Host Communities and Last Chance Tourism

Last Chance Tourism (LCT) has emerged in recent years as an adaptive response of the global tourism industry to the threats and opportunities of climate change. Referring to the act of travellers explicitly seeking out natural and/or cultural attractions that they deem to be at threat, LCT occurs in many of the World's most iconic and fragile tourism destination regions. While academic scholarship around LCT grows, authors are beginning to question the lack of attention paid to LCT's theoretical underpinnings. This paper uses Lefebvre's notion of a Three-Fold view of space encompassing the interrelated forces of: spatial practice, representations of space, and spaces of representation as a conceptual framing for understanding the spatial dimensions of LCT in Churchill (Canada). Demonstrating both the totality of space and the interrelated nature of its constituent parts, Lefebvre's view of space offers a foundation for future empirical work looking to explore the host community perspective on LCT.

Keywords: Last Chance Tourism; Climate Change; Spatial Practices; Representations of Space; Spaces of Representations; Churchill.

Introduction

Last Chance Tourism (hereafter LCT) is defined by Lemelin et al. (2010, p. 478) as the act of "tourists explicitly seeking vanishing landscapes or seascapes, and/or disappearing natural and/or social heritage". LCT developed from a 1990 travelogue *Last Chance to See* where the presenters Adams and Cawardine sought to experience a variety of then threatened species including the Yangtze River Dolphin in China and the Komodo Dragon in Indonesia (Fisher & Stewart, 2017). LCT has subsequently grown as an identifiable form of tourism because of increased global tourist numbers and concern/recognition of the susceptibility of many tourism destinations to the effects of climate change and other environmental and social forces (Brown, 2018; Hutton, 2019; Shrikant, 2018).

For all of its popular appeal, LCT has faced accusations that it has a somewhat paradoxical relationship to climate change and broader sustainability debates (Dawson, Lemelin, Stewart, & Tailon, 2015; Weaver, 2011). As Eijgelaar et al. (2010) have noted with respect to Arctic cruising, "in attempts to raise awareness of climate change ... [they – cruise ships - are] disproportionally contributing to it at the same time". Building on the pioneering work of Eijgelaar, Thaper, and Peeters (2010), Hall and Saarinen (2010) and Lemelin et al. (2010) the number of papers considering aspects of LCT's sustainable management continues to grow (Dawson et al., 2011; Hindley & Font, 2018; Kruczek, Kruczek, & Szromek, 2018; Piggott-McKellar & McNamara, 2017; Vila, Costa, Angulo-Preckler, Sarda, & Avila, 2016; Zerva, 2018). Recently, however, Fisher and Stewart (2016, 2017) have begun to question the lack of a theoretical foundation for many existing LCT studies.

Fisher and Stewart (2017, p. 512) have argued that the majority of LCT research to date has been descriptive, "usually based on one particular species such as charismatic mega fauna, for example polar bears, or in particularly fragile environments, for example the Polar Regions or coral reefs". From a demand perspective there have been recent efforts to explore how last chance tourists develop place based stewardship tendencies on the basis of their experiences (Groulx, Boluk, Lemieux, & Dawson, 2019; Groulx, Lemieux, Dawson, Stewart, & Yudina, 2016; Groulx, Lewis, Lemieux, & Dawson, 2014). Groulx et al. (2016, p. 1537) noted that "a visitor's nature relatedness and place identity are a significant force shaping their concern for climate change, and by extension their motivation to experience a threatened landscape".

