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Comparing the robustness of Arctic and Antarctic governance through the continental shelf submission process

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ABSTRACT. The processes undertaken by Arctic states and Antarctic claimant states to submit data to the Commission on the Limits of the Continental Shelf (CLCS) demonstrates the robustness of polar governance. The robustness of a governing system reflects its capacity to deal with emerging issues. For the purposes of this article, robustness comprises the effective protection of rights in the absence of prejudice and participant confidence. In the Arctic, unilateral assertion of continental shelf entitlement can proceed due to the nature of the CLCS process and recognition of sovereignty. Combined with the voluntary nature of Arctic governance, the process does not hamper cooperation in scientific research, boundary delimitation or engagement in initiatives such as the Arctic Council. In the Antarctic, a coordinated approach to continental shelf delimitation protected claimant states' entitlement to a continental shelf and the right of other states not to recognise sovereignty. States demonstrated commitment to the Antarctic Treaty and acted according to accepted norms. Though different in structure, each polar governing system has its own characteristics of robustness. State authority drives participant confidence and regional cooperation in the Arctic. In the Antarctic, norms of behaviour foster system legitimacy and resilience is reinforced by the consequences of abandoning the system. With continued acceptance of the individual governing-system dynamics, emerging issues can be accommodated in both polar regions.

Introduction

States adopt, interpret and apply rules of international law to satisfy their national interests, yet the behaviour of Arctic and Antarctic states in delimiting the continental shelf, as provided for in Part VI of the United Nations Convention on the Law of the Sea (LOSC) (United Nations 1982), has received highly critical media comment (*The Times* (London) 13 November 2007; *The Economist* (New York) 14 May 2009; Sky News 2009). Understandably, the Arctic and Antarctic capture public imagination. The effect of climate change is accelerated in these areas, and there is concern that growing demand for energy may need to be satisfied by access to resources in more of the polar regions.

Pressure on the polar environments and their governing regimes is mounting. Some academic work suggests that the existing regimes are incapable of coping with such challenges and that alternatives should be considered. Scholars suggest the lack of an overarching regional treaty in the Arctic is a weakness of its governing system (Koivurova 2008; Hertell 2008; Yeagar and Huebert 2008; Koivurova and Molenaar 2009; Koivurova 2010). In the Antarctic the lack of universally recognised sovereignty, involvement of the United Nations or broad acceptance of Antarctic security have been identified as shortcomings (Joyner 2008; Rothwell and Nasu 2008; Rothwell 2012). It is inferred that one regime may be better than the other; however, the nature of these regimes has yet to be compared using the tests of robustness described below.

By examining state behaviours concerning continental shelf delimitation, the robustness of the regional governing systems can be assessed. Continental shelf delimitation is a useful test because the coastal state is not the only stakeholder and, as such, regional regime dynamics are illustrated. The process was defined by international law but involves an independent commission which must contend with various legal interpretations. Delimitation defines the boundary between national jurisdiction and the global commons. It is a prerequisite to offshore resource exploration and defines limits of enforcement. There are concerns about expanding national jurisdiction 'shutting out' the international community from resource development and about appropriate stewardship over large areas of vulnerable marine ecosystems (Rayfuse 2008; Jares 2009).

Differences in the structure of the governing systems and state participation do not have to limit system robustness as measured through participant confidence and the protection of rights. The following case studies show that each system has retained robustness. As interest in the polar regions grows, and climate change improves access, identifying Arctic and Antarctic regime dynamics contributes to understanding of regime longevity or change.

The polar governing systems

Arctic governing system

Arctic governance relies on sovereign state initiatives and cooperation, rather than an integrated regime. Initiatives range from non-binding measures to hard law instruments. Inter-state cooperation exists within the mosaic of issue-specific arrangements (Young 2005). However, the laws that govern the Arctic can vary across territorial borders. Pan-Arctic governance is a dynamic process that creates a network of regional arrangements. The most prominent global instrument relating to maritime rights for Arctic coastal states is the LOSC (United Nations 1982). Canada, Denmark, Norway and the Russian Federation are parties to the LOSC. These five states, along

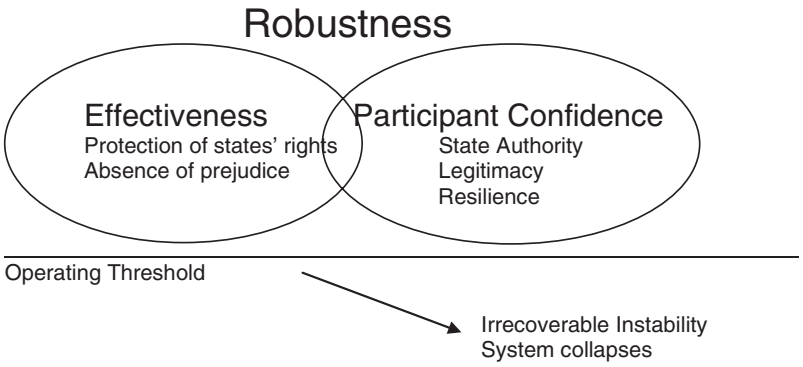

Fig. 1. Schematic for systemic robustness.

with Iceland, Finland and Sweden, comprise the member states of the Arctic Council (AC). The AC developed from the Arctic Environmental Protection Strategy (AC 1996a) and is the most prominent region-specific initiative. Six indigenous groups have permanent participant status: the Arctic Athabaskan Council, the Aleut International Association, Gwich'in Council International, the Inuit Circumpolar Council, Russian Arctic Indigenous Peoples of the North and the Saami Council (AC 1996b).

AC decisions are taken by consensus by the eight member states. Permanent participants must be consulted on all issues prior to any vote. Other states may apply for observer status, and as of September 2012, six non-arctic countries have been admitted as permanent observer States: France, Germany, the Netherlands, Poland, Spain and the United Kingdom. Other non-governmental, intergovernmental and inter-parliamentary organisations have also been granted observer status (AC 2012) website: http://www.arctic-council.org/index.php/en/about-us/partners-links). The AC mandate covers 'common Arctic issues', ranging from environmental protection to search and rescue initiatives, but excludes military security (AC 1996a: Article 1a). Indigenous groups do not possess the same authority as a state and are not considered primary participants in the governing framework. This does not, however, reflect the importance of their consultation nor suggest this forum adequately represents their needs.

Antarctic governing system

Antarctic governance centres on the Antarctic Treaty System (ATS) alongside other instruments of international law. The ATS is based on the Antarctic Treaty, its associated measures (decisions made by consensus during Antarctic Treaty consultative meetings (ATCMs) that create legally binding obligations), the 1991 Protocol on Environmental Protection, and two standalone conventions: the 1972 Convention for the Conservation of Antarctic Seals and the 1980 Convention on the Conservation of Antarctic Marine Living Resources (CCAMLR) (Antarctic Treaty 1959, 1991, 1972, 1980). Regional collaboration is founded on the ATS as an Antarctic-specific regime, but is also pursued through the LOSC and other relevant conventions.

Under unique provisions of the Antarctic Treaty the seven Antarctic claimant states (Australia, Argentina, Chile, France, New Zealand, Norway and the United Kingdom) are able to maintain their right to a territorial claim while other parties preserve the right to not recognise these claims (Antarctic Treaty 1959: Article IV(1c)). Article IV of the treaty provides the legal basis for this. Each Antarctic state enacts its own legislation, yet there is no obligation for other states to recognise such legislation. For many issues a bifocal approach to practical application of Article IV has evolved (Triggs 1986; Fabra and Gascon 2008). The primary participants in the Antarctic governing system include the seven claimant states, the Russian Federation and the United States, as well as the 19 other Antarctic Treaty Consultative Parties (ATCPs). The ATCPs are able to take part in decision-making at the ATCMs (Antarctic Treaty 1959: Article IX(2)). The 22 parties to the treaty that have not met the criteria for consultative status (by demonstrating significant research capacity) may attend treaty meetings, but may not participate in decision-making.

