



The Impact of Globalization and Shifting Defense Priorities on the Defense Industrial Base

**Dr. Nayantara Hensel
Chief Economist
Department of the Navy
Office of the Deputy Assistant Secretary of the
Navy (Cost and Economics)**

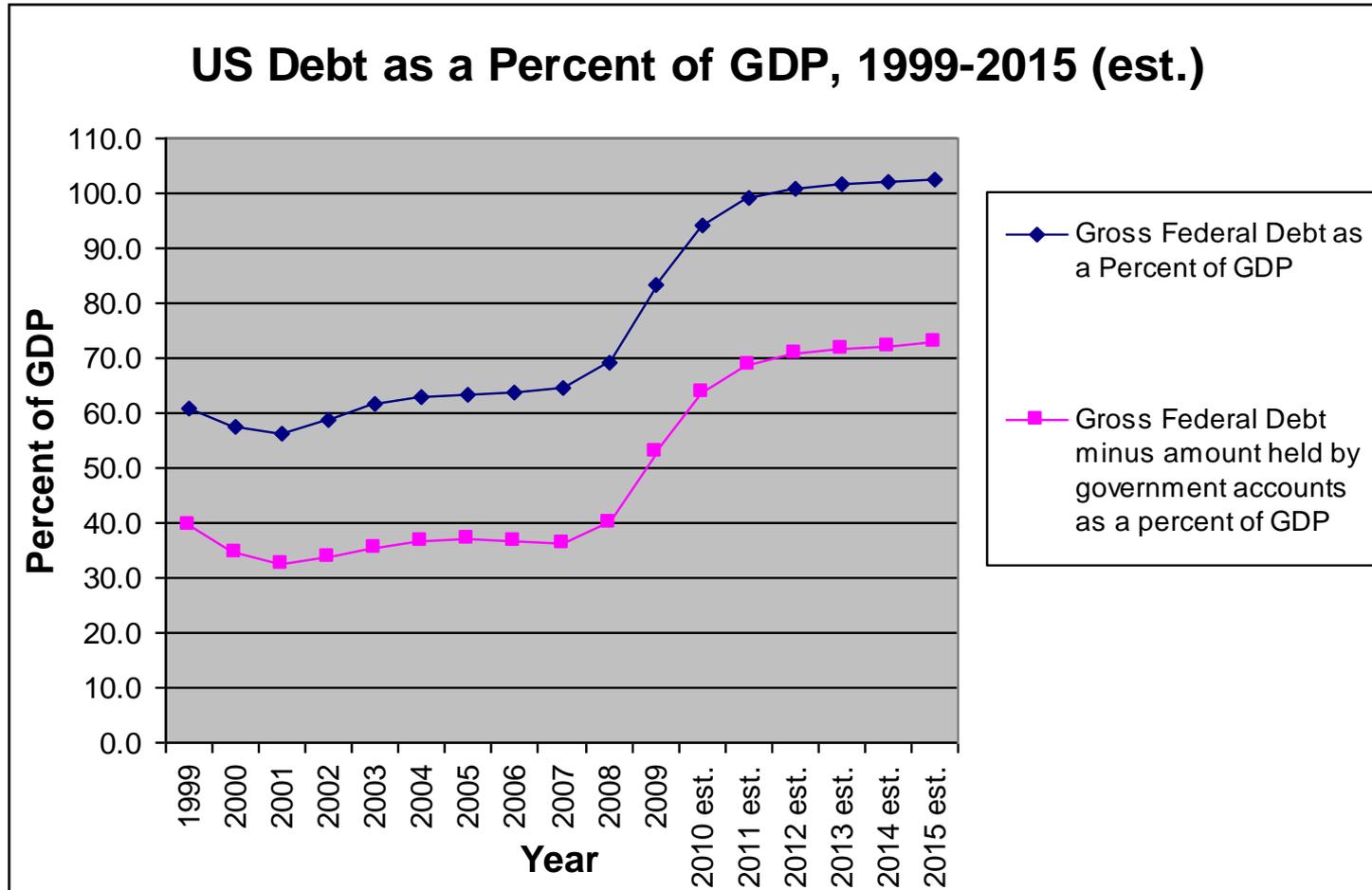


Evolution of the Defense Industrial Base

- The defense industrial base in the US has witnessed many changes over the past twenty years.
- Presentation focuses on
 - The impact of macroeconomic conditions and shifting defense priorities on the defense industrial base
 - The continuing global nature of the defense marketplace
 - Global alliances in creating products
 - Growth of overseas defense industrial bases