Groulx et al. (2016, p. 1537) go onto suggest, a "strong sense of nature relatedness may be a springboard to constructing a place identity in a new destination and potentially to environmental stewardship" amongst tourists. However, what of the locale in which sociocultural, economic and environmental costs are manifest? Many of the regions and constituent communities that serve as LCT destinations (e.g. Churchill in Manitoba, Canada in this paper) are distinct on the basis that "the history and lifestyle of northern communities has given them an identity that reflects the climatic, geographical, and natural conditions of the environment" (Newton, Fast, & Henley, 2002, p. 289). With a view to exploring aspects of the LCT space based setting, the paper will seek to examine the socially constructed nature of LCT space with reference to Henri Lefebvre's relational conception of space and time notably expressed through his three-fold conceptualisation of space (i.e., Spatial practices – Representations of space – Spaces of representation) (see Lefebvre, 1991[1974]). To date the theory has been applied in a small number of tourism studies focussed on contested tourism locales (e.g. Frisvoll, 2012; Wearing, Schweinsberg, & Tower, 2016), as well as in studies of other contested land use debates around coal seam gas development (e.g. Schweinsberg and McManus, In press). In this paper we will use the work of Lefebvre and illustrate this using Churchill (Canada) to shed light on the myriad social perspectives that are the hallmark of destination sustainability (see Moscardo, Konovalov, Murphy, McGehee, & Schurmann, 2017) in LCT settings.

Climate Change and the Social Construction of LCT Space

The global tourism industry's adaptation to the effects of changing climactic conditions has become an academic research focus in recent years (e.g. Bonzanigo, Giupponi, & Balbi, 2016; Hoogendoorn & Fitchett, 2018; Kaján & Saarinen, 2013; Michailidou, Vlachokostas, & Moussiopoulos, 2016). With tourism globally expected to see 1.4 billion international arrivals in 2018 and 1.8 billion by 2030 (Saarinen, 2018), industry and governments throughout the world have become increasingly concerned with understanding the sector's role as both a victim and cause of global climate change (Moyle et al., 2018; United Nations World Tourism Organisation, 2018; Wood, 2017).

The Intergovernmental Panel on Climate Change has defined climate adaptation as an "adjustment in natural or human systems in response to actual or expected climate stimuli or

their effects, which moderates, harms or exploits beneficial opportunities" (IPCC, 2001). In this sense it is differentiated from mitigation, which "aims to reduce greenhouse gas emissions with the goal of slowing or preventing climate change", adaptation is instead focussed on reducing vulnerabilities (Jopp, Mair, DeLacy, & Fluker, 2015, p. 302). Scott (2011) has argued that adaptation strategies represent something more than the maintenance of a tourism enterprise, they are instead actions that influence the wider social and environmental sustainability of a destination. Climate change adaptation can, depending on the context, present short-term development opportunities for local people (Ooi, Duke, & O'Leary, 2018). In the context of Nunavut communities in northern Canada, changes in the extent and distribution of sea ice has for instance opened up opportunities for increased maritime traffic including the movement of cruise ships through previously inaccessible ocean passages (Johnston, Dawson, & Stewart, 2019)

Lew and Cheer (2018, p. 319) have suggested that "assessing how human social systems respond to change is a challenge because, in most instances, the systems being examined are implicated as both agents and victims of the change that is taking place". On the one hand, when seen in the context of LCT and Arctic tourism more broadly, demand from tourists for access to at-risk environments is growing (McCarthy, 2018). *Forbes* magazine has identified LCT as its top global travel trend for 2018 (Talty, 2017), with access to northern shipping routes including the North West Passage predicted to allow travellers to reduce transit distances by nearly 33% by allowing them to bypass the Panama or Suez Canal (Atwood, Simac, Breck, York, & Wilder, 2017). At the local scale, Environment Canada has estimated the value of polar bear observation around Churchill Canada to be "\$7.2 million per year, of which \$2.2 million represents the net revenue of companies who organise viewing expeditions" (see ÉcoRessources Consultants, 2011, p. vi).

However, is LCT necessarily sustainable beyond the short term? LCT is for some academics an illustration of a "death instinct" in the global tourism industry (Higgins-Desbiolles, 2018, p. 159). Higgins-Desbiolles (2018, p. 158) has described what she sees as the lack of shame exhibited by travellers (including those completing flyovers of Antarctica) for prioritising new experiences in isolated regions, whilst host "communities ... are pushed into a tourism dependent economy in their attempts to try to garner some opportunities for themselves in a global trading system geared towards their underdevelopment". Kelman (2019) has in this journal gone as far as to argue that LCT contradicts the very principles of sustainable tourism.

