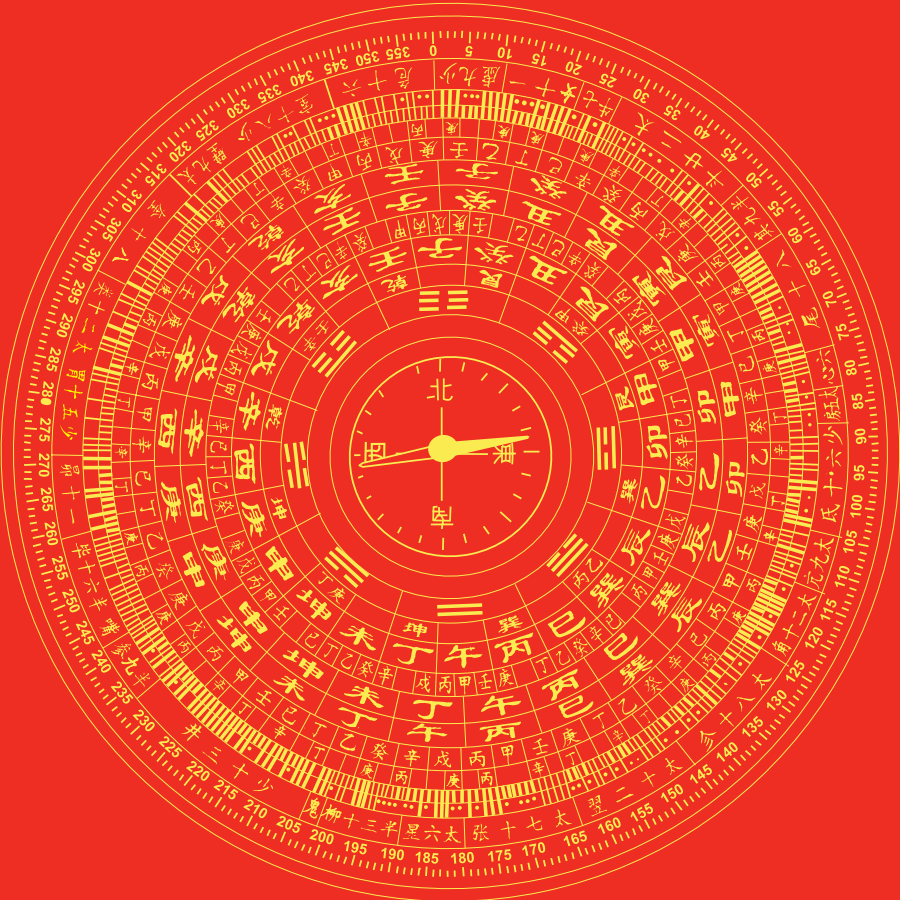


中海

NAVAL WAR COLLEGE
CHINA MARITIME STUDIES INSTITUTE

Number 8

The Dragon Eyes the Top of the World Arctic Policy Debate and Discussion in China



David Curtis Wright

Report Documentation Page

Form Approved
OMB No. 0704-0188

Public reporting burden for the collection of information is estimated to average 1 hour per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Washington Headquarters Services, Directorate for Information Operations and Reports, 1215 Jefferson Davis Highway, Suite 1204, Arlington VA 22202-4302. Respondents should be aware that notwithstanding any other provision of law, no person shall be subject to a penalty for failing to comply with a collection of information if it does not display a currently valid OMB control number.

1. REPORT DATE AUG 2011		2. REPORT TYPE		3. DATES COVERED 00-00-2011 to 00-00-2011	
4. TITLE AND SUBTITLE The Dragon Eyes the Top of the World: Arctic Policy Debate and Discussion in China				5a. CONTRACT NUMBER	
				5b. GRANT NUMBER	
				5c. PROGRAM ELEMENT NUMBER	
6. AUTHOR(S)				5d. PROJECT NUMBER	
				5e. TASK NUMBER	
				5f. WORK UNIT NUMBER	
7. PERFORMING ORGANIZATION NAME(S) AND ADDRESS(ES) Naval War College, Center for Naval Warfare Studies, China Maritime Studies Institute, Newport, RI, 02841				8. PERFORMING ORGANIZATION REPORT NUMBER	
9. SPONSORING/MONITORING AGENCY NAME(S) AND ADDRESS(ES)				10. SPONSOR/MONITOR'S ACRONYM(S)	
				11. SPONSOR/MONITOR'S REPORT NUMBER(S)	
12. DISTRIBUTION/AVAILABILITY STATEMENT Approved for public release; distribution unlimited					
13. SUPPLEMENTARY NOTES					
14. ABSTRACT					
15. SUBJECT TERMS					
16. SECURITY CLASSIFICATION OF:			17. LIMITATION OF ABSTRACT	18. NUMBER OF PAGES	19a. NAME OF RESPONSIBLE PERSON
a. REPORT unclassified	b. ABSTRACT unclassified	c. THIS PAGE unclassified			



The Dragon Eyes the Top of the World

Arctic Policy Debate and Discussion in China

David Curtis Wright

CHINA MARITIME STUDIES INSTITUTE
U.S. NAVAL WAR COLLEGE
Newport, Rhode Island

www.usnwc.edu/Research---Gaming/China-Maritime-Studies-Institute.aspx

Naval War College

Newport, Rhode Island
Center for Naval Warfare Studies
China Maritime Study No. 8
August 2011

President, Naval War College
Rear Admiral John N. Christenson, U.S. Navy

Provost
Amb. Mary Ann Peters

Dean of Naval Warfare Studies
Robert C. Rubel

Director of China Maritime Studies Institute
Prof. Peter Dutton

Naval War College Press

Director: Dr. Carnes Lord
Managing Editor: Pelham G. Boyer

Telephone: 401.841.2236
Fax: 401.841.3579
DSN exchange: 841
E-mail: press@usnwc.edu
Web: www.usnwc.edu/press
www.twitter.com/NavalWarCollege

Printed in the United States of America

The China Maritime Studies are extended research projects that the editor, the Dean of Naval Warfare Studies, and the President of the Naval War College consider of particular interest to policy makers, scholars, and analysts.

Correspondence concerning the China Maritime Studies may be addressed to the director of the China Maritime Studies Institute, www.usnwc.edu/Research---Gaming/China-Maritime-Studies-Institute.aspx. To request additional copies or subscription consideration, please direct inquiries to the President, Code 32A, Naval War College, 686 Cushing Road, Newport, Rhode Island 02841-1207, or contact the Press staff at the telephone, fax, or e-mail addresses given.

Reproduction and printing is subject to the Copyright Act of 1976 and applicable treaties of the United States. This document may be freely reproduced for academic or other noncommercial use; however, it is requested that reproductions credit the author and China Maritime Studies series and that the Press editorial office be informed. To obtain permission to reproduce this publication for commercial purposes, contact the Press editorial office.

ISSN 1943-0817

ISBN 978-1-884733-94-9

中海

The image features the Chinese characters '中海' (Zhōng Hǎi) written in a bold, expressive cursive calligraphic style. The characters are black and set against a white background. The character '中' is on the left, and '海' is on the right. Below the characters, there are four curved, brush-like strokes that resemble the movement of fish or waves, adding a dynamic and fluid quality to the composition.

The opinions expressed in this publication are the perspectives of the author and do not necessarily represent the views of the U.S. Department of Defense or any of its components.

I thank Caitlyn L. Antrim (Rule of Law Committee for the Oceans), Dr. Lyle Goldstein (Naval War College), Dr. Guo Peiqing (Ocean University of China), Marshall Horne (University of Calgary), Dr. Robert Huebert (University of Calgary), Wendell L. Minnick (Asia Bureau Chief in Taipei for *Defense News*), Joseph Ashley Roach (U.S. Navy, JAGC, Ret.), two anonymous reviewers, and other very helpful unnamed Americans and Chinese for their information, assistance, and suggestions during the preparation of this project. Having availed myself of their expertise, I of course bear sole responsibility for its contents, including any errors of fact, interpretation, or both. I also want to thank the conscientious and meticulous editor(s) who went through the initial proofs and spared me several blunders. Lastly, I should point out that I have made no attempt to correct factual errors in the Chinese originals I have translated.

The Dragon Eyes the Top of the World

Arctic Policy Debate and Discussion in China

After the Northwest Passage is opened up it will become a new "axial sea route between Atlantic and Pacific," and the sea route between Europe, Asia, and North America will be shortened by 5,200 to 7,000 nautical miles. Whoever controls the Arctic sea route will control the world economy and a new internationally strategic corridor.

LI ZHENFU

The Chinese are increasingly interested in the effects of global climate change and the melting of the Arctic ice cap, especially as they pertain to emergent sea routes, natural resources, and geopolitical advantage.¹ China seems to see the overall effect of Arctic climate change as more of a beckoning economic opportunity than a looming environmental crisis. Even though it is not an Arctic country, China wants to be among the first states to exploit the region's natural resource wealth and to ply ships through its sea routes, especially the Northwest Passage.

The Arctic is currently quite topical in China, and articles on China's newfound interest in Arctic affairs now appear with some frequency in major academic journals, as well as in the popular media. There is currently something of a cacophony of Chinese voices on Arctic affairs, and this is because Chinese Arctic policy has not been fully formulated or promulgated.² There does, however, seem to be a current consensus within Arctic policy debate, discussion, and deliberation in China, and that is that the Arctic belongs to all humankind and not to any one country or group of countries. But herein is a quandary for China, which has a long and assertive record of insisting on sovereign state rights as the paramount principle of international relations. As the Finnish scholar Linda Jakobson of the Stockholm International Peace Research Institute has trenchantly pointed out,

China's insistence that respect for state sovereignty be a guiding principle of international relations makes it difficult for China to question the Arctic states' sovereignty [and sovereign] rights [and jurisdiction]. There is some irony in the statements by Chinese officials calling on the Arctic states to consider the interests of mankind so that all states can share in the Arctic. These statements appear to be contrary to China's long-standing principles of respect for sovereignty and the internal affairs of other states.³

Even though China is currently climbing the Arctic learning curve, it seems reluctant to acknowledge that it being a non-Arctic country, its influence in the Arctic and in Arctic affairs might be somewhat limited. This hesitance arises, however, not from pride or haughtiness but from concern over the multivalent implications of such an acknowledgement: China does not want to lose any ground in its campaign to become a major player in the world in general, and increasingly for Beijing that means being a player in the Arctic. China wants, as the term in Chinese goes, to “insert its hands” (*chashou*) into Arctic affairs but finds it inconvenient to indicate this directly, because that would be infelicitous diplomatically. So instead, China engages in unctuous and circumlocutory diplomatic language about respecting the sovereignty of Arctic countries, hoping that the Arctic countries can resolve their differences quickly and anticipating that Arctic issues can ultimately be worked out through negotiation to the satisfaction of both the Arctic and international communities. But the gentlemanly bows and matronly curtsies and bouquets of Chinese diplomatic gesturing should not be confused for acquiescence or lack of resolve on China’s part. Despite its status as a non-Arctic country, China seems bound and determined to have a voice, perhaps even a say-so, in Arctic affairs.

China today is quite aware of the U.S. Geological Survey’s estimates that “25% of the world’s undiscovered hydrocarbon resources are found there, along with 9% of the world’s coal and other economically critical minerals.”⁴ Whether or not it will own up to it in so many words, China nurses an enormous sense of entitlement to the natural resource wealth of the Arctic, because it is a major emerging world power and a permanent member of the United Nations Security Council. This was expressed by Chinese rear admiral Yin Zhuo in March 2010: “The Arctic belongs to all the people around the world, as no nation has sovereignty over it. . . . China must plan an indispensable role in Arctic exploration as we have one-fifth of the world’s population.”⁵

The Chinese nightmare scenario for the Arctic is that the European and North American Arctic powers will more or less gang up and “carve up the Arctic melon” and its natural resources among themselves, to the exclusion of everyone else. At least one Chinese academic has raised alarmist concerns about Russia’s dropping of a titanium capsule containing a Russian flag at the bottom of the Arctic Ocean in late 2007, about Russia’s “dream of extending its continental shelf,” and about its putative suggestion of an alliance among the eight Arctic states, known as the A8:^{*}

Things that happen in the Arctic and Antarctic involve China’s rights and interests. During this process we should guard against some individual states casting China aside and privately consulting [among themselves] about establishing a regional multilateral treaty system, thereby harming China’s polar rights and interests. This concern is not unreasonable

^{*} The “A8” are Canada, Denmark, Finland, Iceland, Norway, Russia, Sweden, and the United States. The “A5,” mentioned below, are the five Arctic littoral states: Canada, Denmark (Greenland), Norway, Russia, and the United States.

because Russian scholars have been clamoring for the establishment of an “Eight-State Polar Region Alliance” [*Jidi baguo lianmeng*].⁶

The use of the term “Eight-State Polar Region Alliance” here for a possible alliance among the A8 states is highly charged, emotively, because it directly echoes the infamous military conduct of the “Eight-State Allied Forces” (*Baguo Lianjun*) that entered and sacked Beijing in the aftermath of the Boxer Rebellion in the late summer and autumn of 1900.⁷ For many Chinese such a multilateral treaty system among Arctic powers to the exclusion of China would be, at the intuitive and visceral level, somewhat reminiscent of the imperialist deprivation and bullying China suffered during its century of humiliation, from the mid-nineteenth through mid-twentieth centuries.

This study considers at some length the discussions and debates on Arctic issues, mainly in Chinese-language scholarly journals but also in journalistic and diplomatic Chinese-language discussion. This study is neither an overview of international Arctic issues and disputes nor a speculative piece on China’s geopolitical and strategic intentions in the Arctic. It is also not an introduction to China’s recent interest in Arctic affairs, which was the topic of Linda Jakobson’s fine and pioneering article published in early 2010.⁸ It is, rather, a report on China’s sometimes-contentious debates and discussions of the issue, an account that hopes to convey something of their extent, complexity, and flavor while China works out its Arctic policy and prepares for its future position in and regarding the Arctic. It also offers some foreign policy recommendations for the United States.

In these Chinese debates and exchanges there is not much direct or substantive consideration of the Arctic interests and policies of the United States. The reasons for this seem to defy simple analysis. It is unlikely that China would refrain from extensive commentary on Arctic issues simply to avoid worsening any further the already-frayed Sino-American relationship. It could well be that China actually does not see much with which to disagree in American Arctic policy, at least as presently constituted; the two states have common interests in the Arctic, not the least of which is freedom of navigation through it. At the policy level, the United States is not seeking to challenge China in the Arctic. Further, while it is unlikely that China declines to take the United States seriously as an Arctic power, China does seem to see Russia and especially Canada as the principals in current Arctic issues; certainly the United States does not assert the claims to sovereignty over Arctic sea routes that Canada does. Finally, it may also well be that the continuing failure of the United States to accede to the United Nations Convention on the Law of the Sea (UNCLOS) is, to some extent, muffling Washington’s voice in international forums on maritime issues in the Arctic and other regions.

Linda Jakobson speculates that “the notion that China has rights in the Arctic can be expected to be repeated in articles by Chinese academics and in comments by Chinese officials until it gradually begins to be perceived as an accepted state of affairs.”⁹ There

is, however, disagreement in China over exactly what these rights are or ought to be. China's scholarly discourse on its Arctic interests is not monolithic or uniformly teleological. While the interrelationships in China of cause and effect between academic and public discourse on the one hand and the formulation of state policy on the other are usually only translucent, if not opaque, to outsiders, the presence and apparent toleration of debate and disparity about Arctic affairs does suggest that scholarly publication is not always an echo chamber for CPC (Communist Party of China) policy diktat. There is genuine debate in China, at least for the present, about some aspects of Arctic policy.

Conflict in or over the Arctic?

