Arcticness and the Urbanism of the North

Peter Hemmersam

Arcticness (or Northernness) has been expressed in the planning and design of Arctic cities over the past century. This paper explores how the imaginary conveyed in this notion has influenced the urbanism and architecture of northern communities in different ways. It traces the convergence of national urbanisms of the North towards an architectural idea of an 'Arctic city' during the latter half of the twentieth century. The exceptionalism expressed as Arcticness became central to the architectural discourse on urban liveability across the circumpolar region during the 1970s and 1980s. However, concerns over Arcticness obscured the presence of urbanity in urban planning and development in the North. The paper concludes with a discussion of the contemporary use and relevance of Arcticness in developing new architectural identities in northern cities. Such identities are cultivated as a component of city branding for tourists, investors and 'creative' knowledge workers. Today, cities promote Arcticness in their aspiration to become a 'Capital of the Arctic'.

Introduction

While there have been settlements in the form of hamlets, encampments, trade posts and missions in various Arctic territories for centuries, the history of city planning in the Arctic spans only a little over a hundred years. Cities were planned and built across the region by corporations and states for a variety of reasons, and today, the population of the Arctic is highly urbanised (Heleniak, 2020; Larsen & Fondahl, 2014; Rasmussen, 2011). Some settlements have a distinct Arctic character and express an architectural Arctiness, while others replicate southern styles of urbanism. Despite the centrality of cities and urbanisation to the modern development history of the Arctic region, urbanism has been a peripheral perspective in the main scope of Arctic studies. It is easy to overlook the agency of the built environment in the vast landscapes of the polar regions.

There is, however, a body of literature on urbanism in the region. Starting in the 1960s, researchers in the Soviet Union explored the engineering challenges and psychological and physiological dimensions of northern urbanism (Kalemeneva, 2018, 2019; Krupitsa & Murav'ev, 1966; Murav'ev & Rimskaya-Korsakova, 1963). In other parts of the Arctic, new urban communities were critically examined within 'acculturation studies' that problematised the urbanisation of Indigenous societies

(Dybbroe, 2008; Ervin, 1968; Sejersen, 2010; Sørensen & Forchhammer, 2014). In Greenland, architects criticised the modernist architecture of the 1960s and 1970s for being culturally maladapted and unresponsive to local needs (Langkilde, 1986; Petersen, 1986; Skriver, 1970). In recent decades, research has engaged the contemporary urban Arctic as an everyday landscape (Nyseth & Granås, 2007; Schweitzer et al., 2017; Sheppard & White, 2017; Sørensen & Forchhammer, 2014; Tróndheim, 2013). Recent years have also seen a growing body of literature on the sustainability of Russia's large industrial cities and other settlements in the face of climate change, deindustrialisation and economic globalisation (Orttung et al., 2020; Orttung & Laruelle, 2017). Within architecture, studies on the global hyper-modernity of the region have emerged, and others have explored the unique cultural and climatic dimensions of design and urbanism in the circumpolar territories (Sheppard & White, 2017).

While urban planners published studies of USSR and other Arctic cities in the past, the contemporary urban literature has largely ignored urbanism and the role of cities in the Arctic. However, as indicated by the Tromsø-based Professor of Planning, Torill Nyseth (2017), studies of Arctic cities uncover a productive paradox within mainstream urban theory that challenges prevailing notions of urbanity. Nyseth echoes the comparative urbanism framework that proposes that the urbanity and planning cultures of cities and societies outside the West should be studied and theorised as 'ordinary cities', similar to cities elsewhere (Robinson, 2006; See also McFarlane, 2006; Roy, 2005). Western thinking has dominated urban theory so far, and Jennifer Robinson (2006) refers to the resulting conceptualisation of cities outside the West as a tradition of 'imitative urbanism'. While Robinson and the comparative urbanism literature primarily reference the Global South, the parallel history of colonialism and development in the Arctic makes it valid to extend an argument for the study of urbanism in the circumpolar North. Thus, urban studies in the intuitively non-urban Arctic landscapes may provide a corrective to mainstream concepts of urbanity and help unfold a concept of Arcticness that incorporates the urban.