The aim of the paper is not to prove, or disprove, the sustainability credentials of LCT. We do suggest, however, that LCT space should be understood as something more than catalogue of material aspects. For many of the world's iconic LCT destinations we know a lot about the nature of the activities, what motivates travellers to partake of those activities, but less about the socially constructed nature of the space in which those activities occur (see Lemelin, Dawson, & Stewart, 2012). Lefebvre has argued that the "materiality [of space] in itself or the material practice per se has no existence when viewed from a social perspective without the thought that directs and represents them, and without the lived experience element, the feelings that are invested in this materiality" (Schmid, 2008, p. 41). While destination communities are "dynamic, historical units with specific identities characterised by hegemonic and other discourses" (Saarinen, 2004, p. 161), they have been reduced by many to a position of a passive 'other' in a LCT context. Whether as the source of materials for ethnographic exhibitions of rare indigenous cultures in Europe in the 19th century (R. Lemelin & Baikie, 2013), or as one part of a broader stakeholder mix in often contested destination locales (Johnston, Viken, & Dawson, 2012) local people are central to the success of LCT. However, do we really understand them?

The Canadian Arctic, which forms the backdrop for this paper's Churchill case study contains a diversity of socially constructed framings "that reflect the images and meanings that people hold of the region" (Johnston et al., 2012, p. 10). These framings are constantly in the process of becoming as communities respond to the effects of climate change and other external forces, e.g.:

Climate change has the potential to change the landscape of business here in Churchill ... I don't think we will lose it completely, we'll adapt. It would be devastating if we lost the ice and whatnot. No we won't die, we'll adapt (Stewart & Draper, 2007, p. 24)

Stewart and Draper (2007) observed a generally positive level of acceptance in the Churchill community over the presence of tourism, although a number of concerns were raised over the environmental impact from tundra vehicles on the local landscape and pedestrian safety. Subsequently, Stewart et al. (2008) have drawn attention to a high degree of fragmentation in the community over the future of tourism, to the "extent that some [within the community] believe that there is no future for tourism in Churchill at all" (p. 360). When there is disagreement in a social space, a so-called 'trial by space' can occur. The idea of a 'trial by

space' was proposed by Lefebvre ostensibly to argue that no understanding of what constitutes capitalist driven abstract space is ever absolute; "any form of production must constantly be reassessed on the basis of its social relations" (Wearing et al. 2016, p. 111). Lefebvre (1991[1974], pp. 416-417) suggested that in the work *The Production of Space* that:

... Nothing or no one can avoid trial by space ... It is in space ... that each idea of 'value' acquires or loses its distinctiveness through confrontation with the other values and ideas that it encounters there. Moreover ... groups, classes or fractions of classes cannot constitute themselves or recognise one another, as 'subjects' unless they generate (or produce) a space.

Halfacree (2007, p. 128) has argued that Lefebvre's notion of a trial by space is thus "inherently associated with the notion of space's production, the mental and material processes through which space itself is perpetually recast". Subsequent scholarship (e.g. Lai, Hsu, & Nepal, 2013) has sought to explore how such a process occurs with a particular focus on power relations between constituent stakeholder groups. Frisvoll (2012) argued that the contestable nature of spaces transformed by rural tourism means that the enaction of stakeholder power within the space would not be limited to power held in traditional top down institutional structures. Rather, power can manifest itself in both formal and non-formal mechanisms, government support for rural tourism being an example for the former and a community's attempt to secure a desired way of life being an example for the latter (Frisvoll, 2012).

In order to give a voice to different and often competing representations of space in an LCT destination setting we will in the next section employ Lefebvre's three-fold model of space (see Lefebvre (1991[1974]) as a conceptual framing for a discussion of LCT's spatial setting in Churchill, Canada. Before doing so, however, it is necessary to note that Lefebvre sought to argue that a capitalist endeavour (for example LCT) must be seen to exist within a space made up of "three mutually co-constituting spheres of facets: perceived space, conceived space, and lived space" (Pierce & Martin, 2015, p. 1282). Schmid (2008) has argued that for Lefebvre, these three facets constitute the self-production of not only individuals but also society. The concept of perceived space refers to the perceivable aspect of space that is appropriated by individuals via not only seeing but also hearing, smelling, touching and tasting. In the meantime, perception does not occur internally to the perceiver. It relies on the material elements that make up space to provide the substance for perception. Space, must be conceived

before it can be perceived. Conceived space represents the knowledge that individuals possess about a space that in turn informs how space is perceived. A lived space differs from a conceived space in that while individuals can obtain the knowledge of a space remotely, the lived space is tied to embodied experience in the space as well as the social relations that are supported therein. Lived space, therefore, denotes the experience and feeling individuals derive from interacting with the space.