It seems almost obligatory in Chinese articles on the nation's interests in the Arctic to include the introductory observation that the Arctic, hitherto almost universally seen as bleak, frigid, and forbidding, is now regarded with the covetous eyes and glowering visages of major powers who long to control access to its waters, militarize its islands, and secure legal rights to its wealth in oil, natural gas, minerals, and seafood. A prime example is an article published in 2010 in the prestigious *Guoji Guanxi Xueyuan xuebao* (*Journal of the University of International Relations*) by Xu Zhenwei (of Nankai University's Zhou Enlai School of Government and Management in Tianjin) and Xu Yuanyuan (of Qingdao University's School of Economics in Qingdao, Shandong Province). It points out (perhaps unwittingly) that China covets the same Arctic assets that the United States, Canada, and Russia do: "What, after all, is so alluring about the ice-in-the-sky, snow-on-the-earth Arctic that it makes the three great and powerful countries the U.S., Canada, and Russia contentious to the point that they don't know what to do? After reading through many materials we have discovered [the reasons]: resources, sea routes, and strategic significance. These three resplendent jewels attract covetous stares from the three great and powerful countries."¹⁰

That the Arctic might emerge in the future as the theater for regional and perhaps even global conflict is a possibility entertained with some seriousness in China today. An article published in 2010 in the influential popular magazine *Dangdai haijun* (*Modern Navy*) notes that the United States is currently procuring more warm clothing for naval personnel and is, in accordance with the U.S. Navy's *Arctic Roadmap*, preparing for the construction and deployment of an Arctic surface fleet, a project slated for the years 2011 through 2015.¹¹ A senior colonel in the People's Liberation Army noted in 2008 that use of force in the Arctic over issues of sovereignty could not be ruled out.¹² In an article published in 2009, Li Zhenfu, associate professor in the College of Transportation Management at Dalian Maritime University in Dalian, Liaoning Province, argues that the ultimate resolution of Arctic issues will have direct bearing on world security.¹³

During the Cold War both the United States and the Soviet Union believed that whoever owned the Arctic would control the world, asserts a brief recent article in the popular fortnightly magazine *Dongbei zhi chuang* (*Window on the Northeast*). The article quotes a recent prediction in the Russian tabloid *Komsomolskaya Pravda* (the Communist Youth League version of *Pravda*, still in publication today and the top-selling newspaper in Russia) about the likelihood of World War III breaking out in the Arctic:

The dispute over the Arctic is strategic in nature for all Arctic countries. For Russia, the United States, and Canada, what used to be seen as a natural barrier in their backyards has suddenly become a wide open, bustling artery, one for which the legal boundaries are vague and the characteristics unclear. This presents major issues for the present and future wealth and security of these countries. This remote and silent realm of frozen seas and snow-capped peaks has suddenly become “hot.” The Arctic Council is no longer a polite and genteel academic forum for geography, meteorology, and scientific research.

With the continual discoveries of new resources beneath the Arctic Ocean, this previously neglected land of snow and ice has become a treasure house at which each country gazes with the cruel greed of a tiger. Although the land areas of the Arctic are owned by the eight countries Canada, Denmark, Finland, Iceland, Norway, Sweden, the United States, and Russia, the strife over Arctic sovereignty has not only not subsided, but has become more vehement over time. Russia’s *Komsomolskaya Pravda* even predicts that “because there are serious discrepancies over the division and delimitation of Arctic interests, the World War III of the future may well break out in the Arctic.”¹⁴

Russia—disparagingly called the “big northern lunk” in 2010 by Chinese academics Mei Hong and Wang Zengzhen, of the School of Law and Political Science at the Ocean University of China in Qingdao—has taken note of China’s new and aggressive pursuit of Arctic interests.¹⁵ “Russia will increase naval patrols in the Arctic Ocean to defend its interests against nations such as China seeking a share of the area’s mineral wealth,” Reuters quoted Russian Navy commander Admiral Vladimir Vysotsky as saying on 4 October 2010 in an interview with Itar-Tass. “We are observing the penetration of a host of states which . . . are advancing their interests very intensively, in every possible way, in particular China,” Vysotsky continued, adding that Russia would “not give up a single inch” in the Arctic.¹⁶ The next day, however, perhaps in an attempt to provide a counterweight to Admiral Vysotsky’s comments, *Russia Today* reported an authoritative opinion that Arctic issues between the two states were not likely lead to conflict:

Evgeny Bazhankov, Vice Chancellor of Research and International Relations at the Russian Foreign Ministry’s Diplomatic Academy, believes there is not much for Russia to worry about in relation to China’s growing role in the region. Like many other countries, it does pursue its economic interests in the region, which is sprawling with natural resources. However, he told RT, it is unlikely that Moscow and Beijing would ever clash over the area. The analyst underlined that the two states are “strategic partners” whose positions on many international issues, including at the UN, are the same. Therefore, Russia and China would certainly be able to come to an agreement on the Arctic zone question as well.¹⁷

Popular glossy military magazines in China often beat the war drums about the likelihood of conflict breaking out in the Arctic. An article in the November 2010 issue of *Dangdai haijun* is a typical example:

According to the “United Nations Convention on the Law of the Sea” currently in effect, the Arctic does not belong to any country. In addition to the five circum-Arctic countries Russia, the United States, Canada, Denmark, and Norway, many [other] countries have proclaimed partial sovereignty over the Arctic. At present there is no Arctic country which has clearly proven that its continental shelf extends into the Arctic, and because of this the Arctic is regarded as an “international area” and is supervised and managed by the International Seabed Authority. Some countries are contending for Arctic sovereignty, and this is tantamount to infringing upon the interests of the other countries of the world. In facing this real and quite unpredictable “scramble and battle for the Arctic” and the probability of some countries dividing up the [Arctic] melon with the aid of geographical advantage and military might, if peaceful means cannot produce the anticipated effects, war becomes the only method for resolving the issue. Based on this, it is not difficult for us to imagine that the probability of the future outbreak of war in the Arctic is very high, and that as soon as war breaks out, the United States, Russia, and Canada will be its main principals.¹⁸

In Canada, more benign and rational assessments of potential trouble in the Arctic usually (but not always) prevail; there may be tension and friction in the Arctic in the future, but by and large Canadian commentators on Arctic affairs do not usually see conflict as a distinct possibility. The conclusions of Kyle D. Christensen of Canada’s National Defence Headquarters are typical: “There exists in China a distinct group of academics and officials trying to influence leaders to adopt a much more assertive stance in the Arctic than has traditionally been the case. This could ultimately bring China into disagreement with circumpolar states in a variety of issue areas, and alter security and sovereignty relationships in the circumpolar region.”¹⁹

Chinese Scholarly Writing on Arctic Issues

The *Zhongguo Haiyang Daxue xuebao* (*Journal of the Ocean University of China*), of the Ocean University of China, has been a prominent outlet for discussion of China’s Arctic interests and has recently published a spate of important articles on the subject.²⁰ Most of the principals in these discussions and debates are academics, but popular media in China and the Chinese government itself are also beginning to comment more on Arctic affairs.

Not all is monolithic or dogmatic in China’s discussion and dissension on Arctic affairs, however; there is in fact a fairly wide range of opinions and perspectives. For instance, scholarly articles in Chinese typically discuss China’s interests in the Arctic, but there seems to be no unanimity of opinion as to exactly what all of these interests are. There seems to be something of a consensus in academic articles that China should strive for

and preserve its “right to speak up” (*huayu quan*) about Arctic affairs, but even this is disputed, as by two scholars in an important article published in a major journal in 2010: “We have no way to participate fully, or even participate at all, in Arctic affairs. We especially have no right to speak up on the dispute about authority over the territorial waters of the Arctic Archipelago.”²¹

Nonetheless, the preponderance of scholarly discussion clearly favors the idea that China deserves some voice in Arctic affairs and that the sea routes and natural resources of the Arctic should be open to the entire world. The mantra that the Arctic and its natural resource wealth belong to no one country or group of countries but constitute the common heritage of all humankind is virtually *de rigueur* in recent Chinese public commentary on Arctic affairs. There are also indications that China sees itself at the vanguard of the rest of humanity and the international community in this regard.

A Chinese admiral said in early 2010 that since China has 20 percent of the world’s population, it should have 20 percent of the Arctic’s resources.²² While this attempt at moral reasoning does not likely amount to officially announced Chinese policy, it does reflect China’s sense of moral entitlement to access to Arctic sea routes and its anxiety that Arctic states might somehow endeavor to block or restrict this access.

The Chinese do, by and large, recognize Arctic issues mainly as regional ones, but they seek to emphasize and enlarge their international dimensions, especially as they pertain to natural resources and sea routes. The operative assumption seems to be that increased internationalization of Arctic affairs will work more to China’s advantage than does the current dispensation. Among prescient Chinese who write on Arctic affairs, however, there is concern that the nation might not be up to the task of projecting and promoting its Arctic interests in the international arena, since global mechanisms are founded largely upon Western concepts and ideologies with which China is not especially familiar. One author in particular, Li Zhenfu, urges his fellow Chinese to familiarize themselves with those Western theories and mechanisms to lessen purely moral and ethical reasoning pertaining to China’s rights and interests in the Arctic.

By 2009 China’s present and future interests in the Arctic were creating enough buzz to induce a major journal dedicated to maritime affairs to jump into the fray. In the third issue of the 2009 volume of the *Journal of the Ocean University of China (Social Sciences Edition)*, published by the Ocean University, the editors announced that with that issue they would be starting a “column” for research on polar region issues:

The unique geographical locations and natural environments of the polar regions have determined their important positions in scientific research and international political law, and they have become the foci for research in many branches of learning. At present the polar regions are undergoing rapid atmospheric, land, oceanic, ecological, and social transformations which will produce weighty influences on global climate and socioeconomic

development. Global environmental and political changes will have deep influence on the national rights and interests of every country, including China. The worth of polar region resources, scientific research, and environment have weighty significance for the future development of humankind, and especially the quantitative enormity of [the polar regions'] mineral and biological resources have in recent years elicited strong world attention. Against the background of environmental transformation in the polar regions, in addition to strengthening natural science research in the polar regions, humanities and social science research on the polar regions with politics and law at the core is of great urgency. "Preparedness ensures success, while unpreparedness spells failure." Only with the development of forward-looking, in-depth research can [China] possess the right to speak up about future international affairs pertaining to the polar regions. To this end, with this issue this periodical is starting the "polar region issues" column, and it will continually present the newest results of research by our country's scholars into humanities and social science aspects of the polar regions. At the same time, we welcome scholars inside and outside China involved in polar region research to submit manuscripts. [Let us] together create flourishing prospects for research on the polar regions.²³

A Uniquely Chinese Approach

Li Zhenfu is easily among the most emphatic of Chinese commentators on Arctic issues. He has published several important articles on China's interests in the Arctic issue and has actively applied rigorous social-science methodology to the topic. He has obviously had extensive exposure to Western geopolitical and social-science theory, and on occasion he sums up contentions and analyses with extensive summation equations that would be comprehensible only to the most positivistic of social scientists, as in two virtually identical articles published in 2009 involving SWOT (strengths, weaknesses, opportunities, and threats) analysis of the Arctic issue from China's perspective.²⁴

But for all its theoretical content, Li's writing can seem vague and nonspecific. It frequently mentions China's "rights and interests" in the Arctic but never quite gets around to defining or spelling them out. His articles clearly assume and argue that increased theoretical sophistication will help guarantee Chinese interests in the Arctic, but they do not specify how or why. They recommend injecting elements of traditional Chinese culture to produce a uniquely Chinese approach to Arctic geopolitical affairs but give no concrete specifics.

One basic position seems to inform Li's many articles: China wants and deserves a piece of the Arctic action even though it is not and never has been an Arctic state. It seems that for Li, China's right of access to the Arctic is so self-evident and axiomatic as to require no elaboration or justification. He has yet to bring forth an effective argument in favor of China's accelerated intervention in Arctic affairs that is not based squarely and unabashedly on China's self-interest. He apparently regards issues of geographical propinquity and historical jurisdiction as largely irrelevant.

For Li Zhenfu, it seems, scientific expeditions and exploration are handmaidens to larger, nonscientific purposes. That is, Chinese scientific activity in the Arctic is clearly subservient and tributary to the nation's geopolitical considerations and regional strategic posturing. At one point, while discussing Chinese scientific investigations and polar explorations, Li even speaks of "the possibility of our country's open declarations of sovereignty over the Arctic and Arctic sea routes, as well as territorial claims."²⁵

Arctic Environmental Issues

Very few Chinese articles on the nonscientific implications of Arctic affairs seem to discuss prevention or reversal of climate change. The phenomenon is fatalistically accepted as an accomplished fact and future trend; the only questions pertain to dealing with the changes, challenges, and opportunities it brings and formulating political, economic, diplomatic, and other non-hard science responses to it. Further, a consensus is evident that as far as the Arctic environment is concerned, existing environmental law is adequate for now and in the future might serve as the basis of more comprehensive international precedent, if not a full international treaty.

The 2009 article that started the series on Arctic issues in the *Journal of the Ocean University of China*, "Research on the Issue of Arctic Environmental Law from the Point of View of International Law," by Liu Huirong and Yang Fan of Ocean University's School of Law and Political Science, is from start to finish an examination of environmental and legal issues pertaining to the Arctic.²⁶ It contains no substantial discussion of specifically Chinese interests in the Arctic and does not regard or treat Arctic environmental issues as representing a legal or diplomatic back door through which China could enter the Arctic and then throw its weight around geopolitically.

Liu and Yang bemoan the present lack of a comprehensive international Arctic treaty, and consider extensively the reasons for the "fragmentation of international law" as it pertains to the Arctic environment. They also discuss at some length the contradictions among various treaties and instruments of environmental law, as well as between national and international law. They then give suggestions for resolving these conflicts.²⁷ In their conclusion they express optimism about UNCLOS as the best means for balancing international interests, characterizing the U.S. refusal to accede to the convention as an American liability:

Looking far and wide at the legal documents which can resolve disputes related to the Arctic and how each state implements them, [it is our opinion that] UNCLOS is the most effective path for balancing the rights and interests among each of the signatory Arctic states. In the present disputes, with the exception of the United States, all other countries have already ratified UNCLOS. As a nonsignatory state to UNCLOS, in the midst of the disputes over resources which are growing fiercer by the day, the United States is meeting up with risks and hazards [regarding access to] the rich resources of several thousand

square kilometers of continental shelf. The position of the U.S. as a nonsignatory state in reality impedes its protection of its maritime interests. To protect their rights and interests in the Arctic region, every state has started paying serious attention to UNCLOS and hopes to find in it the legal basis for supporting its positions, this in order to win advantageous positions in international court decisions and obtain the recognition of international society.

It is the authors' opinion that [China] should proceed from the law of the sea, with UNCLOS as basis, and originate principles of the law of the sea directed solely at the Arctic. What is more, [China should] enable these principles to cover environmental protection, scientific research, resource development, and other realms. UNCLOS is already widely applied in the Arctic, and the main content of some of its articles is directed at environmental protection of ice-covered areas by littoral states. The main body of the Arctic is an ocean surrounded by the territory of sovereign states, and because of this Arctic issues are essentially maritime issues. Although related countries all approve of UNCLOS as a basis for the resolution of Arctic issues, each country proceeds with indiscriminate interpretation of UNCLOS and other treaties in accordance with its own national rights and interests. What is more, there exist "defects" in UNCLOS itself. We should proceed with the development and improvement of its relevant systems, and we can especially go forth from the special system for "ice-covered areas" in striving for the founding of a set of new specialized systems, directed at Arctic circumstances, for the resolution of Arctic environmental issues. Further, as a part of the helter-skelter Arctic international law system, UNCLOS still needs to resolve the issue of its conflict with other treaties. It can be seen that conflicts between treaties pertaining to the Arctic are far from being solvable in a day and a night.²⁸

An article by Mei Hong in a subsequent 2009 number of *Zhongguo Haiyang Daxue xuebao*, is primarily (but not entirely) about how environmental law pertaining to the Arctic can lead to more comprehensive law. The piece especially covers sea routes, but Mei does not neglect environmental issues and in fact seems genuinely concerned about them. Arctic environmental concerns are not, for him, mere cynical ploys for achieving geopolitical or economic advantage.