In this article, 'Arctic' primarily denotes a particular architectural discourse – and is not restricted to climatographic zones or Indigenous homelands. 'Urban' and 'City' are used to denote cultural and economic processes of an urban nature and are not limited to strict definitions by size, population or morphology.

Arcticness

Arcticness or Northernness represents the idea that there is something unique and distinctive about the Arctic North (Medby, 2017; van Alstine & Davies, 2017). Geographers and economists have constructed categories of Northernness with implications for development policies in the region (Graham, 1990). Canadian geographer Luis Edmond Hamelin (1980) unfolded, rather famously, the concept of Nordicity as an expression of the variation between regions and settlements in the North in terms of size, culture, economy, climate and infrastructure. Building on Soviet territorial demarcations related to the economy and engineering challenges of the industrial cities in the Far North (Graham, 1990; Stammler-Gossmann, 2008), Hamelin compiled these factors into a Polar value index that expressed the unique Nordicity of any location. Hamelin suggests that such indices and approaches have been attempts to overcome the concern that "the traits of the South become the yardstick of the North" (1980: 90). Nevertheless, an effect of Hamelin's composite index is that the Nordicity of any location changes with new developments in infrastructure, economy or

even climate change. As architects Lola Sheppard and Mason White (2017) ask, does this mean that increased urbanisation and urbanity in northern settlements is antithetical to Arcticness?

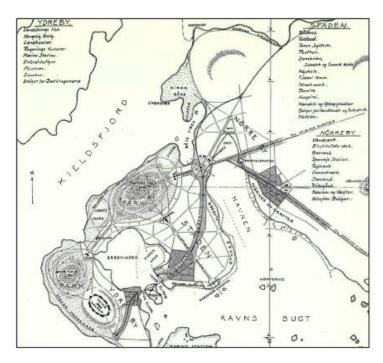
Arcticness is formed by, and directed at, an external audience (Medby, 2017). It is a label attached to the region from a southern perspective and echoes notions of exceptionalism that assume that the Arctic is fundamentally different from the rest of the world and that ordinary politics and general theoretical frameworks cannot be applied to or within the region (Bravo, 2015; Coates, 1994; Keskitalo, 2004; Wormbs, 2018). Arcticness indicates the continued construction of a marginal space where local conditions are obscured to the outsider (Jensen, 2015; Shields, 1991). However, Arcticness also has agency within the Arctic. For instance, Arcticness can add status or credibility to an actor or stakeholder who holds certain rights and responsibilities (Kelman, 2017; Medby, 2017).

Moving beyond imaginaries of an exotic periphery, historian of science Michael Bravo suggests a need for decentring Western narratives of the Arctic. Like Robinson's (and others') proposals for post-colonial studies of 'ordinary cities', Bravo posits a 'post-Arctic' that rejects "cliched and wrongheaded polarities of traditional/modern, local/global, nature/culture, human/animal [and further,] these dichotomies grossly distort the fabric of our human and non-human ecologies" (2015: 101). Tracing Arcticness and associated terms such as Nordicity outlines an evolving but persistent cultural discourse (Chartier, 2018; Graham, 1990; Shields, 1991). Mindful of this framing of the region and leaning on the comparative urbanism argument, it becomes necessary to investigate and deconstruct the assumed truths regarding Arcticness and de-essentialise the Arctic territory and climate as foundational to the discourse on Arctic cities. Studying the evolution of Arcticness within the architecture and urban planning fields contributes to considering the concept an evolving discourse rather than as an essence of the territory. Such studies also make Arctic cities relevant beyond the Arctic.

A brief history of city-building and urban design in the Arctic

The first planned settlements in the Arctic were resource communities and towns constructed to house military personnel and function as administrative centres. Later in the twentieth century, planned cities and new residential and other architectures were central and active components of policies for the economic development and industrialisation of northern territories as well as the social and cultural modernisation of local communities and Indigenous peoples.