Lefebvre identified these three aspects of space in his triadic representation of space where space involved the interplay of the following interrelated forces/ components – Spatial practices – Representations of space – Spaces of representation. As Halverson (2015, p. 7) has noted:

Spatial practices, [is] the "perceived space" of everyday life that entails both production and reproduction, providing a level of cohesion and continuity; representations of space, [is] the "conceptualized space" that imposes its knowledge, signs and codes, most forcibly through urban planners and other technocrats; and representational spaces (often translated as spaces of representation), [are] a "lived space" that includes dreams and imaginations as well as subversive or clandestine activity

Both constrained and enabled by the material configuration of space, spatial practice encompasses networks of activities/interactions that are made possible or limited because of the material basis of space. The representation of space may be expressed in verbalised (e.g., descriptions, definitions, theories of space) or visualised (e.g., maps, pictures, signs) forms, and is substitutable by another spatial representation. As such, it is detached from lived experience. Representational spaces refer to the symbolic aspect of space and the forces that signify and link a space to a symbol (e.g., the symbol of polar bear for Churchill). It is through representational spaces different values, norms, identities crash or collaborate to preserve, construct or reconstruct the meaning of a space. The three aspects of space are inseparable and to understand any of the aspects, one needs to refer to the other two (Schmid, 2008).

Taken together Lefebvre was offering a conceptual model that identified space holistically based on the "dialectical interrelations" between its constituent elements (Pierce & Martin, 2015, p. 1282). In this way "space is [seen by Lefebvre as] neither simply natural geography

nor an empty container filled by history" (White, 2010, p. 2). It is instead a shifting entity, one which is produced by human beings over time. As Lefebvre (1975, p. 34) observed:

The past becomes the present (or is renewed) as a function of the posssibilities objectively implied in this past. It is revealed with them. The introduction of the category of the possible into historical methodology permits us to conceive the objectivity – while yielding its due to the relativity, novelty and inexhaustability – of history.

Petani and Mengis (2016) deduce from these words of Lefebvre that space is never set and is constantly being reinvented on the basis of events that bring about possibilities. A LCT destination like Churchill is not merely a frontier township, or natural wonderland, or the home of Indigenous populations or a tourism destination; "it is each of these things to different people toward differing ends, a place assemblage that is constantly and agnostically reproduced" (Pierce & Martin, 2015, p. 1290).

LCT in Churchill Canada

The township of Churchill is located on the southern shore of Hudson Bay in northern Manitoba, Canada (see Figure 1). Located approximately 966 km by air from the provincial capital, Winnipeg, and not easily accessible by ground transport, the region is characterised by a diverse set of landscapes including arctic waters, treeless tundra and boreal forest (Newton et al., 2002). Churchill's permanent population was 899 in 2016 (Statistics Canada, 2019). At the present time the main industries (employers) operating in the township include: tourism; the Port of Churchill and the associated rail line (managed by the Arctic Gateway Group Limited Partnership); medical services under the auspices of the Churchill Regional Health Authority, and Arctic Research based around the not-for-profit Churchill Northern Studies Centre (Groulx et al., 2016).

Tourism in Churchill began in the 1950s and 60s when "the abundance of lakes, rivers forests and tundra, coupled with long-standing tradition[s]s of wilderness outfitters, lodges and other leisure facilities" gave way to the development of the region as a popular birding destination (H. Lemelin, 2005). Polar bear viewing then followed over the ensuing decades as travellers took advantage of opportunities to observe bears from land-based vehicles and helicopters as

the animals wait for the yearly formation of sufficient sea ice to move north to hunt (Dawson et al., 2010).

