

## ISSUE BRIEF

No. 4054 | SEPTEMBER 24, 2013

## Biofuel Blunder: Navy Should Prioritize Fleet Modernization over Political Initiatives

Brian Slattery and Michaela Dodge

Por the past several years, the President and Navy Secretary Ray Mabus have directed the U.S. Navy to dedicate increasingly precious budgetary resources to establish a "green fleet"—i.e., to replace conventional diesel fuel for ships with biofuels harvested from organic material.

Supporters claim that instability in the fossil fuel market justifies paying more for unproven technologies, but this initiative will in effect cause fiscal instability in an already unstable Department of Defense budget.

Most Capable Fleet, Not Green Fleet. While the Navy is officially embracing biofuel use as a tool to decrease its dependence on fuels from the volatile Middle East, there are good reasons why the Navy should keep relying on conventional fuels.

Diesel Will Be Plentiful. The American petroleum sector is currently undergoing a booming revival, and new sources of fuel such as shale will decrease demand for diesel elsewhere in the U.S. economy. This will help secure sources of diesel to be readily available to the U.S. military.

No Established International Infrastructure. That could cause considerable challenges given the Navy's

to refuel a "green" ship in foreign waters, because a foreign biofuel infrastructure capable of meeting the Navy's needs is almost non-existent. Even if the U.S. builds its own supply chain for the Navy, it would still have to rely on diesel if refueling in foreign ports.

\*\*Increased Corrosion\*\*. Studies have shown that

global reach. It might be difficult or even impossible

Increased Corrosion. Studies have shown that biofuels are more corrosive than regular diesel and can therefore increase maintenance costs within the Navy's fleet.¹ This would only worsen the current fleet's dire situation, since inspection failures are already occurring at an alarming rate within the fleet.² Increasing average age of U.S. fleet; delayed, deferred, and underfunded modernization; and use of fuels with potentially harmful consequences is a recipe for a fleet readiness crisis.

Increased Expenses. Biofuels are disproportionately more expensive than conventional fuels. A gallon of biofuel costs \$26, whereas the Department of Defense purchases diesel at about \$3.60 per gallon. Many argue that this rate will decrease over time as biofuel production increases, but in the interim, the Navy's readiness would be further damaged by wasting precious resources on biofuels that are seven times more expensive than the Navy's conventional fuels—not including the increased maintenance costs

An Already Unstable Funding Environment. Even in a fiscally robust environment, biofuels are not a wise allocation of the Pentagon's funds. The U.S. military is currently facing serious funding reductions due to sequestration, which was mandated by the Budget Control Act of 2011. Under these cuts, the Navy will be unable to sustain its current

This paper, in its entirety, can be found at <a href="http://report.heritage.org/ib4054">http://report.heritage.org/ib4054</a>

Produced by the Douglas and Sarah Allison Center for Foreign Policy Studies

The Heritage Foundation

214 Massachusetts Avenue, NE Washington, DC 20002 (202) 546-4400 | heritage.org

Nothing written here is to be construed as necessarily reflecting the views of The Heritage Foundation or as an attempt to aid or hinder the passage of any bill before Congress.

shipbuilding rate, which has already been below the necessary level for a number of years.

As defense spending is projected to keep decreasing into the future, the Navy's budget becomes even more fragile. Naval Surface Warfare Director Rear Admiral Tom Rowden projected that the fleet could fall to 257 ships—around 50 less than the Navy's requirement—by 2020.<sup>3</sup> Yet the Navy will still be required to replace the aging ballistic missile submarine fleet and maintain 10 carrier air wings, as both are the key elements of U.S. strategic posture.<sup>4</sup>

Biofuels currently do not consume much of the Pentagon's topline budget; however, it is essential that the organization scrutinizes any and all programs, no matter how small or large. Fleet readiness is of utmost importance to the Navy and the security of this nation. Programs jeopardizing readiness in order to support unproven science with questionable results should be eliminated.

What Congress Should Do. While some will continue to push for this alternative fuel source, Congress should direct its support to the real needs of the military. With respect to the Navy's biofuels use, Congress should:

■ Eliminate funding for the purchase of biofuels. The free market should be the driver of new fuels and technologies, not taxpayers' dollars. With sequestration already causing readiness problems, the Navy should not detract its resources from achieving national security objectives.

- Redirect funds allocated for biofuels development. The Navy should prioritize modernization accounts that are currently suffering. For instance, the Congressional Budget Office has reported that the shipbuilding budget has been underfunded for over a decade.<sup>5</sup>
- Focus on national security objectives. The biofuels debate is one example of a broader lack of national security strategy. The Obama Administration has continuously undermined a comprehensive strategy and has instead pursued politically charged goals, such as pulling military bases out of Europe.<sup>6</sup>

Focus on Security, Not Unproven Science. The U.S. military is at a crossroads due to intense budget-ary constraints. Every decision made by the Navy and other services should be evaluated against whether it first and foremost improves the military's ability to secure American interests. While energy independence is only a component of this assessment, the current experiments with biofuels force an overly expensive program on an already strained service, and they will ultimately only weaken the fleet.

-Brian Slattery is a Research Assistant for Defense Studies and Michaela Dodge is Policy Analyst for Defense and Strategic Policy in the Douglas and Sarah Allison Center for Foreign Policy Studies, a division of the Kathryn and Shelby Cullom Davis Institute for International Studies, at The Heritage Foundation.

Deniz F. Aktas et al., Anaerobic Metabolism of Biodiesel and Its Impact on Metal Corrosion, Naval Research Laboratory, April 21, 2010, http://www.dtic.mil/dtic/tr/fulltext/u2/a530692.pdf (accessed September 19, 2013).

Sam Fellman, "Details Emerge on Cruiser's INSURV Failure," NavyTimes, May 9, 2011, http://www.navytimes.com/article/20110509/ NEWS/105090324/Details-emerge-cruiser-s-INSURV-failure (accessed September 9, 2013).

<sup>3.</sup> Syndey J. Freedberg Jr., "Will Sequester Scuttle Navy's Surface Ship Comeback?," BreakingDefense, August 5, 2013, http://breakingdefense.com/2013/08/05/will-sequester-scuttle-navys-surface-ship-comeback/ (accessed September 19, 2013).

<sup>4.</sup> Daniel Goure, "The Measure of a Superpower: A Two Major Regional Contingency Military for the 21st Century," Heritage Foundation Special Report No. 128, January 25, 2013, http://www.heritage.org/research/reports/2013/01/the-measure-of-superpower-a-two-major-regional-contingency-military-for-21-century.

<sup>5.</sup> Congressional Budget Office, *An Analysis of the Navy's Fiscal Year 2013 Shipbuilding Plan*, July 2012, http://www.cbo.gov/sites/default/files/cbofiles/attachments/07-25-12-NavyShipbuilding\_0.pdf (accessed September 19, 2013).

<sup>6.</sup> Luke Coffey, "Keeping America Safe: Why U.S. Bases in Europe Remain Vital," Heritage Foundation Special Report No. 111, July 11, 2012, http://www.heritage.org/research/reports/2012/07/keeping-america-safe-why-us-bases-in-europe-remain-vital.