Mei observes that there are only two international treaties directly pertaining to the Arctic: the 1920 Svalbard Treaty and UNCLOS, of 1982. These he finds quite insufficient for the current disputes over Arctic sea route rights and interests. But Mei is a realist, and he faces up to current reality: "It would be difficult in the short term to shape the harmonized international will [necessary] for concluding a specialized treaty regarding all aspects of legal issues pertaining to Arctic sea routes. Moreover, I fear it would be difficult for international legislation revolving around the Arctic sea routes to break free of the already-existent system of international law principles and set up an entirely new one."²⁹

Mei echoes the insight of Guo Peiqing (Ocean University) that in essence Arctic disputes are maritime disputes. For Mei, the most extensive, albeit not comprehensive, body of

international law pertaining to the Arctic is environmental law, and at the bottom of international law is the international law of the sea (LOS). In fact, Mei sees LOS as the potential “source of the law”:

For issues of maritime environmental protection relating to Arctic sea routes, it is not difficult to find the source of the law from amid the international law and international environmental protection principles over the last half a century or so. In view of this, this article takes the framework of international law, of which the main body is LOS, and [with it] investigates the revelations of related international law legal regulations toward Arctic sea route legal rules and regulations.³⁰

Mei traces the development of postwar international maritime environmental law in some detail. He covers the International Convention on Civil Liability for Oil Pollution (CLC 1969), the 1973 International Convention for the Prevention of Pollution from Ships (MARPOL 1973), and the establishment and development of the “prevention [precautionary?] principle” in international maritime environmental law.³¹ He notes that “the Arctic region is a region that is extremely sensitive to environmental pollution, and its population and culture are completely dependent on the ecological and environmental conditions of the region.”³² He ends his historical survey with two straightforward and descriptive paragraphs on the Ilulissat Declaration of 2008 but offers no significant commentary on it.³³

Mei’s concluding paragraphs sum up his combined commercial, geopolitical, and environmental concerns about the Arctic region and convey his optimistic (perhaps even roseate) view of the future emergence of international law pertaining to the Arctic:

In a word, international legislation on maritime environmental protection has already established, from the prevention of pollution from ships and the prevention of waste dumping at sea, the basic system for combined maritime management. What is more, under the guidance of the “prevention principle,” [the system] is continually being developed and perfected.

Today, despite the variegated and complicated situation revolving around the disputes of each country pertaining to Arctic sea route rights and interests, mutual convergences of considerations regarding rights and interests also exist. Although enormous commercial rights and interests exist pertaining to the opening of Arctic sea routes, giving due consideration to the protection of maritime environment and Arctic ecology is a common understanding of each state. Protecting the maritime environment from harm and attaching importance to managing multiple ecological systems in opening and managing Arctic sea routes are basic requirements for the opening and plying [of ships] along sea routes.

Protecting the maritime environment of Arctic sea routes and safeguarding the greatest common rights and interests of humankind—doing no harm to ecological rights and interests, guarding against ecological hazards, and preventing and controlling ecological damage—[these] are issues pertaining to the opening up and management of Arctic sea routes that cannot be overlooked. Not only should the Arctic countries pay close attention

to ecological protection in the Arctic, but [all of] international society should pass perfected or newly created regulations in international law to safeguard the ecological rights and interests commonly enjoyed by all of humankind regarding the Arctic.

The scholar [Robert] Wade of the London School of Economics has said, in an article entitled “Why a Warmer Arctic Needs New Laws” and published in England’s *Financial Times*, that because of intensifying global warming, the Arctic Ocean will become the front line of battles over economic rivalries.* Against this background, international society must produce regulations pertaining to maritime environmental protection of Arctic sea routes and ecological protection of the polar regions. Carrying on discussions concerning the environmental protection of Arctic sea routes and coming up with specialized regulations are the significances which the further development of international maritime environmental legislation should have. Of course, specialized regulations should build upon the foundation of already existing international laws and regulations, turn relevant rules in current international law into the origin of laws, and direct them at the uniqueness of the Arctic ocean areas, all in order to come up with regulations in the manner of special agreements.³⁴

An article published in 2010 by Dong Yue and two other scholars at the School of Law and Political Science considers the Arctic Environmental Protection Strategy (AEPS) as a “soft law” factor in Arctic environmental protection. After wrestling with definitions and conceptualizations of soft law, the article considers AEPS along with AMAP (the Arctic Monitoring and Assessment Program), EPPR (Energy Prevention, Preparedness, and Response), PAME (Protection of the Arctic Marine Environment), and CAFF (Conservation of Arctic Flora and Fauna). It argues that although there is widespread consensus about AEPS in the international community and despite its current soft-law status as the standard or norm for Arctic environmental protection, AEPS has drawbacks such as practical limitations and lack of enforceability. This is ultimately a question of “what is” and “what ought to be,” Dong and his coauthors contend:

Although we fully recognize the Arctic environmental management functions brought into play by AEPS and the Arctic Council, we should also see that except for the aforesaid functions, it brings very few other functions into play, especially toward member state legislation, judicature, and enforcement. Many work plans and research results remain at the preliminary level, and there is no way for them to be transformed into concrete restrictive directives. Further, the Arctic Council established by AEPS as the largest inter-governmental agency has no policy-making authority, no organizational capabilities, no control over resources, and no right to restrict member states. The Arctic Council also has no standing as an international legal personality, and is only a high-level forum for “endeavoring to promote cooperation pertaining to sustainable development, environmental protection, and other common issues among Arctic states in the circum-Arctic region.” The position of the Arctic Council is similar to that of “The Organization for Security and Cooperation in Europe,” APEC [Asia-Pacific Economic Cooperation], or the Group of 77.³⁵

* Mei Hong erroneously gives the affiliation as “London School of Political Economy” (*Lundun Zhengzhi Jingji Xueyuan*) and the title as “A Warmer Arctic Needs Shipping Regulations.”—Trans.

Nonetheless, AEPS and its related organizations and measures are still useful as transitions to hard international law pertaining to the Arctic, the authors conclude:

In summation of the above, it would be extremely difficult to conclude a uniform environmental treaty in the Arctic. AEPS is absolutely not the best choice for “what ought to be,” but an inevitable choice of “what is” under the circumstances. From a certain level this explains the relationship of soft law to hard law: Under the new challenges international law faces, there are many circumstances in which soft law is a transitional means to an end. But there are also some circumstances under which soft law exists independently and [indeed] must exist independently. Further, between [soft law] and hard law there exists a relationship of “is” and “ought to be,” of “practical choice” and “ideal prospects.”³⁶

Watching the Chinese Watch the A5

After making the standard observation that the Arctic potentially contains 25 percent of the world’s oil and natural gas, 9 percent of the world’s coal, and large amounts of diamonds, gold, and uranium, Xu Zhenwei and Xu Yuanyuan use game theory and the prisoner’s dilemma to explain why Russia, Canada, and the United States do not adopt cooperative, simultaneous measures regarding the Arctic but instead opt for contentious stratagems and postures.³⁷ They make extensive use of matrices in their analysis, but at one point they briefly change their analytical metaphor from gaming to one of staged performance: “On the scramble-for-Arctic-sovereignty stage the three states busy themselves until they are dizzy: ‘After you’re through singing I’ll mount the stage.’ One side adduces evidence and another side refutes it and brings up its own evidence, around and around in circles. As yet no state has produced compelling evidence that persuades the minds and mouths of the other two. What will be the results if they just keep going on this way?”³⁸

The two authors then work through more matrices and ultimately propose a solution: cooperation and coordination. They conclude with a recommendation for noncircumpolar countries:

Noncircumpolar states should also be highly concerned with Arctic issues and not stand idly by with hands in pockets. This is because Arctic issues have a bearing on the existence and development of all humankind. The international community should press the circumpolar countries to talk things through peacefully, work out effective laws, expeditiously establish effective mechanisms for handling Arctic issues, and reasonably develop and exploit Arctic resources so that all countries can, on a cooperative basis, be winners.³⁹

Canada’s Arctic Claims

Although Canada joined UNCLOS, Mei Hong and Wang Zengzhen assert in their sprawling and discursive article on Canada and the Arctic, nobody has been able to stop Canada from attempting to designate Arctic Ocean areas adjacent to the North American mainland as Canadian internal waters. The Canadians base their stance on two

grounds, Mei and Wang observe: straight baselines and historical possession. They trace the International Court of Justice's (ICJ's) straight-baseline concept to the Fisheries Case (*United Kingdom v. Norway*) of 1951 and criticize the straight-baseline concept as vague and subjective. Nonetheless, they are convinced, Canada can always find a pretext for its claims under the straight-baseline doctrine. For instance, the sphere of Inuit activity, they observe, is not limited to the land areas of the Arctic archipelagoes but extends into perennially ice-covered areas, thus blurring the territorial distinction between ice and land. If Canada did not place these ice-covered areas under its land jurisdiction, they believe, there could be broad, negative implications for Canada's interests.⁴⁰

Mei and Wang then quote article 234 of UNCLOS, which specifies regulations for ice-covered areas:

Coastal States have the right to adopt and enforce non-discriminatory laws and regulations for the prevention, reduction and control of marine pollution from vessels in ice-covered areas within the limits of the exclusive economic zone where particularly severe climatic conditions and the presence of ice covering such areas for most of the year create obstructions or exceptional hazards to navigation, and pollution of the marine environment could cause major harm to or irreversible disturbance of the ecological balance. Such laws and regulations shall have due regard to navigation and the protection and preservation of the marine environment based on the best available scientific evidence.

Mei and Wang end their analysis of Canada's straight-baseline claims with a concession that Canada's interests, jurisdiction, and claims in the Arctic region are more substantive and reasonable than those of other countries:

The stability of the ecological system in the ice-covered areas of the Arctic is without doubt, quite fragile. Speaking from the viewpoint of the global nature of ecological protection, every country has the right and the obligation to protect the ecological environment of the Arctic Ocean. Nonetheless, speaking from a practical level, the levels of interests and interconnectedness of the areas of the Arctic Ocean adjacent to mainland North America are different than those of other countries. For example, the connectedness of Canada to the environmental interests of this region are certainly stronger than those of Britain, France, or other countries.⁴¹

Mei and Wang point out that the international community does not support Canada's claim to sovereignty over Arctic waters. UNCLOS's regulations concerning ice-covered waters are doubtless music to Canadian ears, they write, but they add that these regulations could wind up working against Canada's interests, because gradual global climate change might transform ice-covered areas into non-ice-covered ones. Thus, article 234 of UNCLOS may lose its meaning, they maintain.

They then argue once again that Britain, which once controlled huge segments of North America, never hinted at British North American authority over the Arctic Ocean. Their clear implication is that Canada inherited nothing from Britain as far as the Arctic

Ocean is concerned and that Canada's claims to it are its own twentieth-century contrivances. They seem genuinely appalled that in 1970 Canada followed common international practice and extended its territorial waters from three nautical miles to twelve, thus turning the Barrow Strait into its internal waters. Canada's designation in 1985 of the waters around the Canadian Arctic Archipelago (CAA) as internal waters is also distasteful to them, in part because it made use of the straight-baseline concept.

The two authors note with a certain alacrity that both the United States and the European Community (now the European Union) were and are strongly opposed to these Canadian territorial waters claims and have stated so publicly.⁴²

What Should China Do?

There is debate and difference among Chinese academics about policy recommendation to the government. In 2009 Li Zhenfu published two virtually identical articles on interests in the Arctic in which he recommended that China play an active, preemptive, and vigilant role in Arctic affairs.⁴³ Linda Jakobson has already pointed out Li's contention that "whoever has control over the Arctic route will control the new passage of world economics and world strategies."⁴⁴ Li argues, after applying SWOT analysis, that China should adopt a multipronged national strategy toward Arctic sea routes. First, he urges full Chinese participation in the development of Arctic sea routes. China should do this because of the obvious economic and strategic importance of the Arctic region, but also because of the wealth of natural resources there: "In addition to Russia, the Arctic littoral states Canada, the U.S., Norway, and Denmark all want to dip their cups into the rich stew of oil and natural gas in the Arctic Ocean." Involvement in the development of Arctic sea routes will, Li argues, be China's entrée into other Arctic matters as well, including the development of its natural resources. Thus, in the struggle over the Arctic "China should, at the national level, rely on real strengths in the formulation of international law, scientific investigations, and jurisdiction over resources and sea routes and do its utmost in the Arctic to make its own voice heard and strengthen its own right to speak up. Only those who become owners of resources will be able to obtain their rightful value."⁴⁵

Second, Li continues, China should determine the appropriate and opportune occasions for entering specific Arctic issues. Earlier is not necessarily always better in these matters, he advises. Nonetheless, the time for concern about Arctic sea routes is at hand. Given the large importance of these routes to Chinese economic development, he argues, it is important for China to participate in issues pertaining to them right now, while there are still no clearly defined or harmonized international mechanisms or principles for dealing with them. In this way, when international mechanisms are formed China will be in an advantageous position.

Li Zhenfu makes more ambitious recommendations for the safety and convenience of Chinese ships operating in the future in an ice-free Arctic. First, he suggests strengthened satellite monitoring of the Arctic: “The resolution of synthetic aperture radar in monitoring and tracking sea ice has already achieved accuracy to within a few meters and completely satisfies our needs. It is, however, relatively expensive. The precision of geosynchronous satellite observation at high latitudes is quite low, even to the point of unobservability.”⁴⁶ If, he then points out, polar satellites (nongeosynchronous, of course) were deployed to monitor the Northwest Passage, it would be necessary to receive data from them in one-to-two-hour cycles. This in turn would entail deploying at least three such satellites, perhaps more. Given the difficulties involved, he concludes, cooperating with several other countries in satellite monitoring of the Arctic would be better than going it alone.⁴⁷

Li then proceeds to recommendations for Chinese enterprises, which he makes within the framework of his national strategic program for opening and developing Arctic sea routes. First, he suggests developing and improving ice-resistant, ice-breaking, and liquefied natural gas (LNG) vessels.

Second, he urges shipping enterprises to take advantage of the present opportunity to extend their “value chains.” Third, he encourages the development of “fourth-party logistics” enterprises (that is, specializing in logistics, transportation, and supply-chain management). The Arctic is poised to become a region of pivotal global significance, he argues, and the region is a natural and practical catalyst for such operations.

Li concludes his ambitious set of recommendations with a note of urgency:

The issue of Arctic sea routes is becoming more and more important because the anticipated melting of the Arctic Ocean has accelerated. China cannot lose its right to speak up on this issue and must struggle for the initiative in international mechanisms pertaining to Arctic issues so that these mechanisms make accurate designations for China’s Arctic strategy. This article has adopted analytic hierarchy process and SWOT analytical methods in analyzing China’s Arctic sea route strategy and concludes that in facing the issue of Arctic sea routes, China should adopt a “winning strategy” [*zhengqu zhanlue*], seize the opportune moment, and actively participate in the formulation of harmonized mechanisms pertaining to Arctic sea route issues, all so that China acquires the rights and interests it deserves. My research results can help the [Chinese] government and enterprises understand the current condition of Arctic sea route issues, formulate Arctic sea route strategies, and come up with a practical and feasible program to aid in implementing these recommendations.⁴⁸

In another article published in 2009, Li Zhenfu starts out with observations on the Arctic’s key importance and then delves into how China should deal with obstacles to its participation in Arctic affairs: “The Arctic region contains rich stores of petroleum, natural gas, mineral, and seafood resources. Approximately one fourth of the petroleum

and natural resources untapped by humankind are in the Arctic. . . . After the Northwest Passage is opened up it will become a new 'axial sea route between Atlantic and Pacific,' and the sea route between Europe, Asia, and North America will be shortened by 5,200 to 7,000 nautical miles. Whoever controls the Arctic sea routes will control the world economy and a new internationally strategic corridor."⁴⁹

Li next outlines the practical, energy security, and world-peace significance of the Arctic region. As far as its practical significance, he has only the jejune observation that "rights, interests, and resources are, from beginning to end, the focus of international competition." The United States, Russia, and Canada are scheming to take over the natural resources and strategic utility of the Arctic region for themselves, he more or less contends, and if that situation is allowed to continue China will be reduced to the status of passive observer in Arctic affairs. China's lack of a developed and systematic approach to Arctic affairs constrains its right to speak up about them and deprives the nation of its rightful interests and international stature, which does not bode well in the long term for global security and interests, he argues.

As for the energy security significance of the Arctic, Li's perspective is more or less that internationalization of the Arctic sea routes will help China avoid piracy, terrorism, and the interruption of maritime traffic these problems can cause. Li attempts to link China's Arctic interests with world peace:

The vying for Arctic sea routes is becoming fiercer and fiercer, and if latent contradictions are not quickly and appropriately dealt with, it is possible that there will be grave threats to world peace and international security. Our country is a country that advocates peace, and it should take active interest in the state of Arctic developments. [China should] respond directly to transformations in the patterns of Arctic sea route rights and interests in order to protect world security and make its rightful contributions to the sustainable development of humankind.⁵⁰

Li seems to feel that increased Chinese participation in international mechanisms pertaining to Arctic affairs will somehow prevent Canada from exercising sovereignty over the Northwest Passage. There are, according to him, three possible options for Chinese participation in these mechanisms: *hegemonic dominance*, in which China requires the formulations, alterations, and improvements of these mechanisms to conform with its national interests; *passive receptivity*, in which China accepts formulations arrived at by these mechanisms under the influence of other countries, thereby assuming the resulting obligations and enjoying the relevant rights and interests; and *active participation* in said international mechanisms, for the benefit of both China and the rights and interests of most other countries.