Insert Figure 1 about here

With polar bear viewing occurring primarily in two protected areas – the Churchill Wildlife Management Area and the Wapusk National Park – located approximately 21 km to the east of Churchill township (Dawson, Stewart, & Scott, 2010), there has long been recognition of the complex and chaotic nature of the local stakeholder dynamics that govern the industry's management . McDonald (2009) has suggested that tourism systems are both evolutionary and subject to the whims of a complex array of stakeholder interests driven by individual value positions. To illustrate the interplay of some of these interests in Churchill we now turn our attention to the first component of Lefebvre's three-fold understanding of space.

The Spatial Practices Dimension of Space in Churchill

Spatial practices (the first component of the Lefebvren understanding of space) constitute those day-to-day actions, forms of production and consumption that together provide a conceptually coherent representation of what space is at a particular point of time. As Elder (2004 in Halfacree, 2007) has noted, spatial practices are associated with how an individual perceives real as opposed to abstract geographical space. Across the 4000 year, history of human habitation of the area around Churchill Township there has been evidence of a progression in how society perceives space. The early nomadic lifestyles of Aboriginal peoples, including the Caribou Inuit, the Sayisi-Dene, and the Maskêkô-winiwak or Swamy Cree, have progressively given way to more industrialised land uses. Indigenous interests have recently been able to capitalise on infrastructure connected to the region's early European trading history to develop eco-lodges including the Cree Village Ecolodge in Northern Ontario on Moose Factory Island (Lemelin, Koster, & Youroukos, 2015).

It was Churchill's abundant wildlife and convenient geographic location at the mouth of Churchill River by Hudson Bay that facilitated the production of fur trades. In 1717, the Hudson's Bay Company built the first permanent European settlement in the region. The company had been established in London in 1670 and came to Canada in a chartered capacity

to manage the trade of furs and compete for limited wildlife resources with Native Americans (O'Leary, Orlikowski, & Yates, 2002). Furs were shipped back to England in exchange for items like knives and blankets and on arrival were used in the creation of hats and other dress goods (O'Leary et al., 2002).

From the early 20th century the focus of government and business began to shift towards seeing Churchill as a gateway for wider trade between Canada and the United Kingdom affecting once again the perception of the area and related development opportunities (Montsion, 2015). The Port of Churchill along with supporting infrastructure including railway and grain terminals, which first started to develop in the 1930s saw Churchill positioned as an integral hub in the industrial make-up of Northern Canada (Montsion, 2015). Throughout the mid-20th century, the Port of Churchill and other infrastructure facilitated the shipment of grain, pulp and other resources to a range of international markets. Along with other industries based around the US and Canadian military exercises in the region and scientific research, various efforts were made to encourage local development (Taylor, 1993).

Tourism in Churchill began in the 1960s (Sisneros-Kidd, Monz, Hausner, Schmidt, & Clark, 2019), with polar bears and other attractions now associated with LCT first becoming prominent in the 1980s (Stewart & Draper, 2007). In 2015/2016 tourism was conservatively estimated to have contributed \$1.6 billion to the regional Hudson Bay (Hayward, 2017). It is an industry that is particularly susceptible to the effects of changing climactic conditions (Johnston et al., 2019) with the main tourism season comprising the six weeks of Polar Bear Migration between October and November, a period where bears essentially wait on the tundra for sufficient ice cover to develop to allow hunting (Yudina & Grimwood, 2016). A small number of private operators run polar bear tours and ecolodges. During peak tourist seasons Churchill's population often grows by as much as 800% (Canada Polar Bears, 2018) with visitors drawn to see polar bears as well as beluga whales and the famed Northern Lights.

The nature of the tourism industry's relationship with the broader Churchill environment is currently being debated. Sisneros-Kidd et al. (2019, p. 2) observe that Arctic tourism, when pursued as "part of a diversified economy can provide communities with an often much-needed source of revenue ... [but that] over-dependency on tourism may adversely affect communities if the economy is solely centred on tourism, as economic dependence can result in reduced resilience and increased vulnerability of a community". While Johnston et al. (2019) have

drawn attention to both the increasing number of Arctic tourists and their high levels of relative wealth; local economies in the Nunavut region including Churchill have often not been able to benefit fully given economic leakage and a lack of opportunities for full-time employment and local ownership (Glowacki, 2015).