The ATCM is the primary forum bringing parties, experts and observers together for both formal and informal discussions. Diplomacy is an important aspect of the system. Decisions are taken by consensus among ATCPs. 'Measures' are binding, whereas 'resolutions' and 'decisions' are voluntarily implemented (Antarctic Treaty 1995: Decision 1).

Measuring and comparing systemic robustness

A framework to measure robustness was developed by the author (Weber 2011 and Fig. 1). While literature is available on aspects of the framework, such as effectiveness, as far as the author is aware, this particular combination of variables and conceptual threshold has not been developed or tested in other literature.

The robustness of a governing system relates to its capacity to withstand stresses and endure challenges. It is a function of willingness to participate within the system and the ability to accommodate interests through non-

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prejudicial actions. In this article robustness comprises: (1) the effective protection of rights in the absence of prejudice (effectiveness); and (2) participant confidence. Participant confidence further relies on state authority, legitimacy and resilience.

Confidence relates to the effective accommodation of interests within the system as well as to compliance with measures or norms. The ability of states to retain their authority with regard to decision-making contributes to confidence, as does the acceptance (and therefore legitimacy) of the system and the system's resilience to challenges. There is a positive correlation between participant confidence and system robustness. If the system is robust, participants will find a way to make it effective. In a robust system participant confidence is upheld alongside states' rights and challenges can be absorbed. However, if participants have low confidence in the system, it is inherently weak and participants may look outside the system for alternatives. States may disregard the rights of other states. Insecurity in the system may manifest as disruptive and prejudicial unilateral assertions. If participant confidence is reduced sufficiently, intervention may be required, or abandonment may even occur. This can be considered the 'operating threshold'. Above this threshold, the system is functional and robust. Below the threshold, institutional changes to the governing system would be invoked due to irrecoverable instability. A different system would result (Weber 2011).

Continental shelf delimitation process

Entitlement to a continental shelf

Under Article 76 of the LOSC, all coastal states are entitled to a continental shelf extending to 200NM from the baseline from which the territorial sea is measured (ICJ 1969). Where the continental margin physically continues beyond 200NM as a natural prolongation of the land territory, a coastal state is entitled to an 'extended shelf'. The outer limit of the extended shelf derives from the application of either of two formulae described in Article 76(4). The outer limit line must not extend beyond 60NM from the foot of the slope, or beyond the point where the sediment thickness is less than 1% of the distance measured back to the foot of the slope. As maximum constraints, the outer limit shall not exceed 350NM from the territorial baseline or 100NM from the 2500m isobaths (LOSC 1982: Article 76). These formulae and constraint lines can be applied depending on shape (morphology) and structure (geology) of the continental margin. The choice of the constraint lines is at the discretion of the coastal state, allowing it to take full advantage of the characteristics of the margin and shelf.

Submission to the Commission on the Limits of the Continental Shelf

Data supporting the outer limits must be submitted to the CLCS whose only role is to assess whether the data meets the technical requirements. On the basis of recommendations of the CLCS the coastal state establishes the outer limits (LOSC 1982: Article 76(8–9)). States are required to make their submission within 10 years of the entry into force of the convention for that state (LOSC 1982: Annex II, Article 4; United Nations 2001). According to a 2008 decision by the states parties, SPLOS/183, submitting preliminary information that contains a description of the intended outer limits, the status of data preparation and intended date of submission also satisfies the 10-year deadline (United Nations 2008a). Submissions and all relevant information are available on the Division of Ocean Affairs and the Law of the Sea website (DOALOS 2012).

Continental shelf boundary delimitation

Continental shelf boundary delimitation is a separate process negotiated between states or referred for resolution to a third party such as an international court. In a number of regions, such as the Arctic, this process is inherently related to the CLCS process. The CLCS process is without prejudice to the delimitation of boundaries. Therefore, submissions can be considered, pending boundary delimitation, as long as *prima facie* entitlement exists.

States may also negotiate boundaries knowing that any CLCS recommendations received are without prejudice to subsequent boundary delimitation. CLCS recommendations on the outer limits of a continental shelf cannot be invoked against another state where the boundary delimitation of the continental shelf is still under consideration (Oude Elferink and Johnson 2006). In these cases, the continental shelf limit can only be settled when the boundaries between the states have been finalised. This process also does not derogate from the rights of other states, including those related to boundary negotiations, scientific collaboration and regional governance.

Disputed areas

Where disputes exist concerning the delimitation of the continental shelf between opposite or adjacent states, or in other cases of unresolved land or maritime disputes, submissions may be considered in accordance with Annex I of the Rules and Procedures of the CLCS. The Commission will not consider a submission concerning a disputed area unless parties to the dispute agree (United Nations 2008b: Annex I(5)). A submission may be made for a portion of continental shelf in order not to prejudice questions relating to boundary delimitation and joint or separate submissions requesting the commission to make recommendations may be made by agreement. The CLCS may also accede to a request by the submitting state not to examine a submission (or portion of a submission). The Commission also recognises that the 'competence with respect to matters regarding disputes which may arise in connection with the establishment of the outer limits of the continental shelf rests with the States' (United Nations 2008b: Annex I(1)).

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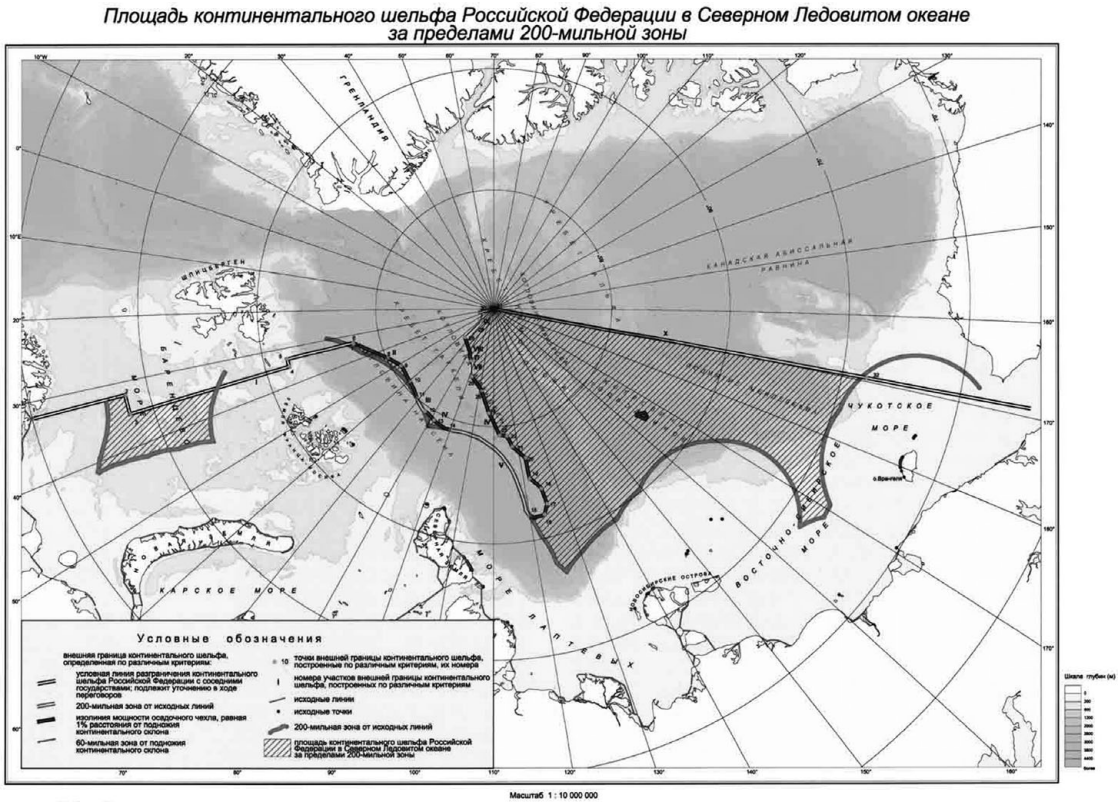

Fig. 2. Adapted map of the Russian Federation submission to the CLCS with lines indicating the location of two of the through-running ridges in the Arctic Basin (Russian Federation 2001).