Li does not consider the first option to be viable, because China "has not yet met the demands to become a leading state in international mechanisms and at present has neither

the real power nor the strategic will to act as a leading state.”⁵¹ He dismisses the second option summarily: “This is because most present international mechanisms have been guided and established by a minority of great Western powers and reflect the imperatives of their own self-interests. It would be difficult for them to avoid their existent limitations and defects. They would pose serious restrictions to China’s struggle for Arctic sea route rights and interests.”⁵²

This leads teleologically to his third and final option: active Chinese participation in international mechanisms. This may or not represent Li’s ideal option, but given present realities, it is for him obviously the only viable one:

Based on China’s present combined national power, international position, and self-interest imperatives, choosing active participation in international mechanisms tallies best with China’s basic national situation and practical needs. Active participation in the formulations, revisions, and improvements of international mechanisms dealing with Arctic affairs is an effective avenue and the best choice for realizing China’s Arctic sea route rights and interest imperatives, accelerating its economic and social development, bringing into play China’s functions as a responsible major power in the international arena, and hastening the rationalization and democratization of international relations.⁵³

Having made this major recommendation, Li then proceeds to discuss three serious impediments or obstacles to effective Chinese participation in these mechanisms. First he covers the obvious advantages of the five Arctic littoral states. The A5—Canada, Denmark (Greenland), Norway, Russia, and the United States—are already there; in August 2007 the Russians even placed a titanium flag of their nation at the bottom of the Arctic Ocean. That same month Prime Minister Stephen Harper of Canada announced the establishment of two new military facilities in the Arctic as indications of his nation’s sovereignty over the Northwest Passage region and the seabed of the Arctic Ocean. These and other actions and stances by the A5 and A8 countries will, Li argues, make it more difficult for China to participate in Arctic affairs.

Li identifies the second major impediment as, collectively, the sector principle (the “fan-shaped principle,” in Chinese parlance) and the continental shelf system. Li has special scorn for the sector principle, which Canada first announced in 1907 and which holds that Canadian territory and territorial waters extend in a pie-shaped (or fan-shaped) wedge all the way to the North Pole. The Soviet Union produced a similar pattern in 1926, announcing that all land and islands within its bounds, as yet discovered or not, were Soviet territory. Between them these Canadian and Soviet territorial claims account for the vast majority of Arctic territory, and for this reason Li finds them particularly objectionable: “Although the sector principle has met with opposition from the other Arctic Ocean littoral states Denmark, Finland [*sic*], Norway, and the U.S., at a certain level it still holds some sway. If Arctic countries insist on this principle it will undoubtedly lead

to the opened Arctic sea routes being placed within the sovereign spheres of Arctic states, and China will have lost its strategic position in Arctic sea routes.”⁵⁴

Li turns next to the legal concept of the continental shelf, another obstacle he sees to China’s pursuit of position and influence in the Arctic. Observing that the idea was first brought up by the American president Harry S. Truman, he discusses the Convention on the Continental Shelf, the incorporation of its principles within UNCLOS in 1982, the advent of two-hundred-nautical-mile exclusive economic zones, and the possible extension of outer continental shelves beyond two hundred nautical miles by application to the UN’s Commission on the Limits of the Continental Shelf (CLCS). The latter development could lead to the corresponding designation of extended shelves in the Arctic, very clearly a problem for Li, because

if the islands of the said region [the Arctic] come under clear national jurisdiction, then the countries will have territorial sovereignty over them, and in accordance with UNCLOS they can once again designate their territorial waters and the sea areas over which there is national jurisdiction. . . . According to principles formed from this, the current “public territory” [*gongtu*] in the Arctic will be very advantageous for the Arctic Ocean littoral states, and particularly for Canada and Russia. In accordance with this development, the difficulties for China’s participation in international mechanisms dealing with Arctic sea routes would be greatly increased and would influence [China’s] obtaining of its rightful rights and interests in Arctic sea routes.⁵⁵

The third and final obstacle to Chinese participation in Arctic affairs is, as Li characterizes it, a “theoretical” one, in that current international mechanisms are based on “Western” values of freedom, equality, and democracy:

The theories of the international mechanisms the world now has were all formulated under the guidance of developed Western countries. The theoretical bases for these formulations are freedom, equality, democracy, and other such Western rational concepts [*linian*]. Because of this, in their fundamental nature all international mechanisms currently in effect are, along with their theories, heavily colored by liberalism.⁵⁶ There are obvious discrepancies between the theories of international mechanisms formulated in accordance with freedom, equality, democracy, and other Western rational concepts on the one hand and the basic social system and mainstream ideology of China on the other. As a result, China’s participation in international mechanisms is restrained, and this in turn has led to China’s shortcomings in international mechanism theory and has created China’s current failure at formulating an international mechanism theoretical system which has rigorous logic and strong interpretive capabilities.⁵⁷

Having identified these obstacles, Li recommends countermeasures for surmounting them. With Canada clearly in mind, he strongly urges comprehensive and penetrating examinations of the “corrupt and abusive malpractices” (*biduan*) inherent in the sector principle and the continental shelf system. China should do this in order to participate

effectively in international mechanisms dealing with Arctic affairs and thereby to avoid losing its “right to speak up” (*huayu quan*).

According to Li there are three ways of attacking the sector principle. First of all, “the ‘sector principle’ is a theory based mainly on the principle of adjacency, and the common failing [*tongbing*] of the theory of adjacency is that it does not explore questions of authority under the conditions of common rights and interests.” Li’s second mode of attack reduces the sector principle to a crude and illegitimate landgrab by Canada and the Soviet Union: “The sector principle was a unilateral agreement concerning rights and interests, one based on the unique geographical position of the Arctic. ‘Manufactured’ as it was by the governments of Canada and the former Soviet Union in order to accrue more Arctic territory, it inevitably contains some fallacies. Further, it is not suitable for application in regions which include territorial waters.”⁵⁸

His third avenue of attack on the sector principle focuses on its lack of international acceptance: “The sector principle has been opposed by all countries except Canada and Russia. The United States and other countries have been especially strong in their opposition, and this will impel the majority of countries concerned with the rights and interests of Arctic sea routes to form an alliance of international mechanisms. This will also weaken their [Canada’s and Russia’s] influence on China’s participation in international mechanisms dealing with Arctic sea routes.”⁵⁹

Within this broad countermeasure, Li then turns his attention to continental shelf issues and attempts to dismantle and deconstruct them by distinguishing between “sovereignty” and “sovereign rights.”⁶⁰ (Interestingly enough, he does not mention China’s own use of continental shelf arguments as part of its rationale for claiming Taiwan and the Senkaku/Diaoyu Islands.)

Concerning the “continental shelf system,” our country should emphasize that the authority of littoral states over their continental shelves is sovereign authority [*zhuquan quanli*] and not sovereignty [*zhuquan*]. Even though what the Arctic Ocean countries emphasize in the Arctic region is their own sovereignty, what is produced according to the continental shelf system within the international law of the sea is sovereign authority and not sovereignty. There is a distinction between the two.⁶¹

Another countermeasure for which Li Zhenfu argues concerns the theory underpinning international mechanisms. China is deficient in this regard and not up to international standards, he argues. He recommends that China diligently construct its own theoretical system for understanding and more effectively participating in international mechanisms, which he sees as now dominated by Western views. In the construction of its theoretical system, China should bear three things in mind. First, it should base such a system on Chinese culture and what he calls “China’s own traditional diplomatic culture” (something this diplomatic historian finds somewhat bizarre and alarming).⁶² This

new theoretical system must comport with “China’s national situation” and its struggle for interests in the Arctic sea routes.

Second, Li strongly recommends deep and penetrating analysis of the theory of “Western” international mechanisms, especially as they pertain to the handling of Arctic sea route issues. This would be to the benefit of China, he argues: China could then show how scientific and reasonable its positions on Arctic affairs are. He urges his fellow Chinese to avoid a purely doctrinal or conceptual approach, recommending instead that China proceed from the rights, interests, and needs of all humanity in making its own constructive contributions to rational international dialogue on Arctic issues. Sophistication in this would, Li argues, give China “theoretical prestige” and strengthen its stature and international influence in issues concerning Arctic sea routes.

Third, Li promotes protecting and developing China’s sea power by means of UNCLOS. The transit-passage regime affords more freedom of movement for Chinese vessels than innocent passage, Li argues; it helps Chinese ships avoid being treated in a discriminatory manner or being impeded in their navigation, and it benefits China’s economic development and expansion into global sea routes. UNCLOS can also be instrumental, he argues, in securing international access to the natural resource wealth of the Arctic Ocean’s seabed: “In accordance with the spirit of UNCLOS, sea areas under international jurisdiction are mainly formed from the high seas and international waters, and it is a rule that every country enjoys equal freedom on the high seas. International seabed regions and their resources are the shared heritage and wealth of humankind.”

Li does, however, sound a note of caution about UNCLOS: if it is a “beneficial weapon” for resolving some of China’s maritime rights and interests, it cannot be the only weapon.⁶³ This is because some of UNCLOS is vague and general. He argues that China should endeavor to clear up and supplement the vague provisions of UNCLOS and also “do its best to put an end to all pretexts and opportunities used by foreign countries to encroach upon our country’s Arctic sea route rights and interests.”⁶⁴

Li ends his article with three conclusions:

1. In actuality, the Arctic is not part of any country. But in addition to the Arctic littoral states the U.S., Russia, Canada, Denmark, and Norway, other countries have announced to the outside [world] that they have partial sovereignty over the Arctic. The [current Arctic] situation resembles the scramble for sovereignty over the Antarctic in bygone years. If this type of wrangling is not handled appropriately, it could seriously influence world security. China is a newly resurgent world-class power and also a permanent member of the United Nations Security Council. How China should assume its own role in this [international] chess match and bring its own purposes into play is already an obviously very important and necessary [consideration].

2. Due to regional factors and the current system of international law, there are practical obstacles to China's participation in solving Arctic sea route issues. Also because of this, our country's obtaining of Arctic sea route rights and interests will be impeded.
3. [Natural] resources are of the utmost importance to any major power, and our country should also exert itself in striving for the gigantic resources of the Arctic. For us, staying aloof from [Arctic] affairs would, without a doubt, be automatic relinquishment [of our interests in them]. Research has shown that we can punch through obstacles and actively participate in the solutions to Arctic sea route issues. Further, as a signatory state to UNCLOS, we have the right to share in rights to the [natural] resources of the region and to freely enter into the Arctic and other regions of the high seas. The government of China should take active interest in the state of Arctic developments and make our own reactions with specific regard [to them] so that we are not marginalized in this new world hot spot region [and in this way] make our rightful contributions to the protection of world security and the sustainable development of humankind.⁶⁵

In yet a further article, published in 2010, Li Zhenfu applies another fashionable theoretical approach, in this case complex networks, to China's interests in Arctic geopolitical issues. He ends up suggesting geopolitical tactics that have some overlap with the recommendations of his 2009 articles.

1. *Protect and Develop China's Sea Power.* In present and future geopolitical issues pertaining to the Arctic and Arctic sea routes, China should, first of all, abide by relevant regulations in UNCLOS and also effectively make advantageous use of the Convention in protecting our country's geopolitical rights and interests in Arctic sea routes. Secondly, we should take the new circumstances which have appeared since the Convention took effect as turning points, adopting follow-up actions and flexible, dexterous measures, doing our utmost to cause the Convention to be useful to us, tending toward its advantages and avoiding its disadvantages, applying practical actions to compensate for the vague and unclear articles in the convention, and protecting at the highest limits our country's rights and interests pertaining to Arctic sea routes.
2. *Formulate a Contingency Plan for Dealing with Crises in Geopolitical Issues.* At present China needs to engage in deep introspections and all-around considerations of its geopolitical tactics concerning Arctic sea route issues. First, we should adhere to inherent principles and actively give impetus to international society's establishment of frameworks and mechanisms for the common opening up and exploitation of the Arctic and Arctic sea routes and exert ourselves to ensure the openness and fairness of Arctic and Arctic sea route development so that the Arctic sea region brings benefit to all humankind and not [merely] individual countries and [nonstate] actors. Second, starting now we must set our hands to preparing for responses to situations involving forcible, out-of-control [attempts at] carving up the [Arctic] melon and Arctic sea route rights and interests. This includes clearly expressing to international society our worries and resolute positions in this regard, establishing a combined scientific research and crisis response center, formulating long-term Arctic and Arctic sea route development strategies and a contingency plan for dealing with crises in the geopolitical patterns of Arctic sea routes, increasing the strength of [China's] involvement in scientific investigations

and polar explorations (especially so that the possibility of our country's open declarations of sovereignty over the Arctic and Arctic sea routes, as well as territorial claims, cannot be eliminated), and building up an appropriate oceangoing navigational strength as a guarantee [of our Arctic rights and interests].

3. *Diligently Structure a Chinese Geopolitical Theory System for the Arctic and Arctic Sea Routes.* Of the obstacles our country faces in the fight over geopolitical rights and interests pertaining to Arctic sea routes, more are embodied by the phenomena of inconsistencies which exist between harmonized international mechanisms on the one hand and our country's culture and theoretical systems on the other. Accordingly, China should actively participate in structuring Arctic sea route geopolitical international mechanisms and also establish a Chinese Arctic sea route geopolitical theory system. In establishing a Chinese Arctic sea route geopolitical theory system, we should stress holding to the following: First, deeply researching Western geopolitical theory, drawing lessons from its positive factors for our use and injecting new impetus and vitality into traditional Chinese Arctic sea route geopolitical concepts; second, with a foothold in traditional Chinese culture, starting out from our own geopolitical philosophy and geopolitical concepts and structuring a theoretical system which tallies with China's national situation and practical needs; and third, consciously punching through the trammels of some customary and set ways of thinking, doing more to prove from the point of view of theory the reasonableness and scientific nature of our own positions and stances, and not just analyzing Arctic sea route geopolitical issues from the point of view of morals and ethics.⁶⁶

Not everyone in China concerned with Arctic affairs has been persuaded by Li Zhenfu's energetic recommendations and his seeming methodological and analytical rigor. Mei Hong and Wang Zengzhen find the possibility of internationalizing Arctic waters infinitesimally small and the resolution of the legal position of these waters fraught with difficulties. Such major controversial issues should, they argue in their article published in 2010, be set aside in favor of cooperation on issues on which there is some consensus or common understanding, such as international environmental law. From there China can, they continue, endeavor to broaden and deepen its participation in international cooperative efforts.

In this connection Mei and Wang make three recommendations. First, China should strive to elevate environmental protection in the Arctic to the level of international cooperation. Nonetheless, they recognize that deepening such cooperation may be quite difficult, given the political and ideological obstacles involved. China has much to learn from advanced countries about environmental protection, they point out, and in the process of international cooperation on this issue China might encounter opportunities for more substantive political cooperation as well.

Their second recommendation is presented indirectly, as a series of pointed questions: How many icebreakers does China have? How many Arctic expeditions has China organized? How capable is China of organizing a complete and independent scientific

expedition to the Arctic? (The strong implication of these questions is, of course, that China ought to get busy building icebreakers and launching Arctic expeditions.) Chinese scholars have a long and difficult road ahead of them, Mei and Wang maintain, if they are to get China's viewpoints in circulation. If China wants the right to speak up on, and participate in, Arctic issues, the Chinese people and government need to work effectively together, they argue.