There has been a realisation for a number of years that a focus on wilderness assets, including in the case of Churchill polar bears, can lead to a situation where the ability of local people to influence a tourist's destination image will be limited. As Milne et al. (1998, p. 112) argue, there is a concern amongst some Inuit that "visitors may misunderstand the Inuit way of life and its intimate links with the surrounding resource base, and then go to spread 'false' rumours, especially about the use of wildlife in the south". Recognising the presence of distinct voices is important. Yudina and Grimwood (2016) have demonstrated that within formalised tourism marketing discourses, the "portrayal of bears as performing spectacles is embedded in and reinforces normative power differentials between species based on discourses of anthropocentrism and instrumentalism". Sustainability, as a broad concept is subject to the ideologies, whims and priorities of a range of competing stakeholder groups (Smith & Farley, 2013). To shed light on the formation of stakeholder discourses in Churchill, we now turn to the second of Lefebvre's conceptualisations of space – the Representations of Space.

The Representations of Space Dimension in Churchill

Bunce (2008) has argued that tourism sustainability in small island states is not just a question of conserving specific resources. Rather, sustainability is also a human centred phenomenon where the development of service based industries like tourism "not only imposes new landscapes but also fractions of power over the production and reproduction of space" (p. 977). Within any tourism destination, stakeholder power is omnipresent and exercised by a variety of groups including locals, brokers and tourists (see Cheong & Miller, 2000) to affect changes in both the nature of development and tourism behaviour – two fundamental components of destination sustainability. Higgins-Desbiolles et al. (2019) have recently suggested that discussions over tourism sustainability need to afford greater attention to the rights of local people. Whilst we broadly agree with this call, we also wish to suggest that local communities are not homogenous with respect to their histories or visions for a sustainable future (see Schweinsberg, Wearing, & Darcy, 2012).

Eizenberg (2012) has suggested that Lefebvre's framing of space is an appropriate conceptual mechanism for unpacking the myriad of stakeholder discourses that surround space. Representations of space form the second component of Lefebvre's triad and represent space as conceived. Merrifield (1993, p. 523) has described representations of space as that which is "discursively constructed ... [by] professionals such as planners, engineers, developers, architects, urbanists, geographers and those of a scientific bent. This space comprises the various arcane signs, jargon, codifications, objectified representations used and produced by these agents". Such representations (or scripts - see McManus & Connor, 2013) have the power through selective invocation of history and contemporary circumstance to invoke arguments as to what should or should not constitute a region's sustainable future.

Representations of space are governed by the values and ideologies of their proponents. From the decision in the early 18th century to name the township and nearby river after John Churchill (Ancestor of William Churchill and 1st Duke of Marlborough) to the attempt by tourism and governmental interests to frame the township as the "Polar Bear Capital of the World" one can observe an evolution in Churchill's cultural framing and power relations. A recent example of this was the Sea Walls Murals for Oceans Festival in 2017 where 18 muralists from throughout the world came to Churchill with the aim of shining light on the realities of local life (see https://www.seawallschurchill.ca/). Coming from nine countries, artists sought to portray a counter narrative for Churchill, one that could go against narratives of apathy that was perceived as existing in the wider Canadian population. Tribe (2008) has argued that art "adds to our interpretive understanding of the world of tourism" (p. 925). For the artists concerned, there was an appreciation that people are inspired by art and that art makes a difference (Handcraft Creative, 2017).

Whilst the Sea Walls Murals for Oceans Festival is only one group's conception of space in Churchill region, what is interesting for the paper is the way that this representation of space dovetails with the abstract spaces of representation, which we will refer to in the next section. For example, the mural entitled *Human Nature* by the artist Askew One depicts various aspects of life in Churchill (see https://www.graffitistreet.com/sea-walls-murals-for-oceans-in-churchill-canada-2017/), drawing on the artist's own experiences of living in the community during its construction. As Askew observed:

