



# Global Trends 2015: a dialogue about the future with nongovernment experts\*

## NOTE ON PROCESS

**I**n undertaking this comprehensive analysis, the NIC worked actively with a range of nongovernmental institutions and experts. We began the analysis with two workshops focusing on drivers and alternative futures, as the appendix describes. Subsequently, numerous specialists from academia and the private sector contributed to every aspect of the study, from demographics to developments in science and technology, from the global arms market to implications for the United States. Many of the judgments in this paper derive from our efforts to distill the diverse views expressed at these conferences or related workshops. Major conferences cosponsored by the NIC with other govern-

ment and private centers in support of **Global Trends 2015** included:

- **Foreign Reactions to the Revolution in Military Affairs** (Georgetown University).
- **Evolution of the Nation-State** (University of Maryland).
- **Trends in Democratization** (CIA and academic experts).
- **American Economic Power** (Industry & Trade Strategies, San Francisco, CA).
- **Transformation of Defense Industries** (International Institute for Strategic Studies, London, UK).
- **Alternative Futures in War and Conflict** (Defense Intelligence Agency and Naval War College, Newport, RI, and CIA).

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- **Out of the Box and Into the Future: A Dialogue Between Warfighters and Scientists on Far Future Warfare** (Potomac Institute, Arlington, VA).
- **Future Threat Technologies Symposium** (MITRE Corporation, McLean, VA).
- **The Global Course of the Information Revolution: Technological Trends** (RAND Corporation, Santa Monica, CA).
- **The Global Course of the Information Revolution: Political, Economic, and Social Consequences** (RAND Corporation, Santa Monica, CA).
- **The Middle East: The Media, Information Technology, and the Internet** (The National Defense University, Fort McNair, Washington, DC).
- **Global Migration Trends and Their Implications for the United States** (Carnegie Endowment for International Peace, Washington, DC).
- **Alternative Global Futures: 2000-2015** (Department of State/Bureau of Intelligence and Research and CIA's Global Futures Project).

In October 2000, the draft report was discussed with outside experts, including Richard Cooper and Joseph Nye (Harvard University), Richard Haass (Brookings Institution), James Steinberg (Markle Foundation), and Jessica Mathews (Carne-

gie Endowment for International Peace). Their comments and suggestions are incorporated in the report. Daniel Yergin (Cambridge Energy Research Associates) reviewed and commented on the final draft.

## OVERVIEW

### GLOBAL TRENDS 2015: A DIALOGUE ABOUT THE FUTURE WITH NONGOVERNMENT EXPERTS

Over the past 15 months, the National Intelligence Council (NIC), in close collaboration with US Government specialists and a wide range of experts outside the government, has worked to identify major drivers and trends that will shape the world of 2015.

The key drivers identified are:

1. Demographics.
2. Natural resources and environment.
3. Science and technology.
4. The global economy and globalization.
5. National and international governance.
6. Future conflict.
7. The role of the United States.

In examining these drivers, several points should be kept in mind:

- No single driver or trend will dominate the global future in 2015.
- Each driver will have varying

impacts in different regions and countries.

- The drivers are not necessarily mutually reinforcing; in some cases, they will work at cross-purposes.

Taken together, these drivers and trends intersect to create an integrated picture of the world of 2015, about which we can make projections with varying degrees of confidence and identify some troubling uncertainties of strategic importance to the United States.

## THE METHODOLOGY

**Global Trends 2015** provides a flexible framework to discuss and debate the future. The methodology is useful for our purposes, although admittedly inexact for the social scientist. Our purpose is to rise above short-term, tactical considerations and provide a longer-term, strategic perspective. Judgments about demographic and natural resource trends are based primarily on informed extrapolation of existing trends. In contrast, many judgments about science and technology, economic growth, globalization, governance, and the nature of conflict represent a distillation of views of experts inside and outside the United States Government. The former are projections about natural phenomena, about which we can have fairly high confidence; the latter are more speculative because they are contin-

gent upon the decisions that societies and governments will make.

The drivers we emphasize will have staying power. Some of the trends will persist; others will be less enduring and may change course over the time frame we consider. The major contribution of the National Intelligence Council (NIC), assisted by experts from the Intelligence Community, has been to harness US Government and nongovernmental specialists to identify drivers, to determine which ones matter most, to highlight key uncertainties, and to integrate analysis of these trends into a national security context. The result identifies issues for more rigorous analysis and quantification.

## REVISITING GLOBAL TRENDS 2010: HOW OUR ASSESSMENTS HAVE CHANGED

Over the past four years, we have tested the judgments made in the predecessor, **Global Trends 2010**, published in 1997. **Global Trends 2010** was the centerpiece of numerous briefings, conferences, and public addresses. Various audiences were energetic in challenging, modifying or confirming our judgments. The lively debate that ensued has expanded our treatment of drivers, altered some projections we made in 1997, and matured our thinking overall—which was the essential purpose of this exercise.