The Russian Federation submission

On 20 December 2001, the Russian Federation made its initial submission to the CLCS containing the data supporting an extended continental shelf claim encompassing two regions in the Arctic and two in the northwest Pacific (Russian Federation 2001).

In total, the Russian Federation's extended continental shelf amounts to 1.2 million km^2 and will amount to possibly the largest Arctic claim. In the submission to the CLCS, the Russian Federation extends the outer limit of its continental shelf to the geographical North Pole along the meridian line of the 1990 US/USSR Boundary Agreement (Article 2 of which states that the 'maritime boundary extends north along the 168° 58′37″ W meridian through the Bering Strait and Chukchi Sea in the Arctic Ocean as far as permitted under international law' (Agreement 1990), though the acceptability of this meridian being extended to the North Pole has not been validated), and into the central Arctic Ocean Basin along two large features of the Amerasia Basin: the Lomonosov Ridge and the Alpha-Mendeleev Ridge (Fig. 2). The Russian Federation chose to constrain the outer limits along the ridges by a line measured 100NM from the 2500m isobath on the basis that these submarine features are natural prolongations of the Russian Federation's continental shelf rather than separate submarine ridges (LOSC 1982: Article 76).

Responses to the submission by Canada, Denmark, Japan, Norway and the United States addressed the difficulty of assessing proposed outer limits given the current state of knowledge, problems of overlapping jurisdiction, questionable baselines and the geological interpretation of the central Arctic Ocean (MacNab and Parson 2006). The presentation made by the Russian Federation to the CLCS explained aspects of the submission and responded to the *notes verbales* from the other states, by noting that they did not constitute an obstacle to the consideration of the submission (United Nations 2002b).

Between December 2001 and June 2002 the CLCS considered the Russian Federation submission and made recommendations noting the challenging research environment and lack of scientific consensus on the complex geology of the Arctic Basin. A revised submission was recommended by the CLCS (United Nations 2002a; CLCS/34 2002). Ten years later, the Russian Federation has still not made a revised submission.

The Russian Federation submission and Arctic robustness

At first glance it might appear that the Russian Federation was over-extending its entitlement to an Arctic continental shelf, thereby disrupting the Arctic governing system. However, the rights of participants in the governing system were upheld throughout this process.

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The Russian submission does not derogate from the entitlement of Canada and Denmark to lodge submissions. Any recommendations by the CLCS cannot prejudice the rights of states in boundary delimitation. Thus Canada, Denmark and the Russian Federation are free to have their submissions examined (Weber 2009). The role of the CLCS is limited (McDorman 2002). While unilaterally defined boundaries may be moderated by the CLCS recommendations, a final proclamation is ultimately a state prerogative.

Questions related to the geological and geomorphological connection of the ridges to the Russian mainland were raised by the submission. Assessment of the Arctic seabed is challenging due to the research conditions of the area, the absence of an agreed geological history and the absence of previously acquired and publicly available data (Mayer and others 2005). States are within their rights to protect their own research interests by not acquiescing to one interpretation, as occurred in the *notes verbales* of Canada and Denmark (Canada 2002; Denmark 2002). The *notes verbales* refer to a lack of specific data that would permit an adequate assessment of the submission, implying that with the current state of research, uncertainty exists as to whether any overlap in the central Arctic would be possible. By also indicating that an absence of comment does not imply agreement or acquiescence to the submission, Canada and Denmark leave open the possibility of such an overlap occurring. In addition, one interpretation, such as that of the Russian Federation, may assist other states in their evaluation of the submerged land features and compilation of their own submissions. A state will be reluctant to protest against an act of another state which may, in turn, satisfy its own interests in future submissions (Weber 2009). In neither denying nor accepting the Russia Federation's interpretation, the deposited *notes verbales* demonstrated acceptance of the process by other states.

Coordination between the states was also enhanced in acquiring a better understanding of the Arctic seabed and basin. Canada and Denmark have since conducted tests of appurtenance on the Lomonosov Ridge through both independent and joint seismic and bathymetric mapping (MacDougall and others 2008; C. Marcussen, Senior Advisor, The Continental Shelf Project, Geological Survey of Denmark and Greenland, personal communication, 20 March 2009). The United States and Canada collaborated in the Beaufort Sea and projects such as International Bathymetric Chart of the Arctic Ocean (IBCAO) and the Map of Arctic Sediment Thickness (MAST) project have combined efforts from all the Arctic coastal states. States have met to discuss scientific interpretations and discussions are likely to continue as Canada and Denmark prepare their submissions (Weber 2009).

It is the responsibility of the states concerned to prove appurtenance and outer continental shelf entitlement along features such as the Lomonosov and Alpha-Mendeleev ridges. If appurtenance is proven to exist, which is likely to be the case (Jackson and others 2010), there is a possibility of overlapping continental shelf claims occurring in the central Arctic between Canada, Denmark and the Russian Federation. The extent of the overlap will depend on the choices states make in establishing provisional boundaries, such as the one set in 2001 along the 1990 boundary line (see Fig. 2), and whether the states are inclined to assert equidistance or sector principles. Even those established lines within a submission are provisional. It remains at the discretion of these states when and how they consider boundary delimitations (LOSC 1982: Article 83). It is also for the states to decide whether to establish provisional arrangements prior to the CLCS examinations or whether a joint submission is viable (Klein 2006). State authority thus plays an important role and cannot be compromised by the process. According to each state, the process can be complementary to, but not interfere with, the delimitation of boundaries and the settlement of disputes. As such, State authority over this process protects states' rights. The recent Barents Sea Treaty, signed on 15 September 2010, ended 40 years of boundary negotiations between Norway and the Russian Federation and confirms state authority within this process and the Arctic system. Norway and the Russian Federation demonstrated their authority over management decisions for overlap that includes extended continental shelf. In this treaty, Norway transferred its sovereign rights so that the Russian Federation is able to exercise these rights in an area that is beyond its own 200NM exclusive economic zone but within that of Norway (Henrikson and Ulfstein 2011).

Although the United States is not party to the LOSC, its efforts in mapping the seabed appurtenant to Alaska are consistent with international law. The US is likely to encounter considerable difficulties in engaging in the CLCS process without acceding to the convention (International Law Association 2006). The absence of CLCS recommendations does not prevent the negotiation of boundaries between the United States and its neighbours. There is no certainty, however, that CLCS validation of continental shelf entitlement is necessary for formal recognition of negotiated boundaries to occur (McDorman 2002). If the CLCS does not acknowledge entitlement to the area around which a boundary is being negotiated, will the boundary be recognised internationally? If the shelf appurtenant to Alaska does not meet a neighbouring state's continental shelf but rather the deep seabed, and the United States is not under the same obligation as LOSC states parties to 'deposit with the Secretary-General of the United Nations charts and relevant information, including geodetic data, permanently describing the outer limits of its continental shelf' (LOSC 1982: Article 76(9)), will the United States-asserted outer limit be accepted as the boundary of the Area? (According to Article 1 of the LOSC, the 'Area' means the seabed and ocean floor and subsoil thereof, beyond the limits of national jurisdiction.)