My wall is a play on the phrase 'Human Nature', it's the universal excuse used to justify everything we're doing wrong in this world – you know, like "it's just human nature to..." insert miscellaneous bad thing here. But this is also a play on Human and Nature – the precarious balance between the two. Churchill is a town where this is the underlying drama at all times. It's a town so dependent on the natural environment and its wildlife and is simultaneously threatened by it too. Everything in Churchill has a duality, a total double edge to it. The text on the mural illustrates this tension and also draws from the parallels in texture of both the natural and industrial environments of the town." (Kristen, 2017)

Similar commentaries on the relationship between formal representations of space and Churchill as lived can be observed in the mural *Footprint* (artist Mandy van Leeuwen – see https://www.graffitistreet.com/sea-walls-murals-for-oceans-in-churchill-canada-2017/). Here the simple representation of boots used by generations of human beings as they try to function in what was often a fractured space based setting are used to draw attention to the resilience of people of the north "as they navigate the unknown climate, government and corporate challenges that will shape their future" (Kristen, 2017).

The Spaces of Representation Dimension in Churchill

The Churchill Seawall murals are both a tourism attraction in their own right, as well as an externally constituted framing of what space in Churchill is. However, how does this relate to the space as lived as perceived by local residents? Groulx (2017) has recently observed a view in sections of the Churchill community that their local place identity is being appropriated for economic gain. Tourism has been at the forefront of such initiatives with the Journey to Churchill and Google's Street View Treks singled out based on their attempts to "select stories, histories and experiences ... for consumption beyond the boundaries of the community, [where] a persistent transformation strips down these experiences into their component parts. As these parts are reconstituted into a profitable narrative, it is hard [for many] to accept that much of their authenticity is maintained" (Groulx, 2017, p. 1390).

The question of what is and is not authentic Churchill is open for debate. On the one hand, one has the indigenous history of the region, its time as a military base, fur-trading outpost and

status as one of the top destinations in Canada (National Geographic, 2018). While tourism futures based around polar bears and subsidiary sectors including sport fishing, hunting and the like might be favoured by some in policy making positions on account of the relatively low levels of capital investment (see Newton, 2002); to what extent do such futures relate to the world of Churchill residents "in the practice of their everyday life"? (Schmid, 2008, p. 40). To what extent are they authentic? Nevin et al. (2014, p. 502) have framed grizzly bear viewing in British Columbia as blurring the boundaries between existential authenticity and symbolic authenticity (see also Wang, 1999) where "the projection of expectations and imaginations onto the toured objects, in this case bears, interacts with the emotional experience of the real self". In Churchill and its surrounds, a polar bear tour feels something like:

A typical seven hour, tundra vehicle outing between 11 October and 20 November, 2002–2003, consisted of 18 passengers per polar bear outing with an average temperature of – 8.2Co, ranging from –23Co to –1Co, and generally overcast skies. Wildlife tourists on these outings had a strong chance of seeing at least 5 to 10 polar bears per outing as well as several other wildlife species, including arctic fox, ptarmigan, and snowy owl. (Lemelin, 2006, p. 521)

In such a wildlife tourism context, the citing of a bear is often what will "authenticate the experience rather than any characteristic of the landscape itself" (Nevin, 2014, p. 502). However, in Churchill itself polar bears are often nothing more than part of the scenery – part of the dangers in living in such an exposed northerly outpost (Mulvaney, 2019). With the threat of polar-bear attacks increasing in response to climate change (Dickie, 2018), polar bears are both a drawcard and a threat to local inhabitants. The threat of polar bears has seen the development of a niche community protection and research industry based around the Polar Bear Alert Program and the Churchill Northern Studies Centre – a "not for profit facility based on sustainability and research into Canada's tundra ecosystem" (Miller, 2019). With Groulx et al. (2019) identifying polar bears as being an effective mechanism for developing place attachments, the question becomes how a community should reconcile a role for tourism in polar bear conservation in light of complex community level debates involving indigenous and other actors over the merits of polar bear hunting (Tyrrell, 2006).