Third, they recommend that China not press, for the time being, for a uniform Arctic treaty, because the negotiations for it would be too difficult and obstacle ridden. They conclude that China should instead seek to cooperate where cooperation is possible and wait until the time is right for a uniform Arctic treaty.⁶⁷

Nonetheless, the two authors adhere to the proposition that the Arctic does not belong to any one state or group of states but is an international region and issue:

The Arctic sea areas constitute a region for the common and shared enjoyment of humankind. The entire series of activities in Arctic sea areas such as ecological protection, environmental pollution prevention, and the development of natural resources does not depend on the strength of one or more circum-Arctic states to be up to the task. In consideration of the future of humankind, strengthened cooperation by every country in Arctic sea area issues is very important. The strategy for sustainable development demands that rational people carefully deliberate on how to open up the Arctic sea areas, and also that they establish good legal order in the Arctic. It can be imagined that an Arctic sea area which embodies the civilization of humankind and yet does not lose its natural characteristics will provide important development space for all humankind. In this process, although we are not optimistic about the prospects for internationalizing the Arctic, we do support our country's active participation in Arctic affairs.⁶⁸

Some Chinese academics writing on Arctic affairs have sought to remind their countrymen and government of the uncertainties and perils of the region's sea routes. Their sobering observations about the viability of directing extensive shipping through them might explain in part the restraint Beijing has thus far displayed in its policy on Arctic affairs:

Chinese Arctic specialists acknowledge the same uncertainties as many of their Western counterparts when contemplating how lucrative the Arctic [sea] routes would ultimately be in comparison to the current routes through the Suez and Panama canals. Although passage along the Northern Sea Route from eastern China to Western Europe would substantially shorten the journey, high insurance premiums, lack of infrastructure and harsh conditions may make the Arctic [sea] routes commercially unviable, at least in the short term. Drift ice will continue to be a problem for ships even when the Arctic passages are officially deemed ice-free. Because of the melting of Greenland's ice cap, the number of icebergs is expected to increase, forcing ships to proceed at a slow speed and make detours. Furthermore, the shallow depth of some of the passages along the shipping routes (in particular the Bering Strait) makes the Arctic unsuited for big cargo ships.⁶⁹

It is noteworthy that Canadian geographer Frédéric Lasserre has made similar observations: “The Northwest Passage is not a deepwater passage: larger tankers and carriers will not be able to use it, at least not if they are loaded with cargo, unless they use McClure Strait, which only recently (2007) saw the ice disappear for a very short period of time.”⁷⁰ Nonetheless, estimates and predictions of the first occurrence of ice-free summer seasons for the Arctic vary widely, ranging from as early as 2013 to as late as 2060. According to U.S. Navy rear admiral David Titley, “We believe that sometime between 2035 and 2040, there is a pretty good chance that the Arctic Ocean will be essentially ice-free for about a month.”⁷¹

The Arctic and Antarctica: Poles Apart?

Could a model, analogue, or precedent for resolving claims to the Arctic and preventing war in the region be found in the suspension of competing claims of sovereignty over Antarctica with the Antarctic Treaty System of 1959? Li Zhenfu notes in passing that the current struggle over the Arctic bears some resemblance to the former struggle over the Antarctic;⁷² Jia Yu of the China Institute for Marine Affairs in Beijing suggests that the settlement of the Antarctic issue might be of use in current Arctic disputes: “The ‘Antarctic Treaty’ system froze the claims of relevant countries to territorial sovereignty over mainland Antarctica and guaranteed the ‘deep slumber’ of the continent of Antarctica for many decades. Could a more concrete treaty for the Arctic also be formulated, one that would cause the opening up and exploitation of the Arctic region to benefit all humankind?”⁷³

But in China the consensus among in-depth considerations of the Antarctic model seems to be that it is inapplicable to the Arctic situation. For example, in an article published in 2009, Dong Yue of the Ocean University of China expresses doubt that the Antarctic Treaty could ever be a model or precedent for a corresponding Arctic Treaty and argues that the framework for the international law of the sea is a more hopeful prospect for resolving Arctic disputes. Dong’s reasons are, first, the foundational factors of the Antarctic legal system differ greatly from those of the Arctic, the Arctic being not a solitary continent but a region in which eight states exist; second, the sovereignty of Arctic states in the Arctic cannot be frozen, and development in the Arctic has already been a historical reality for some time; and third, there are basic differences between the Svalbard or Spitsbergen Treaty and the Antarctic Treaty, with the former affirming Norway’s sovereignty over the Svalbard Islands but the latter freezing all claims of sovereignty over the Arctic.⁷⁴ Dong also points out that the Ilulissat Declaration of 2008 indicates this impossibility:

In summation of the above, establishing in the Arctic a uniform treaty system similar to the Antarctic Treaty, thereby setting aside disputes and engaging in joint development, is not feasible. The actions of Arctic countries are proof of this article’s viewpoints. The five

Arctic littoral states (Canada, Denmark, Norway, Russia, and the United States) stated in the Ilulissat Declaration that “this framework provides a solid foundation for responsible management by the five coastal States and other users of this Ocean through national implementation and application of relevant provisions. We therefore see no need to develop a new comprehensive international legal regime to govern the Arctic Ocean.” This point shows that the A5 states already uniformly reject the possibility of accepting the conclusion of a new Antarctic-style uniform treaty.⁷⁵

Dong’s hope and contention is that the current international law of the sea, not an ideal treaty modeled after the Antarctic Treaty out there somewhere on the Platonic plane, can serve as the basis for future resolutions to current Arctic disputes and that China will have some input in this process:

So where, after all, is the path for resolving Arctic legal disputes? The declaration of the five states gives the answer just the same, and that is in making full use of the current systematic framework of the international law of the sea. In actuality, up until the present the relevant stances of the Arctic littoral countries toward outer continental shelves have not broken through the system of regulations established in UNCLOS. Further, the relevant countries also recognize that the [UN’s] Continental Shelf Commission has decision-making authority [*sic*] toward their stances. The current influence of our country in Arctic legal affairs is, for the most part, not large and is still stuck in the corner of scientific research. But proceeding from our country’s strategic rights and interests, our country can, on the basis of issues pertaining to the extension of continental shelves and the harmonization of our relevant stances toward outer continental shelves, pay close attention at the highest levels to the applications [to the Continental Shelf Commission] of Arctic countries for their continental shelves. [We can] emphasize the international position of the Arctic region’s seabed areas and high seas, expand the space of the Arctic as global public territory, and leave behind space for the future search for rights and interests in the Arctic.⁷⁶

Mei and Wang doubt very much the utility of the Antarctic model, and they cite, in order to dispute, Chinese scholars who think otherwise. Any analogy between the Antarctic and the Arctic in international terms is, they argue, inappropriate:

First, the isolation of Antarctica determined that Antarctic international isolation would not exert substantial influence on the strategic rights and interests of each state involved. The Arctic, however, is quite different. The internationalization of the Arctic will certainly be hugely influential on the strategic rights and interests of the Arctic states.* Russia and Canada especially will not tolerate the internationalization of the Arctic.

Second, taking note of the background that led to the “Antarctic Treaty,” it is not difficult to see that although some countries discovered mainland Antarctica very early on, they were still unable to carry out effective opening up of mainland Antarctica due to their levels of technological development at the time. That is to say, none of these countries obtained substantial rights and interests in Antarctica, and this made the internationalization of Antarctica become a possibility. Let us ask: If the United States, England, France, and others had carried out large-scale opening up of Antarctica at the time, could Antarctica

* *Beiji zhoubian guojia* here refers, I think, to the A8 and not just the five Arctic littoral states.—Trans.

still have been internationalized? Look again at the Arctic region, where Russia, the United States, Canada, and other powerful maritime states struck first and gained the upper hand, getting an early start in research on topics relating to the Arctic (including research on the legal position of the Arctic and research on Arctic natural science). They have already realized, or in the not-too-distant future will realize, their rights and interests in the Arctic region. Against this background, will they forsake these rights and interests and make concessions?

Third, the positions of the circum-Arctic states in the Arctic are, in reality, unequal. For example, Russia has an absolute advantage in the numbers of ice-breaking vessels, and from Russia's "flag-planting incident" can be seen the overbearing manner of this big northern lunk. The minority circum-Arctic countries have difficulties [even] in reaching common understandings [*heyi*], to say nothing of drawing up an international Arctic treaty.⁷⁷

Liu and Yang give four reasons for their similar pessimism. First, Antarctica is a continent and the only piece of land in the world without a sovereign, whereas in the Arctic there are several states with territorial sovereignty, exclusive economic zones, and continental shelves; second, article 234 of UNCLOS already addresses ice-covered sea areas, and UNCLOS is widely applied in the Arctic region; third, many bilateral and multilateral agreements pertaining to the Arctic have already been concluded under the influence of UNCLOS, including AEPS; and fourth, the Antarctic is a nonmilitarized region, whereas nuclear weapons are present in the Arctic, the most militarized region in the world.⁷⁸

It is worth noting that reservations by individual Chinese analysts about the analogical applicability of the Antarctic Treaty to current Arctic affairs dovetail with U.S. foreign policy on the issue: "The geopolitical circumstances of the Arctic region differ sufficiently from those of the Antarctic region such that an 'Arctic Treaty' of broad scope—along the lines of the Antarctic Treaty—is not appropriate or necessary."⁷⁹

The Arctic in China's Popular Media

Coverage of Arctic issues is not limited to academic venues in China, and the subject is gradually attracting attention in China's mass media. A significant amount of the public-media commentary and reporting on military affairs in recent years has been by the eloquent and telegenic Shao Yongling, a female tutor to doctoral students and holder of the military rank of senior colonel at China's Second Artillery Academy. Shao has regularly appeared in programs on CCTV 7, a television channel in China's state-controlled media empire, and is currently a distinguished guest speaker on the weekend program *Around the World's Military Affairs in Sixty Minutes*. Shao published a popular book in March 2010 on the relationship between naval might and the rise of great powers, and in it is a chapter entitled "Whose Arctic Is It?"⁸⁰

In *Dili jiaoyu* (*Geographical Education*), a periodical largely for middle-school educators, a high school teacher in Jiangsu Province wrote in 2009 on global warming and its influence on the hydrology and biology of the Arctic, in an article that turned to an analysis of its global social and economic impacts.⁸¹

The Finnish scholar Linda Jakobson's landmark 2010 study of China's interests in the Arctic and its preparations for an ice-free Arctic region has led to some commentary and discussion in popular Chinese media, as in the 2 March 2010 edition of *Fazhi wanbao*, which presented a straightforward account of Jakobson's observations and conclusions.⁸² But another article, published on 6 March, was critical of Jakobson's study, characterizing it as speculative in nature and alleging that it failed to provide evidence for its contentions.⁸³

The November 2010 issue of *Dangdai haijun* contains four articles on the Arctic—an overview of international angling for territorial position in the Arctic and three fulminations against, respectively, Russia for its flag-planting “incident” on the bottom of the Arctic Sea, the United States for playing the environmental card as a ploy for achieving hegemony over the Arctic, and Canada for regarding the Arctic as its “backyard.”⁸⁴

The Chinese Government Speaks—a Little

Although China's Arctic policy is currently being debated and is not yet fully formulated, some of its contours are emerging fairly clearly. First and foremost, it is already obvious that China views the Arctic as international territory and not the private property or exclusive preserve of the A5 or A8. Beyond that, the Chinese government seems, in open speeches and publications at least, to be making rather optimistic noises and gestures as to future amicable resolution of present Arctic disputes.

In 2009 Hu Zhengyue, China's assistant minister of foreign affairs, gave an address on the Chinese government's perspectives at an Arctic forum in Norway's Svalbard Archipelago. He started out by depicting the Arctic as a global concern: “The Arctic occupies a unique position for all of us as humankind who live on the blue planet. The changing natural environment in the Arctic is enormously influential toward the existence and environment of all humankind. The Arctic is a sensitive region in global climate change. The entire planet in turn reacts to natural changes in the Arctic, especially the climate of the northern hemisphere.”⁸⁵

From here Hu segued into a characterization of China as a country in the northern hemisphere and therefore a rightful participant in Arctic affairs:

China is a northern hemisphere country, and changes in the cold air activity of the Arctic region and the atmospheric circulation of high-latitude climes have direct influences on China's weather and climate and obvious effects on China's ecological and environmental

systems and its agricultural production and other social and economic activities. The melting of Arctic ice quickly raises global sea levels and influences the economic and social development of China's eastern coastal regions. Arctic matters do, therefore, have multiple bearings on China's natural environment, economy, and society. They influence the sustainability of China's development. The government of China is, therefore, greatly concerned about them. China needs to understand more about climate change in the Arctic and more about the influence of this type of change on China. (p. 54)

Hu then went on to describe China's recent scientific activities in the Arctic—their beginning in the mid-1990s, China's formal joining of the International Arctic Science Committee in 1996, and three combined Arctic Ocean investigations, in 1999, 2003, and 2008. In 2004, he noted, China established the Arctic Yellow River Station in the Arctic (in fact, on Spitsbergen Island) for scientific research into climate change and ecological and maritime subjects. That China has already become a significant player in the Arctic game was his strong implication.

Having China's own current contentious issues of exclusive economic zones and continental shelves in mind, Hu was careful to indicate that China would show respect for these concerns in the Arctic:

China takes note of the exclusive economic zones and outer continental shelves of relevant countries in the Arctic region, especially since the extended continental shelves have yet to be designated. China considers that the undetermined nature of the legal position of the maritime areas of the Arctic region might influence the further development of cooperation in the Arctic and hopes that relevant countries will, through consultation and on the basis of international law and scientific data, come to an early resolution of relevant issues. (p. 55)

Hu's comments to this point amount to little more than standard diplomatic bureaucrat-ese, but now he adds a broad hint that Arctic countries should not attempt to lock up for themselves the natural resource wealth of the Arctic:

While determining the demarcations of extended continental shelves, the countries of the Arctic region should, in addition to appropriately handling relations among themselves, give full and careful consideration to the relationship between extended continental shelves and international seabed areas which are the shared inherited wealth of all humankind. Arctic countries should protect the balance between the interests of states with shorelines on the Arctic Ocean and the shared interests of the international community. (p. 55)

Nonetheless, Hu recognizes the Arctic issue as mainly a regional issue, apparently contradicting Guo Peiqing's earlier insistence in 2008 that "circumpolar nations have to understand that Arctic affairs are not only regional issues but also international ones."⁸⁶ Hu does observe, however, that China prefers a cooperative international approach to the Arctic whenever possible:

The Arctic issue is mainly a regional issue, but it also involves climate change, shipping, and other trans-regional issues that require strengthened cooperation at regional and international levels. China is very happy to observe that over the past 20 years, Arctic cooperation has continually deepened, broadened, and is becoming more mechanized with each passing day. Cooperation is now the mainstream of Arctic affairs, and China respects the sovereignty and jurisdictional authority enjoyed by states in the Arctic region in accordance with international law. China is willing to strengthen mutually beneficial cooperation with all parties involved in relevant Arctic issues and work diligently for the peace, stability, and sustainable development of the Arctic region.⁸⁷

It is noteworthy that Hu did not comment on the issue of Canadian sovereignty over the Northwest Passage. Frédéric Lasserre observes that Beijing has officially remained silent regarding Canada's position that the passage is internal Canadian waters: "China has not publicly stated its position concerning the status of the Northwest Passage, but it would certainly be interested in securing a mechanism that could provide for a safe and fast passage to its energy-hungry markets. That does not mean it will seek to undermine Canada's stance on sovereignty over the Northwest Passage; Beijing has remained neutral on the sovereignty issue."⁸⁸

In a 2010 article, Jia Yu, of the State Oceanic Administration (Guojia Haiyangju), gives a fairly detailed historical overview of Arctic territorial issues all the way back to the Tzar Alexander I's declaration of sovereignty over parts of North America in 1821.⁸⁹ He even briefly covers the outstanding issue between Canada and Denmark over Hans Island. His purpose in all of this, never explicitly stated, seems to be to show that many issues pertaining to territorial waters, exclusive economic zones, and continental shelves have been debated and resolved in the past and that remaining issues will likely be resolved in the future: "Of the disputes over maritime boundaries in the Arctic region, some have been successfully resolved; some are still being debated, and some have been alleviated through joint development, fishery agreements, and other such ways."⁹⁰