The lack of clarification concerning such issues has not undermined progress in formalising rights under the

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LOSC. Nor has formalisation under the LOSC undermined collective authority within the Arctic governing arrangements regarding regional collaborative initiatives. Legal provisions associated with continental shelf entitlement and delimitation co-exist with responsibilities towards regional cooperation within the Arctic governing system. Mechanisms of regional cooperation exist in the framework of the LOSC through, among others, Articles 122–123 regarding semi-enclosed seas, and Articles 194 and 197 regarding cooperative management of marine pollution (United Nations 1982). Arctic states have cooperated in creating the Arctic Environment Protection Strategy (AEPS) and the AC. These initiatives are consistent with, but not limited by, the LOSC. By emphasising Arctic-specific issues, these initiatives provide further structure to the Arctic governing system and reinforce regional cooperation. AC activities have not been compromised by the submission process; in fact, they have continued to expand. For example, in 2009 the AC established a task force to develop an international instrument on search and rescue. The task force was co-chaired by the Russian Federation and the United States and concluded its work with the 2011 Agreement on Cooperation on Aeronautical and Maritime Search and Rescue in the Arctic, which was the first legally binding instrument signed at an AC ministerial meeting.

Unilateral CLCS submissions do not undermine AEPS or the AC collaboration. Numerous initiatives occur across political, ecological or socio-demographic boundaries. In the 2008 Ilulissat Declaration and the 2010 'Chairman's summary of the Arctic Ocean: foreign ministers' meeting' the five Arctic coastal states restated commitment to regional cooperation in marine research and protection of the marine environment within the existing governing system (Arctic Coastal States 2008; Cannon 2010). The Ilulissat Declaration also states that there is no need for an overarching Arctic-specific convention. Coastal states declared ongoing commitment to the LOSC, which provides a 'solid foundation for responsible management', and to the 'orderly settlement of any possible overlapping claims', while continuing to contribute to the AC and other international forums (Arctic Coastal States 2008).

This declaration clearly indicates confidence that states' rights are upheld alongside existing regional cooperation. By also affirming that there is no need for a new Arctic Ocean regime, these states acknowledge that the LOSC is sufficient to advance states' rights while allowing for regional cooperation. The actors have therefore demonstrated acceptance of the existing system and willingness to maintain it.

The Ilulissat Declaration confirmed the commitment of coastal states to the governance structure and continued cooperation. The declaration also created a perception of the Arctic Five (coastal states) isolating their interests from the Arctic Eight (AC member states) and the rest of the international community. The AC became the political platform for non-coastal states (such as Iceland), outside players (such as the European Union), and representatives of the permanent participants to voice concerns over their inclusion and interests (Offerdal 2011). Questioning the actions of states within the system did not diminish confidence in the system, but increased transparency and legitimacy.

The lack of conflict arising from the 2007 Russian Federation's flag-planting on the North Pole seabed (*The Guardian* (London) 2 August 2007) also indicates the resilience of the Arctic system. Such gestures increase attention to the Arctic but do not generate real conflict. That particular action might indicate that the Russian Federation is disinclined to forfeit the North Pole seabed in favour of equidistance boundaries; however, this gesture plays no role in the formal negotiating position of the state in the interests of boundary delimitation (which has yet to commence).

The Russian Federation has yet to resubmit data. Denmark made a submission for an area south of Greenland (Denmark 2012) and is preparing central Arctic data. Canada is preparing a full submission for 2014. It is likely that Canada and Denmark will include the Lomonosov Ridge in their submissions. Canada will also include the Alpha-Mendeleev Ridge, the extent of which is still under investigation. Canadian and Danish submissions are likely to extend beyond the North Pole, overlapping with the Russian Federation one. *Notes verbales* may be prepared by the states, permitting examination of the data and reiterating that any recommendations would not prejudice final boundary delimitation. Alternatively, Canada, Denmark and the Russian Federation may reach a provisional arrangement concerning the central Arctic and submit data accordingly. Formal boundary negotiations have not yet begun. Considering the backlog of submissions for CLCS examination, there is time for negotiations and formalisation to take place if desirable. A sub-commission is already prepared to examine a revised Russian Federation submission, although Russian resubmission may be delayed until after Canada and Denmark submit. It remains to be seen whether an outer limit established by the United States in the absence of CLCS endorsement of relevant data will be recognised as valid. Meanwhile, Norway's experience in the Arctic and Antarctic will provide further diplomatic and legal expertise.

The Russian submission identified potential overlaps in the central Arctic and highlighted the need for further research. It also revealed different interpretations of the LOSC. Importantly, Arctic coastal states were able to use the opportunity to reaffirm their acceptance of, and commitment to, the existing framework and the LOSC. The process reaffirmed the willingness of states to cooperate scientifically and diplomatically. Media speculation concerning conflict between these states has been subdued. Collaborative research in the central Arctic and diplomatic discussions continue and there is no indication that unmanageable conflict will arise from pending submissions. Participants show confidence in the system's ability to contend with issues that may arise.

States are aware that the outer limit of the continental shelf is determined through a scientific process, which also answers any question of entitlement beyond 200NM. Boundary negotiations are settled at the states' discretion. The 2001 Russian Federation submission demonstrates the capacity of the Arctic governing system to maintain unilateral interests alongside regional cooperation and the absence of prejudice. The submission process does not prevent states negotiating boundaries or cooperating in research or regional governance. States retain their rights and engage collaboratively. With recognised sovereignty and voluntary cooperation, states are able to assert their authority without disrupting the system.

The Antarctic claimant state submissions

Entitlement to a continental shelf is implicit in the territorial claims made by the seven claimants in Antarctica. However, recognition of that entitlement, or assertion of exclusive sovereign rights over the Antarctic continental shelf, could prejudice the position of contracting parties that do not recognise a state's territorial sovereignty. The balance achieved by Article IV of the Antarctic Treaty could have been undermined by the continental shelf delimitation process. However, a survey of the claimant state submissions to the CLCS (with one communication of preliminary information) reveals two approaches have been tacitly endorsed by parties to the treaty and successfully accommodated claimant and non-claimant positions. In the first approach, claimant states made a full submission to the CLCS in respect of all of their continental shelves but asked the commission to refrain from examining the information pertaining to the continental shelf extending from the Antarctic continent for the time being. In the second approach, states made a partial submission to the commission which excluded Antarctic data but expressly reserved a right to make a future submission. Chile presented preliminary information and indicated that one of the two approaches would be used in the subsequent submission. Diplomatic notes and careful wording within the text of submissions were integral components of the 'nuanced approach' (Weber 2008). There was no formal admission that parties had negotiated these options, but the similar phraseology within the submissions and responses to them helps confirm the notion that states cooperated on these issues through diplomatic channels (Jacobsson 2007). Table 1 outlines the approach taken by each state.

Some departure from expected practice arose in the submissions. For example, Argentina made a full submission without a request that the commission refrain from considering the Antarctic portion and the Netherlands alone chose to use the word 'dispute' in their *notes verbales* (DOALOS 2012). For some claimant states, such as Australia, an unrecognised claim is distinct from a disputed claim (A. Jackson, principal policy advisor to the Australian Antarctic Division, personal communication, 14 May 2008). The word 'dispute' may not accurately describe all of the Antarctic circumstances and its use has been consistently avoided by contracting parties in order to prevent misinterpretation of the special circumstances pertaining to sovereignty. The overlapping claims in the Antarctic Peninsula are clearly disputes between Argentina, Chile and the United Kingdom. A request by Argentina not to examine the information in accordance with Annex I(5a) of the CLCS Rules of Procedure, was, in a legal sense, unnecessary. Argentina's attached *note verbale* recalled common principles and the importance of consistency between the Antarctic Treaty and the LOSC and reiterated the 'special legal and political status of the Antarctic' (Argentine Republic 2009a). For any of the claimant states, the special legal and political status could have prevented the CLCS from examining submissions or, in Serdy's opinion, Article IV of the Antarctic Treaty and Article 76 of the LOSC taken together would have enabled examination, recommendation and even proclamation without due prejudice (Serdy 2009). However, there was no precedent or case study to support this conclusion. Serdy considers Argentina's approach to be the correct approach, but also recognises that treating the Antarctic as any other continental shelf was potentially politically controversial (Serdy 2009: 190).