The first phase of Arctic urban planning mostly followed the then-dominant City Beautiful model. The resulting urban scenery of boulevards and squares framed by a classical architectural language was familiar to the southerners who arrived to contribute to the modernisation of the region. This planning movement evolved in the late nineteenth century as an aesthetic response to the uncontrollable growth of the industrial metropolis and is often considered the first modern approach to city planning, and was applied to the planning of national capitals (Washington DC, Canberra and Moscow) and new colonial cities beyond the West (Hall, 2002).



Alfred Råvad: 'Erikshavn' - a new capital of Greenland (1914c, p. 239).

The first modern urban plan for the Arctic by Danish architect Alfred Råvad (1914a, 1914b, 1914c, 1914d, 1914e, 1914f) evidences the influence of the style. Råvad worked in Chicago for Daniel Burnham on the White City at the World's Columbian Exposition in 1893 – the first true expression of the City Beautiful ideals (Blumberg, 2014; Madsen, 1990). Råvad's unrealised design for a colonial capital in Greenland had boulevards, parks, a palace and a monumental government district. The city was designed for European colonisers (Danes and Icelanders), and Råvad hoped it would attract tourists from the USA. In the presentation of the project, he only mentioned the local population in passing and made few design concessions to the specificities of the Arctic climate and landscape. However, Råvad did propose closed-contour blocks with sheltered courtyards – an early iteration of a model that later became a prominent architectural expression of Arcticness.

The most dramatic expressions of this neo-monumental planning mode are the massive industrial cities in the Soviet Union from the 1930s and 1940s. The Soviet state carried out massive city building in the North and Far East as part of a policy for industrialising and urbanising the entire territory of the country (Asafiev, 1989; Hill & Gaddy, 2003; McCannon, 2012). The monumental city building in the Soviet Far North celebrated communism's triumph over the adversarial Arctic nature (Bruno, 2016; Kalemeneva, 2017) and attracted young people motivated to 'build communism' in the North (Armstrong, 1965; Kalemeneva, 2019; McCannon, 1998). Central to these colonial urban designs was that they offered 'islands' of urbanity and modernity in a hostile and pre-modern territory. For instance, botanists developed schemes for Arctic urban vegetation that emulate the parks and greenery of southern metropolises (Avrorin, 1941). Over time, such designed social clusters became a central feature of architectural Arcticness.



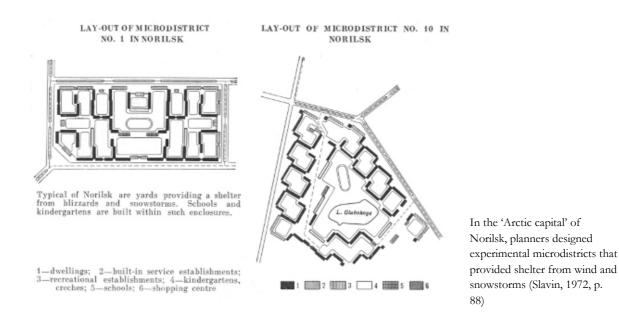
The neo-classical cityscape of Monchegorsk, Murmansk Oblast. Photo: P. Hemmersam.

Other parts of the Arctic have distinctive urban histories. City building in the Scandinavian Arctic was a result of colonisation, trade and the pursuit of territorial sovereignty over Indigenous homelands. Here, early settlements were trade and administrative posts in what states considered national peripheries rather than Arctic territories. Mining communities had existed in northern Sweden for centuries, but in the early twentieth century, Finland, Sweden and Norway built new northern resource towns. In contrast, Alaska's and northern Canada's urban histories started with the gold rush at the turn of the twentieth century. In these territories, as well as in Greenland, World War II led to infrastructure development and in turn industrialisation and the urbanization of Indigenous peoples in the decades that followed.

