect of which is delivering effects in the maritime environment," he said in a written response.

In early January, Naval Air Systems Command announced that it is working to integrate the AGM-158C-1 Long Range Anti-Ship Missile, or LRASM, on the Air Force's new F-15EX and existing F-15E fleets.

The F-15EX, a modernized deriva-

tive of the aged F-15C/D air superiority fighter it's intended to replace, is joining the F-15E as the Air Force's only long-range tactical aircraft. Both Eagle variants can tote weapons loads that far outstrip those the service's stealthy F-35A and F-22 fighters can carry.

The Air Force already deploys LRASM on its fleet of B-1B bombers. With a reported range of approximately 300 to 500 miles, the missile is also employed by the Navy's F/A-18E/F Super Hornets and is being adapted for its F-35C fighters and P-8A Poseidon maritime reconnaissance aircraft.

The Air Force's efforts to build out maritime strike will have to align with the top priority of Indo-Pacific Command Commander Navy Adm. Samuel Paparo, which is deterring a potential Taiwan invasion, said Bryan Clark, a senior fellow at the Hudson Institute.

If the Air Force sticks to its long-favored role of attempting to achieve air superiority by attacking air bases on the Chinese mainland — for example, using B-2 or B-21 stealth bombers armed with the ground attack version of the LRASM, the Joint Air-to-Surface Standoff Missile — it may not prevent China from assaulting Taiwan.

"China might say, 'That's fine. We'll lose a bunch of aircraft, but we'll succeed in the invasion of Taiwan, our real goal,'" Clark said. "If instead you're buying LRASMs and other anti-ship weapons and you're putting them onto every aircraft that can carry them, you might change China's calculus."

In the early days of a campaign to defend Taiwan, "the Air Force will carry the brunt of the maritime strike load," said Mark Gunzinger, the Mitchell Institute's director of future concepts and capability assessments.

The Air Force's long-range bomber fleet will be able to deliver far more weapons against Chinese amphibious shipping and other warships in the area around the Taiwan Strait and the first island chain than the Navy, according to Gunzinger and Deptula.

"If you're talking about aircraft carriers, you're talking over a 1,000-mile stand-off in order to reduce the threat from anti-ship ballistic missiles and cruise missiles the [Chinese People's Liberation Army] have and are well-practiced to use against our warships," Gunzinger said.

Deptula added that once carrier strike groups and submarines exhaust their magazines of maritime strike munitions, "they're out of the



fight for a period of time" and must replenish weapons expended at sea or transit to a port for resupply.

Clark said he thinks the Chinese navy would deploy some surface combatants, including its own carrier strike groups, farther away from the Taiwan Strait to manage the periphery of a fight. Weapons like China's DF-26 intermediate-range ballistic missile — which has an estimated range of 2,500 miles — would force carrier-based U.S. fighters to operate at the extreme edge of their range.

"You're going to have pilots doing 1,000-mile transits with refueling to get to the point where they can launch weapons that are then going to do a 500-mile transit approximately to get to the Strait," Clark said.

That would limit the effectiveness of maneuvering missiles like LRASM, which "would essentially have to head straight for targets because they would be out of fuel, making it easier for the enemy to predict where they would strike," Clark added.

The U.S. maritime strike munitions inventory is another challenge, the analysts agreed. The Air Force's fiscal year 2025 budget requested a multi-year procurement of LRASM with a planned buy of 549 extending to 2029 at a total cost of \$1.7 billion.

That supply could be exhausted within days, Gunzinger noted, adding that LRASMs are also expensive — over \$3 million per missile —



Artist's rendering of the Long Range Anti-Ship Missile

and difficult to manufacture rapidly because of their complex components and limited supply chain.

That's why the Air Force is exploring missiles and bombs "that cost tens to hundreds of thousands of dollars apiece instead of a million-plus, with a 500-nautical-mile range or so, carrying enough of a warhead to make a difference," Gunzinger said.

The Extended Range Attack Munition, or ERAM, is one of those. ERAM and a related version for the Navy are envisioned as precision-guided air-launched stand-off munitions that could be employed against ships with the help of seeker technology from the Air Force's QUICKSINK program, an effort aimed at adapting the GBU-31 Joint Direct Attack Munition for maritime strike.

Clark said a recent Air Force request for information to industry for ERAM specifies a "500-mile range and capability to build 1,000 in [the] first six months of production."

While not as precise or survivable against adversary countermeasures as LRASM, the Extended Range Attack Munition will be much easier to rapidly produce, using government and commercial-off-the-shelf parts that are in inventory — "kits, essentially, that contract manufacturers can use to build their structure and assemble them just like you do a washer or dryer," he explained.

The "beauty" of these and other

weapons the Air Force is developing, including the Franklin low-cost cruise missile that can be palletized and dropped from mobility aircraft including the C-130 Hercules transport aircraft, is that "they could be launched out in front of a wave of more capable, stealthy cruise missiles," Gunzinger said.

"An enemy detecting this inbound threat would have to respond and expend their defenses, perhaps creating an opportunity in time and space for the killer hornets — the LRASMs and other weapons — to successfully penetrate and kill ships," he said. "The combination of those lower costs with higher-end weapons could actually reduce, maybe significantly, how many of those higher-end weapons are needed."

But the Air Force faces another challenge. The bomber fleet that might employ these weapons is comparatively small, with less than 20 B-2 Spirits in inventory. It's most capable bomber, the B-21 Raider, is not yet in service.

Would that small force have the bandwidth to conduct maritime strike as well as other urgent missions in the opening phase of a South China Sea conflict?

Schneider would not "get into the hypotheticals of any proposed scenarios" but said the Air Force "will continue to expand our capabilities to provide options to the Joint Force commander to deliver lethal

effects in a variety of scenarios."

Clark said he thinks the role of the Air Force in maritime strike, though vital, is currently limited. The service's B-1B Lancer and B-52 Stratofortress bombers will have to operate "at the edge of a fight," he explained, and the service is torn on how to use its B-2s and B-21s.

"The B-21 is going to be an ideal platform for that counter-maritime fight in the Taiwan Strait because they can get close enough to use LRASMs and other munitions with a high degree of lethality, and I think the Air Force recognizes that," Clark said. "But there aren't enough B-21s to attack shipping and take out the Chinese air force before it takes off if they're needed for both missions simultaneously."

Thus, he said, the Air Force will have to decide which mission to focus on.

"And they don't want to state a priority in public," Clark said.

Clark said analysis done by the Hudson Institute shows that if the Air Force uses its short-range fighters including the F-35A and high-signature B-1B and B-52 bombers for maritime strike, "you lose a lot of them."

But if B-2s and B-21s are used in combination with the Navy's submarine force and Indo-Pacific Command's "hellscape" concept — wherein a variety of airborne and sea-based drones engage a wide range of targets — the United States can succeed, Clark said.

"The argument is that if you combine those stealthy assets with hellscapes where you use a bunch of uncrewed systems basically acting as a mobile minefield in the Taiwan Strait as Adm. Paparo advocates, our modeling shows that is very successful," he explained. "And you don't have to get the rest of the force involved."

Deptula said the Air Force's role in maritime strike is up to Indo-Pacific Command and joint planners, and that it's a matter of allocating limited resources.

"You can put together a plan that disperses F-15EXs and puts them at forward airfields where they do have the range to be able to prosecute maritime targets," he said. "That's not insignificant. The value of an EX is that it can be rapidly rearmed and brought back into the fight. That's the utility of reusable airpower." **ND**