



# ***DISARMING ARCTIC SECURITY***

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## **Missile Defence and the Arctic**

***Ballistic missile defence installations in the Arctic may have little direct bearing on day-to-day security concerns and arrangements there, but it would be naïve to assume that the irritations that missile defence visits on strategic relations among Russia, the United States, and NATO, and even China, can be kept fully out of Arctic security dynamics.***

The most basic definition of a security community of independent states within a defined region is that there exists a reliable expectation that the states within that region will not resort to war to prosecute their disputes. Put another way, such a “pluralistic security community ... [is] a transnational region comprised of sovereign states whose people maintain dependable expectations of peaceful change’.”<sup>1</sup> That is certainly a widely affirmed expectation, even if not yet a guarantee, for the Arctic region.

But there is another characteristic of a security community that is less entrenched in the Arctic, namely, “the absence of a competitive military build-up or arms race involving [its] members.”<sup>2</sup> There is no denying that there is currently a build-up of conventional military capacity within the region,<sup>3</sup> and it is not yet definitively clear whether it will turn out to be a competitive build-up that undermines the growing expectation that change will be peaceful, or whether it will instead facilitate increased security cooperation and build capacity for more effective domestic and cross border support to civil authorities in search and rescue, and in monitoring regional activity and ensuring compliance with international regulations.

For current conventional military developments and deployments in the Arctic that remains an open question, but what about ballistic missile defence (BMD)? Key strategic BMD installations are in the Arctic – currently 26 US interceptor missiles at Fort Greely, Alaska and early warning radars at Clear, Alaska and Thule, Greenland. The primary BMD actors, the US and Russia, are Arctic states and there is currently little doubt at all that BMD is not a source of trust and harmony between them. The current focus of that BMD-generated mistrust is not the Arctic, rather it is the NATO missile defence program in Europe, but that European system gives four more Arctic states a direct stake in the controversy (NATO members Canada, Norway, Denmark, and Iceland). Of the five Arctic Ocean states, four are NATO states actively promoting BMD in Europe, and the fifth is Russia actively opposing it. The result has been to place distinct strain on post-Cold War strategic amity and arms control potential, and that in turn cannot but have an impact on efforts within the Arctic region to minimize tension and maximize political and military cooperation.

### ***BMD today***

Perhaps the most remarkable characteristic of American BMD<sup>4</sup> ambition is its resilience in the face of what should be daunting obstacles. It relies on technologies that both science and officialdom admit are far from proven and which testing shows to be far from reliable.<sup>5</sup> It is ostensibly arrayed against threats from North Korea and Iran that are similarly unproven and less than imminent.<sup>6</sup> It depends on steady infusions of public resources, all essentially borrowed, in a time of deep budgetary challenges and Pentagon cuts.<sup>7</sup> And it certainly complicates relations with Russia and China for an Administration ostensibly committed to building those ties and advancing nuclear disarmament.

BMD is obviously not just one thing, and not all types or elements have the same impact. Briefly, there are essentially five basic missile defence systems currently deployed by the US.<sup>8</sup> The first and most developed is theatre missile defence that uses Patriot missiles to defend specific locations like military bases against short-range missile attacks. In this case the intercept takes place within the atmosphere during the final descent of the attacking missile. The second type, also for point defence, is the THAAD system (Terminal High-Altitude Area Defense), designed to engage incoming short and medium range missiles slightly earlier and in space, just before their final descent.

Neither of these two systems is of particular concern to the Russians inasmuch as they have no capability against Russia's strategic deterrent.