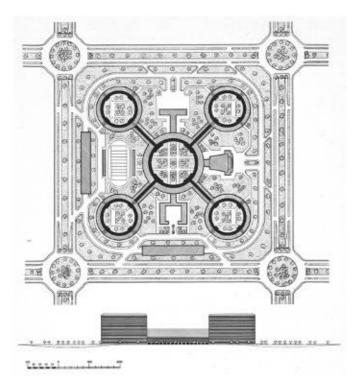
High-modernist cities

In the post-war years, states initiated urban development schemes that resulted in new cities based on modernist principles, such as the functional separation of programmes and the industrial production of architecture. The Soviet Far North was an advanced case, but governments implemented similar modernist planning and development policies in Greenland, Arctic Canada and northern Norway. The architecture of this period followed international standards and differed radically from the City Beautiful movement's historicism. The utopian social vision of architectural modernism aligned with states' high-modernist visions of scientific and technical progress (Liscombe, 2006; Scott, 1998). Social engineering through urbanisation also played a role in assimilating Indigenous populations into Western society. In Greenland, for instance, urbanisation and city building were vital to the Danish government's social and economic development programme (Lyager, 2002; Skjelbo, 1995). After the abolishment of Greenland's colonial status in 1953, the government planned and built cities according to an industrialisation-based master plan. The government policy was to replace the entire existing housing stock with modern dwellings and supply amenities that correspond with Danish architectural and urban planning standards, all within a few decades.

High-modernist urban planning, as demonstrated by Soviet and Greenlandic examples, largely ignored local communities' desires and the characteristics of the place in favour of universal 'scientific' expert designs and construction solutions (Hill & Gaddy, 2003; Lyager, 2002; Ølgaard, 1976). A motivation behind the creation of new cities in northern Canada, the Soviet Union and Greenland was the need to attract and house southern workers and experts in different fields to work in industries or partake in the administration and development of the territories in different ways (Farish & Lackenbauer, 2009; Langkilde, 1986). In the Soviet Union, the need to attract skilled workers and their families accelerated with the abolishment of the Gulag system in the late 1950s (Kalemeneva, 2019; Reisser, 2017). The shortage of workers resulted in new research on how to make northern cities attractive and comfortable – a recurring feature of architectural Arcticness. This involved the exploration of design solutions for climatic challenges and the provision of higher quality housing than elsewhere in the country (Armstrong, 1965; Asafiev, 1989; UNECE 1980). Thus, following Khrushchev's political 'thaw', the northern cities not only demonstrated rushed planning and ad-hoc development but also the fragmentary results of policies to provide good public facilities and above-average-quality apartments. While state propaganda continued to promote the spirit of northern scientific exploration, and while Architects and planners developed micro-climatic design solutions, the microrayon (microdistrict) urban cluster, which was a universal feature of Soviet urban planning, continued to dominate the North (Slavin, 1972).



Soviet urban designs focussing on micro-climatic mitigation are examples of a larger international modernist trend of proposing universal models for city building in the Arctic. The Swiss-Austrian architect Ernst Egli (1945, 1951) proposed a precursor to such urban design prototypes in the aftermath of World War II. This design prototype was one of several directed at various global regions and contributed to the emerging field of urban climatology.



Ernst Egli (1951, p. 54): "The Unborn City". Buildings with 16,000 inhabitants could be combined to form cities of 128,000 people. The round shapes deflected winds and minimised the structure's surface to reduce heat loss. Egli's modernist approach used universal design approach that reduced the Arcticness to the climatic response of the architecture.