Although Argentina did not explicitly request the CLCS not to examine the information relating to the Antarctic continental shelf, states took this opportunity to confirm through the CLCS and United Nations forums that the first of the two approaches applied. States used *notes verbales* to affirm that an accepted process exists within the system. The United Kingdom reiterated that these options were in place irrespective of the wording of the Argentine submission or attached *note*. The United Kingdom remarked that it 'expects' that the CLCS will not, at this time, examine the portion of Argentina's submission that relates to the continental shelf appurtenant to the Antarctic (United Kingdom 2009a). The United States, Russian Federation, India and Japan followed the United Kingdom with similar *notes* of their own that affirm non-recognition of Argentina's Antarctic claim and the 'expectation' (India 2009; Russian Federation 2009) or 'understanding' (Japan 2009; United States 2009) that the CLCS would not examine those aspects of the Argentine submission.

The Netherlands chose to describe the situation as an 'unresolved land dispute' and requested that the CLCS act in accordance with Paragraph 5(a) of Annex I of the LOSC (Netherlands 2009). In this case, unlike the situation for Australia and Norway, the dispute has been acknowledged and this provision could be invoked. Kaye and Rothwell note that the CLCS Rules and Procedures make no attempt to define 'dispute'. A rejection of the Antarctic claims may constitute a dispute and, according to the authors, states are not able to assert that a dispute does not exist on the basis that they choose not to acknowledge it. However, there is also no obligation for the states to test the validity of their claims, especially

Table 1. Submissions to the CLCS by Antarctic claimant states as of May 2012

Claimant state	Submission	Special reference to the Antarctic	Responses with respect to the Antarctic	Recommends
Argentina	Full submission 21 April 2009	Not included	India Japan Russian Federation United Kingdom United States The Netherlands	Not yet adopted
Australia	Full submission 15 November 2004	Requests exclusion of Antarctic continental shelf from examination for the time being	France Germany India Japan Russian Federation United States The Netherlands	Adopted 9 April 2009
Chile	Preliminary information 8 May 2009	Reserves rights to future submission	No responses	Not yet adopted
France	Partial submission 5 February 2009	Reserves rights to future submission	Japan The Netherlands	Not yet adopted
New Zealand	Partial submission 19 April 2006	Reserves rights to future submission	Japan The Netherlands	Adopted 22 August 2008
Norway	Full submission made in two parts:			
	1. Partial submission received 27 November 2006	Reserves right to future submission	India Japan Russian Federation	Adopted 27 March 2009
	2. Partial submission including Antarctic and sub-Antarctic islands received 4 May 2009	Requests exclusion of Antarctic continental shelf from examination for the time being	United States The Netherlands	Not yet adopted
United Kingdom	Partial submission 9 May 2008	Reserves rights to future submission	Japan The Netherlands	Adopted 15 April 2009
	Partial submission on Falklands, South Georgia and South Shetlands 11 May 2009		Argentina	Not yet adopted

when the claimant states are aware that their claims are not recognised (Kaye and Rothwell 2002). From the perspective of a claimant state, lack of recognition may not necessarily constitute a dispute where there is no disagreement between states over a specific territorial claim or boundaries. Although use of the term 'dispute' may not be incorrect, it has also not been tested legally. Its use may be politically provocative where it has not previously been used in the situation of non-recognition (as opposed to overlapping claims).

Sub-Antarctic islands

Sub-Antarctic islands located north of the Antarctic Treaty boundary (60°S) are not subject to Article IV of the Antarctic Treaty. Coastal states are entitled to assert sovereign rights over the full extent of continental shelves associated with these islands even where those shelves extend into the Treaty area (Weber 2008; Hemmings and Stephens 2010). As long as there are no underlying disputes concerning the islands, submissions in respect of their continental shelves can be considered by the CLCS and the outer limits of the shelves can be finalised. For example, the Australian submission in 2004 included extended continental shelf limits for the sub-Antarctic territory of Heard Island and McDonald Islands (HIMI), as well as Macquarie Island (Fig. 3). The examination proceeded and recommendations, which were adopted 9 April 2008, are now publicly available (DOALOS 2012). Extended continental shelf areas also exist for the South Sandwich Islands, although the islands are subject to a dispute between Argentina and the United Kingdom. The United Kingdom and Argentina (Fig. 4) have submitted data relating to these islands (Argentina 2009; United Kingdom of Great Britain and Northern Ireland 2009b), but it will not be examined by the CLCS as both states reject the other's claims to sovereignty over the islands (Argentina 2009; Argentine Republic 2009b; United Kingdom 2009a). Their delimitation will, therefore, depend on the actions of the states involved in the dispute to resolve it (Oude Elferink and Johnson 2006).

According to Article 77 of the LOSC the coastal state is entitled to exercise exclusive rights over resources located on these continental shelves. These rights extend

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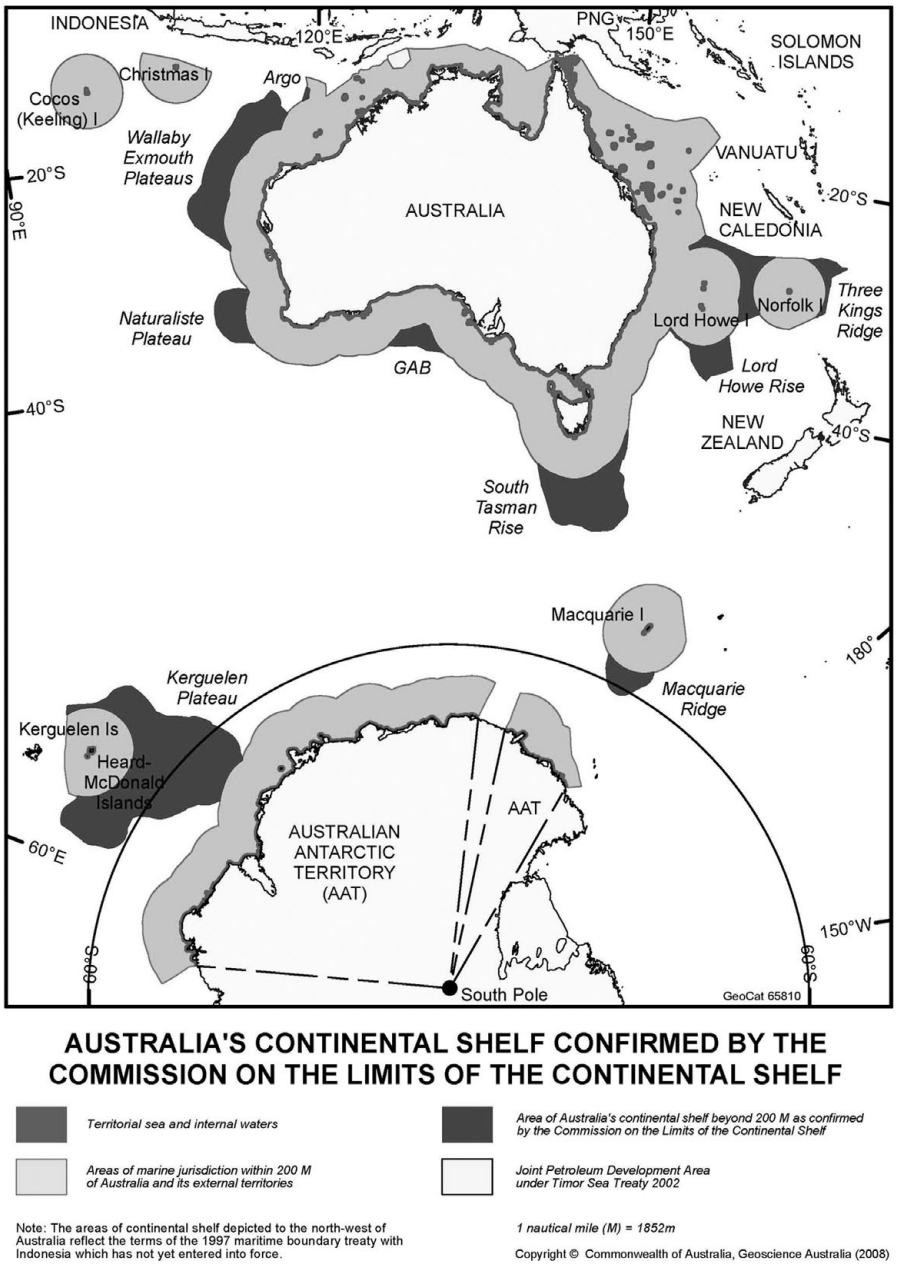

Fig. 3. Australia's continental shelf (adapted from Campbell 2008: 146).

to the limit of the shelves regardless of their location within the Antarctic Treaty area. In general, the limit of these shelves corresponds with the boundary of the area. In Australia's case, the southern limit of the HIMI shelf is contiguous with the 200NM outer limit of the shelf extending from the Antarctic continent (see Fig. 3), which Australia proclaims domestically under the Sea and Submerged Lands Act 1973 (Roxon and others 2012).

