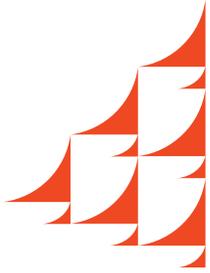


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War at Any Price: Domestic and Regional Economic Consequences of Yemen's Civil War

Karen E. Young



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Executive Summary

The civil war in Yemen is now approaching its fourth year, and the rising cost of the conflict in its humanitarian disaster and continued investments by the warring parties in military expenditures suggest that cost is not a deterrent or impediment to war. While the immediate costs to the Yemeni people have been clear, the future cost to Gulf neighbors, Saudi Arabia and the United Arab Emirates in particular, may be more than these states have estimated.

Considering social science research on civil wars, this paper evaluates the economic consequences of the conflict in Yemen, for the country itself, as well as for the Gulf region. Further, it offers suggestions on how the Gulf Cooperation Council states can learn from past conflicts and theory in their approach to reconstruction efforts to avoid the conflict trap and violence cycle.

Introduction

The central puzzle about war, as James Fearon observes, is that wars are costly but nonetheless occur.¹ The civil war in Yemen is now approaching its fourth year, and the rising cost of the conflict in its humanitarian disaster (complete with a cholera outbreak² and widespread hunger³) and the continued willingness of warring parties to invest in military⁴ equipment⁵ suggests that cost is not a deterrent or impediment to war. The Saudi and Emirati justification for intervention in Yemen on behalf of President Abd-Rabbu Mansour Hadi has been to confront Iranian aggression in the Arabian Peninsula. Following U.S. President Donald J. Trump's visit to Saudi Arabia, the tensions between Iran and its Gulf Arab neighbors have continued to mount.⁶ Saudi Arabia and its allies continue to seek further U.S. support for the intervention in Yemen⁷ and continued arms sales.⁸

While the immediate costs to the Yemeni people in famine,⁹ disease, and destruction have been clear, the future cost to Gulf neighbors, Saudi Arabia and the United Arab Emirates in particular, may be more than these states have estimated. As the expansive social science research on civil wars demonstrates, the cost of these conflicts tends to multiply, with reverberating effects in the domestic economy and in neighboring states. The value of the

1 James D. Fearon, "Rationalist Explanations for War," *International Organization* 49, no. 3 (1995): 379-414.

2 Muhammed Mukhashaf and Ali Abdelatti, "Cholera Death Toll in Yemen Reaches At Least 180: Red Cross," *Reuters*, May 15, 2017.

3 "Yemen," World Food Programme, accessed May 18, 2017.

4 Steve Holland, "U.S. Nears \$100 Billion Arms Deal for Saudi Arabia: White House Official," *Reuters*, May 12, 2017.

5 Daniel Brown, "The State Department Just Approved a \$2 Billion Sale of Patriot Missile Systems to the United Arab Emirates," *Business Insider*, May 11, 2017.

6 Anthony H. Cordesman, "President Trump's Trip to Saudi Arabia," *Center for Strategic and International Studies*, May 11, 2017.

7 Mirren Gidda, "U.S. Considering More Military Assistance for Saudi Arabia in Yemen's Civil War," *NewsWeek*, April 20, 2017.

8 Ibid.

9 "Yemen: IPC Analysis – Summary of Findings, Acute Food Insecurity Current Situation Overview," *reliefweb*, March 1, 2017.

academic research on the economic consequences of civil wars is more than affirming the intuitive argument that war is costly, but to demonstrate shared causal factors and common consequences over time and across space. Policymakers should take note, as the Yemeni case is textbook in its demonstration of expected outcomes of civil wars. When considering a postconflict reconstruction effort in Yemen, what might the GCC states learn from the experience and theory on how to avoid the conflict trap and violence cycle? While it is too late to avoid the conflict, there is some good evidence of how to make the effects less severe. The amount of aid is probably equally important to the design, delivery, and capacity to absorb aid.

Over the next decade the Gulf states will likely grow as both consumers of military equipment and disbursers of significant amounts of postconflict aid and institution building within the Middle East and North Africa. The Gulf states are untested in this very difficult field; U.S. experience in the region has demonstrated that state building and reconstruction efforts are complicated.¹⁰ Saudi Arabia and the UAE in particular will need to grow their capacity to be able to advise and deliver this kind of support.

