Climate Change and the Northern Sea Route

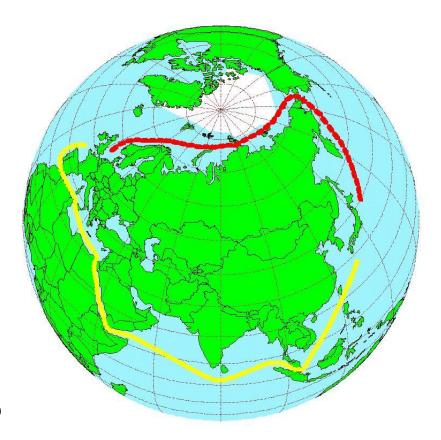
Dmitry Zimin

Karelian Institute

University of Eastern Finland

Northern Sea Route (NSR): basic facts

- Opened for foreign ships in 1991
- Rotterdam-Yokohama route:
 - NSR: 7300 miles / 20 days
 - Through Suez: 11200 miles / 33 days
- Disadvantages:
 - Icebreaker's assistance is often required;
 - Assistance of Russian navigation specialists is mandatory;
 - Lack of infrastructure makes navigation more risky, which leads to higher insurance costs



NSR: basic facts

- Main modes of usage:
 - Delivery of goods to Russian Arctic regions;
 - Transportation of locally extracted natural resources;
 - Other (military, fishing, tourism, transit shipments).
- Transit traffic remains very modest: 2 ships in 2009, 4 in 2010, 34 in 2011, 46 in 2012 (1.26 million tons of cargo).

Russia in the Arctic: more active engagement

- Russia's State Policy Principles in the Arctic till 2020 (2008);
- Russia's Climatic Doctrine (2009);
- Major new projects focussing on exploitation of natural resources (e.g. ExxonMobil – Rosneft; Royal Dutch Shell – Gazprom; China National Petroleum Corp. – Rosneft; Novatek LNG);
- Federal Law on the NSR (2012);
- Russia's Arctic Zone Development Strategy (2013);
- State Administration of the NSR (2013).

Factors affecting the dynamics of traffic

- Depopulation of Russian Arctic regions;
- Global warming makes the Arctic cap smaller;
- "Shale revolution", especially the growing production of shale gas in the United States;
- Cases of piracy in the Indian Ocean stimulate interest towards the NSR;
- The commitment of the Russian state to invest in infrastructure development in order to facilitate extraction of natural resources in the Arctic (e.g. new port of Sabetta);
- Development of alternative routes and projects (e.g. VSTO (oil), Yamal-Europe-2 (gas), Transsib, Sakhalin, etc.).

Developments in 2013:

- State Administration of the NSR (<u>www.nsra.ru</u>) was re-established in early 2013 and started to issue licenses for navigation in NSR waters: from 16 April till 16 August 2013 it issued 413 such licenses, including 10 to COSCO (China Ocean Shipping Co.), 10 to Stena Bulk AB (Sweden), 6 to Marinvest Shipping AB (Sweden).
- The Administration is headquartered in Moscow and has a branch in Arkhangelsk where two major shipping companies are situated.

Future expectations:

- NSR's transit traffic will multiply by 2020;
- China plans to deliver up to 15% of its international cargo through the NSR by 2020, what about other Far Eastern countries?
- Global economic recession: a fall in oil and gas prices?
- Global warming or cooling? Russian scientists predict some cooling in 2015-2040.