States are still obliged to manage the area south of 60°S in conformity with obligations established in the ATS. As this includes the prohibition of mineral resource activities in the 1991 Madrid Protocol (Protocol on Environmental Protection), in this circumstance Australia could use exclusive rights to prevent mining by states that are not party to these instruments, extending the ban to a wider group of states.

Claimant state submissions and Antarctic robustness

A state that believes in the validity of its territorial sovereignty may seek to protect its entitlement to a continental shelf and submit data regardless of the opinion of other states. Non-claimant states consider any assertion of rights as prejudicial to their position on non-recognition of the claims. Invoking the CLCS process had the potential to validate, indirectly, a territorial claim (even though the CLCS is essentially a technical body). To balance these seemingly incompatible positions, key states discussed all the options well in advance of any submissions

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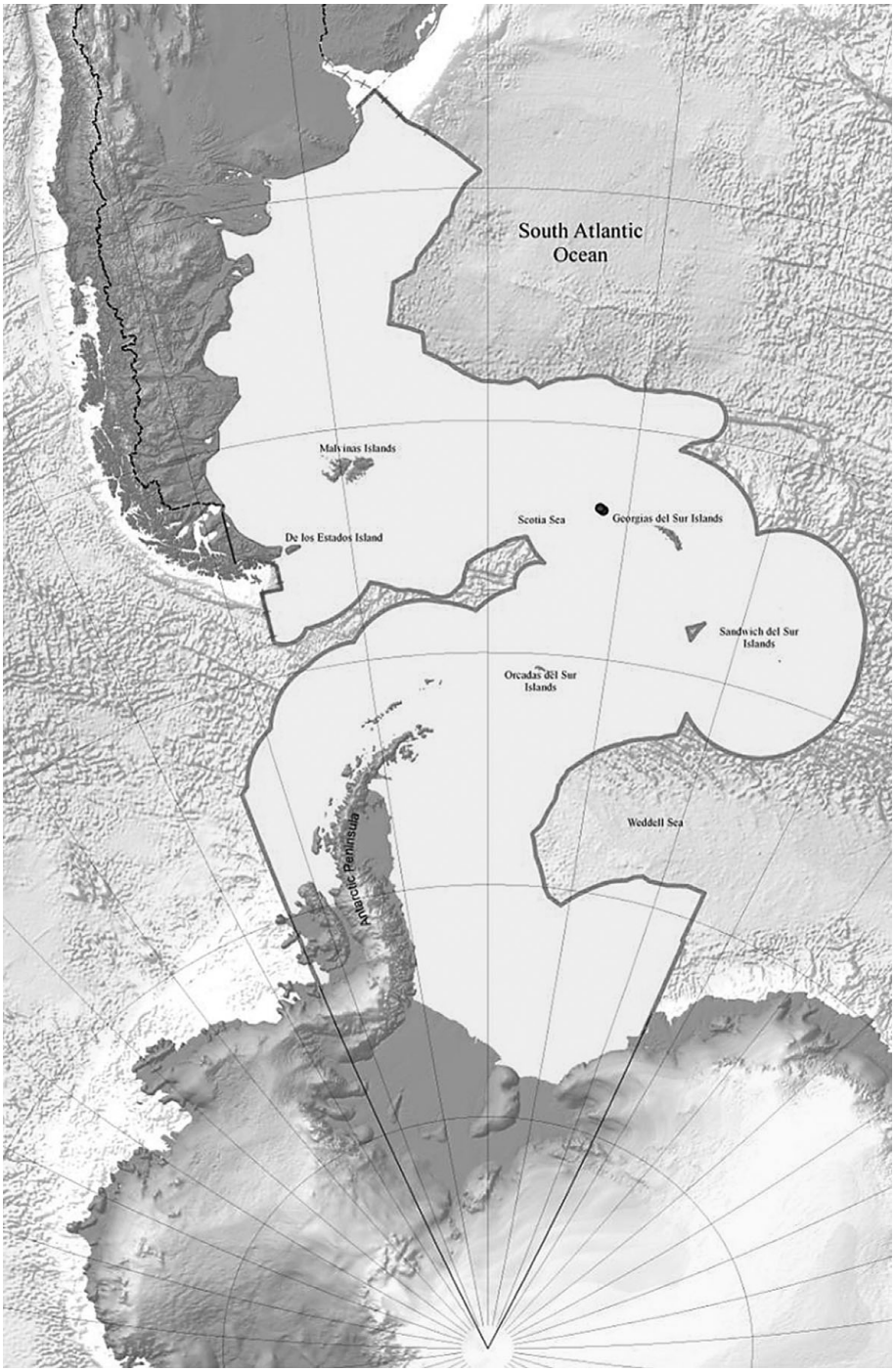

Fig. 4. Argentina's claim. Reproduced from the Argentine Executive Summary (Argentina 2009: 17).

(A. Jackson, personal communication, 14 May 2008). Participants committed themselves to ensuring that the provisions of Article IV were upheld. The binding nature of Article IV requires non-prejudicial outcomes. Therefore, this intrinsic obligation of the governing system essentially guarantees effectiveness when measured by the protection of states' rights.

The two approaches emerged. Full submissions were acceptable with the understanding that rights were protected through the *note verbale* requests or the natural invocation of Paragraph 5(a) of Annex I of the CLCS Rules. Partial submissions gained legitimacy through decisions of the states parties and through state practice (Rothwell 2008). The lack of assessment of Antarctic data prevented misinterpretation. Statements protecting interests reiterated that partial submissions were in no way a renunciation of rights. Rights to a future submission regarding the Antarctic continental shelf are protected while provisions of the LOSC and Decisions of States Parties (SPLOS/72 and SPLOS/183) are satisfied.

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Except for the addition of French and German responses to the first submission by Australia, states that responded to the submissions did so consistently. The pattern and substance of the responses imply acceptance while a lack of response may also indicate acquiescence. Australia received more responses than any other submission, probably because it was the first submission and states wanted to demonstrate their acceptance of the approach (Weber 2012).

The phrasing of the diplomatic notes is important. Use of the word 'dispute' was appropriate in respect of the overlapping claims between Argentina, Chile and the United Kingdom to the Antarctic Peninsula. However, its application to the Australian and Norwegian cases was unprecedented. In respect of Australia, informal discussions with the Netherlands did ensue (A. Jackson, personal communication, 14 May 2008). Consistent use across all full submissions (rather than only in respect of Australia's submission) enabled the word to take on a broader, non-threatening interpretation. The term 'dispute' could be applied to the whole of the Antarctic, consistent with the universal non-recognition available through Article IV of the Antarctic Treaty, rather than a specific claim.