Global Trends 2015 amplifies several drivers identified previously, and links them more closely to the trends we now project over the next 15 years. Some of the key changes include:

- Globalization has emerged as a more powerful driver. GT 2015 sees international economic dynamics –including developments in the World Trade Organization– and the spread of information technology as having much greater influence than portrayed in GT 2010.
- GT 2015 assigns more significance to the importance of governance, notably the ability of states to deal with nonstate actors, both good and bad. GT 2015 pays attention both to the opportunities for cooperation between governments and private organizations and to the growing reach of international criminal and terrorist networks.
- GT 2015 includes a more careful examination of the likely role of science and technology as a driver of global developments. In addition to the growing significance of information technology, biotechnology and other technologies carry much more weight in the present assessment.
- The effect of the United States as the preponderant power is introduced in GT 2015. The US role as a global driver has emerged more clearly over the past

four years, particularly as many countries debate the impact of “US hegemony” on their domestic and foreign policies.

- GT 2015 provides a more complete discussion of natural resources including food, water, energy, and the environment. It discusses, for example, the over three billion individuals who will be living in water-stressed regions from North China to Africa and the implications for conflict. The linkage between energy availability, price, and distribution is more thoroughly explored.
- GT 2015 emphasizes interactions among the drivers. For example, we discuss the relationship between S&T, military developments, and the potential for conflict.
- In the regional sections, GT 2015 makes projections about the impact of the spread of information, the growing power of China, and the declining power of Russia.

Events and trends in key states and regions over the last four years have led us to revise some projections substantially in GT 2015.

- GT 2010 did not foresee the global financial crisis of 1997-98; GT 2015 takes account of obstacles to economic development in East Asia, though the overall projections remain fairly optimistic.

- As described in GT 2010, there is still substantial uncertainty regarding whether China can cope with internal political and economic trends. GT 2015 highlights even greater uncertainty over the direction of Beijing's regional policies.
- Many of the global trends continue to remain negative for the societies and regimes in the Middle East. GT 2015 projects at best a "cold peace" between Israel and its adversaries and sees prospects for potentially destabilizing social changes due to adverse effects of globalization and insufficient attention to reform. The spike in oil revenues reinforces the assessment of GT 2010 about the rising demand for OPEC oil; these revenues are not likely to be directed primarily at core human resources and social needs.
- Projections for Sub-Saharan Africa are even more dire than in GT 2010 because of the spread of AIDS and the continuing prospects for humanitarian crises, political instability, and military conflicts.

## THE DRIVERS AND TRENDS

### DEMOGRAPHICS

World population in 2015 will be 7.2 billion, up from 6.1 billion in

the year 2000, and in most countries, people will live longer. Ninety-five percent of the increase will be in developing countries, nearly all in rapidly expanding urban areas. Where political systems are brittle, the combination of population growth and urbanization will foster instability. Increasing lifespans will have significantly divergent impacts.

- In the advanced economies—and a growing number of emerging market countries—declining birthrates and aging will combine to increase health care and pension costs while reducing the relative size of the working population, straining the social contract, and leaving significant shortfalls in the size and capacity of the work force.
- In some developing countries, these same trends will combine to expand the size of the working population and reduce the youth bulge—in increasing the potential for economic growth and political stability.

### NATURAL RESOURCES AND ENVIRONMENT

Overall food production will be adequate to feed the world's growing population, but poor infrastructure and distribution, political instability, and chronic poverty will lead to malnourishment in parts of Sub-Saharan Africa. The potential for famine

will persist in countries with repressive government policies or internal conflicts. Despite a 50 percent increase in global energy demand, energy resources will be sufficient to meet demand; the latest estimates suggest that 80 percent of the world's available oil and 95 percent of its gas remain underground.

- Although the Persian Gulf region will remain the world's largest single source of oil, the global energy market is likely to encompass two relatively distinct patterns of regional distribution: one serving consumers (including the United States) from Atlantic Basin reserves; and the other meeting the needs of primarily Asian customers (increasingly China and India) from Persian Gulf supplies and, to a lesser extent, the Caspian region and Central Asia.
- In contrast to food and energy, water scarcities and allocation will pose significant challenges to governments in the Middle East, Sub-Saharan Africa, South Asia, and northern China. Regional tensions over water will be heightened by 2015.

## SCIENCE AND TECHNOLOGY

Fifteen years ago, few predicted the profound impact of the revolution in information technology.

Looking ahead another 15 years, the world will encounter more quantum leaps in information technology (IT) and in other areas of science and technology. The continuing diffusion of information technology and new applications of biotechnology will be at the crest of the wave. IT will be the major building block for international commerce and for empowering nonstate actors. Most experts agree that the IT revolution represents the most significant global transformation since the Industrial Revolution beginning in the mid-eighteenth century.