International Aid to Yemen

Saudi Arabia has emphasized its willingness to contribute funding toward Yemen's postconflict reconstruction expenses. At a May 12 meeting in Washington, Saudi Permanent Representative to the United Nations Abdallah Al-Mouallimi noted that \$10 billion had been "earmarked" by Saudi Arabia to rebuild Yemen after the conflict.¹¹ This is in addition to the \$8.2 billion the Saudis have already provided to Yemen, according to the King Salman Humanitarian Aid and Relief Center.¹²

For those seeking to end the conflict and begin planning the hard work of rebuilding Yemeni society and institutions, the World Bank, in partnership with a number of U.N. organizations, is considering a package of aid to Yemen to avoid famine and humanitarian catastrophe.¹³ The multilateral initiative has proposed: a \$200 million Emergency Cash Transfer program that would benefit approximately 1.5 million poor and vulnerable households in all 22 governorates of Yemen and be implemented in partnership with UNICEF; \$80 million additional financing to an Emergency Health and Nutrition Project to address the worsening health and nutrition status of the vulnerable, particularly children and women; a Global Agriculture Food Security Program Grant for \$36 million expected to target poor households, women, internally displaced persons, and farmers who have lost their livelihood due to the ongoing conflict; and, more difficult, a Trade Finance Facility for Food Imports to address constraints on financing food imports. The proposed mechanism for the latter would establish a \$500 million uncommitted and secured trade finance facility to finance imports of wheat and rice by local importers. The

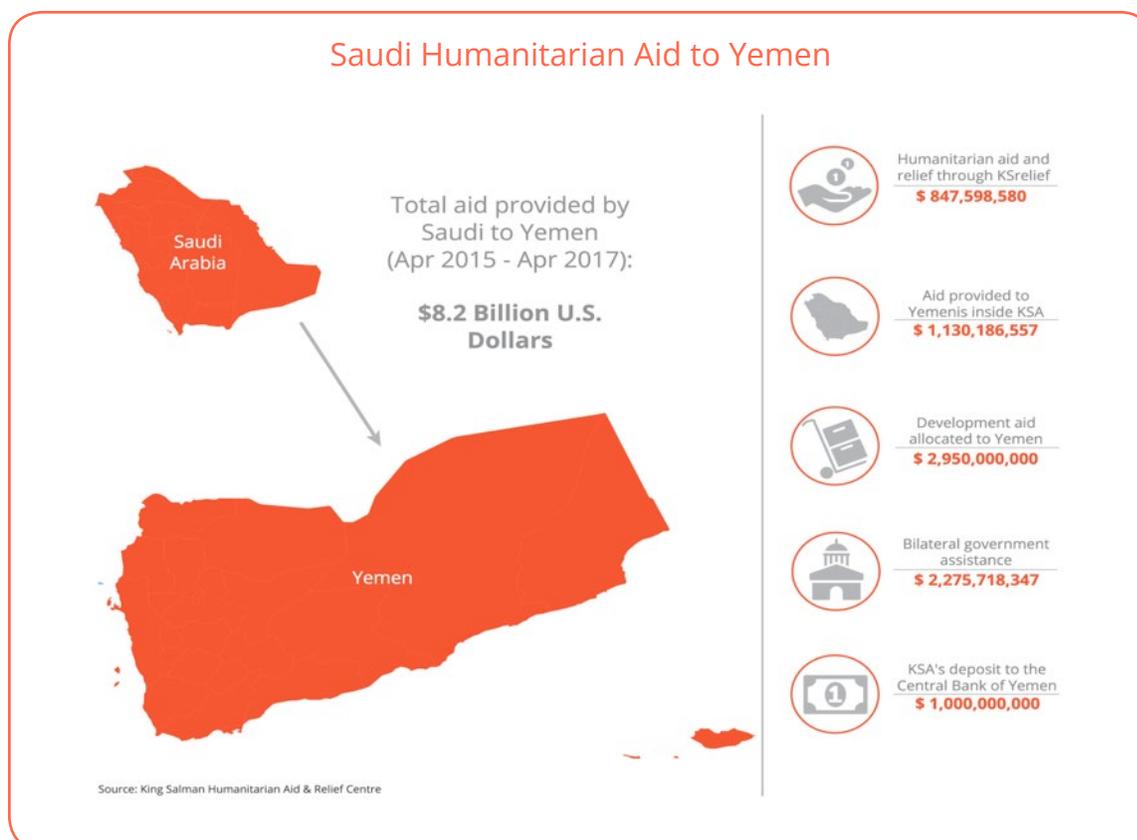
¹⁰ Stephen M. Walt, "[Top 10 Lessons of the Iraq War](#)," *Foreign Policy*, March 20, 2012.

