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Energy as a Component of International Security

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Outline of the Presentation

1. Security: Definitions
2. Energy Security Concepts
3. The Role of Institutions and States in achieving Energy Security
4. Energy Security and Climate Change
5. Conclusions

- *“If I had only 60 minutes to save the world, I would spend 59 minutes defining the problem, and one minute in solving it.”*
- Albert Einstein, Physicist and Philosopher

1. Definitions of Security

Definition of Security

“Security, in an objective sense, measures the absence of threats to acquired values, in a subjective sense, the absence of fear that such values will be attacked”

Arnold Wolfers, “National Security as an ambiguous symbol”, 1962

“Structural security”

“One cannot talk about lasting stability and security in places where poverty, unemployment and inequality in the distribution of income are rampant.”

- PM R. Erdogan, Turkey, Munich SF, 2008

Whose security?

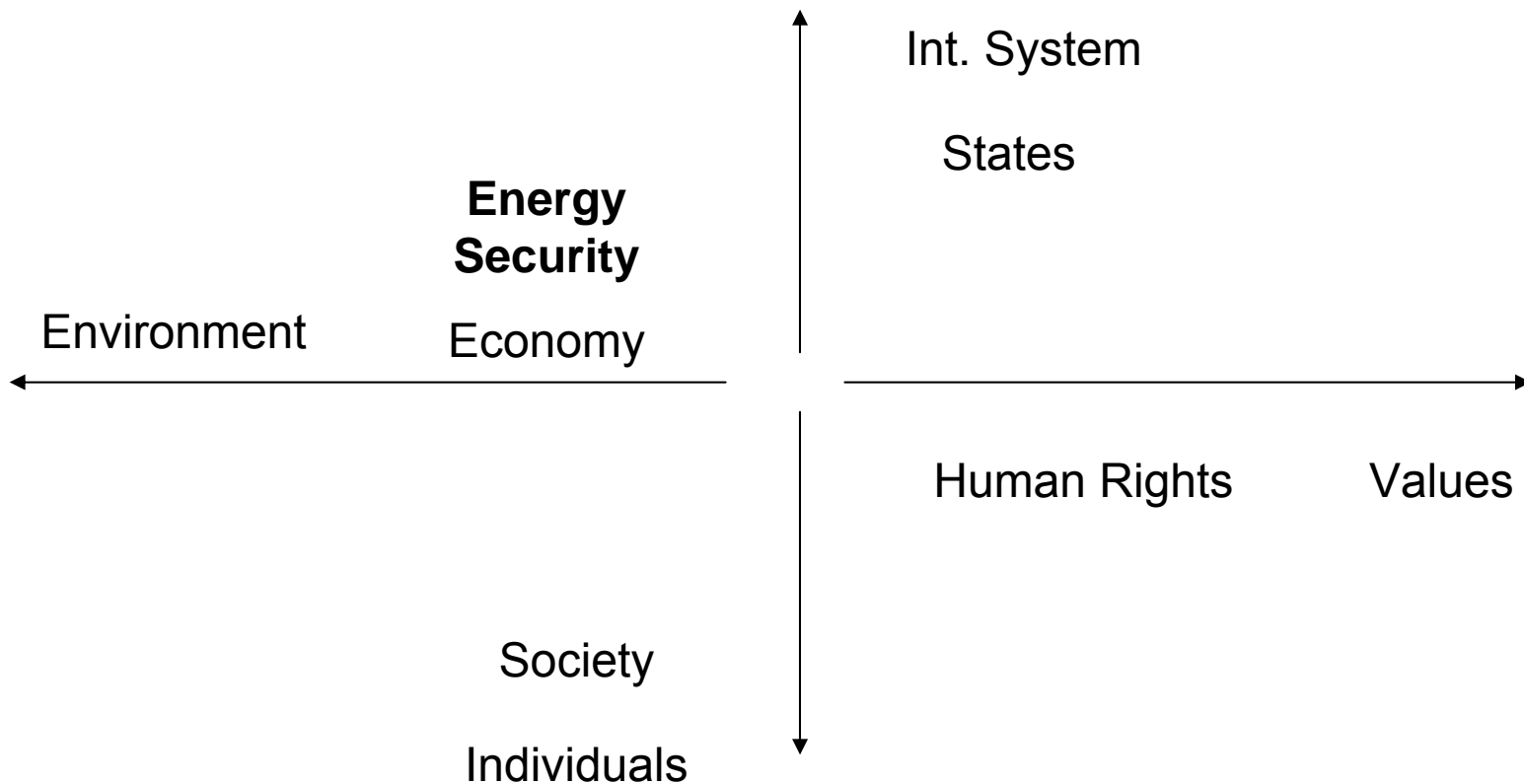
Referent objects

- "National Security" - State / Nation
- "Regime Security"
- "Societal Security"
 - Non-State collectives (national, ethnic, religious..)
- "Human Security" - Individuals