A third system is the sea-based Aegis Ballistic Missile Defence system. It is of greater concern to Russia. Its interceptors are designed to intercept short to medium range missiles in the early mid-course of an attacking missile's flight, and its radars can detect and track missiles of any range, including intercontinental-range missiles and provide data to ground-based interceptors in the US. The Aegis system is currently deployed in the Pacific (North Asia being a prime target), the Atlantic, and the Mediterranean. The latter deployments are part of NATO missile defence, the European Phased Adaptive Approach (EPAA) system – the fourth of the five basic systems. The EPAA system is the most troublesome or provocative for Russia because it is close at hand and has the potential (or at least the theoretic potential) to threaten Russia's second strike or deterrent forces. The US and NATO have sought to assure Moscow that the only target is Iranian nuclear-armed missiles, but of course Russia notes that such a thing does not now exist, and won't for the foreseeable future, if ever. The EPAA is to be rolled out in four phases:<sup>9</sup> interceptors already aboard ships in the Mediterranean; additional interceptors on ships and the introduction of land-based interceptors in Romania by 2015; more advanced interceptors in Poland by 2018; and, new generations of land-based interceptors in Romania and Poland with heightened capabilities against ICBMs or long-range missiles, initially planned for deployment after 2018, but changed earlier this year to a technology development program only. These phase VI missiles are regarded by Russia as a particularly provocative element – and, if deployed, they would most likely end all Russian nuclear arms control cooperation for the time being.

The fifth BMD system currently deployed is the ground-based, mid-course interception system, with interceptors based primarily in Alaska (of 30 deployed interceptors, 26 are at Alaska's Fort Greely, and four in California).

All of these systems are aided by satellites, radars, and other sensors to detect missile launches, track their trajectories and guide interceptor launches. And although these systems are still a lot more effective in theory than in practice, Russia's own planning and responses rely, not on current capabilities, but on future worst case scenarios – that is, on assumptions that they will actually be made to work and to work well. The point defence systems, which don't worry the Russians, are the most proven, and the mid-course interceptors, the ones that most worry the Russians, have the least proven capacity.

The Obama Administration's decision earlier this year to withdraw plans to develop or deploy the Phase VI interceptors of the NATO system was an important nod to Russian concerns, but that was followed by an announcement that the US would add another 14 interceptors in Alaska, bringing the total there to 40. In effect, a US/NATO signal of modest restraint in Europe was accompanied by a significant, 50 per cent, expansion in Alaska. The change of plans in Europe is good news from the point of view of nuclear disarmament advocates inasmuch as it will help make the Russians more amenable to joining President Obama in pursuit of a new round of nuclear arms reduction talks. But the Alaskan expansion, at a cost of \$1 billion (a distinctly modest sum in the Pentagon's world), keeps strategic BMD alive (if not well, from the point

of view of performance), and an ongoing thorn in US-Russian security relations. The 40 Alaskan interceptors are of concern to Russia, not for what they represent now (40 interceptors of dubious reliability are not a threat to a strategic deterrent of 1,500-plus warheads), but for what they could become.

Russia also has concerns specific to the Arctic. In 2009 Russia's envoy to NATO worried that with Arctic ice in retreat, NATO is poised to advance into the region, and, more particularly, US ships with strategic missile defence capabilities could potentially be deployed there as well.<sup>10</sup> Russia fears the Americans could potentially exploit further reductions in Russia's arsenal with a dramatic surge in BMD interceptors rendering Russia's deterrent ineffective. In response, as Russia's Deputy Prime Minister was recently reported as saying, Russia has been led to carry out a "rearmament program" that will not involve new deployments now but will make it possible for Russia to undertake rapid expansion if conditions change.<sup>11</sup>

The American pro-BMD constituency has been trying to draw heightened attention to what some accounts describe as Russian military operations to simulate monitoring and attacks on US missile defence assets. The *Washington Free Beacon* blog has a lengthy April 2013 account, also published in the *Washington Times*,<sup>12</sup> which quotes US officials as saying the Russians have simulated attacks on missile defences in Asia and against ground-based interceptors in Alaska. It also claims that a new Russian reconnaissance ship, the *Yuri Ivanov*<sup>13</sup>, which is to begin service in 2014, will be tasked, among other things, to monitor US missile defence installations in Alaska.<sup>14</sup>