¹¹ Abdallah Al-Mouallimi, "[The Status of the Conflict in Yemen](#)" (roundtable presentation, Arab Gulf States Institute in Washington, Washington, DC, May 12, 2017).

¹² "[Saudi Aid to Yemen in Two Years Stands at \\$8.2 Billion](#)," *RiyadhVision*, May 8, 2017.

¹³ Mahmoud Moheildin, "[Statement by World Bank Group Senior Vice President Mahmoud Moheildin at the High-Level Pledging Event for the Humanitarian Crisis in Yemen](#)," *The World Bank*, April 25, 2017.

facility would need to be secured by a cash collateral balance, mobilized from the international donor community through a World Bank Group proposal led by the International Finance Corporation and supported by the International Monetary Fund.



Senior officials of the Central Bank of Yemen (operating out of Aden), however, have expressed some concern about external finance facilities. At a conference in Washington on May 5 sponsored by the National Defense University and the Gulf Research Center, the deputy governor of the central bank, Khalid Abadi, expressed concern that external finance facilities such as the one the World Bank proposes could impede the bank's ability to manage its affairs and unify the country's disparate regional bank offices under a single authority.¹⁴

A study by the World Bank, United Nations, Islamic Development Bank, and European Union estimates the economic impact of the conflict in Yemen far exceeds the promised Saudi aid. Rebuilding costs are also distinct from damage assessments. The group's early assessment tops \$15 billion, including nearly \$7 billion in economic losses and more than \$7.3 billion in

¹⁴ Khalid Abadi, "NESA and Gulf Research Center Yemen-Saudi Arabia Workshop" (workshop presentation, Near East South Asia, Center for Strategic Studies, Washington, DC, May 5, 2017).

production and service delivery. The cost of restoring electricity production in four cities was \$139 million at the end of 2015. These early estimates include the reconstruction of over a thousand schools and nearly a thousand health centers for vaccinations.¹⁵

While this aid is desperately needed, it will be a fraction of the cost of the eventual reconstruction of Yemen (or two separate Yemeni states¹⁶). It will also be a sliver of the cost of the conflict to the Gulf Cooperation Council states, especially those directly involved in the conflict and on Yemen's borders. What political scientists have learned about the effects of civil wars suggests the humanitarian aid cost and even the postconflict reconstruction costs will be dwarfed by the longer-term economic effects of the war in Yemen. As the statistical evidence of civil wars reveals in their regional effects, the entire neighborhood of the GCC is likely to experience the prolonged economic shock of the war.

Structure of Yemen's Economy Weakens Its Chances of Recovery

The structure of Yemen's economy weakens its chances of recovery and broadens its regional economic fallout in several ways. Yemen's economy is heavily dependent on oil exports and food imports. According to a new World Bank study on the economics of postconflict reconstruction in the Middle East and North Africa, for the last 30 years, Yemen has relied on oil for more than a third of its gross domestic product (\$31 billion in 2010), half of its government revenue, and 90 percent of its exports.¹⁷ During the recent oil boom decade between 2003 and 2014, high oil revenue allowed the central government of Yemen to provide employment in the public sector and make some infrastructure investment. While consistently poor and struggling with unification, Yemen's economy grew at an average annual rate of 3.8 percent between 1990 and 2010. The oil growth resource is now less reliable since the decline in oil prices in late 2014, and the expectation of steady or increasing growth is less realistic.

Yemenis have grown qat at the expense of their water and food supply, as the country imported more than 90 percent of its food needs before the current crisis.

The agricultural productivity of Yemen was distorted before the conflict, given that 30 percent of production before 2011 was dedicated to the cultivation of qat, a low-level stimulant that is water intensive to grow and six times more profitable to sell than other food crops. Yemenis have grown qat at the expense of their water and food supply, as the country imported more than 90 percent of its food needs before the current crisis. Moreover, Yemenis spend as much as a quarter of their income on qat. In a related Oxfam study on food security during the 2011 uprisings, researchers show that while food consumption decreased

¹⁵ The World Bank, United Nations, European Union, Islamic Development Bank, Government of Yemen, [Joint Social and Economic Assessment for the Republic of Yemen](#) (Washington, DC: The World Bank, August 2012).

¹⁶ Stephen A. Seche, "Shaping the South: The UAE in Yemen," *Arab Gulf States Institute in Washington*, May 4, 2017.

