



Neil Webb

Global defense spending: The shifting center of gravity

An understanding of the past century gives context to today’s uncertainty.

Andrew Erdmann

It often seems that today is an era of unprecedented, rapid change—and with good reason. The past decade has seen the fastest shift in global economic power in human history.¹ The trends underpinning this are also reshaping the landscape of global defense power. In a 2013 article from *McKinsey on Government*, several related topics were explored: the decline in the United States’ and its allies’ share of global spending; the rise of spending in Asia, the Middle East, and Russia; and the potential future trajectories of both.²

Since then, these shifts have accelerated.³ With change approaching faster than expected,

some historical context is needed. An analysis of defense-spending data for more than 50 countries over the past century reveals a clear but surprising story (exhibit). The “center of gravity”⁴ of global defense spending is indeed rapidly moving away from the United States. Yet this is not the first time the world has experienced a shift of this magnitude. Several times, the center of defense spending has swung dramatically as budgets rose in one part of the world and declined in another.

These shifts can be best understood if bracketed into three great waves, in which the tide of spending rushed first in one direction and then retreated.

The first wave, 1900–30. At the start of the 20th century, the center of gravity in global defense spending was in the middle of Europe. The rivalries in Europe defined the geopolitical landscape, despite the United States' rise to "great power" status by 1900 after a period of remarkable economic growth and victory in the Spanish-American War. The center of gravity remained in the center of Europe through the outbreak of the First World War.

By 1918 and the end of the war, however, two simultaneous trends drove a dramatic swing westward in the center of gravity. First, the United States entered the war on the side of the Allied Powers and launched its rapid mobilization of society to support the war effort. Second, the Russian Empire collapsed in revolution and

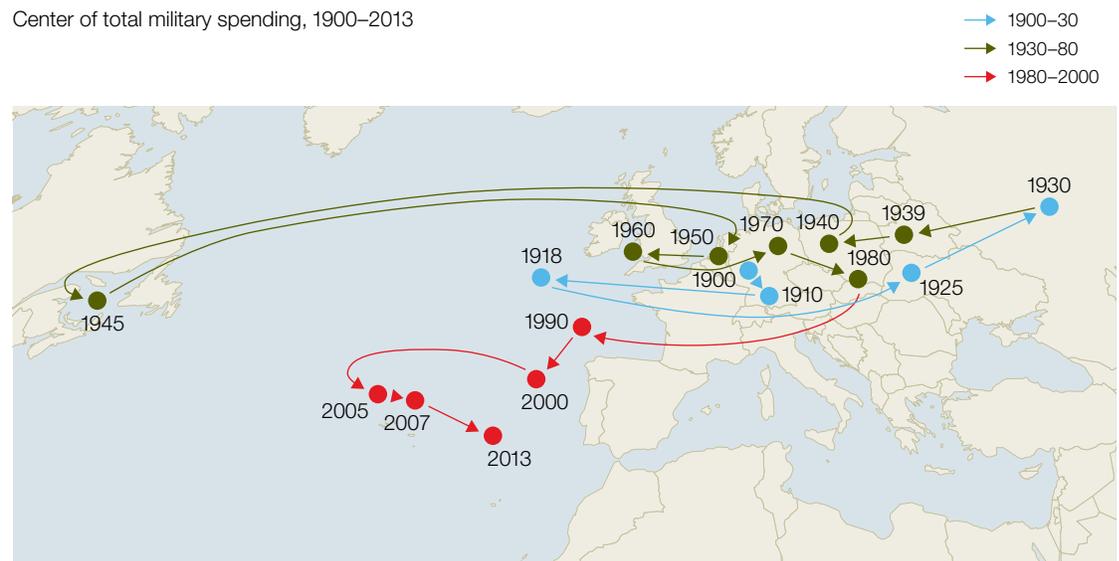
withdrew from the war. Between the Treaty of Versailles in 1919 and the Treaty of Locarno in 1925 that defined the postwar settlement, the center of gravity then swung dramatically back toward Eastern Europe—to today's Ukraine—in the defining movement of this first wave. The US withdrawal of armed forces from Europe and demobilization, the demilitarization of Germany, the fragmentation of the Austro-Hungarian and Ottoman empires, and the rise of the Soviet Union and the new Japanese empire contributed to this swing. The center of gravity continued moving eastward, into what was then the Soviet Union, in the early 1930s.

