

## Hunt for Airliner Shows Limits of Satellite Imagery

Apr. 19, 2014

By ANDREW CHUTER



Needing Help: A navigational radar on Indonesia's national search-and-rescue boat shows details during a search in the Andaman Sea for the missing Malaysian Airlines Flight MH370. Malaysia has had to rely on other countries for satellite data and analysis. (CHAIDEER MAHYUDDIN/AFP)

**KUALA LUMPUR** — The big question on the minds of industry executives and others attending the Defense Services Asia (DSA) exhibition in the Malaysian capital last week was what effect would the crash of flight MH370 have on defense spending priorities here.

The disappearance of the Malaysian Airlines Boeing 777 in the southern Indian Ocean is posing questions about the country's military capabilities to track and search for even civilian aircraft, let alone potentially hostile military targets.

Malaysian Defence Minister Datuk Seri Hishammuddin Hussein has already pointed to the need for surveillance improvements and a review of the ground-based air radar capabilities following the aircraft's disappearance.

"I think not only Malaysia but the whole world should relook at their defense needs, capacity and capabilities in the context of MH370," he told a press conference as the show opened April 14.

The Malaysian government will likely get the chance to discuss MH370 and wider defense and security issues when US President Obama visits this week as part of a tour that also includes Japan, South Korea and the Philippines.

Obama is the first US president to officially visit this moderate Muslim nation since Lyndon B Johnson in 1966.

The hunt for answers to any military shortcomings resulting from MH370 is in full swing. Like the search for the airliner itself, the task may take some time.

Britain's defense procurement minister, Philip Dunne, certainly thinks so.

Dunne, in the Malaysian capital to attend DSA as well as meet with Prime Minister Najib Razak, cautioned during a briefing April 15 that it was much too early to discuss possible lessons learned.

But the British minister did point to one lesson from the monthlong search for the airliner: Malaysia had to rely on other nations for vital satellite surveillance data and imagery analysis.

Inmarsat, the British mobile satellite communications service provider, played a key role analyzing the likely track MH370 took over the Indian Ocean. China, France and others provided satellite surveillance pictures to help a huge armada of ships and aircraft in a so-far unsuccessful search for debris from the aircraft.

Asked by one reporter what Britain had to offer in any future collaboration with Malaysia, Dunne said it could be in the satellite sector.

“Britain has significant expertise in satellite tracking and surveillance image analyses. While the northern hemisphere is well covered the south is not, and it may be something we could do together, perhaps with the Five Power Defence Arrangement [FPDA] playing a part,” Dunne said.

The FPDA involves a series of security alliances involving Australia, Britain, Malaysia, New Zealand and Singapore.

Hussein essentially nodded in the direction of satellite data and communications improvements when he pointed up surveillance as an issue on the opening day of DSA.

“These are necessary to improve our capacity for better defense surveillance. ... We also have to look at better sharing of information technology between the civilian and military,” he said.

One senior industry executive told Defense News that an international consortium is doing just that by putting together proposals to set up a commercial provider of high-resolution satellite images for Southeast Asian nations.

“This has been in the works for about two years but recent events may accelerate it. The idea is a privately held commercial operation based in Malaysia could provide high-grade data and maybe communication capabilities to ASEAN and the Five Power nations to fill a surveillance gap in the region,” he said.

The Association of Southeast Asian Nations (ASEAN) is an alliance of Brunei, Cambodia, Indonesia, Laos, Malaysia, Myanmar, Singapore, Thailand and Vietnam.

The executive, who asked not to be named, said he could not divulge the identity of the companies behind the proposals. Such a move would play to ongoing Malaysian efforts for ASEAN nations to better pool their defense activities where appropriate, he said.

In a speech on emerging regional threats at a conference on the sidelines of the DSA show, Hussein said he favored more initiatives similar to the “Eyes-in-the Sky” arrangement among Singapore, Indonesia, Thailand and Malaysia, which tackles piracy

in the Malacca Strait through a combination of maritime air patrols, an intelligence exchange group and other collaboration.

Affordability of any go-it-alone satellite system would be an issue for Malaysia and less expensive ways exist to provide surveillance capabilities, said Dan Darling, Forecast International's Asia and Pacific Rim military analyst.

"In terms of air surveillance and imaging coverage, a cheaper solution for Malaysia than satellite imagery would be to seek an off-the-shelf high-altitude long-endurance unmanned aerial vehicle solution. But then, this is a country that still has not addressed a Royal Malaysian Air Force request for between four and eight AEW&C aircraft that stretches back to 2003 and earlier, so even if a requirement is put forth by the Air Force it is unlikely to be met in the short term," Darling said.

But executives said there might be light at the end of the tunnel as there were signs of new life in the two surveillance requirements even before MH370.

The problem has been they have had to jostle for priority against other big ticket procurement requirements such as fighter jets and attack helicopters. So far, all of them have been caught in the logjam.

Even the much-maligned air defense radar system has been on the list for updating.

The Malaysian Air Force last year accepted one ThalesRaytheonSystems supplied Groundmaster 400 radar and an associated command-and-control system, which was integrated into a Malaysian legacy network that includes some radars built by British companies that ceased to exist years ago.

Darling said Malaysia's immediate defense emphasis should be on acquiring "reconnaissance and surveillance drones, increasing the Navy's riverine and littoral waters capabilities in light of militant activity in Sabah, and moving forward on air- and sea-oriented projects such as acquisition of new AEW&C and maritime patrol aircraft, anti-submarine warfare helicopters, coastal patrol and fast attack ships, as well as the acquisition of a new multipurpose combat and support ship."

Aligning defense priorities with budgets and political maneuvering here has long been a problem, as it is elsewhere.

“It’s a crap shoot of shifting and changing political factors, economic factors and who is charge at various levels,” explained one foreign executive.

Whether the national embarrassment of failing to properly observe Flight MH370 as it tracked back through Malaysian air space enroute to the southern Indian Ocean will further shuffle priorities remains unanswered, but possible capability shortfalls could still be under scrutiny.

But in practical terms, most executives at DSA said MH370 will make little difference in the short term and point to the apparent lack of progress in terms of re-equipping the military in the wake of terror attacks in Sabah in early 2013.

Executives agree that if history is a guide, they will likely have to wait for the upcoming five-year defense plan starting 2016 to judge the pace and depth of any change.

Darling, though, is not holding his breath in anticipation.

“To be blunt, I do not expect much change in terms of Malaysian policy approaches — politically, militarily or otherwise. Overall, I expect little radical change regarding military modernization to come out of the MH370 disaster,” he said.

“Government budgeting towards defense remains consistent in terms of consolidated spending figures, but will likely continue to climb in the coming years at just around the rate of inflation, thus representing only marginal increases in real-terms,” he said.

“Reading the tea leaves of change in Malaysia, particularly where military reform and planning are concerned, is a difficult exercise,” the analyst said. “The UNMO party of Prime Minister Najib Razak does not place great emphasis on defense procurement, and during the run-up to the 2013 general election. the political opposition People’s Alliance indicated at times that it saw defense spending as largely wasteful. Thus a clear desire to push forward on military modernization does not seem a priority on either end of Malaysia’s political spectrum.” ■

**Email: [achuter@defensenews.com](mailto:achuter@defensenews.com).**

Source: <http://www.defensenews.com/article/20140419/DEFREG03/304190021/Hunt-Airliner-Shows-Limits-Satellite-Imagery>