¹⁷ The World Bank, [MENA Economic Monitor, April 2017: The Economics of Post-Conflict Reconstruction in MENA](#), (Washington, DC: The World Bank, April 2017).

as income sources declined, qat consumption remained a priority in household expenditure, second only to food.¹⁸ During the current conflict, qat production has actually increased, putting further pressure on food supplies, according to a report by Deep Root Consulting.¹⁹

The academic literature on civil wars is rich with debate on the cause and consequence of these conflicts and in the accumulation of data across regions and over time. There are some important findings from this literature that should give pause to all parties in Yemen's ongoing conflict.

Economic Consequences of Civil War

Paul Collier's seminal work in the late 1990s and early 2000s on the economic causes²⁰ and consequences²¹ of civil war estimates that a 15-year conflict would reduce a country's GDP per capita by about 30 percent on average. (Yemen's history of internal conflict and insurgency since its unification in 1990 adds to the impact and legacy of its current political and economic turmoil.²²) Collier's work with Anke Hoeffler at Oxford University points to the longer-term consequences of conflict as an underdevelopment trap, in which economic, social, and political disintegration impedes the formulation of institutions to support growth, making future conflict more likely.²³ Their work supports the argument that for aid to be effective, the right policy mix (and institutional framework) must exist to support and amplify it in the receiving country; institutional reform is therefore necessary to create growth in postconflict environments.

More recent studies find civil wars to be especially devastating to postconflict economic recovery.²⁴ A recent quantitative work in the *Journal of Peace Research* by Stefano Costalli, Luigi Moretti, and Costantino Pischedda evaluating 20 countries finds that civil wars have the effect of reducing average annual per capita GDP growth by about 1.5 percent during conflict and for some time following it.²⁵ It is not just that war devastates economies, but civil wars tend to devastate possibilities for economic recovery for a long time. Yemen's future, even if aid commitments are delivered, is likely to be mired in poverty.

18 "Yemen: Fragile Lives in Hungry Times," *Oxfam*, September 19, 2011.

19 Brett Scott, "Close to the Food but Not Far from Famine," *Deep Root*, April 30, 2017.

20 Paul Collier, "Economic Causes of Civil Conflict and Their Implications for Policy," *The World Bank*, June 15, 2000.

21 Paul Collier, "On the Economic Consequences of Civil War," *Oxford Economic Papers* 51 (1999): 168-83.

22 Zachary Laub, "Yemen in Crisis," *Council on Foreign Relations*, April 19, 2016.

23 Paul Collier and Anke Hoeffler, "Aid, Policy and Peace: Reducing the Risks of Civil Conflicts," *The World Bank*, May 20, 2002.

24 Hannes Mueller, "Growth Dynamics: The Myth of Economic Recovery: Comment," *American Economic Review* 102, no. 7 (2012): 3,774-77.

25 Stefano Costalli, Luigi Moretti, and Costantino Pischedda, "The Economic Cost of Civil War: Synthetic Counterfactual Evidence and the Effects of Ethnic Fractionalization," *Journal of Peace Research* 54, no. 1 (2017): 80-98.

Impact of Civil War on GDP Per Capita

<i>Country</i>	<i>Percentage effect</i>	<i>Ethnic fractionalization</i>
	<i>(1)</i>	<i>(2)</i>
Cote d'Ivoire	-16.1	0.87
Congo, Republic of	-0.4	0.72
Djibouti	-27.9	0.80
Algeria	-3.0	0.30
Egypt	-1.8	0.25
Haiti	-13.4	0.10
Kenya	-3.2	0.89
Liberia	-74.0	0.89
Nigeria	-6.5	0.89
Nicaragua	-22.4	0.50
Nepal	-14.2	0.68
Peru	-14.1	0.66
Rwanda	-14.4	0.22
Senegal	-2.8	0.81
Sierra Leone	-24.2	0.79
El Salvador	-21.6	0.15
Somalia	-51.9	0.39
Thailand	-5.1	0.36
Turkey	-1.6	0.19
Uganda	-31.7	0.93
Average	-17.5	0.57
Correlation		-0.23

Column 1 reports the percentage difference between the observed GDP per capita and its synthetic counterfactual averaged during the treatment period. Column 2 reports the ethnic fractionalization index.

Stefano Costalli, Luigi Moretti, and Costantino Pischedda, "The Economic Cost of Civil War: Synthetic Counterfactual Evidence and the Effects of Ethnic Fractionalization," *Journal of Peace Research* 54, no. 1 (2017): 54.