China, is also giving growing voice to its BMD concerns. The Chinese concern is not focused on the European-based interceptors, but on Aegis systems in the Pacific and on Alaskan interceptors. Both systems represent a much more immediate threat to China's minimum deterrent force of fewer than 50 missiles that could reach North America. Chinese experts recently told the *Wall Street Journal* that China "was likely to respond to the US missile defense plans by upgrading plans to modernize China's relatively small nuclear arsenal." A Major General at China's Academy of Military Science notes: "The current development, especially the deployment of missile-defense systems in East Asia would be, in Chinese eyes, a very, very disturbing factor having implications for the calculation of China's nuclear and strategic arsenal."<sup>15</sup> And Chinese concerns will only heighten when they see comments like the following, from a US military official, that the US is explicitly planning to be able to surge deployments of the Aegis system: "Part of what's in the budget is to get us a sufficient number of ships to allow us to have a global deployment of this capability on a constant basis, with a surge capacity to any theater at a time."<sup>16</sup>

As the *Bulletin of the Atomic Scientists* puts it, "while the intention behind US missile defense is not to threaten Russia or China's ability to strike the United States with nuclear weapons, both Russia and China fear otherwise. Moscow's concerns about US missile defenses in Europe appear to be the main stumbling block to further bilateral US and Russian nuclear arms reductions. China, meanwhile, is concerned that the expansion of US regional defenses in East Asia is designed to counter both North Korea and China's growing arsenal of conventionally-armed theater ballistic missiles, and could be augmented by long-range interceptors that would threaten its strategic nuclear deterrent."<sup>17</sup>

US-Russian and US-Chinese<sup>18</sup> tensions over BMD do not make it easier for them to cooperate in other contexts, such as Syria, and it would be unrealistic to assume that these tensions will not also at some level undermine cooperation in the Arctic. Direct linkages are unlikely and would not be helpful, but, as a Chinese Foreign Ministry spokesperson recently told reporters in Beijing in response to the announcements of additional interceptors to be deployed in Alaska: "Strengthening anti-missile deployments and military alliances can only deepen antagonism and will be of no help to solving problems."<sup>19</sup> He was not referring to

the Arctic, of course, but there is no reason to believe that the Arctic would somehow be exempt from the effects of such antagonisms.

The pursuit of an Arctic security community is, to say the least, not bolstered by BMD dynamics. It is impossible to expect full cooperation within the context of an Arctic security community when those same states are at loggerheads on other issues in other regions of the globe (especially when much of the hardware at the heart of those disagreements – interceptors in Alaska, radars in Greenland, and nuclear weapons in Russia – are based in the Arctic).

Ending BMD unilateralism is important for many reasons, most especially for issues related to global strategic dynamics and nuclear arms control and disarmament – and it is important for the Arctic as well. It would be a significant strategic miscalculation and a confusion of priorities to allow a major and expensive weapons system of dubious technical capability to absorb scarce resources. It is doubly significant when that same system serves to undermine the urgent and absolutely necessary spirit of cooperation on which positive development in the Arctic depends for there to be constructive progress on a broad range of environmental and security issues.

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## Notes

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<sup>1</sup> These definitions are taken from Amitar Acharya, *Constructing a Security Community in south East Asia: ASEAN and the problem of regional order* (Routledge, 2nd edition, 2009), pp. 18-21. Acharya's definition is, of course, an elaboration of Karl Deutch's foundational discussion of "security communities."

<sup>2</sup> Amitar Acharya, *Constructing a Security Community in south East Asia: ASEAN and the problem of regional order* (Routledge, 2nd edition, 2009), pp. 18-21.