US Debt as a Percent of GDP



Underlying raw data from Office of Management and Budget (OMB)

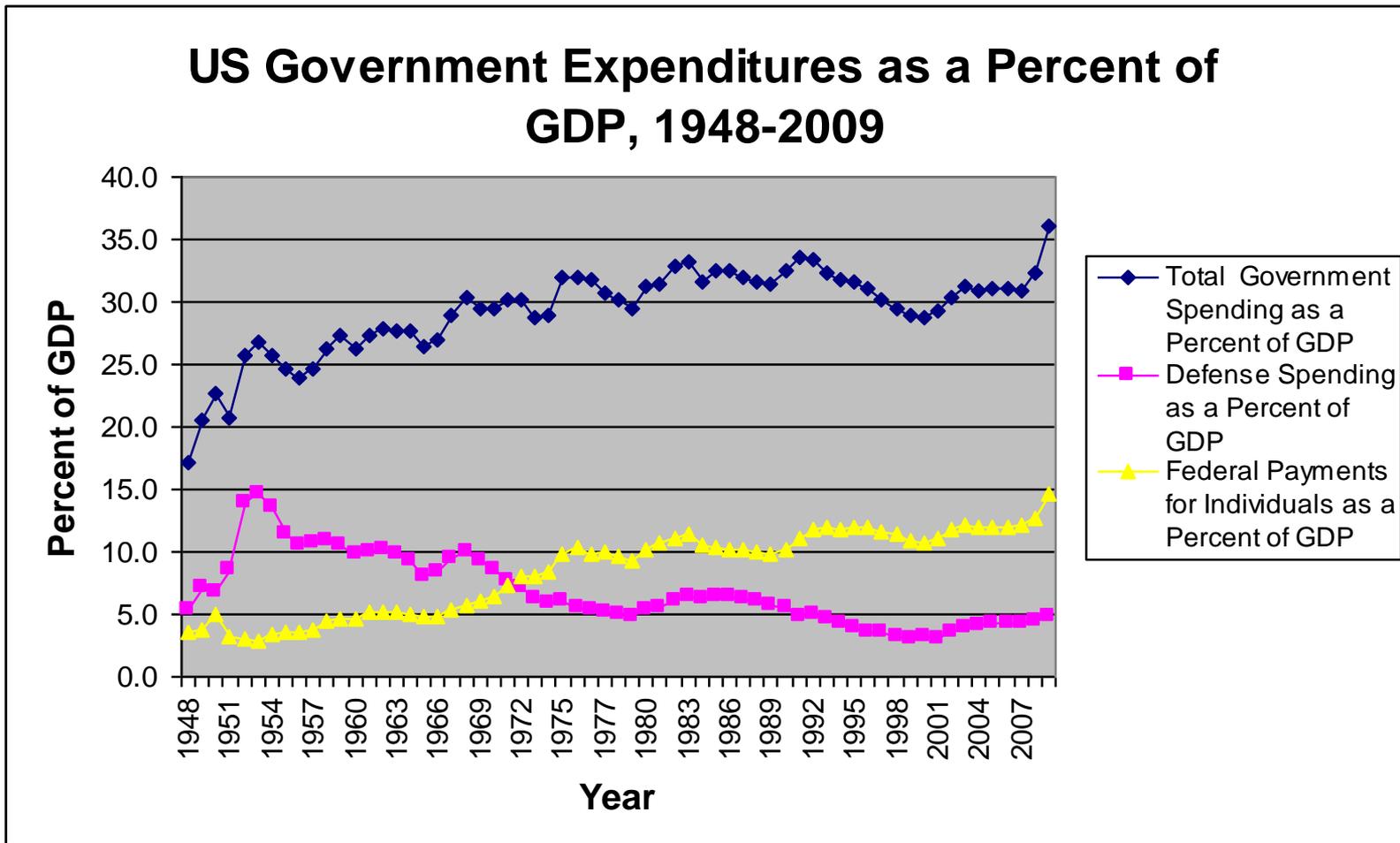


Size of the US Debt and Deficit

- The ratio of gross federal debt to GDP rose from 57.3% in 2000 to 69.2% in 2008 to 83.4% in 2009. Projections suggest that it will continue to rise.
- The US deficit for FY 2009 was \$1.4 trillion, which was 9.9% of GDP.
 - President Obama's budget, submitted to Congress in early February, 2010, would result in a \$1.56 trillion deficit, which is the highest level in history.
 - The deficit has only climbed to 5% or more of GDP four times since the end of World War II.
- Projected deficits between 2011 and 2020 would add \$8.5 trillion to the national debt.