Role of Trust in Economic Reconstruction

New research on the role of trust in postconflict reconstruction underscores the devastation in societies that are divided by factions, especially along ethnic or identity cleavages. In a society and conflict as in Yemen, the manipulation of sectarian identity to describe and frame the conflict could deepen the legacies of economic damage.²⁶ Alessandra Cassar, Pauline Grosjean, and Sam Whitt find that civil war erodes interethnic trust and highly fractionalized societies pay an especially high price, as they rely heavily on interethnic business relations.²⁷

According to survey work, Yemen's economy contracted sharply in 2015 by 28.1 percent and again by 4.2 percent in 2016.²⁸ Much of the economic halt has come from the closure of small businesses within the informal economy in Yemen, which is the bulk of Yemeni employment opportunity outside of the public sector. A United Nations Development Programme Business Survey report shows that small and medium-sized enterprises have been most affected by the conflict with as many as 34 percent of medium enterprises closing compared to 17 percent of large businesses. Businesses belonging to the service sector were hit the hardest with as many as 35 percent forced to close.²⁹

In societies like Yemen, informal economic activity and microlevel businesses will be the first to restart growth, and will be the dominant mechanism of income for most families, even those with former government employment or positions within the military.

While there are arguments in economic and political history that characterize war and competition between social and ethnic groups as salubrious to state formation and market development,³⁰

studies of modern states in civil war are more likely to find the economic effects detrimental to growth, and for the longer term. Some scholars point to the growth of collective action in postconflict societies (particular in studies on civil war in Africa³¹), which helps rally political identification and political activism, but more generally the legacy of conflict is negative on interethnic trust and trade. The social and institutional legacy of conflict has been described as the most important but least understood of all war impacts, in particular in the understanding of the role of trust.³²

²⁶ Farea Al-Muslimi, "[How Sunni-Shia Sectarianism Is Poisoning Yemen](#)," *Carnegie Middle East Center*, December 29, 2015.

²⁷ Alessandra Cassar, Pauline Grosjean, and Sam Whitt, "Legacies of Violence: Trust and Market Development," *Journal of Economic Growth* 18, no. 3 (2013): 285-318.

²⁸ United Nations Development Programme, [UNDP SMEPS Rapid Business Survey](#) (New York: United Nations Development Programme, November 16, 2015).

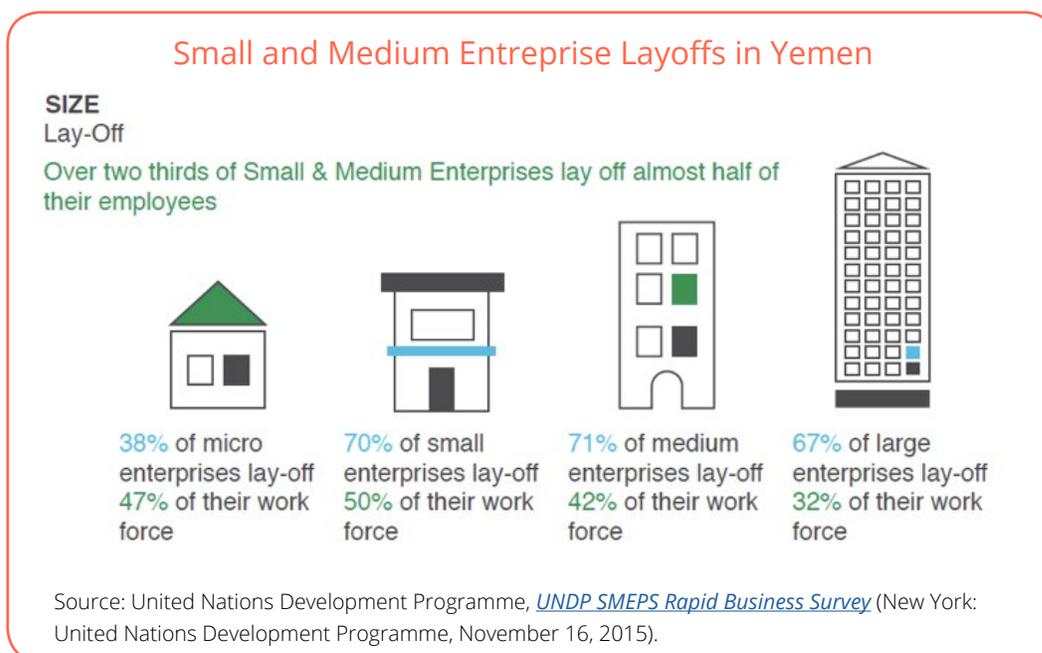
²⁹ Ibid.