- The integration –or fusion– of continuing revolutions in information technology, biotechnology, materials science, and nanotechnology will generate a dramatic increase in investment in technology, which will further stimulate innovation within the more advanced countries.
- Older technologies will continue lateral “sidewise development” into new markets and applications through 2015, benefiting US allies and adversaries around the world who are interested in acquiring early generation ballistic missile and weapons of mass destruction (WMD) technologies.
- Biotechnology will drive medical breakthroughs that will enable the world's wealthiest people to improve their health

and increase their longevity dramatically. At the same time, genetically modified crops will offer the potential to improve nutrition among the world's one billion malnourished people.

- Breakthroughs in materials technology will generate widely available products that are multi-functional, environmentally safe, longer lasting, and easily adapted to particular consumer requirements.
- Disaffected states, terrorists, proliferators, narcotraffickers, and organized criminals will take advantage of the new high-speed information environment and other advances in technology to integrate their illegal activities and compound their threat to stability and security around the world.

## THE GLOBAL ECONOMY AND GLOBALIZATION

The networked global economy will be driven by rapid and largely unrestricted flows of information, ideas, cultural values, capital, goods and services, and people: that is, globalization. This globalized economy will be a net contributor to increased political stability in the world in 2015, although its reach and benefits will not be universal. In contrast to the Industrial Revolution, the process of globali-

zation is more compressed. Its evolution will be rocky, marked by chronic financial volatility and a widening economic divide.

- The global economy, overall, will return to the high levels of growth reached in the 1960s and early 1970s. Economic growth will be driven by political pressures for higher living standards, improved economic policies, rising foreign trade and investment, the diffusion of information technologies, and an increasingly dynamic private sector. Potential brakes on the global economy—such as a sustained financial crisis or prolonged disruption of energy supplies—could undo this optimistic projection.
- Regions, countries, and groups feeling left behind will face deepening economic stagnation, political instability, and cultural alienation. They will foster political, ethnic, ideological, and religious extremism, along with the violence that often accompanies it. They will force the United States and other developed countries to remain focused on “old-world” challenges while concentrating on the implications of “new-world” technologies at the same time.

## NATIONAL AND INTERNATIONAL GOVERNANCE

States will continue to be the dominant players on the world stage, but governments will have less and less control over flows of information, technology, diseases, migrants, arms, and financial transactions, whether licit or illicit, across their borders. Nonstate actors ranging from business firms to nonprofit organizations will play increasingly larger roles in both national and international affairs. The quality of governance, both nationally and internationally, will substantially determine how well states and societies cope with these global forces.

- States with competent governance, including the United States, will adapt government structures to a dramatically changed global environment—making them better able to engage with a more interconnected world. The responsibilities of once “semiautonomous” government agencies increasingly will intersect because of the transnational nature of national security priorities and because of the clear requirement for interdisciplinary policy responses. Shaping the complex, fast-moving world of 2015 will require reshaping traditional government structures.
- Effective governance will increasingly be determined by

the ability and agility to form partnerships to exploit increased information flows, new technologies, migration, and the influence of nonstate actors. Most but not all countries that succeed will be representative democracies.

- States with ineffective and incompetent governance not only will fail to benefit from globalization, but in some instances will spawn conflicts at home and abroad, ensuring an even wider gap between regional winners and losers than exists today.

Globalization will increase the transparency of government decision-making, complicating the ability of authoritarian regimes to maintain control, but also complicating the traditional deliberative processes of democracies. Increasing migration will create influential diasporas, affecting policies, politics and even national identity in many countries. Globalization also will create increasing demands for international cooperation on transnational issues, but the response of both states and international organizations will fall short in 2015.

## FUTURE CONFLICT

The United States will maintain a strong technological edge in IT-driven “battlefield awareness” and in precision-guided weaponry



in 2015. The United States will face three types of threats:

- Asymmetric threats in which state and nonstate adversaries avoid direct engagements with the US military but devise strategies, tactics, and weapons –some improved by “side-wise” technology– to minimize US strengths and exploit perceived weaknesses;
- Strategic WMD threats, including nuclear missile threats, in which (barring significant political or economic changes) Russia, China, most likely North Korea, probably Iran, and possibly Iraq have the capability to strike the United States, and the potential for unconventional delivery of WMD by both states or nonstate actors also will grow; and
- Regional military threats in which a few countries maintain large military forces with a mix of Cold War and post-Cold War concepts and technologies.

The risk of war among developed countries will be low. The international community will continue, however, to face conflicts around the world, ranging from relatively frequent small-scale internal upheavals to less frequent regional interstate wars. The potential for conflict will arise from rivalries in Asia, ranging from India-Pakistan to China-Taiwan, as well as among the

antagonists in the Middle East. Their potential lethality will grow, driven by the availability of WMD, longer-range missile delivery systems and other technologies.