US Government Expenditures as a Percent of GDP, 1948-2009



Underlying raw data from Office of Management and Budget (OMB)



The Defense Budget and the Shift in Priorities

- Shift in defense priorities toward combating insurgent foes through irregular warfare,
- The Obama administration is seeking \$708 billion in fiscal 2011 for DoD which reflects these shifting priorities.
 - The base budget request is \$548.9 billion, which is 3.4% higher than in 2010.
 - Funding for military hardware is to rise to \$112.9 billion—an increase of 7.7%.
 - Greater funding for types of weapons systems which support irregular warfare
 - Reduction in high-tech weapons systems for conventional warfare
 - Demise of F-22 last year

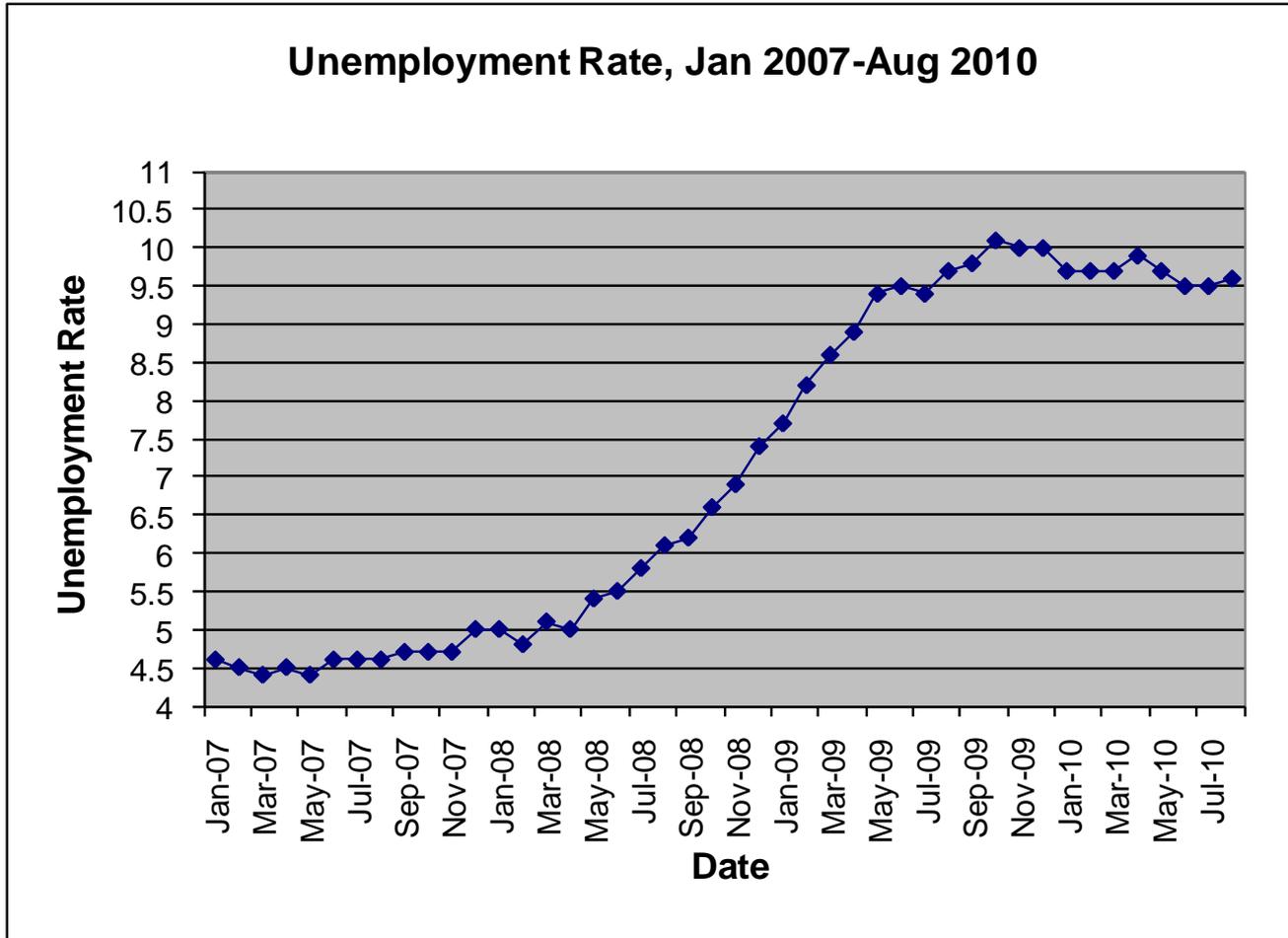


The Defense Sector Impacts Regional Economies

- The defense presence in regional economies has strong spillover effects.
- Example: Washington DC
 - Federal spending in the DC area rose from 33% of the spending in the regional economy in 2000 to 37% in 2010
 - Volume of defense procurement contracts in the area rose from \$12 billion to \$35 billion between 2000 and 2010
 - General Dynamics—headquartered in Fall Church, VA; expanded from 1100 local employees in 2000 to nearly 6000 by 2005
 - CACI International had 2600 area employees in 2001 and now has close to 6200
- Impact of possible reduction in spending by 10% on support contractors in each of the next 3 years?