³⁰ Charles Tilly, "War Making and State Making as Organized Crime," *Bringing the State Back In*, (Cambridge University Press: 1985): 169-91.

³¹ John Bellows and Edward Miguel, "[War and Local Collective Action in Sierra Leone](#)," *Journal of Public Economics* 93 (2009): 1,144-57.

³² Christopher Blattman and Edward Miguel, "[Civil War](#)," *National Bureau of Economic Research*, Working Paper No. 14,801 (2009).

Trust is fundamental to initiating trade with others and a prerequisite to successful market development and entrepreneurship. In societies like Yemen, informal economic activity and micro level businesses will be the first to restart growth, and will be the dominant mechanism of income for most families, even those with former government employment or positions within the military. As the United Nations Development Programme SMEPS Rapid Business Survey finds, the early impact of the war on small and medium-sized enterprises has been harsh, with over two-thirds of employees laid off or without work by 2016.³³ Small businesses are first affected by the decline in trust for impersonal exchange; in short, if people don't know or find some affinity with a shopkeeper they will not frequent the business. Identity defines economic choice.



Findings by Cassar, Grosjean, and Whitt point to negative and persistent effects of violence on the norms that support impersonal exchange, in particular on trust within local communities.³⁴ They find that victimization during civil war is associated with a 40 percent average decrease in trust. Former victims are both less likely and less willing to participate in local markets, especially when they do not have a personal connection with the trader with whom they are dealing. Their results also find that experiences of victimization are associated with reinforced kinship-based norms of morality and behavior, at the expense of the rule of law; negative effects are more pronounced in areas of their study where opposing groups intermix and where local allegiances are ethnically divided. Moreover, the demographics of Yemen reinforce the vulnerabilities of the local economy. As the study by the World Bank, United Nations, Islamic Development Bank, and European Union finds, youth and informality are

³³ Christopher Blattman and Edward Miguel, "[Civil War](#)," *National Bureau of Economic Research*, Working Paper No. 14,801 (2009).

³⁴ Ibid.

strongly linked: 21.9 percent of employed people are between the ages of 15 and 24 in Yemen, and 97.2 percent of them work in the informal sector.³⁵ Young people are exposed to higher levels of vulnerability than older workers.

Public Health Effects of Civil Wars

Research on the public health effects of civil wars and conflict reveals some troubling findings, especially for societies in which arms are plentiful and the youth population is predominant. In a cross-national study of World Health Organization data broken down by age, gender, and disease condition in the 1990s, researchers show that the indirect and lingering effects of civil wars nearly doubled the incident of death, disease, and disability in postconflict societies, with a disproportionate effect on women and children.³⁶ Violence lingers, and is more likely to increase in the aftermath of long civil wars. Homicide and violent crime tend to peak in the first year after the end of a war, as well as increases in suicides and transportation-related deaths. Changes in suicide and violent crime rates are magnified by the availability of small arms after many civil wars. The research finds that young men are disproportionately victims and perpetrators of this violence. In these cases, Yemen stands particularly at risk, with its widespread gun ownership among the population.³⁷ At 3 percent per year, Yemen's population growth rate is twice the regional average with a youth bulge in which nearly half the population is under the age of 15. According to 2012 World Bank data, at its current growth rate, the population is expected to increase from 22 million to 50 million by 2035.³⁸

The loss of human capital in trained medical professionals is also very difficult to replace in the short term after conflict.

Civil wars reduce available resources for expenditure on health care. A study by James C. Murdoch and Todd Sandler finds that after their cessation, civil wars typically have a negative impact on economic growth in the short run, on average for five years.³⁹ Other quantitative studies show how weak economies decrease tax revenue for health care systems, and heavy fighting in urban areas during civil wars is likely to damage existing hospitals as well as water treatment and electricity facilities.⁴⁰ This has certainly been the case in Yemen. The loss of human capital in trained medical professionals is also very difficult to replace in the short term after conflict.

³⁵ Christopher Blattman and Edward Miguel, "[Civil War](#)," *National Bureau of Economic Research*, Working Paper No. 14,801 (2009).