Internal conflicts stemming from religious, ethnic, economic or political disputes will remain at current levels or even increase in number. The United Nations and regional organizations will be called upon to manage such conflicts because major states –stressed by domestic concerns, perceived risk of failure, lack of political will, or tight resources– will minimize their direct involvement.

Export control regimes and sanctions will be less effective because of the diffusion of technology, porous borders, defense industry consolidations, and reliance upon foreign markets to maintain profitability. Arms and weapons technology transfers will be more difficult to control.

- Prospects will grow that more sophisticated weaponry, including weapons of mass destruction –indigenously produced or externally acquired– will get into the hands of state and nonstate belligerents, some hostile to the United States. The likelihood will increase over this period that WMD will be used either against the United States or its forces, facilities, and interests overseas.

## ROLE OF THE UNITED STATES

The United States will continue to be a major force in the world community. US global economic, technological, military, and diplomatic influence will be unparalleled among nations as well as regional and international organizations in 2015. This power not only will ensure America's preeminence, but also will cast the United States as a key driver of the international system.

The United States will continue to be identified throughout the world as the leading proponent and beneficiary of globalization. US economic actions, even when pursued for such domestic goals as adjusting interest rates, will have a major global impact because of the tighter integration of global markets by 2015.

- The United States will remain in the vanguard of the technological revolution from information to biotechnology and beyond.
- Both allies and adversaries will factor continued US military pre-eminence in their calculations of national security interests and ambitions.
- Some states –adversaries and allies– will try at times to check what they see as American “hegemony”. Although this posture will not translate into strategic, broad-based and enduring anti-US coalitions, it will lead to tactical alignments

on specific policies and demands for a greater role in international political and economic institutions.

Diplomacy will be more complicated. Washington will have greater difficulty harnessing its power to achieve specific foreign policy goals: the US Government will exercise a smaller and less powerful part of the overall economic and cultural influence of the United States abroad.

- In the absence of a clear and overriding national security threat, the United States will have difficulty drawing on its economic prowess to advance its foreign policy agenda. The top priority of the American private sector, which will be central to maintaining the US economic and technological lead, will be financial profitability, not foreign policy objectives.
- The United States also will have greater difficulty building coalitions to support its policy goals, although the international community will often turn to Washington, even if reluctantly, to lead multilateral efforts in real and potential conflicts.
- There will be increasing numbers of important actors on the world stage to challenge and check –as well as to reinforce– US leadership: countries such as China, Russia, India, Mexico, and Brazil; regional organizations such as the

European Union; and a vast array of increasingly powerful multinational corporations and nonprofit organizations with their own interests to defend in the world.

### KEY UNCERTAINTIES: TECHNOLOGY WILL ALTER OUTCOMES

Examining the interaction of these drivers and trends points to some major uncertainties that will only be clarified as events occur and leaders make policy decisions that cannot be foreseen today. We cite eight transnational and regional issues for which the future, according to our trends analysis, is too tough to call with any confidence or precision.

- **These are high-stakes, national security issues that will require continuous analysis and, in the view of our conferees, periodic policy review in the years ahead.**

### SCIENCE AND TECHNOLOGY

We know that the possibility is greater than ever that the revolution in science and technology will improve the quality of life. What we know about this revolution is exciting. Advances in science and technology will generate dramatic breakthroughs in agriculture and health and in leap-frog applica-

tions, such as universal wireless cellular communications, which already are networking developing countries that never had land-lines. What we do not know about the S&T revolution, however, is staggering. We do not know to what extent technology will benefit, or further disadvantage, disaffected national populations, alienated ethnic and religious groups, or the less developed countries. We do not know to what degree lateral or "side-wise" technology will increase the threat from low technology countries and groups. One certainty is that progression will not be linear. Another is that as future technologies emerge, people will lack full awareness of their wider economic, environmental, cultural, legal, and moral impact—or the continuing potential for research and development.

Advances in science and technology will pose national security challenges of uncertain character and scale.

- Increasing reliance on computer networks is making critical US infrastructures more attractive as targets. Computer network operations today offer new options for attacking the United States within its traditional continental sanctuary—potentially anonymously and with selective effects. Nevertheless, we do not know how quickly or effectively such adversaries as terrorists or disaffected states will develop the tradecraft to

use cyber warfare tools and technology, or, in fact, whether cyber warfare will ever evolve into a decisive combat arm.

- Rapid advances and diffusion of biotechnology, nanotechnology, and the materials sciences, moreover, will add to the capabilities of our adversaries to engage in biological warfare or bio-terrorism.