- In the context of rising unemployment, Congressional representatives have become increasingly concerned about the labor market impacts of reducing certain defense programs.
 - Example: the C-17



Unemployment Rate



Source of underlying data: Bureau of Labor Statistics



The Impact of Shifting Defense Priorities on the Defense Industrial Base

- Concerns that a gap in work from termination of certain types of defense programs could lead to atrophy of a specialized skills base, which, in the absence of defense work, would not be able to grow with commercial sector demand.
- Although current profits may be good in particular sub-sectors due to orders of existing models, reduced demand for next generation Pentagon programs may prevent greater development of design teams and can hinder the strength of the sector in developing future systems.
 - Large body solid rocket motors (SRM's)
- Shift in priorities can lead to the development of new areas in the defense industrial base
 - UAV's and associated equipment (sensors, new propulsion systems, full motion video)
- Defense contractors are shifting their focus toward areas of growth, including cybersecurity, electronic systems, and unmanned aircraft, as is evident in recent earnings and projections



The Defense Sector as a Global Industry

- Defense Secretary Robert Gates stated that “defense manufacturing is a global business.”
- Ashton Carter, Undersecretary of Defense (AT&L), has noted that European products are “part of a ‘global industrial base’ that deserve consideration, especially if these designs can be purchased at a lower cost.”