Capsular cities

Several designs for self-contained communities displaying round component forms followed Egli's proposal and became signifiers of architectural modernity at the edge of technological performance. Architects at Soviet research institutions, such as the Leningrad Zonal Scientific Research and Planning Institute, developed and published science-fiction-like urban prototypes (Bond, 1983; Filin et al., 2018; Odnovalov & Tsimbal, 1966). In Canada, architects at the Department for Public Works designed a dome-covered new town for Frobisher Bay (Iqaluit) (Gardner & Fancott, 1958). Near Anchorage in Alaska, Adrian Wilson Associates later proposed 'Seward's Success', an entirely enclosed city for 40,000 inhabitants (J. Davies, 1970). Few capsular cities have ever been realised. Beyond military installations, such as the 1953 Buckner Building ('City under a roof') in Whittier, Alaska, designed by Foss, Malcolm, and Olsen to house 1,000 servicemen, the most advanced example in existence is a microdistrict for 4,500 people in the Udachny mining community in Siberia. The main design feature of this structure from the late 1970s is a linear gallery that connects residential buildings to a community centre, schools and kindergartens (Kalemeneva, 2019; Pozdnyakov, 1978). Despite the relative failure to realise such proposals, the publication of Arctic urban projects in popular journals contributed to disseminating ideas of the unique Arcticness of northern settlements (J. Davies, 1970; Filin et al., 2018; Recently Announced', 1962). These publications on northern cities aligned with the widespread interest in space exploration (Hemmersam, 2016) and extended a pre-existing discourse on the exotic nature and the Arctic sublime previously established in literature and mass culture (Jensen, 2016; Osherenko & Young, 2005; Ryall et al., 2010).

Building Arctic architectural knowledge

In the 1960s and 1970s, academic and professional books and journals on the nature of architecture and planning in the North were translated and communicated between the Arctic nations. This

exchange included the Soviet research institutes that explored northern architecture and urbanism. For instance, the Soviet journal *Problemy Severa* (Problems of the North) was translated in its entirety to English by the Canadian National Research Council between 1958 and 1978. Politicians, planners and architects also travelled to other Arctic regions to learn from city-building programmes (Pedersen et al., 1978; Pedersen et al., 1980; Riley, 1959; Rosendahl, 1985; Rosendahl & Ølgaard, 1977; Slipchenko, 1972). In 1978, experts from across the Arctic met at the 'Human Settlements, Planning and Development in the Arctic' symposium organised by the United Nations Economic Commission for Europe (UNECE 1980) in Godthåb (Nuuk). Planners at the event described it as the start of the international sharing of knowledge on Arctic urbanism and construction (Rosendahl, 1989). The planners and architects gathered, agreed that a primary concern in Arctic planning was the uncritical import of southern architecture and building technology. Further, the report from the event outlined a consensus that urban clustering for climate protection was needed while ensuring good snow management and access to the surrounding nature. Finally, the experts agreed that it was necessary to make northern settlements attractive for skilled and educated southerners, introducing colours in the Arctic urban landscape and designing convenient indoor public spaces: "climate-controlled shopping malls which also promote contacts among inhabitants [and] relieve tensions" (UNECE, 1980: 110).

Travels, literature exchange and discussions at events such as these reflect an idea that the unique challenges of the Arctic region require the development of particular related or similar policies and models of urbanism and architecture, and learning between national experts can facilitate such development. Little, however, was discussed in terms of Arcticness in the architecture and planning of settlements in the North. In 1988, a second conference was organised by the UNECE, this time in Finland (1980). This event contributed to the international prominence of the Winter Cities movement. This planning advocacy group promoted liveable urban environments and the cultural celebration of snow and darkness towards local governments primarily through the dissemination of best practice guidelines and cases in publications and conferences (Davies, 2015; Pressman, 2004; Stout et al., 2018). This group promoted Arcticness as a design parameter and an urban policy objective in order to enhance population's attachment to, and identification with, place.

Architectural Arcticness

The Soviet architects' focus on the liveability of northern settlements was mirrored by British-Swedish architect Ralph Erskine. After developing a sub-Arctic prototype habitat in the late 1950s, he became the standard-bearer for a climate-centric Arctic urban design approach that came to dominate the international architectural community's imagination (Birk, 2012; Jull, 2016; McGowan, 2008). Echoing modernist idioms, Erskine's Arctic urbanism was, in his own words, the result of "forms [that] result directly from climate and function" (1961: 59). The prototype comprised a long climate wall that sheltered lower residential districts from the prevailing winds and snowdrift. For size and volume, the wall housed all the communal functions of the town and primary public (indoor) spaces. As Erskine explained, "houses and towns [should] open like flowers to the sun of spring and summer but, also like flowers, turn their backs on the shadows and the cold northern winds" (1968: 167). Erskine claimed that his climate-centric approach was authentic to the Arctic region and suggested that "only by such methods can arise a personal and Indigenous Alaskan, Canadian, Scandinavian or North Russian tradition" (1968: 167). Erskine demonstrated the modernist claim for design universality when he transplanted his Arctic urban prototype, which