Evolution of a Concept

- 1983: Richard Ullman: “Redefining Security”
 - population growth and resource scarcity
- 1989: Jessica Tuchman Mathews:
 - “Global developments influence national security that should include resource, environmental and demographic issues”
- 2005 Michael Renner, security threats:
 - “problems without passport” - shared risks and vulnerabilities
 - Diffuse, less predicable, and multidimensional

Buzan: Broadening and Deepening



Towards new “post-modern” security concepts?

- Security Governance
- Human Security
 - “At its most basic level, human security means freedom from fear” (McRae)
- Democratic Peace
- Cyber-Security
- Climate Security
- Energy Security

Globalisation and International Relations

- Optimistic view
 - Interdependence and peace argument
 - Democratic peace thesis (Kant, Russett)
 - “The World is Flat” (Friedman)
 - Pessimistic view
 - Globalisation seen as vulnerability
 - Globalisation, uneven growth and the balance of power
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Global cross-cutting risks, threats

- International terrorism
- Proliferation of WMD
- Economic Instability
- Migration
- Cyber Security
- Climate Change
- Energy Security

2. Energy and Security

Energy in Schools of Thought

- **Realism** –competition over goods: ex. Africa, Central Asia (“The Grand Chessboard”)
- **Liberalism** – exchange in multi-sum context: ex. trade and development, normative engagement, mutual benefits, institutions do matter (IEA, OPEC, IAEA)
- **Constructionism**: perceptions/identity

Main drivers that will influence the future

- Energy/Resources
- Environmental Change
- Economics
- Science and Technology
(incl. Defence Technology)
- National and International Governance
(incl. Military Dimension)
- Perceptions, Beliefs, Values, Attitudes
- all have a direct/indirect affect on energy security and the future security environment

Energy Security also affected by...

- Climate Change
- Resource Wars
- Geopolitics
- Armed Conflict

Energy Security

- From the **consumer's perspective**: “Energy security” is the assurance that adequate supplies of the appropriate energies will be available when and as needed at a reasonable price.
- From the **producer's perspective**: “Energy security” means that consumers can be relied upon to purchase energy in quantities and at prices justifying producers’ upstream investments.

Energy Security (US-EU Summit Statement 2008)

Energy security seeks

“to ensure access to affordable, **clean**, and secure sources of energy to underpin sustainable global economic growth and protect our environment”.

Energy Security: why is it so important?

- 1. Tight global oil and gas markets
 - 2. Rapidly rising demand in the developing world
 - 3. Energy is a strategic commodity, but also a military commodity
 - 4. Heightened terrorist threat to infrastructure and supply lines
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Many of today's most widely discussed threats are energy-related

- Dependence on imported oil and natural gas is steadily increasing in many countries
- Recent interruptions of Russian oil and gas supplies have made Europeans nervous.
- The rapid expansion of developing-country (and especially Chinese) oil companies into global upstream activities,
- Resurgent resource nationalism in some oil exporting countries (such as Venezuela) suggest a new politicization of energy markets.

IEA: World Energy Outlook 2008; Oil rules

- BAU scenario: energy demand +45% by 2030
 - China and India over half of the increase
 - Oil remains the dominant fuel
 - Oil production peaked in most non-OPEC countries
 - Russia, Iran and Qatar have 56% of gas reserves
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Issues

- Nuclear renaissance
 - Nuclear power: clean, but dangerous
 - IAEA: by 2030 23 new civilian nuclear power states
- Increase on gas imports in Europe
 - No alternative for now higher dependence on gas from Russia and North Africa
- Supply security and political amity
 - Tensions: US missile defence, NATO enlargement towards Caucasus, Ukraine
 - Division of Europe on (North stream) opposition by Poland