Jia covers the 1957 agreement on the maritime boundary between Norway and the Soviet Union in the Varangerfjorden (the coastal region of the land boundary between Norway and the Soviet Union) in the Barents Sea; the agreement on the continental shelf boundary between Canada and Greenland in 1981 and 1982; the 1990 treaty between the United States and the Soviet Union on the maritime boundary between the Chukchi Sea (north of the Bering Sea) and the Bering Sea; the 1993 decision of the ICJ regarding the designation of the continental shelf and fishery area boundaries between Norway and Denmark and the subsequent Danish-Norwegian treaty in 1995; and the agreement between Norway and Russia in 2007 on the continental shelf. He also covers the outstanding dispute between Canada and the United States over the Beaufort Sea maritime boundary. (At stake in this dispute are over six thousand square nautical miles of sea area above rich oil and natural-gas resources.) He concludes with the observation

that there remain outstanding disputes between Iceland and Denmark over maritime boundaries between Iceland and the Faeroe Islands and between Norway's Svalbard Islands and Greenland.⁹¹

Next Jia covers the thorny issue of outer continental shelves extending beyond two hundred nautical miles and looks at current applications by Norway, Russia, Canada, and Denmark to the UN's Commission on the Limits of the Continental Shelf to secure these extensions for themselves. He points out that the United States, which has yet to accede to UNCLOS, has "criticized" these applications.⁹² He then drops a broad and subtly optimistic hint that the Svalbard Treaty (which China joined in 1925) and UNCLOS will provide precedents and momentum for the eventual resolution of other current or incipient Arctic issues:

The main body of the Arctic region is the Arctic Ocean. Intimately related to this special geographical feature [is the fact that] dispositions of territorial sovereignty in the Arctic region have gone through several previous changes and have long since been relegated to the dust. UNCLOS affirmed Norway's territorial sovereignty over Svalbard Islands, thereby resolving the disposition of sovereignty over the Svalbard Islands as well as guaranteeing their relative long-term stability. Even so, Norway's "full and complete sovereignty" over the Svalbard Islands is restrained by the vessels and citizens of each signatory state in the Svalbard Islands and by their fishing and hunting rights in internal waters. This causes Norway's sovereignty over the Svalbard Islands to differ to some extent from the paramount completeness of territorial sovereignty enjoyed by states in traditional international law. Articles of the Svalbard Treaty are now facing issues of integration with the modern legal system established by UNCLOS. At present only Canada and Denmark are standing their ground over Hans Island. At this same time, especially since the 1980s of the twentieth century, relevant countries have concluded and signed maritime boundary treaties and have resolved, or are in the process of resolving, issues pertaining to the boundaries of exclusive economic zones and continental shelves.⁹³

Jia here quite likely means to suggest or hint that the Svalbard Treaty could be used as a model, precedent, or analogue for defining Canada's sovereignty over the Northwest Passage. This idea has been noted and dismissed as impossible in an article published in Canada.⁹⁴

Jia next concludes his article with two paragraphs setting out his opinion (and very likely the Chinese government's as well) that the Arctic, beyond the extended continental shelves of the A5, belongs to the world:

One of the obvious peculiarities of the disputes over sea area boundary delimitation in the Arctic region is the inclusion among them of issues pertaining to continental shelves beyond two hundred nautical miles. This forms unique "boundary limits" between the national jurisdictional sea areas of littoral states on the one hand and international seabed regions ("regions") on the other. According to UNCLOS, "regions" and their resources beyond the limits of the outer continental shelves of littoral states are the commonly

inherited wealth of humankind, and the International Seabed Authority exercises, on behalf of all humankind, the rights to the “regions” and their resources. The two-hundred-nautical-mile outer continental shelves of littoral states on the one hand and the “regions” on the other are a zero-sum game—the tendency of excessively extending the continental shelves of littoral states is certainly to shrink the scope of the “regions,” thereby influencing the rights and interests of all humankind. Whether and how much of the seabed of the Arctic Ocean belongs to the continental shelves of littoral states [are questions that] await the deliberations and recommendations of the Commission on the Limits of the Continental Shelf in response to Russian and Norwegian boundary submissions and future boundary limitation cases brought by other circum-Arctic countries.

The “Antarctic Treaty” system froze the claims of relevant countries to territorial sovereignty over mainland Antarctica and guaranteed the “deep slumber” of the continent of Antarctica for many decades. Could a more concrete treaty for the Arctic also be formulated, one which would cause the opening up and exploitation of the Arctic region to benefit all humankind? Whether this kind of treaty can be produced or not, there is one point that needs to be clear and definite: The Arctic Ocean is not the backyard of any country or group of countries and is not the “private property” of the Arctic Ocean littoral states. As with Earth’s other oceans, under the framework of international law, every country in the world has an equal right to exploit the Arctic Ocean.⁹⁵

Caution—for the Time Being

American policy makers should be aware that China’s recent interest in Arctic affairs is not an evanescent fancy or a passing political fad but a serious, new, incipient policy direction. China is taking concrete diplomatic steps to ensure that it becomes a player in the Arctic game and eventually will have what it regards as its fair share of access to Arctic resources and sea routes. China has already committed substantial human, institutional, and naval resources to its Arctic interests and will continue to do so, likely at an accelerated rate, in the future. The Polar Research Institute of China (Zhongguo Jidi Yanjiu Zhongxin), with a staff of 124 people headquartered in Shanghai, supervises three Chinese research stations in the Antarctic and one in the Arctic. It also manages the Chinese icebreaker *Xuelong* (Snow Dragon), a light, Ukraine-built, nonnuclear vessel with a displacement of twenty-one thousand tons, used in both Arctic and Antarctic scientific expeditions.⁹⁶ *Xuelong*, the largest conventionally powered icebreaker in the world, reached eighty-eight degrees north latitude in August 2010, and its helicopter took Chinese Arctic researchers to the North Pole on 20 August 2010, a Chinese first. The Arctic and Antarctic Administration (Guojia Haiyangju Jidi Kaocha Bangongshi), under the State Oceanic Administration, also manages Chinese scientific research activity in the Arctic.⁹⁷ China currently plans to build its own smaller (eight thousand tons displacement) sister icebreaker to *Xuelong*, at a cost of U.S.\$300 million, and to have it operational by 2013. “Between the two ships,” the *New York Times* observed in May 2010, “China will have larger and more modern icebreakers than either the United States or

Canada.”⁹⁸ Russia, for its part, has over a dozen heavy icebreakers, seven of them nuclear powered.

The United States should, of course, make heavy icebreakers a national defense priority. Many Americans would be shocked to learn that both of their country’s heavy icebreakers designed for use in the thickest ice are decrepit, decades-old vessels and are at this writing broken down or otherwise unavailable. One, *Polar Star*, is in dry dock in Seattle for an overhaul and will not be operational again until 2013. The other, *Polar Sea*, is out of service and, at this writing, will not be seaworthy again until sometime in 2011. (*Polar Sea* was commissioned in 1978 with a projected thirty-year service life; an overhaul in 2006 extended its service life to 2014.)⁹⁹ There is a third icebreaker, USCGC *Healy*, but it is not designed for heavy ice. The *New York Times* bemoaned the resultant state of American Arctic defenses on 25 June 2010 in stark terms:

Even as the long-term trend in the Arctic is toward less sea ice in summers, for decades to come—and routinely in other seasons—any nation with interests in the far north will need to be able to navigate in heavy ice.

Until Congress and the White House come up with a plan to round up about \$1.5 billion to keep the *Polar Sea* and *Polar Star* running, and another \$1 billion or so to build replacements, the United States is an Arctic nation without that capacity.¹⁰⁰

How can the U.S. Coast Guard guard the Arctic coasts of the United States without the required vessels? Icebreakers are not Cold War relics but essential components of Arctic security. The need to repair and make more of them is pressing and real, now, and it will be in the future.

For its part, China is working discreetly and energetically to foster good relations with Arctic states. Beijing is currently quite annoyed at Norway for awarding Chinese dissident Liu Xiaobo the Nobel Peace Prize on 8 October 2010 and is making noises about damage to Sino-Norwegian relations. Already China has canceled some official contacts between the two countries. But given China’s heavy reliance on Norway in its maneuvering for advantage in the Arctic region, it is quite unlikely that any damage will be substantial or enduring. *Russia Today* reported on 5 October 2010 that the two states very much need each other:

Back in August this year, Norwegian Foreign Minister Jonas Gahr Støre praised China’s cooperation in the Arctic and said it should go farther in the future. Speaking at the China Institute of International Studies Forum in Beijing, he said that Oslo had observed “China’s technological interest and capability in the Arctic.”

“We would like to see how Norwegian and Chinese research groups on the environment come together in highly complementary areas of interest and go deeper, in areas ranging from natural science to geopolitics,” he said, cited *Beijing Review*. “It is important for

Norway to engage with China in dialogue about all issues relevant in the region,” Støre added.¹⁰¹

China is also cultivating close relationships with Iceland:

Meanwhile, Beijing is also actively strengthening ties with another player in the region— Iceland. The area of particular interest for China is new sea routes which are opening due to ice melting. Citing Icelandic President Ólafur Ragnar Grímsson[’s] interview with Norwegian broadcaster NRK, *Barents Observer* wrote that over the past two years relations between Iceland and China have picked up pace.

Following the 2008 financial crisis, when the banks collapsed in Iceland, “we faced a situation, where there was no positive helping hand coming either from Europe or the United States, and I and the government decided to approach the government of China . . . to see if China could show some friendship in these times of difficulties,” Grímsson said. He added that the bilateral talks between the leaderships of the two countries indicated that China is keen “to cooperate with Iceland and the other countries in the Arctic region on what is happening in the Arctic and the northern regions and also of what are the implications of the northern sea routes opening up over the next few decades,” the president is quoted as telling NRK.¹⁰²

“China can be expected to seek a role in determining the political framework and legal foundation for future Arctic activities,” Linda Jakobson noted in early 2010.¹⁰³ It seems that China respects, in principle, the UN’s continental shelf system. But China very much wants a voice in Arctic affairs, and it will likely seek to influence, or at least comment emphatically upon, the decision-making processes and deliberations of the UN’s Continental Shelf Commission. While there is likely little, as a practical matter, that China could do to influence the decisions of the commission, in the future China will monitor very closely the extended-continental-shelf claims of A5 countries, will likely express its opinions about them, and may even dispute some of them. Some Chinese academics see the stakes for China in all of this as huge: “Guo [Peiqing] has estimated that about 88 percent of the seabed of the Arctic Ocean would be under the control of the Arctic littoral states if the Commission on the Limits of the Continental Shelf were to approve all the existing or expected claims to the Arctic Ocean continental shelf.”¹⁰⁴

A Russo-Chinese entente concerning Arctic affairs seems unlikely. China is particularly wary of Russia’s designs and intentions in the Arctic, and the feeling would seem to be mutual.¹⁰⁵ In fact, China seems to be more at odds with Russia over Arctic affairs than with any other A5 or A8 state. There could, however, be cooperation among East Asian states regarding the Arctic issue.¹⁰⁶

The Svalbard Treaty affirms “the full and absolute sovereignty of Norway over the Archipelago of Spitsbergen” but qualifies this sovereignty to some extent by stipulating the rights of the nationals of all signatory states to “equal liberty of access and entry for any reason or object whatever to the waters, fjords, and ports” of the islands. The treaty

further restricts Norway from militarizing the archipelago.¹⁰⁷ It was on the basis of the provisions of this treaty that China managed in 2004 to establish a physical presence in the Arctic by constructing its Arctic Yellow River Station (Huanghe Zhan) in the Svalbard Archipelago/Spitsbergen (in the Barents Sea, well inside the Arctic Circle), a facility for oceanic and climatological research. China became the eighth state to establish research facilities there. Some (but certainly not all) Chinese academics and governmental officials who comment on Arctic affairs have indirectly and tentatively floated (or at least broadly hinted at) the possibility of using the Svalbard Treaty as a model or precedent for resolving Canada's claims of sovereignty over the Northwest Passage as internal Canadian waters. Their suggestion seems more or less to be that Canada might be allowed Svalbard-like "full and absolute sovereignty" over the passage but with the proviso that international shipping be allowed passage through it with something like "equal liberty of access and entry for any reason or object whatever." But this of course would be quite unpalatable to Canada, and it seems naive to assume or hope that the Canadian government and public would ever accept it.

The United States should neither underestimate China's burgeoning interests in the Arctic region nor allow itself to be outdone by China. The Chinese have become acute observers of the region. According to Dr. Robert Huebert, an internationally renowned Canadian expert on the Arctic at the University of Calgary, China has shown itself to be a quick study in Arctic affairs and has been doing a lot of very good homework on the region.¹⁰⁸ The government of the United States should pay close attention to China's engagement in Arctic affairs and consider its possible security implications, especially since the U.S. Navy in late 2009 observed that increasing economic and scientific activities in the Arctic are "potential sources of competition and conflict for access and natural resources."¹⁰⁹

The United States and its allies should be prepared for possible Chinese submarine incursions into the Arctic. A study published in Beijing in 2002 by Military Science applies Sunzi to submarine warfare and points out the value of the submarine in high-tech intelligence gathering and surveillance: "In the modern technology and information age, the marvelous way [*dao*] of employing spies in waging submarine warfare is indeed the application of high new technology."¹¹⁰ China has placed strong new emphasis on strengthening and updating its submarine fleet, and its submarines have recently stalked American naval vessels. Given this trend and also the brazen violation of Japanese territorial waters by a Chinese submarine in 2004, it should not be too surprising in the future to find or detect one or more Chinese submarines lurking in the cold and murky depths of the Arctic, perhaps even in the territorial Arctic waters of the United States or Canada.¹¹¹ In Cold War history there is much precedent for Soviet and American peacetime submarine operations and maneuvers in the Arctic.¹¹²

It is, however, also important not to *overestimate* the importance of the Arctic in most publicly available Chinese naval strategic thinking. Two important books by major Chinese naval strategists published in 2010 discuss little if anything substantive regarding Chinese interests in the Arctic, but they cover the Indian Ocean quite extensively.¹¹³ One recent book on Chinese seapower does, however, have the insight and foresight to devote significant coverage to Arctic and Antarctic affairs.¹¹⁴

The United States should accede to UNCLOS. This would be difficult currently, because a small but obstreperous group of senators is holding up accession, a regrettable and unfortunate situation since the United States can ill afford to be marginalized or hampered and hobbled in Arctic affairs while other A5 states busily prepare extended-continental-shelf territorial claims. These senators should rethink their positions in light of China's recent and developing engagement in Arctic affairs and note that at least two Chinese commentators have concluded that continual American nonaccession will be detrimental to U.S. interests.¹¹⁵

As well, an American naval analyst has recently observed that "the failure of the United States to accede to UNCLOS gives China unchallenged diplomatic space to attempt to shape law of the sea in its favor."¹¹⁶

Ironically, the United States is currently preparing its own extended-continental-shelf claims in the Arctic even though it is not party to UNCLOS, which provides the mechanism for submitting such claims. American legal rationale and liabilities pertaining to this are published on the *Extended Continental Shelf Project* website of the U.S. government:

The United States is the only Arctic country, and indeed one of the few countries in the world, that has not yet ratified the LOS Convention. A non-party country has the same rights in its extended continental shelf as a country that has ratified the Convention, but without ratifying, the U.S. cannot submit its scientific findings to the CLCS, which means the U.S. will not have the opportunity to receive their recommendations and set ECS [extended continental shelf] limits based on them. There is an [*sic*] benefit to considering these recommendations: according to the LOS Convention, if a coastal country establishes its ECS limits "on the basis of" CLCS recommendations, those limits are "final and binding."¹¹⁷

Accession to UNCLOS is the common recommendation of both the former George W. Bush and current Barack Obama administrations and is supported by a strong alliance of American military, environmental, shipping, energy, and other interests. In its recently issued "U.S. Navy Arctic Roadmap," the U.S. Navy itself urges UNCLOS accession.¹¹⁸ Nowhere is the rationale for accession better spelled out than in the most recent statement of American Arctic policy, issued during the final days of the Bush administration:

The Senate should act favorably on U.S. accession to the U.N. Convention on the Law of the Sea promptly, to protect and advance U.S. interests, including with respect to the

Arctic. Joining will serve the national security interests of the United States, including the maritime mobility of our Armed Forces worldwide. It will secure U.S. sovereign rights over extensive marine areas, including the valuable natural resources they contain. Accession will promote U.S. interests in the environmental health of the oceans. And it will give the United States a seat at the table when the rights that are vital to our interests are debated and interpreted.¹¹⁹

As for Beijing, it is somewhat difficult to read or predict all of its intentions and policy designs regarding the Arctic. Some observers view China's rapidly developing interest in the Arctic with concern and even alarm, while others are less certain that Chinese engagement in Arctic affairs has ominous implications. Lasserre, for instance, takes a relatively benign view of China's growing wealth and power in general and of its Arctic interests in particular.¹²⁰ He even sees cooperation with China and engagement of the country within the Arctic Council as a possible way to advance Canadian interests in the Arctic.¹²¹ It might also be a means to counter American intransigence regarding the Northwest Passage: "The Canadian government, confronted with the Americans' refusal to recognize its claim of sovereignty over the waters of the Northwest Passage, could engage China as well as other countries in discussing the need to implement tight shipping rules in the Arctic."¹²² He also regards China's Arctic interests as more an opportunity than a danger for Canada;¹²³ Jakobson takes the same view with regard to "the Nordic countries that otherwise struggle to be noticed by the rising great power that is preoccupied by global challenges."¹²⁴

China has stated that it "takes note" of the EEZs and outer continental shelves of A5 countries, but these statements are of course somewhat qualified and ambiguous; China has also indicated its hopes that the A5 states will balance their own economic interests with those of the international community (meaning primarily China). But even if these statements are taken at face value, they are still largely unclear, because they do not preclude the possibility of Beijing's aversion to the future submission of extended-continental-shelf claims by the five Arctic littoral states.