## ASYMMETRIC WARFARE

As noted earlier, most adversaries will recognize the information advantage and military superiority of the United States in 2015. Rather than acquiesce to any potential US military domination, they will try to circumvent or minimize US strengths and exploit perceived weaknesses. IT-driven globalization will significantly increase interaction among terrorists, narcotraffickers, weapons proliferators, and organized criminals, who in a networked world will have greater access to information, to technology, to finance, to sophisticated deception-and-denial techniques and to each other. Such asymmetric approaches—whether undertaken by states or nonstate actors—will become the dominant characteristic of most threats to the US homeland. They will be a defining challenge for US strategy, operations, and force development, and they will require that strategy to maintain focus on traditional, low-technology threats as

well as the capacity of potential adversaries to harness elements of proliferating advanced technologies. At the same time, we do not know the extent to which adversaries, state and nonstate, might be influenced or deterred by other geopolitical, economic, technological, or diplomatic factors in 2015.

## THE GLOBAL ECONOMY

Although the outlook for the global economy appears strong, achieving broad and sustained high levels of global growth will be contingent on avoiding several potential brakes to growth. These include:

### THE US ECONOMY SUFFERS A SUSTAINED DOWNTURN

Given its large trade deficit and low domestic savings, the US economy—the most important driver of recent global growth—is vulnerable to a loss of international confidence in its growth prospects that could lead to a sharp downturn, which, if long lasting, would have deleterious economic and policy consequences for the rest of the world.

### EUROPE AND JAPAN FAIL TO MANAGE THEIR DEMOGRAPHIC CHALLENGES

European and Japanese populations are aging rapidly, requiring more than 110 million new workers by 2015 to maintain current depen-

dency ratios between the working population and retirees. Conflicts over social services or immigration policies in major European states could dampen economic growth.

#### CHINA AND/OR INDIA FAIL TO SUSTAIN HIGH GROWTH

China's ambitious goals for reforming its economy will be difficult to achieve: restructuring state-owned enterprises, cleaning up and transforming the banking system, and cutting the government's employment rolls in half. Growth would slow if these reforms go off-track. Failure by India to implement reforms would prevent it from achieving sustained growth.

#### EMERGING MARKET COUNTRIES FAIL TO REFORM THEIR FINANCIAL INSTITUTIONS

Many emerging market countries have not yet undertaken the financial reforms needed to help them survive the next economic crisis. Absent such reform, a series of future economic crises in emerging market countries probably will dry up the capital flows crucial for high rates of economic growth.

#### GLOBAL ENERGY SUPPLIES SUFFER A MAJOR DISRUPTION

Turbulence in global energy supplies would have a devastating

effect. Such a result could be driven by conflict among key energy-producing states, sustained internal instability in two or more major energy-producing states, or major terrorist actions.

#### THE MIDDLE EAST

Global trends from demography and natural resources to globalization and governance appear generally negative for the Middle East. Most regimes are change-resistant. Many are buoyed by continuing energy revenues and will not be inclined to make the necessary reforms, including in basic education, to change this unfavorable picture.

- Linear trend analysis shows little positive change in the region, raising the prospects for increased demographic pressures, social unrest, religious and ideological extremism, and terrorism directed both at the regimes and at their Western supporters.
- Nonlinear developments –such as the sudden rise of a Web-connected opposition, a sharp and sustained economic downturn, or, conversely, the emergence of enlightened leaders committed to good governance– might change outcomes in individual countries. Political changes in Iran in the late 1990s are an example of such nonlinear development.

## CHINA

Estimates of developments in China over the next 15 years are fraught with unknowables. Working against China's aspirations to sustain economic growth while preserving its political system is an array of political, social, and economic pressures that will increasingly challenge the regime's legitimacy, and perhaps its survival.

- The sweeping structural changes required by China's entry into the World Trade Organization (WTO) and the broader demands of economic globalization and the information revolution will generate significantly new levels and types of social and economic disruption that will only add to an already wide range of domestic and international problems.

Nevertheless, China need not be overwhelmed by these problems. China has proven politically resilient, economically dynamic, and increasingly assertive in positioning itself for a leadership role in East Asia. Its long-term military program in particular suggests that Beijing wants to have the capability to achieve its territorial objectives, outmatch its neighbors, and constrain US power in the region.

- We do not rule out the introduction of enough political reform by 2015 to allow China to adapt to domestic pressure for

change and to continue to grow economically.

Two conditions, in the view of many specialists, would lead to a major security challenge for the United States and its allies in the region: a weak, disintegrating China, or an assertive China willing to use its growing economic wealth and military capabilities to pursue its strategic advantage in the region. These opposite extremes bound a more commonly held view among experts that China will continue to see peace as essential to its economic growth and internal stability.