The second wave, 1930–80. The remilitarization of Germany under Hitler, followed by the increase in defense spending elsewhere in Europe and,

Exhibit

Three waves have defined shifts in the center of gravity for defense spending since 1900.

Center of total military spending, 1900–2013



Source: Correlates of War Project, National Material Capabilities data set; International Institute for Strategic Studies

eventually, the outbreak of the Second World War, brought the economic center of gravity back into Central Europe. As in the First World War, the entrance of the United States into the war in 1941 fundamentally altered the balance. By the end of the war in 1945, the United States' unprecedented mobilization of its economy—the country produced approximately half the world's GDP—supported, in turn, its massive defense spending.

At that point, the center of gravity had shifted across the Atlantic Ocean to the shores of Canada. The center then swung back to the middle of Europe by 1950, as the United States once again dismantled its military and cut its overall defense spending by more than 80 percent in five years. The European powers were still rebuilding after the war, and the Soviet Union maintained its massive military as it consolidated its influence across Central and Eastern Europe. For the next 30 years, the Cold War struggle between East and West set the boundaries for the center of gravity. Europe rearmed under the umbrella of the North Atlantic Treaty Organization, and the center of gravity ebbed and flowed across Europe until, in the aftermath of the drawdown

of the United States following the Vietnam War, it was again in Eastern Europe, near today's Slovakia.

The third wave, 1980–present. The third great shift in global defense power began in 1980, at the time of the Soviet Union's invasion of Afghanistan. Increases in US spending started to move the center of gravity westward in the early 1980s. A decade later, the Cold War ended peacefully, the Soviet Union broke apart, and the United States emerged as the world's sole superpower.

Accordingly, the center of gravity moved once again into the Atlantic. The trend continued through the 1990s and into the first years of the 21st century, accelerated by the US defense buildup following the terrorist attacks of September 11, 2001. By 2005, the center of gravity had reached a point near the Azores Islands, marking the crest of the third wave. The center of gravity shifted eastward once again and, for the first time, southward, a movement accelerated in the aftermath of the 2008–09 global economic crisis that triggered retrenchments in the United States and much of Europe. During these years, China, the Middle East, Russia, and a number of Asian countries invested in making



their militaries even stronger. This third wave appears similar in its movements to the previous two waves, but its underlying drivers differ. Whereas earlier movements centered on questions of European security, the latest developments in the third wave are propelled by rising spending in emerging economies in Asia and the Middle East.



“History does not repeat itself,” Mark Twain is credited with saying, “but it does rhyme.” The three major waves in the center of gravity of global defense spending since 1900 reflect the broader story of the changing global balance of power. Ultimately, defense spending reflects the combination of a country’s underlying economic health and more immediate strategic threats and opportunities. For most of this period, the ebbs and flows in the struggle for the mastery of Europe defined the path for the center of gravity. In the past decade, however, a new rhyme can be heard, as the spending of non-European powers accelerates the movement of the center of gravity for global defense spending away from the Atlantic. ○

¹For more, see *Urban world: Cities and the rise of the consuming class*, McKinsey Global Institute, June 2012, on mckinsey.com

²Jonathan Ablett and Andrew Erdmann, “Follow the money: Strategy, scenarios, and the global shift in defense power,” *McKinsey on Government: Special Issue: Defense*, Spring 2013, Number 8.

³*The Military Balance 2014*, International Institute for Strategic Studies (IISS), 2014, iiss.org.

⁴The “center of gravity” for a given year is a point on the Earth’s surface, calculated by adding, across all countries, the product of each country’s latitude and longitude and its defense spending, and then dividing by total world defense spending. This analysis uses data primarily from Correlates of War Project data sets, supplemented by the most recent IISS data for 2007–13. There are 55 countries in the sample, including 4 countries (Austria-Hungary, Czechoslovakia, the German Democratic Republic, and the Federal Republic of Germany) that are no longer sovereign states; their successors are all included in the sample. The percent of total global spending captured in our sample ranges from 94 to 99 percent of global spending, depending on the year.

The author wishes to thank Brian Cooperman and Cody Newman for their contributions to this article.

Andrew Erdmann is a principal in McKinsey’s Washington, DC, office. Copyright © 2014 McKinsey & Company. All rights reserved.