Diplomatic exchange prior to the submissions being lodged, as well in response to the submissions, played an important role in formalising rights to a continental shelf within the Antarctic governing system. While the diplomatic notes might indicate lack of confidence in the existing system, the use of diplomacy and *notes verbales* is a key factor in maintaining stability within the system (Weber 2012). Although the Netherlands and Argentina strayed somewhat from the template used by other states in their diplomatic notes, their approaches were still absorbed into the system, implying acceptance. The *notes verbales* and careful wording of the submissions helped to clarify the intent of actions, thus protecting both national interest and regional governance. The willingness to act according to agreed norms of behaviour fostered ATS legitimacy. The ATS remained stable and the international community has not pressed the issue. State authority was not compromised while the cooperative authority of the ATCPs was maintained.

A coordinated approach to the submissions played an important role in protecting states' authority and rights, and pre-empting possible conflict. State practice did not derogate from the rights of states in their recognition or non-recognition of claims, or prevent continued cooperation within the ATS. Pre-emptive efforts in this process verified the desire of states to maintain the existing governing system, indicating confidence in the system. That a pre-emptive approach was necessary can also suggest insecurity regarding systemic legitimacy and an acknowledgement of the risk of instability. Nonetheless, the successful mitigation of possible instability indicated resilience. The system was able to absorb discrepancies and restore normative behaviours.

At no time during the submission, examination or recommendation process for Australia, were diplomatic responses lodged with respect to HIMI and Macquarie Island (DOALOS 2012). Acquiescence to this aspect of the submission by other states acknowledges that the CLCS does not have the authority to deny these sovereign rights to a state even if exercised within the Antarctic Treaty area. States can exercise exclusive rights to resources within the Antarctic Treaty area, but they must conform with existing provisions which, at this time, include a prohibition on mining (Antarctic Treaty 1991: Article 7). Through exercising recognised jurisdiction, the mining prohibition and other provisions relating to protection of the marine environment can be enforced. This creates a means to oblige states not party to the ATS to act in accordance with existing principles.

The lack of negative reaction to sub-Antarctic continental shelf claims within the Antarctic Treaty area and the acceptance by states (within and outside the system) of the two approaches concerning the Antarctic continental shelf lend robustness to the ATS. States can be confident in their ability to exercise rights in the absence of prejudice alongside other international obligations. The CLCS cannot support or deny a sovereign claim in Antarctica. Thus, the assertion of entitlement to a continental shelf within the Antarctic Treaty area can proceed without destabilising the norms of Article IV of the Antarctic Treaty. The media's misrepresentation of the events of the continental shelf submissions as 'land-grabs' in the Antarctic (*Daily Mail* (London) 18 October 2007; *The Times* (London) 13 November 2007) do not reflect reactions within the diplomatic community.

Antarctic claimant states worked within the Antarctic governing system to protect inherent rights to a continental shelf while not asserting or denying a basis to claim or enabling the CLCS to undermine their authority. Key Antarctic states used diplomacy to promote non-prejudicial actions by individual states. The pre-emptive approach to the submission process demonstrated commitment to act within the norms of the Antarctic governing system. An ability to recognise potential instability and reduce its likelihood reflects system resilience. National interest and state authority were protected alongside the cooperative principles inherent to the Antarctic governing system. The system has demonstrated legitimacy, resilience and versatility – creating solutions that provide non-prejudicial outcomes, accommodate divergent state rights, and fulfil existing obligations related to sovereignty and normative regime principles.

Comparing the Arctic and Antarctic systems

Effectiveness

In the Arctic context, there is minimal concern over the recognition of the entitlement to a continental shelf, because sovereignty is recognised. The nature of the CLCS process, combined with recognised sovereignty

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and the voluntary nature of Arctic cooperation, enables states to take a 'hands-off' approach. Shelf delimitation depends on scientific evidence. Final boundary delimitation occurs between states and a process to accept or protest against those boundaries remains available to states consistent with Article 76, LOSC. The process cannot interfere with any eventual decisions regarding jurisdiction over areas of seabed that might, for example, overlap. States were not required to acquiesce to or directly protest against Russia's or other states' interpretations. The process itself provides an element of built-in effectiveness while not deterring regional initiatives.

In terms of effectiveness of the Antarctic system, a non-prejudicial context was already established through the unique sovereignty arrangement. Article IV provides a binding obligation to balance states' rights in the absence of prejudice. This provision ensures that states' rights in their recognition or non-recognition of territorial claims (and therefore sovereignty and jurisdiction) are upheld. Contradiction of this provision would reduce effectiveness and introduce instability. Therefore, every debate in relation to Antarctic rights comes back to Article IV and effectiveness is almost guaranteed within the system when measured by the protection of states' rights in the absence of prejudice. For continental shelf delimitation, the hands-off approach of the Arctic states was not appropriate for the Antarctic claimants. The nuanced approach produced acceptable outcomes, mitigated potential risk to the system, and reflected flexibility within the system.

Although effectiveness is achieved in the Antarctic system, it also depends on the engagement of states and participant confidence, built on norms of behaviour. Confidence is built through the willingness to be bound with other states. However, binding measures also correspond with potentially greater instability. States may be less inclined to participate along normative principles without a binding obligation to do so. In the absence of Article IV, it is unlikely that states would participate in Antarctic governance in a similar manner. Yet, the consequences of prejudicing another state's position in terms of the recognition or non-recognition of territorial sovereignty in the Antarctic are great. A key legal provision would be abandoned, forcing the governing system to change. Effectiveness produced through binding measures alone cannot achieve robustness. The process, and the manner in which participants implement measures, reflect overall acceptance of the system. Political will further assists maintenance of participant confidence in the capacity of the system to protect states' rights.

If prejudice is created in the Arctic governing system, the system may not be forced below the 'operating threshold'. Internal mechanisms, such as diplomacy or formal dispute resolution, may address the issues without causing abandonment or restructuring of the system. The engagement of these mechanisms relates to participant confidence rather than the binding or non-binding nature of provisions.

Diplomacy has been essential in the Arctic and Antarctic continental shelf submission process. Diplomacy is likely to continue as more information is gathered in the Arctic and as new understandings emerge regarding the application of continental shelf jurisdiction in the Antarctic. As issues evolve, the historic relations between states contribute to the continued confidence and system legitimacy. Acknowledging and accepting idiosyncrasies contribute to growing consistency of norms of behaviours. Consistency and the acceptance of the behavioural dynamics within informal diplomacy or in formal negotiations reduce the perception of risk of instability. Positions that might appear to threaten the system or the balance between states can be placed within a context and the threat avoided.

Participant confidence

State authority

With recognised sovereignty in the Arctic, there is no ambiguity concerning state authority. Throughout the continental shelf delimitation process participants have been confident that while maintaining their own authority, no other state has acquired an advantage that might prejudice their rights. Enforcement capabilities co-exist with cooperative obligations. By accepting that state authority exists, participants voluntarily maintain a dynamic balance between states. In the Antarctic, state authority is not as apparent because of the sovereignty arrangements embedded in Article IV of the Antarctic Treaty. The states involved maintain their authority regardless of whether sovereignty is recognised. At the same time, non-militarisation of the Antarctic decreases enforcement presence and inspections in accordance with Article VII are used for compliance. State authority will only become overt if a state decides to abandon the existing principles in favour of unilateral interests.

Submissions to the CLCS provided Arctic and Antarctic states with an opportunity to showcase their capacity and authority. Early submissions enabled states to highlight their scientific capacity and interpretation of Article 76. This authority tested the application of Article 76 and Annex II of the LOSC as well as the 'Rules and Procedures of the CLCS and the Scientific and Technical Guidelines of the CLCS'. As a result, further clarification of the process occurred alongside the maintenance of state authority.

Legitimacy

The recognised presence of state authority in the Arctic governing system grants the system underlying legitimacy. Irrespective of the far-reaching Russian Federation submission, states continued to contribute to cooperative initiatives and joint research. Norway and the Russian Federation resolved a longstanding maritime dispute in the Barents Sea. In declaring their commitment, states demonstrated their confidence in the existing governing framework. Proposals for a new Arctic treaty, one which would create a new and very different system, have been

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defused, international criticism has been mitigated and systemic legitimacy reinforced.