## RUSSIA

Between now and 2015, Moscow will be challenged even more than today to adjust its expectations for world leadership to its dramatically reduced resources. Whether the country can make the transition in adjusting ends to means remains an open and critical question, according to most experts, as does the question of the character and quality of Russian governance and economic policies. The most likely outcome is a Russia that remains internally weak and institutionally linked to the international system primarily through its permanent seat on the UN Security Council. In this view, whether Russia can adjust to this diminished status in a manner that preserves rather than upsets regional stability is also uncertain. The stakes

for both Europe and the United States will be high, although neither will have the ability to determine the outcome for Russia in 2015. Russian governance will be the critical factor.

## JAPAN

The first uncertainty about Japan is whether it will carry out the structural reforms needed to resume robust economic growth and to slow its decline relative to the rest of East Asia, particularly China. The second uncertainty is whether Japan will alter its security policy to allow Tokyo to maintain a stronger military and more reciprocal relationship with the United States. Experts agree that Japanese governance will be the key driver in determining the outcomes.

## INDIA

Global trends conflict significantly in India. The size of its population –1.2 billion by 2015– and its technologically driven economic growth virtually dictate that India will be a rising regional power. The unevenness of its internal economic growth, with a growing gap between rich and poor, and serious questions about the fractious nature of its politics, all cast doubt on how powerful India will be by 2015. Whatever its degree of power, India's rising ambition will further strain its relations with China, as well as complicate its ties with Russia, Japan, and

the West –and continue its nuclear standoff with Pakistan.

## KEY CHALLENGES TO GOVERNANCE: PEOPLE WILL DECIDE

**Global Trends 2015** identifies governance as a major driver for the future and assumes that all trends we cite will be influenced, for good or bad, by decisions of people. The inclusion of the United States as a driver –both the US Government as well as US for-profit and nonprofit organizations– is based on the general assumption that the actions of nonstate actors as well as governments will shape global outcomes in the years ahead.

An integrated trend analysis suggests at least four related conclusions:

## NATIONAL PRIORITIES WILL MATTER

- To prosper in the global economy of 2015, governments will have to invest more in technology, in public education, and in broader participation in government to include increasingly influential nonstate actors. The extent to which governments around the world are doing these things today gives some indication of where they will be in 2015.

## US RESPONSIBILITIES WILL COVER THE WORLD, OLD AND NEW

- The United States and other developed countries will be challenged in 2015 to lead the fast-paced technological revolution while, at the same time, maintaining military, diplomatic, and intelligence capabilities to deal with traditional problems and threats from low-technology countries and groups. The United States, as a global power, will have little choice but to engage leading actors and confront problems on both sides of the widening economic and digital divides in the world of 2015, when globalization's benefits will be far from global.

## US FOREIGN PRIORITIES WILL BE MORE TRANSNATIONAL

- International or multilateral arrangements increasingly will be called upon in 2015 to deal with growing transnational problems from economic and financial volatility; to legal and illegal migration; to competition for scarce natural resources such as water; to humanitarian, refugee, and environmental crises; to terrorism, narcotrafficking, and weapons proliferation; and to both regional conflicts and cyber th-

reats. And when international cooperation –or international governance– comes up short, the United States and other developed countries will have to broker solutions among a wide array of international players –including governments at all levels, multinational corporations, and nonprofit organizations.

## NATIONAL GOVERNMENTS WILL BE MORE TRANSPARENT

- To deal with a transnational agenda and an interconnected world in 2015, governments will have to develop greater communication and collaboration between national security and domestic policy agencies. Interagency cooperation will be essential to understanding transnational threats and to developing interdisciplinary strategies to counter them. Consequence management of a biological warfare (BW) attack, for example, would require close coordination among a host of US Government agencies, foreign governments, US state and municipal governments, the military, the medical community, and the media.

## MAJOR REGIONS

Latin America: Average Annual Population Growth: 1998-2015



## LATIN AMERICA

**Regional Trends.** By 2015, many Latin American countries will enjoy greater prosperity as a result of expanding hemispheric and global economic links, the information revolution, and lowered birthrates. Progress in building democratic institutions will reinforce reform and promote prosperity by enhancing investor confidence. Brazil and Mexico will be increasingly confident and capable actors that will seek a greater voice in hemispheric affairs. But the region will remain vulnerable to financial crises because of its dependence on external finance and the continuing role of single commodities in most economies. The weakest countries in the region, especially in the Andean region, will fall further behind. Reversals of democracy in some countries will be spurred by a failure to deal effectively with popular demands, crime, corruption, drug trafficking, and insurgencies.

Latin America—especially Venezuela, Mexico, and Brazil—will become an increasingly important oil producer by 2015 and an important component of the emerging Atlantic Basin energy system. Its proven oil reserves are second only to those located in the Middle East.