But expressing displeasure at A5 extended-continental-shelf claims in the Arctic could be a delicate and difficult matter for Beijing in view of its own such claims in the East China Sea and the South China Sea.¹²⁵ While the South China Sea is a core interest to China and the Arctic is not, Beijing nonetheless knows it is faced with a thorny diplomatic quandary in the latter and is currently thinking through the tortuous diplomatic contortions and inconsistent, selective logic that its engagement in Arctic affairs may entail in the future. China seems to apply very different approaches to territoriality in the South China Sea and the Arctic Ocean. Even though "only a few of the South China Sea's islands qualify under UNCLOS for more than a mere 12-nautical mile territorial sea" and "only a small handful of all the islands in the South China Sea qualify for an exclusive economic zone or continental shelf," China has now "essentially claimed the

South China Sea as its own,” based largely on its own domestically legislated claims and on self-perceived strategic imperatives.¹²⁶ China would, however, almost certainly find distasteful A5 states doing essentially the same things in the Arctic region. Thus, Beijing finds itself on the horns of a dilemma in terms of the consistency of its South China Sea policy and its incipient Arctic policy, and Washington seems to have clued in on this. Since “international law prevents a state from claiming legal rights if it objects to the same type of claims by other states,” it may well be that Washington is subtly tolerating or even encouraging greater Chinese enthusiasm for the commons approach to the Arctic, if only to lessen China’s potentially more assertive approaches to maritime claims in its own region.¹²⁷

The U.S. Navy itself has acknowledged that “while the Arctic is not unfamiliar to the Navy, expanded capabilities and capacity may be required for the Navy to increase its engagement in this region.”¹²⁸ The American navy is committed to “strengthen[ing] institutions for cooperation among the eight Arctic nations”;¹²⁹ it has “broad and fundamental national security interests in the Arctic region and is prepared to operate either independently or in conjunction with other states to safeguard these interests”;¹³⁰ finally, it wants to “promote a safe, stable, and secure Arctic region by strengthening existing and fostering new cooperative relationships.”¹³¹

Prudence and realism dictate that foreign policy plan and hope for the best but prepare for the worst. China is quite aware that its “size and rise to power status evoke jitters,” and according to Linda Jakobson, Beijing has decided, for the time being at least, to “advocate cautious Arctic policies for fear of causing alarm and provoking countermeasures among the Arctic states.”¹³² But this reticence and restraint on China’s part will not likely last indefinitely. China is very heavily dependent on international shipping (energy imports and finished goods exports) for its economic, social, and political stability;¹³³ if and when the Arctic proves to be truly valuable for its natural resources and sea routes, Beijing will likely become much more assertive. The United States should be prepared for the possibility that Beijing could someday conclude that developments or situations in the Arctic threaten China’s economic prosperity, and thus Chinese social stability and ultimately the political power of the Communist Party of China. At a minimum it is in the interest of the United States and the other A5 NATO democracies to maintain defensive capabilities for safeguarding the security of the Arctic region.

Notes

1. Epigraph: Li Zhenfu [李振福], “中国参与北极航线国际机制的障碍及对策” [*Zhongguo canyu Beiji hangxian guoji jizhi di zhang'ai ji duice*] [China's Participation in International Arctic Route Mechanisms: Obstacles and Countermeasures], 中国航海 [*Zhongguo hanghai*] [China Navigation] 32, no. 2 (2009), p. 99. For a largely similar statement see also Liu Huirong [刘惠荣] and Liu Xiu [刘秀], “北极群岛水域法律地位的历史性分析” [*Beiji qundao shuixu falü diwei di lishixing fenxi*] [Historical Analysis of the Territorial Waters of Arctic Archipelagoes], 中国海洋大学学报 [*Zhongguo Haiyang Daxue xuebao*] [Journal of the Ocean University of China] no. 2 (2010), p. 1. All translations from Chinese are by the author.
2. When China's Arctic policy and interests will emerge with more clarity is a matter of guesswork. The release in March 2011 of China's twelfth five-year plan could have some bearing on Chinese Arctic policy, but the occasion for more clarity will likely be the convening of the Eighteenth National Congress of the Chinese Communist Party, slated for October and November 2012, when Hu Jintao must step down. But given that the stances of Politburo Standing Committee members toward the Arctic are largely unknown, it seems impossible to predict with any specificity what the emergent Arctic policy will be. On this see Kyle D. Christensen, “China in the Arctic: Potential Developments Impacting China's Activities in an Ice-Free Arctic,” Conference of Defence Associations Institute (Canada) *On Track* (Winter 2010–11), pp. 19–22.
3. Linda K. Jakobson, “China Prepares for an Ice-Free Arctic,” *SIPRI Insights on Peace and Security* 2 (2010), p. 13.
4. Joseph Spears, “A Snow Dragon in the Arctic,” *Asia Times Online*, 8 February 2011, www.atimes.com/.
5. Gordon G. Chang, “China's Arctic Play,” *Diplomat*, 9 March 2010, the-diplomat.com/. Spears, in “Snow Dragon in the Arctic” and elsewhere, inexplicably garbles Yin Zhuo's name as Yin “Zhin,” an impossible spelling in Chinese.
6. Guo Peiqing, quoted in Xie Kaihua [谢开华], “极地未来对中国影响重大—专访中国海洋大学极地问题专家郭培清” [*Jidi weilai dui Zhongguo yingxiang zhongda—Zhuanfang Zhongguo Haiyang Daxue Jidi wenti zhuanjia Guo Peiqing*] [The Future Influence of the Polar Regions on China Will Be Great: A Visit with Arctic Issues Expert Guo Peiqing of Ocean University of China], 参考消息 [*Cankao xiaoxi*] [Reference News], 8 November 2007, available at express.cetin.net.cn/.
7. There were never exactly “eight” states involved, but among them were Japan, Russia, Britain, France, the United States, and even Italy.
8. Jakobson, “China Prepares for an Ice-Free Arctic.”
9. *Ibid.*, p. 13.
10. Xu Zhenwei [徐振伟] and Xu Yuanyuan [徐园园], “北极消融背後的美加俄博弈” [*Beiji xiaorong beihou di Mei Jia E boyi*] [The American-Canadian-Russian Chess Match behind the Scenes of the Melting Arctic], 国际关系学院学报 [*Guoji Guanxi Xueyuan xuebao*] [Journal of the University of International Relations] 2 (2010), pp. 17–22.
11. “美海军4年内摸清北冰洋, 打造北冰洋舰队” [*Mei haijun si nian nei moqing Beibingyang, dazao Beibingyang jiandui*] [Within Four Years the American Navy Will Become Familiar with the Arctic Ocean and Construct an Arctic Fleet], 当代海军 [*Dangdai haijun*] [Modern Navy], no. 1 (2010), p. 5.
12. Jakobson, “China Prepares for an Ice-Free Arctic,” p. 7.
13. Li Zhenfu, “China's Participation in International Arctic Route Mechanisms,” pp. 99, 102.
14. 王志彬 [Wang Zhibin], “北极引爆世界大战?” [*Beiji yinbao shijie dazhan?*] [Will World War Break Out in the Arctic?], 东北之窗 [*Dongbei zhi chuang*] [Window on the Northeast] 17 (2009), pp. 42–43.
15. For the “big northern lunk,” Mei Hong [梅宏] and Wang Zengzhen [王增振], “北极海域法律地位争端及解决” [*Beiji haiyu falü diwei zhengduan ji qi jiejué*] [The Dispute over the Legal Status of Arctic Territorial Waters and Its Solution], 中国海洋大学学报 [*Zhongguo Haiyang Daxue xuebao*] [Journal of the Ocean University of China], no. 1 (2010), p. 26.
16. Guy Faulconbridge, “Russian Navy Boss Warns of China's Race for Arctic,” *Reuters Africa*, 4 October 2010, af.reuters.com/.
17. “China Seeks Piece of Arctic Pie,” *RT*, 8 October 2010, rt.com/.
18. Li Daguang [李大光], “多国觊觎北极大蛋糕” [*Duoguo jiyu Beiji 'da dangao'*] [Many Countries Covet the Arctic's “Big Cake”], 当代海军 [*Dangdai haijun*] [Modern Navy], November 2011, p. 12.
19. Christensen, “China in the Arctic,” p. 21.

20. Dong Yue [董跃], Chen Yitong [陈奕彤], and Li Shengcheng [李升城], “北极环境治理中的软法因素: 以北极环境保护战略为例” [*Beiji huanjing zhili zhong de ruanfayin su: Yi Beiji huanjing baohu zhanlue wei li*] [Soft Law Factors in Administering the Arctic Environment: The Arctic Environmental Protection Strategy as an Example], 中国海洋大学学报 [*Zhongguo Haiyang Daxue xuebao*] [Journal of the Ocean University of China], no. 1 (2010), pp. 17–22; Jia Yu [贾宇], “北极地区领土主权和海洋权益争端探析” [*Beiji diqu lingtu zhuquan he haiyang quanyi zhengduan tanxi*] [A Preliminary Analysis of Territorial Sovereignty in the Arctic Region and the Causes of Disputed Maritime Rights and Interests], 中国海洋大学学报 [*Zhongguo Haiyang Daxue xuebao*] [Journal of the Ocean University of China], no. 1 (2010), pp. 6–10; Liu Huirong and Liu Xiu, “Historical Analysis of the Territorial Waters of Arctic Archipelagoes,” pp. 1–5; Liu Huirong [刘惠荣] and Yang Fan [杨凡], “国际法视角下的北极环境法律问题研究” [*Guojifa shijiao xia di Beiji huanjing falu wenti yanjiu*] [Research on the Issue of Arctic Environmental Law from the Point of View of International Law], 中国海洋大学学报 [*Zhongguo Haiyang Daxue xuebao*] [Journal of the Ocean University of China], no. 3 (2009), pp. 1–5; and Mei Hong and Wang Zengzhen, “Dispute over the Legal Status of Arctic Territorial Waters and Its Solution,” pp. 23–27.
21. Liu Huirong and Liu Xiu, “Historical Analysis of the Territorial Waters of Arctic Archipelagoes,” p. 5.
22. Brian Lilley, “Canadian Jets Repel Russian Bombers,” *Cnews*, 30 July 2010, cnews.canoe.ca/.
23. “Editors’ Note,” 中国海洋大学学报 [*Zhongguo Haiyang Daxue xuebao*] [Journal of the Ocean University of China], no. 3 (2009), p. 1.
24. Li Zhenfu [李振福], “北极航线的中国战略分析” [*Beiji hangxian di Zhongguo zhanlue fenxi*] [A Chinese Strategic Analysis of the Arctic Route], 中国软科学 [*Zhongguo ruankexue*] [China Soft Science] 1 (2009), pp. 1–7, and “中国北极航线战略的 SWOT 动态分析” [*Zhongguo Beiji hangxian zhanlue di SWOT dongtai fenxi*] [Dynamic SWOT Analysis of China’s Arctic Route Strategy], 上海海事大学学报 [*Shanghai Haishi Daxue xuebao*] [Journal of Shanghai Maritime University] 30, no. 4 (2009), pp. 40–45.
25. Li Zhenfu, “Research into the Unique Complex Network Features of Arctic Sea Route Geopolitics,” p. 32. The possibility Li floats here of Chinese territorial claims in the Arctic should be understood contextually. Li recommends formulating a contingency plan for dealing with crises pertaining to developments in the Arctic, and among the crises he envisions is the “[forceful], out-of-control [attempts at] carving up the [Arctic] melon” by the A5—and possibly by other Western states as well—to the exclusion of everyone else. Li holds out the possibility that under these extreme circumstances China could make its own territorial claims in the Arctic, perhaps simply to complicate matters or at least to throw Arctic territorial issues into sharp relief. For a translation of the context of this statement, see pages 22–23.
26. Liu Huirong and Yang Fan, “Research on the Issue of Arctic Environmental Law from the Point of View of International Law,” pp. 1–5.
27. *Ibid.*, pp. 2–5.
28. *Ibid.*, p. 5.
29. Mei Hong [梅宏], “北极航道环境保护国际立法研究” [*Beiji hangdao huanjing baohu guoji lifa yanjiu*] [Research into the Enactment of International Law for the Environmental Protection of the Arctic Route], 中国海洋大学学报 [*Zhongguo Haiyang Daxue xuebao*] [Journal of the Ocean University of China], no. 5 (2009), p. 14.
30. *Ibid.*
31. *Ibid.*, pp. 14–18.
32. *Ibid.*, p. 18.
33. *Ibid.*, pp. 18–19.
34. *Ibid.*, p. 19.
35. Dong Yue, Chen Yitong, and Li Shengcheng, “Soft Law Factors in Administering the Arctic Environment,” p. 21. The reference Dong et al. give for their first quotation here is Evan T. Bloom, “Establishment of the Arctic Council,” *American Journal of International Law* 93, no. 3 (1999), p. 721, but the passage does not appear on this page.
36. Dong Yue, Chen Yilong, and Li Shengchen, “Soft Law Factors in Administering the Arctic Environment,” p. 22.
37. On the Arctic’s mineral potential, it is worth noting that “the vast majority of known but untapped energy resources lie in undisputed areas, that is, within the legitimate exclusive economic zones (EEZs) of the Arctic littoral states”; Jakobson, “China Prepares for an Ice-Free Arctic,” pp. 11–12. Likewise, Lasserre observes that “should vast amounts of oil be discovered in the Canadian Arctic (a low-probability event, since oil and gas are known to be there, but in moderate quantities), they would lie within the Canadian EEZ or continental shelf and their exploitation would be subject to Canadian law”; Frédéric Lasserre, *China and the Arctic: Threat or Cooperation Potential for Canada?*, Canadian