In the absence of universally recognised sovereignty, commitment to Article IV of the Antarctic Treaty reinforces the system. Commitments to Article IV encouraged the nuanced behaviour that has developed amongst the ATCPs. Thus, norms of behaviour contribute significantly to legitimacy and participant confidence. The submissions and responses to them reflect a willingness of the states to defend the existing system, fostering its legitimacy. Even the differences introduced by the Netherlands and Argentina were absorbed into the system, reflecting internal acceptability. The lack of response by the wider international community is indicative of external acceptability. Although the continental shelf delimitation process was directly attached to national interests, the manner in which the approaches were accepted by states within and outside the governing system contributed to legitimacy. The international community effectively acquiesced to the authority of the ATCPs with respect to the Antarctic, setting aside decades of rhetoric about the 'common heritage of mankind'.

Resilience

Arctic states did not need to utilise a pre-emptive approach for the submissions. In light of recognised sovereignty and voluntary cooperation, instability has not occurred in the Arctic governing system. A hands-off, 'wait and see' attitude characterised continental shelf delimitation without risk of undermining the system. States are confident that each other is open to coordination, providing the resilience the system needs to contend with instability that may arise.

Arctic coastal states counteracted external criticism concerning Arctic governance and used declarations from the Ilulissat and Chelsea (Canada) Foreign Ministers' meetings (Arctic Coastal States 2008; Cannon 2010), as well as the Nuuk AC ministerial meeting (AC 2011), to defend their governing system. The need for a declaration could be construed as a lack of underlying confidence. Nonetheless, the declaration demonstrated participant commitment. Resilience within the Arctic system also stems from the interaction of militarisation and the cooperative framework. Militarisation of the Arctic is not prohibited and the AC was not designed to deal with military security. Commitment to regional cooperation through the AC and the LOSC can continue while military security initiatives, such as Canada's (Harper 2007), are absorbed within the governing system. Thus the cooperative aspect of the system has created resilience.

Antarctic issues require states to be pro-actively engaged, given the sovereignty arrangements and the differing reasons for participation by claimants and non-claimants. The pre-emptive approach prepared the actors for challenges from within and outside the system. Recognising the potential for instability fostered resilience. Beyond the continental shelf issues, states have consistently returned to the bifocal approach used to both maintain state authority and deny it in the Antarctic Treaty area. The repetitive accommodation of issues in non-prejudicial outcomes contributes to resilience.

It can be suggested that the need for such an intricate pre-emptive approach indicated instability within the system. However, pre-emption exemplified a high degree of commitment to maintain the system (Weber 2012). Flexibility in the interpretation of regulatory scope will continue to provide resilience. For example, the ability to bind third parties to the prohibition on mining the continental shelves located within the Antarctic Treaty area generated from islands north of 60S safeguards ATS norms. For the Antarctic governing system, the risk of instability will not disappear, but as long as Article IV sets the backdrop for sovereignty, the appreciation of the consequences of abandoning the system will contribute to resilience.

Discussion

The Arctic-specific regime is non-binding, built on the cooperative efforts of the AEPS and the AC and other forums such as the Northern Forum and the Barents EuroAC (Northern Forum 2012; BEAC 2012). The LOSC provides a pivotal foundation for coastal and maritime issues and suggests opportunities for further collaboration in the areas of marine environmental protection. The voluntary nature of regional initiatives, such as the AC, provides scope for further engagement of participants. In particular, the AC has successfully made it possible to 'perceive the Arctic as a distinct political region' (Koivurova and VanderZwaag 2007: 159).

Decisions within the Arctic governing system may occur through numerous forums. This process is driven by the actors and the political consequences of issues. The implementation of decisions occurs at a national legislative level and there are many opportunities for unilateral, bilateral and multilateral initiatives to develop within the system. Cooperation can occur at many levels and across jurisdictions. Cooperative initiatives have created regional norms. Their non-binding nature does not imply a less robust system. The manner in which states protect their interests while upholding the system contributes to systemic robustness. Effort and engagement are necessary to uphold the non-binding normative principles. Nevertheless, the non-binding nature of decisions ensures state authority and provides legitimacy and resilience. State initiatives and interpretations can be carried forward in the absence of prejudice. Effectiveness relates to the mutual respect of rights and the normative commitment to remaining open to coordination. Flexibility within the Arctic governing system contributes to its robustness.

The Arctic system has not obliged states to moderate their actions. With recognised sovereignty, the assertion of rights does not run the risk of destabilising the understanding of sovereignty. The authority of each state regarding a continental shelf is accepted and

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co-exists with the understanding that Article 76 is without prejudice. State authority thus contributes significantly to participant confidence. Because sovereignty is recognised and regional responsibilities are non-binding, less effort is required to maintain state authority. Less pre-emptive engagement is required because issues return to legitimate state authority. In comparison to the Antarctic, enforcement is also better tolerated in the Arctic. Issues are accommodated in a manner that prevents prejudice, and recognised sovereignty ensures governing system effectiveness. Though the Arctic system has received criticism, resilience and confidence have developed, contributing to legitimacy. States have taken the opportunity to declare their commitment and defer international challenges. Together, these elements prove the robust nature of the system.

The Antarctic governing system is a complex mixture of provisions that revolve around the Antarctic-specific regime. The ATS functions alongside general international law while also providing a source of normative rules specific to the Antarctic. The institutions of the ATS are more developed than those in the Arctic but in a similar manner provide for the discussion of issues and the resolution of disputes that may arise. Sovereignty issues are accommodated through the provisions of Article IV of the Antarctic Treaty. This provision establishes consistency within the system.

Article IV shapes the initiatives and measures sought through the governing system. Related norms of behaviour have subsequently evolved and continually reinforce the effectiveness of the system. The lack of universally recognised sovereignty and the built-in obligation of Article IV to prevent prejudicial outcomes require the Antarctic states to take a pre-emptive approach. Normative behaviours play a more dominant role than enforcement with respect to compliance. Without clear-cut enforcement mechanisms, appreciation of the consequences of abandoning the system creates an incentive to support it. Article IV instils a requirement but the system allows for flexible approaches to this obligation, driven by acceptable norms.

The outcome of the continental shelf process in the Arctic will unfold in more detail as Canada makes a submission in 2013 and Denmark in 2014. The Russian Federation has yet to make a resubmission. Although the United States is not a party to the LOSC, it is mapping the continental shelf appurtenant to Alaska in conformity with international law, although it will have difficulty engaging with the CLCS without commitment to the convention. For the time being, the Antarctic states have protected their entitlement to a continental shelf without prejudicing the right of others not to recognise the territorial claim on which the entitlement is based. Obligations have been met within the ATS and the LOSC and, since there is no pressure to establish distinct maritime boundaries, this stalled outcome can remain the default position for Antarctic system participants.

Conclusion

Though the polar governing systems are structurally different, the net effect of these differences lies in how the systems accommodate political challenges and sovereign rights. Characteristics such as recognised sovereignty (in the Arctic) or the existence of a binding regional treaty (in the Antarctic) shape aspects of the governing systems but are not determinative of robustness. Systems which have the ability to uphold states' rights alongside regional principles, engage participants confidently, and maintain cohesion against intrinsic and extrinsic criticism remain above an 'operating threshold'. Political will and belief that these are the most mutually beneficial systems are also key components to robustness.

In accommodating the continental shelf delimitation process, the polar governing systems have demonstrated effective protection of states' rights and confidence that the systems have the capacity to continue protect those rights. Each system has demonstrated robustness in its own manner. The systems are not interchangeable and robustness could be undermined if this were assumed. Evidence suggests that emerging issues can be accommodated within each system. Challenges, or even instability, do not have to reflect weakness, but rather indicate robustness when participants are confident in the achievement of non-prejudicial outcomes.

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