<sup>3</sup> "[Circumpolar Military Facilities of the Arctic Five](#)" prepared by [Ernie Regehr, O.C.](#), Senior Fellow in Arctic Security, The Simons Foundation. Updated: April 2, 2013

<sup>4</sup> Notably, Russia is also developing missile defence options, including a sea-based system, and has a system deployed for the defence of Moscow. Mark B. Schneider and Peter Huessy, "Russian Deployment of Missile Defenses Hidden in Plain Sight," Gatestone Institute, 18 February 2013. <http://www.gatestoneinstitute.org/3590/russia-missile-defense>

In 2012 the Russian missile cruiser Pyotr Veliky carried out missile defense drills while on a training mission in the Arctic. This is a point defense system, but the newspaper *Izvestia* quoted a source as saying "the missile defense drills in the Arctic are very important because they cover the trajectories of potential strikes by land-based US ballistic missiles." "Russian Warship Tests Missile Defense Capability," RIA Novosti, 20 September 2012. [http://en.rian.ru/military\\_news/20120920/176091963.html](http://en.rian.ru/military_news/20120920/176091963.html)

<sup>5</sup> The US Missile Defense Agency reports that only 8 out of 15 tests of the ground-based, mid-course interception system were deemed successful. "Ballistic Missile Defense Intercept Flight Test Record (updated February 13, 2013), Missile Defense Agency. <http://www.mda.mil/global/documents/pdf/testrecord.pdf>. Furthermore, the MDA's definition of success is questioned by independent analysts. The Arms Control Association, persistently critical of BMD, points out that none of the tests of this system occurred under realistic conditions: "All the intercept tests to date have involved substitute components in highly scripted scenarios. A C-band transponder on the target provides tracking data used to formulate the system's initial intercept plan; the target and interceptor fly the same trajectories in every test; the intercepts take place at slower speeds and lower altitudes than what would be expected in a real attack; the interceptor

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is preprogrammed with information on what the target looks like before the intercept attempt; and the tests do not involve realistic decoys that a potential adversary might use to trick the system into hitting the wrong object.” U.S. Missile Defense Programs at a Glance, Arms Control Association, August 2012.  
<http://www.armscontrol.org/factsheets/usmissiledefense>.

The ground-based, mid-course interception system is especially susceptible to being overwhelmed by decoys and other counter measures. As George Lewis of MIT puts it: “The Current GMD systems shows no prospect of improved performance against any attacker that takes any serious steps to defeat it....” Yousaf Butt and George Lewis, “Recent Developments in US and NATO Missile Defense,” FAS Strategic Security Blog, 20 March 2013, Federation of American Scientists. <http://blogs.fas.org/security/2013/03/qa-session-on-recent-developments-in-us-and-nato-missile-defense-with-dr-yousaf-butt-and-dr-george-lewis/>

Dan De Luce, “US missile defense still plagued by technical doubts,” AFP, 23 May 2013.  
[http://www.google.com/hostednews/afp/article/ALeqM5g1DZYDtyJspcVAGVdBK8fH\\_8lkqw?docId=CNG.b022b0273ff14f04fa33c577f36155c6.1d1](http://www.google.com/hostednews/afp/article/ALeqM5g1DZYDtyJspcVAGVdBK8fH_8lkqw?docId=CNG.b022b0273ff14f04fa33c577f36155c6.1d1)

<sup>6</sup> Greg Thielmann, “Sorting Out the Nuclear and Missile Threats From North Korea,” *The Arms Control Association*, 21 May 2013.  
<http://www.armscontrol.org/threats/Sorting-Out-the-Nuclear-and-Missile-Threats-From-North-Korea>

Duyeon Kim, *Fact Sheet: North Korea's Nuclear and Ballistic Missile Programs*, August 2012, Center for Arms Control and Non-Proliferation.  
[http://armscontrolcenter.org/publications/factsheets/fact\\_sheet\\_north\\_korea\\_nuclear\\_and\\_missile\\_programs/](http://armscontrolcenter.org/publications/factsheets/fact_sheet_north_korea_nuclear_and_missile_programs/)

Greg Bruno, *Iran's Ballistic Missile Program*, updated July 2012, Council on Foreign Relations.  
<http://www.cfr.org/iran/irans-ballistic-missile-program/p20425>

<sup>7</sup> “Since 2002 MDA [the US Missile Defense Agency] has spent approximately \$90 billion to provide protection from enemy ballistic missiles by developing battle management systems, sensors that identify incoming threats, and missiles to intercept them. MDA plans to spend about \$8 billion per year through 2017.” *Missile Defense*, April 2013, US General Accounting Office Report to Congressional Committees. <http://www.gao.gov/assets/660/654233.pdf>

<sup>8</sup> U.S. Missile Defense Programs at a Glance, Arms Control Association, August 2012.  
<http://www.armscontrol.org/factsheets/usmissiledefense>.