3. Role of Institutions and States in Energy Security



UNGA

- Resolution of 63rd session (2008/2009) of General Assembly, proposed by Turkmenistan:
- “Reliable and stable transit of energy and its role in ensuring sustainable development and international cooperation”
- Creation of an international system to safeguard energy pipelines and related structure against man-made and natural disasters.
- Energy as a joint responsibility



UNGA

- UNGA on 3 June 2009 adopted a resolution titled « climate change and its possible security implications »
A/63/L.8/Rev.1
- Convened an interactive thematic dialogue on energy efficiency, energy conservation and new and renewable sources of energy, 18 June 2009



United Nations

- The United Nations Economic Commission for Europe (UNECE) was set up in 1947 by ECOSOC.
 - Key Energy Issues
 - Energy Security
 - Sustainable Energy Strategies
 - Energy Efficiency
 - Electric Power, Coal and Gas Infrastructure
 - Committee on sustainable energy

NPT—three pillars

- **Non-proliferation**
IAEA verifies that members are not diverting “nuclear energy from peaceful uses to nuclear weapons or other nuclear explosive devices (Article III)
- **Peaceful use of nuclear energy**
Parties have the “inalienable right” to exploit “nuclear energy for peaceful purposes without discrimination” (Article IV.1)
- **Disarmament (Article VI)**

Bucharest Summit in April 2008

- Report on energy security identifies guiding principles and outlines options and recommendations for further activities. It identifies five key areas where NATO can provide added value:
 - Information and intelligence sharing;
 - Projecting stability;
 - Advancing international and regional cooperation;
 - Supporting consequence management;
 - Supporting the protection of critical infrastructure.



Collective defence clause for energy security?

- March 2006, Polish foreign ministry proposed an “energy Article V” which would pledge all signatories to assist a country in the event of a supply disruption
 - 1. militarizing an issue which is fundamentally economic would disrupt the market
 - 2. could sour relations with producing countries by politicizing energy trading
 - 3. counterproductive to the end-goal of political and security risk reduction

NATO: Maritime operations support

- Some 65 per cent of the oil and natural gas consumed in Western Europe passes through the Mediterranean each year, with major pipelines connecting Libya to Italy and Morocco to Spain.
- NATO ships have been patrolling in the Eastern Mediterranean monitoring shipping to detect and deter terrorist activity as part of Operation Active Endeavour since October 2001. The operation has since been extended to cover the Straits of Gibraltar and the entire Mediterranean, providing escorts to non-military shipping and conducting compliant boarding of suspicious vessels.
- NATO ships also systematically carry out preparatory route surveys in “choke” points as well as important passages and harbours throughout the Mediterranean.

1. “European Security Strategy” (2003)