- International Council China Paper 11 (Toronto: June 2010), p. 8.
38. Xu Zhenwei and Xu Yuanyuan, "American-Canadian-Russian Chess Match behind the Scenes of the Melting Arctic," p. 20.
 39. *Ibid.*, p. 22.
 40. Mei and Wang then make some shockingly racist comments about the Inuit that are unworthy of translation (page 23 of their article). Such comments would never be acceptable in international society, and they indicate how insular and out of touch with the modern world some of mainland Chinese academia is.
 41. Mei Hong and Wang Zengzhen, "Dispute over the Legal Status of Arctic Territorial Waters and Its Solution," p. 24.
 42. *Ibid.*, p. 25.
 43. Li Zhenfu, "Chinese Strategic Analysis of the Arctic Route," and "Dynamic SWOT Analysis of China's Arctic Route Strategy."
 44. Surprisingly, Jakobson gives no page number in her citation for this quotation, but it appears on page 99 of Li Zhenfu, "China's Participation in International Arctic Route Mechanisms." A better translation of Li's statement is this: "Whoever controls the Arctic sea routes will control the world economy and a new internationally strategic corridor."
 45. Li Zhenfu, "Chinese Strategic Analysis of the Arctic Route," p. 6.
 46. *Ibid.*
 47. *Ibid.*, pp. 6–7.
 48. *Ibid.*, p. 7.
 49. Li Zhenfu, "China's Participation in International Arctic Route Mechanisms," p. 99.
 50. *Ibid.*
 51. *Ibid.*, p. 100 [emphasis added].
 52. *Ibid.*
 53. *Ibid.*
 54. *Ibid.*
 55. *Ibid.*
 56. Here Li cites Wu Hui [吴慧], "北极争夺战的国际法分析" [*Beiji zhengduozhan di guojifa fenxi*] [An International Law Analysis of the Battle over the Arctic], 国际关系学院学报 [*Guoji Guanxi Xueyuan xuebao*] [Journal of the University of International Relations], vol. 5 (2007), pp. 36–42.
 57. Li Zhenfu, "China's Participation in International Arctic Route Mechanisms."
 58. *Ibid.*, p. 101.
 59. *Ibid.*
 60. In this he relies on Wu Hui, "International Law Analysis of the 'Battle over the Arctic.'"
 61. Li Zhenfu, "China's Participation in International Arctic Route Mechanisms."
 62. On the traditional Chinese diplomatic world order of premodern times, to which there were some notable exceptions, see John K. Fairbank, ed., *The Chinese World Order: Traditional China's Foreign Relations* (Cambridge, Mass.: Harvard Univ. Press, 1968); Morris Rossabi, ed., *China among Equals: The Middle Kingdom and Its Neighbors, 10th–14th Centuries* (Berkeley: Univ. of California Press, 1983); Jingshen Tao, *Two Sons of Heaven: Studies in Sung-Liao Relations* (Tucson: Univ. of Arizona Press, 1988); and David Curtis Wright, *From War to Diplomatic Parity in Eleventh-Century China: Sung's Foreign Relations with Kitan Liao* (Leiden: Brill, 2005).
 63. Li Zhenfu, "China's Participation in International Arctic Route Mechanisms," p. 101.
 64. *Ibid.*
 65. *Ibid.*, p. 102.
 66. Li Zhenfu, "Research into the Unique Complex Network Features of Arctic Sea Route Geopolitics," p. 32.
 67. Mei Hong and Wang Zengzhen, "Dispute over the Legal Status of Arctic Territorial Waters and Its Solution," pp. 26–27.
 68. *Ibid.*, p. 27.
 69. Jakobson, "China Prepares for an Ice-Free Arctic," p. 8.
 70. Lasserre, *China and the Arctic*, p. 7.
 71. Spears, "Snow Dragon in the Arctic."
 72. Li Zhenfu, "Research into the Unique Complex Network Features of Arctic Sea Route Geopolitics," p. 102.
 73. Jia Yu, "Preliminary Analysis of Territorial Sovereignty in the Arctic Region and the Causes of Disputed Maritime Rights and Interests," p. 10.
 74. Dong Yue [董跃], "论海洋法视角下的北极争端及其解决路径" [*Lun haiyangfa shijiao xia di Beiji zhengduan ji qi jiejie lujing*] [On the Law of the Sea's View of the Arctic Dispute and the Way to Resolve It], 中国海洋大学学报 [*Zhongguo Haiyang Daxue xuebao*] [Journal of the Ocean University of China], no. 3 (2009), pp. 8–9.
 75. *Ibid.*, p. 9.
 76. *Ibid.*
 77. Mei Hong and Wang Zengzhen, "Dispute over the Legal Status of Arctic Territorial Waters and Its Solution," pp. 25–26.

78. Liu Huirong and Yang Fan, "Research on the Issue of Arctic Environmental Law from the Point of View of International Law," pp. 1–2.
79. President George W. Bush, *National Security Presidential Directive and Homeland Security Presidential Directive*, NSPD-66/HSPD-25 (Washington, D.C.: 9 January 2009) [hereafter NSPD-66/HSPD-25], p. III.C.3, available at www.fas.org/.
80. Shao Yongling [邵永灵], 海洋战国策: 邵永灵论海洋大国崛起 [*Haiyang zhanguocce: Shao Yongling lun haiyang daguo jueqi*] [Records of the Warring Naval States: Shao Yongling on the Rise of Great Naval Powers] (Beijing: Shiyou Gongye chubanshe [Petroleum Industry Publishing], 2009), pp. 185–89.
81. Liang Ganqiao [梁干桥], "全球变暖—未来北极冲突的隐患" [*Quanjiu bian nuan—Weilai Beiji chongtu di yinhuan*] [Global Warming: The Hidden Peril of the Future Conflict over the Arctic], 地理教育 [*Dili jiaoyu*] [Geographical Education], no. 2 (2009), p. 20.
82. Jakobson, "China Prepares for an Ice-Free Arctic"; "瑞典机构: 中国加强关注北极" [*Ruidian jigou: Zhongguo jiaqiang guanzhu Beiji*] [China Strengthens Its Concerns over Arctic Affairs], 法制晚报 [*Fazhi wanbao*] [Rule of Law Nightly], 2 March 2010, tech.sina.com.cn/.
83. Zhao Quanmin [赵全敏], "中国在北极竞争中处境不利需加紧相关研究" [*Zhongguo zai Beiji jingzheng zhong chujing buli xu jiajin xiangguan yanjiu*] [China Is at a Disadvantage in Arctic Competition and Needs to Strengthen Relevant Research], 国际在线—世界新闻网 [*Guoji zaixian—Shijie xinwenbao*] [International Online: Report on World News], 6 March 2010.
84. Li Daguang, "Many Countries Covet the Arctic's 'Big Cake.'"
85. Hu Zhengyue [胡正跃], "中国对北极事务的看法" [*Zhongguo dui Beiji shiwu di kanfa*] [China's Perspectives on Arctic Affairs], 世界知识 [*Shijie zhishi*] [World Knowledge], no. 15 (2009), p. 54.
86. Jakobson, "China Prepares for an Ice-Free Arctic," p. 10.
87. Hu Zhengyue, "China's Perspectives on Arctic Affairs," p. 55.
88. Lasserre, *China and the Arctic*, p. 9 and note 31. Nonetheless, Lasserre speculates about the future of China's policy toward the Northwest Passage: "If China's interest in the Arctic is real, it is not fueled by a long-term desire to force Canada to surrender its sovereignty over the Northwest Passage" (p. 2).
89. Jia Yu, "Preliminary Analysis of Territorial Sovereignty in the Arctic Region and the Causes of Disputed Maritime Rights and Interests." The English-language précis of Jia's article gives the name of his organization as "China Institute for Marine Affairs," but this is at variance with the organization's website, www.soa.gov.cn/soa/index.htm.
90. *Ibid.*, p. 7.
91. *Ibid.*, pp. 7–9.
92. *Ibid.*, p. 9.
93. *Ibid.*, p. 10.
94. See David Curtis Wright, *The Panda Bear Reads to Meet the Polar Bear: China Debates and Formulates Foreign Policy towards Arctic Affairs and Canada's Arctic Sovereignty* (Calgary, Alta.: Canadian Defence & Foreign Affairs Institute, February 2011).
95. Jia Yu, "Preliminary Analysis of Territorial Sovereignty in the Arctic Region and the Causes of Disputed Maritime Rights and Interests," p. 10.
96. For the Polar Research Institute, www.pric.gov.cn/. Lasserre, *China and the Arctic*, p. 3, incorrectly gives the meaning of *Xuelong* as "blue dragon," and Spears, "Snow Dragon in the Arctic," as "Snow Lion." Although the *Xuelong* is usually described as an icebreaker, Lasserre (p. 3 note 4) observes that it "was in fact built by a Ukrainian shipyard as a transport ship with strong ice capabilities."
97. For the Arctic and Antarctic Administration, www.chinare.gov.cn/en/ (accessed 9 October 2010). For the State Oceanic Administration, www.soa.gov.cn/soa/index.htm (accessed 9 October 2010).
98. "China's Arctic Ambitions," *Idea of the Day* (blog), *New York Times*, 24 May 2010, ideas.blogs.nytimes.com/2010/05/24/chinas-arctic-ambitions/.
99. "Icebreaker *Polar Sea* Sidelined by Engine Troubles," *Coast Guard Compass*, 25 June 2010, coastguard.dodlive.mil/.
100. Andrew C. Revkin, "America's Heavy Icebreakers Are Both Broken Down," *Dot Earth* (blog), *New York Times*, 25 June 2010, dotearth.blogs.nytimes.com/.
101. "China Seeks Piece of Arctic Pie."
102. *Ibid.* Reports that the Chinese embassy is the largest in Reykjavík are incorrect; on this see Lasserre, *China and the Arctic*, p. 5 note 14. These reports originate from Robert Wade, "Why a Warmer Arctic Needs New Laws," *Financial Times*, 16 January 2008.
103. Jakobson, "China Prepares for an Ice-Free Arctic," p. 1.

104. *Ibid.*, p. 10.
105. For Chinese wariness, *ibid.*, p. 12.
106. *Ibid.*, p. 13.
107. Treaty Concerning the Archipelago of Spitsbergen, and Protocol, Paris, 9 February 1920, Australian Treaty Series 1925, no. 10, available at *Australian Treaty Series*, www.austlii.edu.au/.
108. Dr. Robert Huebert, personal e-mail correspondence, 1 October 2010, cited and used with Dr. Huebert's permission.
109. U.S. Navy Dept., *U.S. Navy Arctic Roadmap* (Washington, D.C.: October 2009) [hereafter *Navy Arctic Roadmap*], p. 6.
110. Geng Shixin [耿仕信], Dai Jiangshan [戴江山], and Ye Jingli [叶敬礼], “孙子兵法”精要与潜艇作战 [“Sunzi Bingfa” jingyao yu qianting zuozhan] [The Essence of “Sunzi’s Art of War” and Submarine Warfare] (Beijing: Junshi kexue chubanshe [Military Science], 2002), p. 239.
111. On the 2004 incident see Peter Dutton, *Scouting, Signaling, and Gatekeeping: Chinese Naval Operations in Japanese Waters and the International Law Implications*, China Maritime Study 2 (Newport, R.I.: Naval War College Press, February 2009).
112. On this see Gary E. Weir, “Virtual War in the Ice Jungle: ‘We Don’t Know How to Do This,’” *Journal of Strategic Studies* 28.2:411–27.
113. Zhang Wenmu [张文木], 论中国海权, 第二版 [Lun Zhongguo haiquan, di er ban] [On Chinese Seapower, Second Edition] (Beijing: Haiyang chubanshe [Maritime Publishers], 2010), pp. 45–76 and 117–31, covers the Indian Ocean, as does Ju Hailong [鞠海龙], 中国海权战略 [Zhongguo haiquan zhanlue] [The Stratage (sic, strategy) of Chinese Seapower] (Beijing: Shishi chubanshe, 2010), pp. 52–53, 83–138.
114. Zhang Shiping [张世平], 中国海权 [Zhongguo haiquan] [Chinese Seapower] (Beijing: Renmin Ribao chubanshe [People’s Daily Publishers], 2009), pp. 58–63. My thanks to Nan Li of the U.S. Naval War College for drawing this important work to my attention.
115. Vide pp. 9–10, quotation from Liu Huirong and Yang Fan (n. 28).
116. Peter A. Dutton, “Through a Chinese Lens,” U.S. Naval Institute *Proceedings* (April 2010), p. 29.
117. Betsy Baker, “The UN Convention on the Law of the Sea,” *Extended Continental Shelf Project*, continentalshef.gov/.
118. *Navy Arctic Roadmap*, pp. 3, 6, 11.
119. NSPD-66/HSPD-25, p. III.C.4.
120. “China displays a real interest in the Arctic, as attested by its applying for observer status at the Arctic Council in 2008 and by its developing research programs in the area. These moves can be better understood in the general frame of China’s policy to assert itself as a major power in the 21st century. . . . China is developing a science policy that matches its ambitions as a major world player, and it is from this perspective that China’s Arctic science interest must be interpreted”; Lasserre, *China and the Arctic*, pp. 3–4.
121. *Ibid.*, p. 11.
122. *Ibid.*, p. 9.
123. *Ibid.*, pp. 9–10.
124. Jakobson, “China Prepares for an Ice-Free Arctic,” p. 13.
125. On which see Dutton, “Through a Chinese Lens,” pp. 24–29. On East China Sea claims, see James Manicom, “China’s Claims to an Extended Continental Shelf in the East China Sea: Meaning and Implications,” Jamestown Foundation *China Brief* 9, no. 14 (11 May 2009), www.jamestown.org/.
126. Quotes in *ibid.*, pp. 27 and 24, respectively.
127. *Ibid.*, p. 27.
128. *Navy Arctic Roadmap*, p. 6.
129. NSPD-66/HSPD-25, p. III.A.4.
130. *Ibid.*, p. III.B.1.
131. *Navy Arctic Roadmap*, p. 10.
132. Jakobson, “China Prepares for an Ice-Free Arctic,” pp. 1, 12.
133. *Ibid.*, p. 5, speculates that nearly half of China’s gross domestic product is dependent on shipping.

Abbreviations and Definitions

A	A5	Arctic Five (Canada, Denmark, Norway, Russia, and the United States)
	A8	Arctic Five plus Finland, Iceland, and Sweden
	AEPS	Arctic Environmental Protection Strategy
	AMAP	Arctic Monitoring and Assessment Program
C	CAA	Canadian Arctic Archipelago
	CAFF	Conservation of Arctic Flora and Fauna
	CCTV	China Central Television
	CLC	International Convention on Civil Liability for Oil Pollution
	CLCS	Commission on the Limits of the Continental Shelf
	CPC	Communist Party of China
E	EEZ	exclusive economic zone
	EPPR	energy prevention, preparedness, and response
I	ICJ	International Court of Justice
L	LNG	liquefied natural gas
	LOS	law of the sea
M	MARPOL	International Convention for the Prevention of Pollution from Ships
P	PAME	Protection of the Arctic Marine Environment
S	SWOT	strengths, weaknesses, opportunities, and threats
U	UNCLOS	United Nations Convention on the Law of the Sea

Chinese Glossary

B	<i>Baguo Lianjun</i>	八国联军
	<i>Beiji zhoubian guojia</i>	北极周边国家
	<i>biduan</i>	弊端
C	<i>chashou</i>	插手
D	<i>dao</i>	道
G	<i>gongtu</i>	公土
	Guojia Haiyangju	国家海洋局
	Guojia Haiyangju Jidi	
	Kaocha Bangongshi	国家海洋局极地考察办公室
H	<i>heyi</i>	合意
	Huanghe Zhan	黄河站
	<i>huayu quan</i>	话语权
J	<i>Jidi baguo lianmeng</i>	极地八国联盟
L	<i>linian</i>	理念
T	<i>tongbing</i>	通病
X	<i>Xuelong</i>	雪龙
Z	<i>zhengqu zhanlue</i>	争取战略
	Zhongguo Jidi Yanjiu	
	Zhongxin	中国极地研究中心
	<i>zhuquan</i>	主权
	<i>zhuquan quanli</i>	主权权利

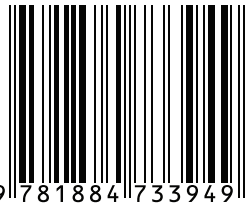
About the Author

David Curtis Wright earned his PhD in East Asian studies at Princeton University and is associate professor of history and Executive Research Fellow at the Centre for Military and Strategic Studies at the University of Calgary. He spent his late youth and early adulthood in the Republic of China on Taiwan in the early 1980s, and during the 1984–85 academic year he studied Chinese language intensively at the Inter-University Program for Chinese Language Studies (the “Stanford Center”) on the campus of National Taiwan University in Taipei. His research is mainly on Chinese military and diplomatic history, and in 2005 he published *From War to Diplomatic Parity in Eleventh-Century China: Sung’s Foreign Relations with Kitan Liao* (Brill). He is currently working on a book on the Mongols’ use of naval forces in their conquest of central and southern China in the 1270s under Khubilai Khan. His future research will center on Mongol weaponry during the Mongol world empire and also on current Chinese naval development.

Wright is also working on a biography of his uncle, Ens. Hans L. Jensen, a U.S. Navy pilot who flew a carrier-based Grumman Avenger and played a key role in the battle of Leyte Gulf and the battle off Samar, winning the Navy Cross for being the first pilot to detect, spot, report, and attack Admiral Kurita’s fleet outside the San Bernardino Strait on the fateful morning of 25 October 1944. (Jensen died later in the Pacific War.)



ISBN: 978-1-884733-94-9



9 781884 733949