<sup>9</sup> Frank A.

Rose, “Implementation of the European Phased Adaptive Approach, US Department of State, 18 April 2013.  
<http://www.state.gov/t/avc/rls/2013/207679.htm>

<sup>10</sup> “Russia fears missile defense in the Arctic,” UPI, 29 September 2009.  
[http://www.upi.com/Top\\_News/2009/09/29/Russia-fears-missile-defenses-in-Arctic/UPI-80901254231286/#ixzz2TStTQULu](http://www.upi.com/Top_News/2009/09/29/Russia-fears-missile-defenses-in-Arctic/UPI-80901254231286/#ixzz2TStTQULu)

<sup>11</sup> “US Missile Shield No Threat to Russia – Deputy PM,” RIANOVOSTI, 16 April 2013.  
<http://en.rian.ru/world/20130416/180661245.html>

<sup>12</sup> “Russian bomber conducts practice strikes on U.S. missile defenses in Asia,” *The Washington Times*, 05 April 2013. <http://www.washingtontimes.com/news/2013/apr/5/russian-bomber-conducts-practice-strikes-us-missil/?page=all>

<sup>13</sup> Also known as the “Project 18280 intelligence ship” currently under construction.

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[http://russian-ships.info/eng/intelligence/project\\_18280.htm](http://russian-ships.info/eng/intelligence/project_18280.htm)  
<http://www.harpoondatabases.com/encyclopedia/Entry2502.aspx>

<sup>14</sup> Bill Gertz, "Russian Bomber Roulette," *The Washington Free Beacon*, 05 April 2013. <http://freebeacon.com/russian-bomber-roulette/>

<sup>15</sup> Jeremy Page, "US-China Nuclear Silence Leaves a Void," *Wall Street Journal*, 13 April 2013. <http://online.wsj.com/article/SB10001424127887324695104578416960963213342.html>

<sup>16</sup> Yousaf Butt and George Lewis, "Recent Developments in US and NATO Missile Defense," FAS Strategic Security Blog, 20 March 2013, Federation of American Scientists. <http://blogs.fas.org/security/2013/03/qa-session-on-recent-developments-in-us-and-nato-missile-defense-with-dr-yousaf-butt-and-dr-george-lewis/>

<sup>17</sup> Kingston Reif, "Does missile defense work?" 8 February 2013, *Bulletin of the Atomic Scientists*. <http://www.thebulletin.org/web-edition/columnists/kingston-reif/does-missile-defense-work>

<sup>18</sup> Part of the US interest is to extend missile defence in response to North Korea so that China is increasingly uncomfortable with it and thus may be more open to pressuring North Korea to alter its behaviour to prevent provoking BMD deployments that impinge upon China. "The new deployment is also intended to send a signal to China, which tried but failed to block the more recent nuclear test, to rein in the North. 'We want to make it clear that there's a price to be paid for letting the North Koreans stay on the current path,' a senior official said Friday." Tom Shanker, David E. Sanger and Martin Fackler, "US Is Bolstering Missile Defense to Deter North Korea," 15 March 2013, *New York Times*. <http://www.nytimes.com/2013/03/16/world/asia/us-to-bolster-missile-defense-against-north-korea.html?pagewanted=all>

<sup>19</sup> Tom Z. Cillina, "Pentagon Shifts Gears on Missile Defense," Arms Control Association, April 2013. [http://www.armscontrol.org/act/2013\\_04/Pentagon-Shifts-Gears-on-Missile-Defense](http://www.armscontrol.org/act/2013_04/Pentagon-Shifts-Gears-on-Missile-Defense)