**Globalization Gains and Limits.** Continued trade and investment liberalization and the expansion of free trade agreements within and outside of Latin America will be a significant catalyst of growth. Re-

gional trade integration through organizations such as MERCOSUR and the likely conclusion of a Free Trade Area of the Americas will both boost employment and provide the political context for governments to sustain economic reforms even against opposing entrenched interest groups.

Latin America's Internet market is poised to grow exponentially, stimulating commerce, foreign investment, new jobs, and corporate efficiency. Although Internet business opportunities will promote the growth of firms throughout the region, Brazil, Argentina, and Mexico are likely to be the biggest beneficiaries.

**Shifting Demographics.** Latin America's demographics will shift markedly—to the distinct advantage of some countries—helping to ease social strains and underpin higher economic growth. During the next 15 years, most countries will experience a substantial slowdown in the number of new jobseekers, which will help reduce unemployment and boost wages. But not all countries will enjoy these shifts; Bolivia, Ecuador, Guatemala, Honduras, Nicaragua, and Paraguay will still face rapidly increasing populations in need of work.

**Democratization Progress and Setbacks.** By 2015, key countries will have made some headway in building sturdier and more capable democratic institutions. Democratic

institutions in Mexico, Argentina, Chile, and Brazil appear poised for continued incremental consolidation. In other countries, crime, public corruption, the spread of poverty, and the failure of governments to redress worsening income inequality will provide fertile ground for populist and authoritarian politicians. Soaring crime rates will contribute to vigilantism and extrajudicial killings by the police. Burgeoning criminal activity—including money laundering, alien smuggling, and narcotrafficking—could overwhelm some Caribbean countries. Democratization in Cuba will depend upon how and when Fidel Castro passes from the scene.

**Growing Regional Gaps.** By 2015, the gap between the more prosperous and democratic states of Latin America and the others will widen. Countries that are unable or unwilling to undertake reforms will experience slow growth at best. Several will struggle intermittently with serious domestic political and economic problems such as crime, corruption, and dependence on single commodities such as oil. Countries with high crime and widespread corruption will lack the political consensus to advance economic reforms and will face lower growth prospects. Although poverty and inequality will remain endemic throughout the region, high-fertility countries will face higher rates of poverty and unemployment.

The Andean countries—Co-

lombia, Venezuela, Ecuador, and Peru—are headed for greater challenges of differing nature and origin. Competition for scarce resources, demographic pressures, and a lack of employment opportunities probably will cause workers' anger to mount and fuel more aggressive tactics in the future. Fatigue with economic hardship and deep popular cynicism about political institutions, particularly traditional parties, could lead to instability in Venezuela, Peru and Ecuador. Resolution of the long-running guerrilla war is key to Colombia's future prospects. The Cuban economy under a Castro Government will fall further behind most of the Latin American countries that embrace globalization and adopt free market practices.

**Rising Migration.** Pressures for legal and illegal migration to the United States and regionally will rise during the next 15 years. Demographic factors, political instability, personal insecurity, poverty, wage differentials, the growth of alien-smuggling networks, and wider family ties will propel more Latin American workers to enter the United States. El Salvador, Guatemala, Honduras, and Nicaragua will become even greater sources of illegal migrants. In Mexico, declining population growth and strong economic prospects will gradually diminish pressures to seek work in the United States, but disparities in living standards, US demand for labor, and family ties will remain strong pull fac-

tors. Significant political instability during a transition process in Cuba could lead to mass migration.

- The growth of Central American and Mexican alien-smuggling networks will exacerbate problems along the US border.

Illegal migration within the region will become a more contentious issue between Latin American governments. Argentina and Venezuela already have millions of undocumented workers from neighboring countries, and resentment of illegal workers could increase. Although most Haitian migrants will head for the United States, Haiti's Caribbean neighbors will also experience further strains.

## APPENDIX

### FOUR ALTERNATIVE GLOBAL FUTURES

In September-October 1999, the NIC initiated work on **Global Trends 2015** by cosponsoring with Department of State/INR and CIA's Global Futures Project two unclassified workshops on **Alternative Global Futures: 2000-2015**. The workshops brought together several dozen government and nongovernment specialists in a wide range of fields.

The first workshop identified major factors and events that would drive global change through 2015. It focused on demography, natural resources, science and technology,

the global economy, governance, social/cultural identities, and conflict and identified main trends and regional variations. These analyses became the basis for subsequent elaboration in **Global Trends 2015**.

The second workshop developed four alternative global futures in which these drivers would interact in different ways through 2015. Each scenario was intended to construct a plausible, policy-relevant story of how this future might evolve: highlighting key uncertainties, discontinuities, and unlikely or "wild card" events, and identifying important policy and intelligence challenges.