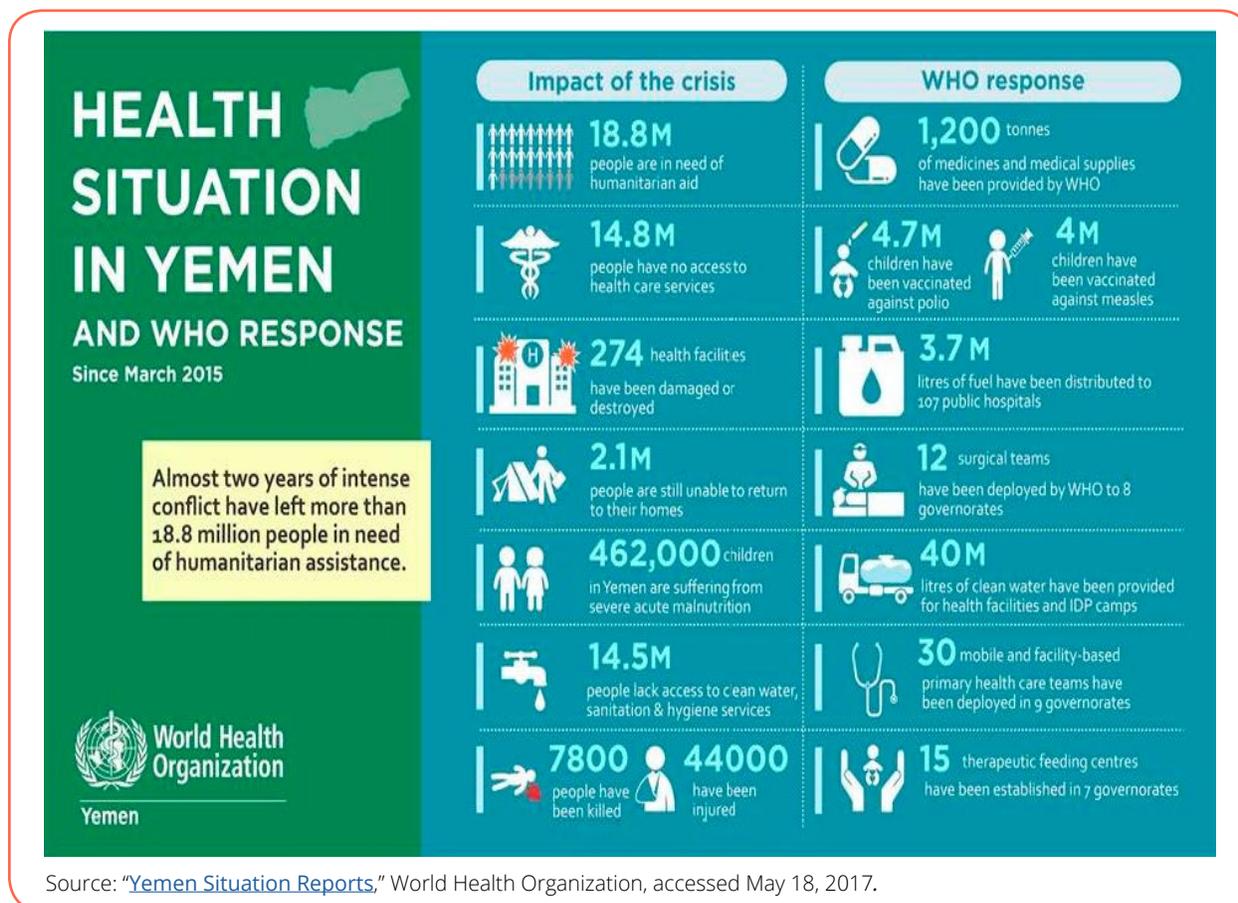
³⁶ Hazem Adam Ghobarah, Paul Huth, and Bruce Russett, "The Post-War Public Health Effects of Civil Conflict," *Social Science & Medicine* 59, no. 4 (2004): 869-84.

³⁷ Tik Root, "[Hun Control, Yemen-Style](#)," *The Atlantic*, February 12, 2013.

³⁸ "[Facing the Hard Facts in Yemen](#)," *The World Bank*, September 26, 2012.

³⁹ James C. Murdoch and Todd Sandler, "Economic Growth, Civil Wars, and Spatial Spillovers," *Journal of Conflict Resolution* 46, Issue 1 (2002): 91-110.

⁴⁰ *Ibid.*



Prolonged Cycles of Violence and Regional Economic Impact

The incidence of continued violence after civil war will put Yemen and its neighbors at risk of prolonged low-level insurgency, and the harboring of violent groups. Again, work by Collier, Hoeffler, and Rohner demonstrates that once a country stumbles into civil war there is a danger of entering a cycle of conflict,⁴¹ or what prominent political economists call a violence trap,⁴² particularly in states with very weak political institutions and lacking an inclusive national identity. As they argue, the principle legacy of a civil war is a grossly heightened risk of further civil war.