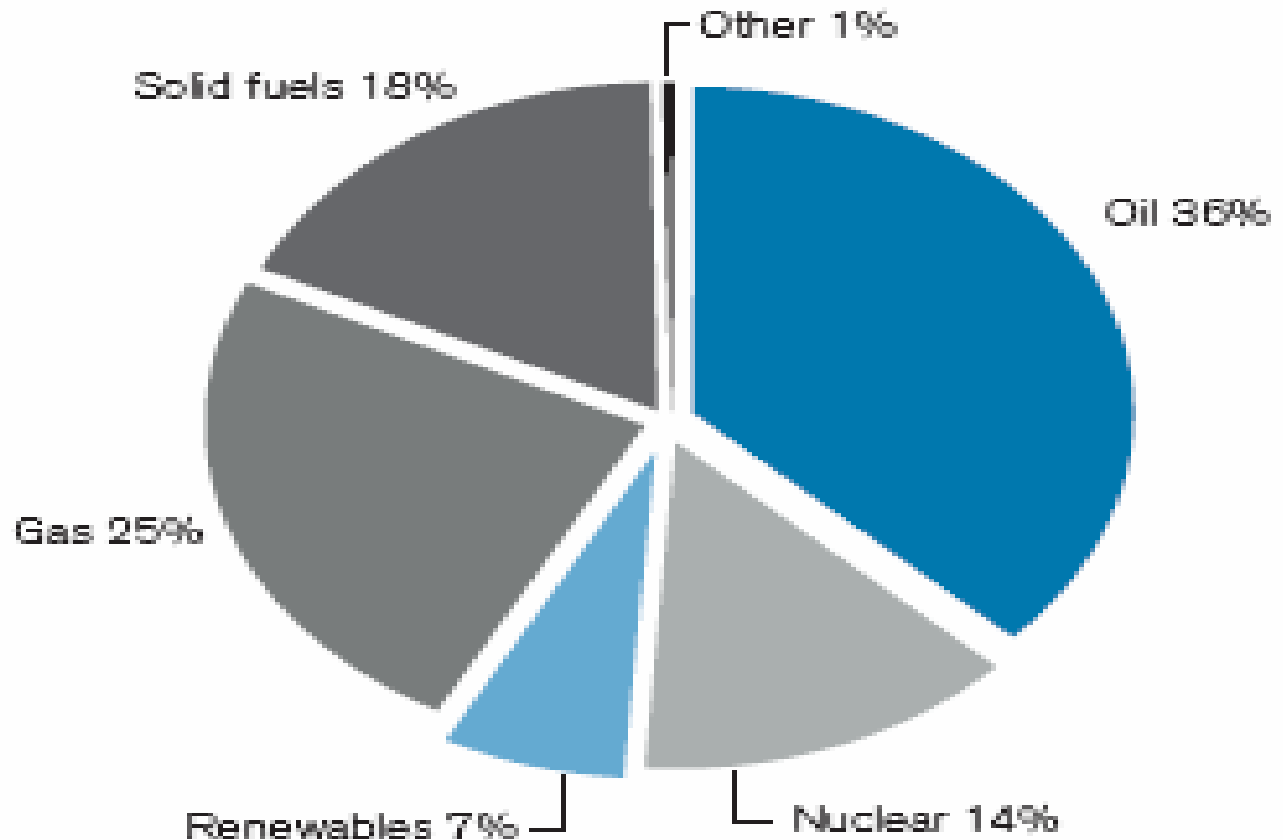
-> “Large-scale aggression against any Member State is now improbable. Instead, Europe faces new threats which are more diverse, less visible and less predictable.”

- Terrorism
- WMD Proliferation
- Regional conflicts
- Organised crime
- Failed States

2. Implementation report (2008)

- Climate Change
- Energy Security
- Cyber-Security

Figure 1. EU's energy mix



Source: European Commission, "Energy and Transport in Figures", Statistical Pocket Book 2007.

Europe's Stake in North Africa

“Europe wants a secure access to oil and gas and protection against waves of migrants”

Bechir Chourou

Report on the Implementation of the European Security Strategy 2008

- Energy Security Concerns about energy dependence have increased over the last five years.....
- By 2030 up to 75% of our oil and gas will have to be imported.
- This will come from a limited number of countries, many of which face threats to stability.

- Our response for improving energy security:
 - Need a more unified energy market, greater inter-connection, particularly to the most isolated countries
 - Crisis mechanisms to deal with disruptions
 - Greater diversification of fuels, resources of supply and transit routes essential for good governance and respect for rule of law and investment in source countries
 - With partners, China, US, India and Japan we should promote renewable energy, low-carbon technologies and energy efficiency

NIC 2025

- **China is poised to** have more impact on the world over the next 20 years than any other country. If current trends persist, by 2025 China will have the world's second largest economy and will be a leading military power. It also could be the **largest importer of natural resources and the biggest polluter.**
- **Russia has the potential to be richer, more powerful, and more self-assured in 2025** if it invests in human capital, expands and diversifies its economy, and integrates with global markets. On the other hand, Russia could experience **a significant decline if it fails to take these steps and oil and gas prices remain in the \$50-70 per barrel range.**

June 2009 Amnesty Intl Report

- Amnesty Intl: Oil industry in Niger Delta creating "human rights tragedy"
- People living in Niger Delta have to drink, cook, wash in polluted water, it says
- Nigeria's state oil company: Local communities causing much of the damage
- Niger Delta a region in Nigeria consisting of nine oil-producing states