was initially developed for northern Sweden, to Arctic Canada and eventually northern England. Erskine's works were studied and emulated across the Arctic, including the Soviet Union (Filin et al., 2018). Desnoyers and Schoenauer's Le Mur-Écran in Fermont, Quebec, is the most elaborate version of Erskine's urban prototype in existence (O'Mahony, 1978; Schoenauer, 1976; Simard & Brisson, 2013). Later generations of international Arctic architects followed Erskine's example and used the region's climate as a determining factor in architecture and urban design, exploring the expressive potential of architectural Arcticness (Jull, 2016; Mähönen, 1989; Pressman, 1989).



The 1.3 kilometre-long climate wall shelters the residential district of Fermont. Photo: P. Hemmersam.

Architectural historian Rhodri Windsor Liscombe argues that Erskine's designs "mobilized the utopic sublimity within the 'modern movement' and the placeless spatiality embodied in Modernist design ideology" (2006: 78). This continuous architectural tradition based on Erskine's work reproduced an urban model with an interior that contrasts a hostile exterior landscape, thereby perpetuating an opposition between urban space and the Arctic territory (Farish & Lackenbauer, 2009; Sheppard & White, 2017).

In the 1980s, Critical Regionalism (Frampton, 1983), which promoted traditional regional expressions as a rejection of modernism, further supported the claim for a unique approach to northern architecture. Architects across the Arctic region continued to invent and propose various 'authentic' architectural expressions. In Inuvik and Iqaluit in Canada, churches resemble giant igloos to reference the Indigenous culture, the Sami Parliament in Karasjok resembles traditional wooden residential structures, and the images of sledge dogs decorate a research station in Kuujjuarapik, Nunavik (Zrudlo, 2001). In Greenland, architects have based the design of public buildings in Nuuk on landscape metaphors, such as the Malik ('Wave') swimming pool, the Aurora Borealis captured in the undulating facade of the Katuaq cultural centre or the mountain-like profile of the Ilimmarfik university complex in Nuuk (Grydehøj, 2014). Such design examples demonstrate one way in which Arcticness is expressed as cultural identity through visual iconography. Another approach in non-Indigenous contexts, has roots in modernist ideas of generally value-free design principles for generalized climatic zones. Architects have explored the expressive potential of 'parametric' design according to environmental conditions. Thus, the design of the visually striking university complex in Longvearbyen by the architectural office Jarmund/Vigsnæs ('Svalbard Science Centre', 2006) prioritises the wind-deflecting geometry over architectural adaptation to the social uses of the town centre. While visually striking, the project reproduces a conceptual framework that insists on the fundamental incompatibility of global urban design frameworks and the Arctic environment.



The University Centre in Svalbard. Photo by Bernt Rostad, CC BY 2.0, www.flickr.com/photos/brostad/1689763976

Experts and designers have actively engaged in the development of architecture and urbanism in the North, and the Winter Cities movement has had some success in promoting Arcticness in urban design, also in cities beyond the Arctic. However, despite the persistence of Arcticness in the architectural discourse, a Northern vernacular has failed to emerge. As Sheppard and White (2017) have concluded concerning Canada's Arctic, architectural models imported from other Arctic regions have proved non-viable due to cultural and economic dissimilarities.