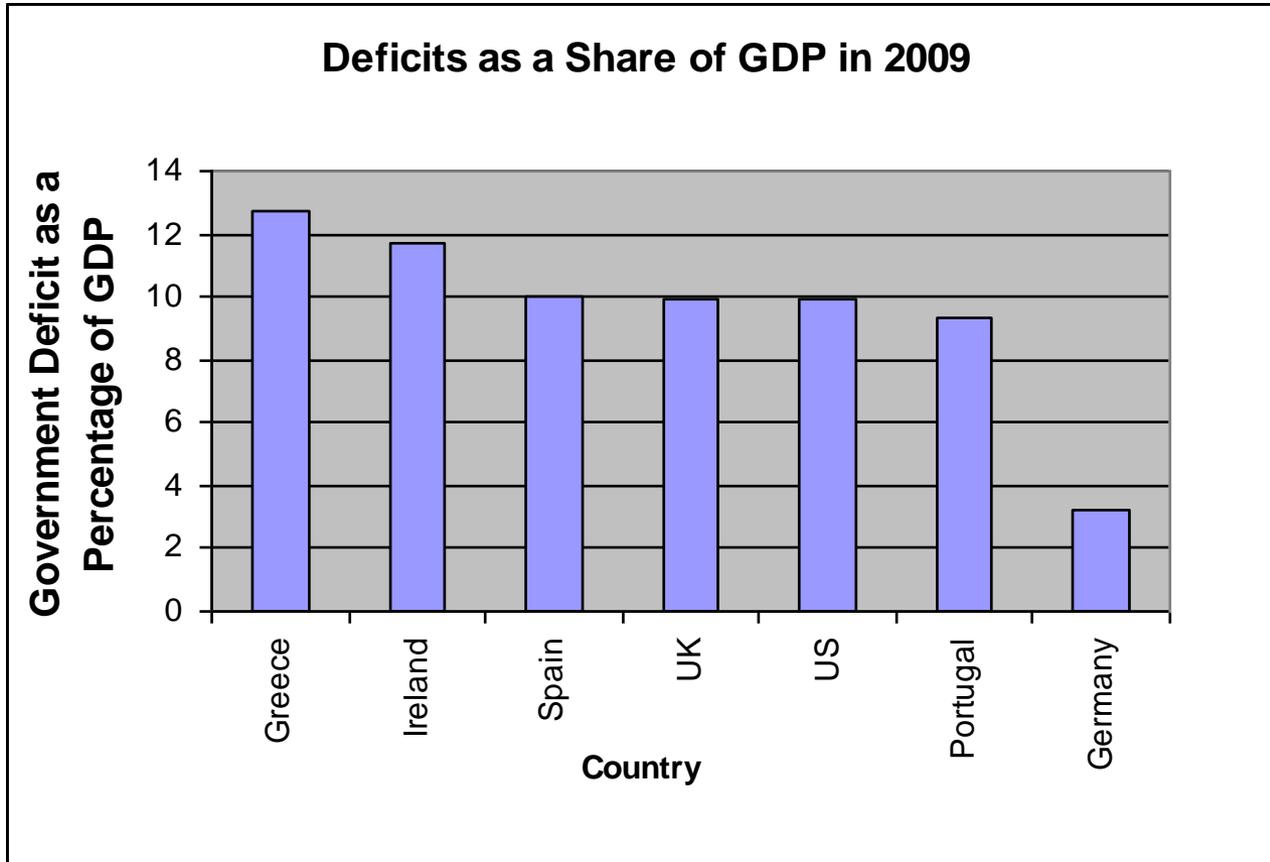


Interdependency within the Global Defense Industrial Base

- Although many US weapons systems do not have foreign contractors as the primary contractor, the US is involved with the defense industrial bases of other countries through global supply chain arrangements.
- The development of the Joint Strike Fighter (JSF) is an example of one of the most extensive global alliances in the defense sector
- Secretary of Defense Robert Gates, in purchasing more JSF's, has emphasized the commitment of the US to systems which are compatible with its allies and which are developed through global alliances.
- Impact of budget deficits
 - Leading to reduction in military spending?
 - Leading to greater volatility and directional change in exchange rates, thus impacting global supply chain arrangements?



Cross-Country Data on Deficits as a Share of GDP



Source of raw data: Congressional Budget Office and the International Monetary Fund



Overseas Sales Can Bolster Our Domestic Defense Industrial Base Even As Our Priorities Change.

- Overseas sales can bolster our domestic defense industrial base even as our priorities change.
- Increased demand for traditional equipment and increased military spending in developing countries
 - Examples: India, the Middle East
 - Role of alliances and “offset agreements” in expanding overseas industrial bases
- Strategic expansion plans of US and European defense manufacturers



Conclusions

- The rising US debt and deficit may increasingly put pressure over time on other segments of the budget, including defense, as more funding becomes needed for additional areas.
- Both with the shift in defense priorities and potentially greater fiscal austerity, there will be a greater emphasis on cost-effective weapons for the current threats.
 - Example: Demise of F-22
- With stagnation in the labor markets, Congressional representatives may become more vocal about the cancellation of certain programs.
- Shift toward irregular warfare and away from conventional warfare may lead to attenuation of certain aspects of the defense industrial base.
 - Example: Solid rocket motor (SRM) industrial base
- Shift can also lead to increased growth of the defense industrial base
 - Example: UAV's and associated market spaces (sensors, full motion video, new propulsion systems)
 - Opportunity for newer firms to enter



Conclusions

- The defense industrial base is global in scope. Although the prime contractors on many US contracts are domestic, there is an increasing trend toward global supply chains to share innovation and risk, and to develop interoperable equipment.
 - Examples: F-35 (defense); 787 (commercial)
- If sales of domestic defense manufacturers flag, still substantive demand from overseas for systems to combat traditional foes.
- Foreign purchases from US firms and alliances with US firms can lead to the growth of overseas industrial bases.
 - Examples: India, the Middle East
- The defense sector continues to be a significant contributor to the US and global economies. The evolving fiscal environment and the types of military threats will hopefully contribute to the development of a more cost-effective and transparent landscape.