For the Gulf Arab states, the risks brewing inside Yemen are very clear: In a young, unemployed, fractionalized society with access to arms and little access to public health services or education, conflict is sure to resurface. But it might be more compelling to consider the export of the conflict effects on neighboring countries' domestic political and economic stability. The

⁴¹ Paul Collier, Anke Hoeffler, and Dominic Rohner, "Beyond Greed and Grievance: Feasibility and Civil War," *Center for the Study of African Economies*, Working Paper Series 2006-10 (2006).

⁴² Gary W. Cox, Douglass C. North, and Barry R. Weingast, "The Violence Trap: A Political-Economic Approach to the Problems of Development," May 2014.

violence trap is not contained. Countries engaged in conflict tend to increase their military spending. The spending effect is contagious to neighboring states, even if they are at peace. Civil war tends to increase military expenditure by two percentage points of GDP, according to a World Bank study by Collier.⁴³ It creates regional arms races in which governments dedicate spending to military purchases and expenses that might have otherwise gone to public health, infrastructure, or education. According to Anthony Cordesman, citing reports by the International Institute of Strategic Studies, Saudi Arabia spent \$56.9 billion on defense in 2016, only \$2 billion less than the total spent by Russia.⁴⁴ Saudi Arabia's military and security spending has decreased somewhat during the fiscal austerity measures of the last year, but remains extremely high by international standards at 8.9 percent of its GDP in 2016.

In the current period of fiscal adjustment for the GCC states, this regional effect could have important consequences on fiscal policy. As cross-regional World Bank studies demonstrate, one of the strongest influences on individual state military expenditure is the expenditure of neighboring states.⁴⁵ Even for neighboring states that are not directly involved in the conflict, this research suggests that by the end of the conflict and the return to "equilibrium" (rough estimates from studies above indicate at least after five years), the neighboring countries will have increased their military expenditure on average by 0.7 percentage points.⁴⁶ There is a spatial cascade effect of military spending, especially for bordering states and even in states not directly engaged in conflict. The cascade spending, and the arms race it can spur, could lead to militarized regions primed for conflict and hypersensitive to threat. The experiential learning happening inside the Yemen conflict suggests that Emirati and Saudi threat perception has only heightened, along with their willingness to commit scarcer resources to defense.

There is a spatial cascade effect of military spending, especially for bordering states and even in states not directly engaged in conflict.

Estimating the overall effect of a neighboring conflict on growth is difficult, but Collier's work on civil war argues statistically that having a neighbor at war reduces the annual growth rate by around 0.5 percentage points. Work by Murdoch and Sandler shows that civil war reduces not only the country's own growth rate, but regional growth.⁴⁷ More neighbors on a warring country's border only creates a multiplier effect. They find each additional nearby civil war can lower growth by approximately 30 percent of the decline the host country experiences in the long run and by 24 percent of the decline the host country experiences in the short run.⁴⁸

⁴³ Paul Collier, V.L. Elliott, Havard Hegre, Anke Hoeffler, Marta Reynal-Querol, and Nicholas Sambanis, "[Breaking the Conflict Trap: Civil War and Development Policy](#)," *World Bank Policy Research Report* (Washington, DC: World Bank and Oxford University Press, 2003).

⁴⁴ Ibid.

⁴⁵ Ibid.

⁴⁶ Ibid.

⁴⁷ James C. Murdoch and Todd Sandler, "[Civil Wars and Economic Growth: Spatial Dispersion](#)," *American Journal of Political Science* 48, no. 1 (2004): 138-51.

⁴⁸ James C. Murdoch and Todd Sandler, "[Civil Wars and Economic Growth: A Regional Comparison](#)," *Defence and Peace Economics* 13, no. 6 (2002): 451-64.

Conclusion

Rationalist explanations for war rest on the willingness of states to expend tremendous resources when their perception of threat is high, and when their estimation of the cost of war is justified. However, studies of the real costs of war, to both neighboring states and the warring parties, suggest that legacies of violence, institutional patterns of spending, and barriers to rebuilding, both in social relations and in physical infrastructure, pose considerable sustained risk. At a time of fiscal restraint, the GCC states will have to measure how best to first help in ending the conflict and then, how best to establish mechanisms to rebuild Yemen in a way that protects it and the region from recurring conflict.