A new urban Arcticness

Despite the problem with identifying and developing a particular architecture and urbanism, Arcticness still plays a role in the formulation of urban policy in the region. There is a long history of making cities attractive to outsiders in Arctic. Initially, architecture and urban design were instrumental in attracting workers and administrators to the North by reproducing 'southern' comforts and a familiar urban scenery. Such approaches by southern planners often meant forming an urban 'inside' separated from a hostile environment and has followed two interacting principles. The first is the indoor social hub that seeks to counter isolation and often becomes a striking architectural feature in a bleak landscape. The other is the climatic urban cluster that reduces infrastructure costs and shelters outdoor urban space from wind and snow. In combination, these principles found a striking architectural form in the climate wall.

In recent years, however, Arcticness has become a marketable quality (Medby, 2017). This realisation has coincided with a post-industrial 'globalisation' wave of urbanisation in the Arctic, where certain cities have emerged as increasingly central (Laruelle, 2019). These cities are seats of increasingly empowered local administrations and have diversified economies, in contrast to the numerous smaller and rural settlements in many parts of the Arctic with stable or declining populations.

In recent decades, a prominent international urban policy trend has promoted attractiveness in the increased inter-urban competition for capital investment and political centrality (Harvey, 1989). Urban economist Richard Florida (2003) and others have highlighted that cities are important sites of innovation and outlined qualitative urban criteria that attract entrepreneurs. Architecture and urban design have significant roles in the attempt to attract and retain young people, entrepreneurs and other members of the 'creative class' that help boost innovation and contribute to job creation. While many Arctic cities are far from achieving the agglomeration effects described by economists such as Florida, changing the framing of northern communities through 'place reinvention'

refocuses attention on the cultural economy and quality of place (Nyseth & Granås, 2007; see also Petrov, 2008).

The 2010 strategic plan for Murmansk proposes that a "modern attractive urban environment" (Extracts, 2010: 6) in addition to good job opportunities are key to attracting and retaining a young population. In its 2016 Capital Strategy, the local government of Nuuk suggested that it could become a 'Capital of the Arctic' by improving its infrastructural connections and attracting international politics and business (Kommuneqarfik Sermersooq, 2016). Similarly, in 2021, Norilsk seeks to become Russia's official Arctic capital (in competition with both Murmansk and Arkhangelsk), while Norwegian cities such as Kirkenes and Longyearbyen position themselves as central international political and scientific hubs (Espiritu, 2018). An example of how urban Arcticness can become economically instrumental is found in the Longyearbyen Tourist Board masterplan (Brunvoll et al., 2015). This strategy promotes the experience of the striking contrast between the ordinary everyday urban life of the town and the 'extreme' landscape to tourists, hoping to keep visitors in town to boost income and avoid disturbing the vulnerable Arctic landscapes of Svalbard.

Conclusion

This paper has outlined how Arcticness became a central concern in twentieth-century urbanism and architectural thinking. Architects and planners exchanged ideas and solutions, and Arcticness intersected with the international discourse and literature on northern liveability problems. Climate amelioration and the creation of urban social life and an experience of urbanity have been central components of the architectural construction of Arcticness rather than local participation and agency. While Arcticness has been a main consideration of urban designers and architects, the actual construction of Arctic cities has developed in a much more ad-hoc fashion; moreover, the framework potentially still plays a role in 'othering' Arctic towns and settlements.

In many Arctic communities, urbanity is not immediately visually evident. The sizeable post-Soviet cites are an exception as are the budding 'Arctic capitals'. Today, Arcticness is exploited by these Arctic cities and has become valuable to urban branding and architectural identity and eventually their sustainability and growth. However, Arctic cities are widely diverse, from modernist metropolises to tiny fishing hamlets. Arctic urbanism must be able to reflect such diversity. Just as there are 'many Norths', Arctic urbanism must be differentiated. Furthermore, Arctic cities must be considered 'ordinary' and on par with cities in other parts of the world, including the urbanised West. Empirical studies and theories must extend to include such marginal locations and enable learning from southern metropolises to the north and from Arctic cities to the rest of the world.

Notes

- 1. https://en.wikipedia.org/wiki/Buckner_Building
- 2. http://www.krskstate.ru/press/news/gubernator/0/news/100344

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