4. Energy Security and Climate Change

The «Doomsday Clock»/Climate Change

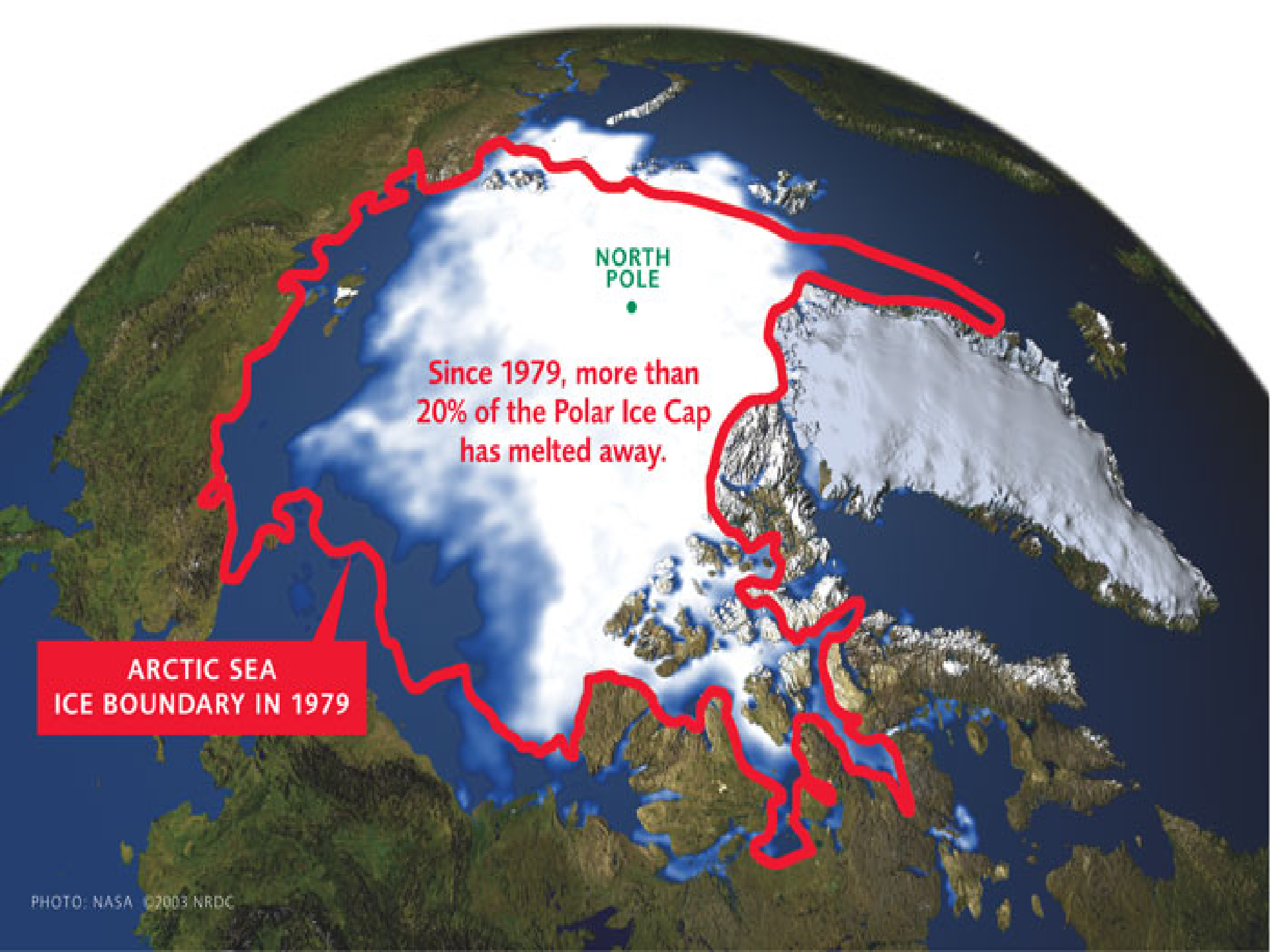
- “**Nuclear weapons** still pose the most potent threat to humanity, but **climate change** and emerging **technologies** have quickened our ability to **self-destruct**”

Jan/Feb 2007 issue of the Bulletin of the Atomic scientist

The National Security Strategy of the United Kingdom, 2008:

“Climate change is potentially the greatest challenge to global stability and security, and therefore to national security.”

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NORTH
POLE

Since 1979, more than
20% of the Polar Ice Cap
has melted away.

ARCTIC SEA
ICE BOUNDARY IN 1979

5. Conclusions

- “Mainstreaming” of energy security
- Energy security should include broad spectrum of import vulnerabilities
- Institutional and normative responses to energy security limited as long as realist paradigm prevails
- Climate Change is part of the “doomsday clock”

*“Safety and certainty in oil lie in
variety and variety alone”*

Winston Churchill, 1912