### SCENARIO ONE: INCLUSIVE GLOBALIZATION:

A virtuous circle develops among technology, economic growth, demographic factors, and effective governance, which enables a majority of the world's people to benefit from globalization. **Technological** development and diffusion—in some cases triggered by severe environmental or health crises—are utilized to grapple effectively with some problems of the developing world. Robust global **economic growth**—spurred by a strong policy consensus on economic liberalization—diffuses wealth widely and mitigates many demographic and resource problems. **Governance** is effective at both the national and international levels. In many coun-

tries, the state's role shrinks, as its functions are privatized or performed by public-private partnerships, while global cooperation intensifies on many issues through a variety of international arrangements. **Conflict** is minimal within and among states benefiting from globalization. A minority of the world's people—in Sub-Saharan Africa, the Middle East, Central and South Asia, and the Andean region—do not benefit from these positive changes, and internal conflicts persist in and around those countries left behind.

#### SCENARIO TWO: PERNICIOUS GLOBALIZATION

Global elites thrive, but the majority of the world's population fails to benefit from globalization. **Population growth and resource scarcities** place heavy burdens on many developing countries, and migration becomes a major source of interstate tension. **Technologies** not only fail to address the problems of developing countries but also are exploited by negative and illicit networks and incorporated into destabilizing weapons. The global **economy** splits into three: growth continues in developed countries; many developing countries experience low or negative per capita growth, resulting in a growing gap with the developed world; and the illicit economy grows dramatically. **Governance** and political leadership are weak at both the national and international levels.

Internal **conflicts** increase, fueled by frustrated expectations, inequities, and heightened communal tensions; WMD proliferate and are used in at least one internal conflict.

#### SCENARIO THREE: REGIONAL COMPETITION

Regional identities sharpen in Europe, Asia, and the Americas, driven by growing political resistance in Europe and East Asia to US global preponderance and US-driven globalization and each region's increasing preoccupation with its own economic and political priorities. There is an uneven diffusion of **technologies**, reflecting differing regional concepts of intellectual property and attitudes towards biotechnology. Regional **economic** integration in trade and finance increases, resulting in both fairly high levels of economic growth and rising regional competition. Both the state and institutions of regional **governance** thrive in major developed and emerging market countries, as governments recognize the need to resolve pressing regional problems and shift responsibilities from global to regional institutions. Given the preoccupation of the three major regions with their own concerns, countries outside these regions in Sub-Saharan Africa, the Middle East, and Central and South Asia have few places to turn for resources or political support. **Military conflict** among and within the three major regions

does not materialize, but internal conflicts increase in and around other countries left behind.

#### SCENARIO FOUR: POST-POLAR WORLD

US domestic preoccupation increases as the US **economy** slows, then stagnates. Economic and political tensions with Europe grow, the US-European alliance deteriorates as the United States withdraws its troops, and Europe turns inward, relying on its own regional institutions. At the same time, national **governance** crises create instability in Latin America, particularly in Colombia, Cuba, Mexico, and Panama, forcing the United States to concentrate on the region. Indonesia also faces internal crisis and risks disintegration, prompting China to provide the bulk of an ad hoc peacekeeping force. Otherwise, Asia is generally prosperous and stable, permitting the United States to focus elsewhere. Korea's normalization and de facto unification proceed, China and Japan provide the bulk of external financial support for Korean unification, and the United States begins withdrawing its troops from Korea and Japan. Over time, these geostrategic shifts ignite longstanding national rivalries among the Asian powers, triggering increased military preparations and hitherto dormant or covert WMD programs. Regional and global institutions prove irrelevant to the evolving con-

flikt situation in Asia, as China issues an ultimatum to Japan to dismantle its nuclear program and Japan—invoking its bilateral treaty with the US—calls for US reengagement in Asia under adverse circumstances at the brink of a major war. Given the priorities of Asia, the Americas, and Europe, countries outside these regions are marginalized, with virtually no sources of political or financial support.

#### GENERALIZATIONS ACROSS THE SCENARIOS

The four scenarios can be grouped in two pairs: the first pair contrasting the “positive” and “negative” effects of globalization; the second pair contrasting intensely competitive but not conflictual regionalism and the descent into regional military conflict.

- In all but the first scenario, globalization does not create widespread global cooperation. Rather, in the second scenario, globalization's negative effects promote extensive dislocation and conflict, while in the third and fourth, they spur regionalism.
- In all four scenarios, countries negatively affected by population growth, resource scarcities and bad governance, fail to benefit from globalization, are prone to internal conflicts,

and risk state failure.

- In all four scenarios, the effectiveness of national, regional, and international governance and at least moderate but steady economic growth are crucial.
- In all four scenarios, US global influence wanes.

Matrix: Drivers in the Global Futures Scenarios: 2000-2015 (JPEG, 351K -- fixed size viewing only)

Matrix: Drivers in the Global Futures Scenarios: 2000-2015 (PDF, 9K -- scalable viewing and printing)

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