Stewart and Draper (2007) have articulated the challenges in integrating spatial practices in Churchill with the lives of real people, drawing attention to the abstract and values driven ways

that space is perceived. As Merrifield (1993, p. 524) has observed, real and perceived space have a close relationship with "people's perceptions condition[ing] their daily reality with respect to the usage of space." When space is endowed with values and emotions, it becomes the ground for contestations when there is an intent to preserve or manifest these values and emotions. In the meantime, it also provides opportunities for invention, negotiation, and/or collaboration (Lai et al., 2013). With polar bears predicted by many to be one of the most high profile casualties of climate change (Hamilton, Kovacs, Ims, Aars, & Lydersen, 2017; Laidre, Stirling, Estes, Kochnev, & Roberts, 2018), will the last chance nature of LCT eventually catchup and render the industry inert? If it does, will the community simply adapt yet again and pursue new futures based on the use of Churchill's port as a site for exporting oil and gas sourced from Arctic drill sites (Reilly, 2018)?

Discussion and Conclusions

"Instead of man versus nature, here it is two sides of the same coin," Li-Hill says in his mission statement. "Both humans and endangered species are in a state of fight or flight. A heightened sense of emergency due to climate change and the long list of global issues places everything in a precarious position. "In a town such as Churchill, the tensions are local but the story is global." (Miller, 2017)

With these words Li-Hill, one of the muralists from the Churchill Festival highlighted both the importance of de-constructing a local perspective of the effects of LCT in Churchill, as well as the applicability of the lessons from Churchill for other LCT destinations. From a purely ecological perspective, LCT is a process leading to a finality where the past is lost forever. For local people, however, life goes on. In this journal, Ooi et al. (2018) have argued that LCT calls into question the resilience of destinations, as the ecosystems on which LCT relies are altered irreversibly. The nature of resilience and indeed of the direction of tourism development in the destination is case specific. As Newton et al. (2002, p. 289) have observed Churchill has an "identity that reflects the climatic, geographical and natural conditions of [it's] ... environment". In the paper, the authors have used Lefebvre's Three-Fold conceptualisation of space to argue that the relationship between real and perceived space is not constant. Instead, it is a product of complex interactions between power dynamics and changing physical environments over time as well as opportunities, gained or lost, within and beyond the space

boundary. As Groulx et al. (2014) have noted there is an increasing realisation that the ability of a community to adapt to changing circumstances (through tourism or any other means) will be constrained or enhanced by a range of local and historically contingent factors.

Lefebvre's conceptualisation of space is well positioned to shed light on space's relational aspects. As Pierce and Martin (2015) have argued with respect to industrial development in the US city of Pittsburgh, "the varying place frames [that exist in a township or community will often] shape political-economic action in ways that are often at cross-purposes" (p. 1291). To see the effect of space as lived we must therefore engage with models that allow us to bridge space's subjective and objective characteristics. As Entrikin (1991, p. 5) has argued:—

From the decentred vantage point of the theoretical scientist, place becomes either location or a set of generic relations and thereby loses much of its significance for human action. From the centred view of the subject, place has meaning only in relation to an individual's or group's goals and concerns.

By seeing space as a trialetic, we are able to position the multitude of stakeholders that exist in a LCT destination at the centre of our understanding of its management. The geography of Canada or indeed any other LCT destination is central to its framing. From this physical geography, different industries will compete to prevail their framings of space (the so-called *Representations of Space*). Such links are not confined to tourism. For example the influential Canadian historian Harold Innis once argued provocatively with respect to the fur trade that Canada "was created because of its geography, not in spite of it" (Innis, 1999).

Lefebvre argued that instead of seeing space, a key geographic component, solely in an abstract sense, we should in fact see it as something that can be claimed by particular stakeholder groups (see Allen, 2011). His three-dimensional framework of space when applied to Churchill manifests the power relations between local stakeholders. For too long there has been a tendency in LCT scholarship for the lived space of communities to be buried in relation to power discourses that tend to prioritise the concerns of industry and travellers. While on the one hand such priorities are logical, can we ever truly have sustainability if the concerns of local people are not given pride of place in discussions? In the paper the authors have sought to demonstrate the value in Lefebvre's tripartite understanding of space as a conceptual framing for LCT's space based discussions. We hope that future work will use this framing as a

foundation for empirical data gathering of community perceptions. As Merrifield (2013) has observed, it is only by "going small, by delving into the atomic structure of life as it is really lived, [that] you can understand the whole structure of the human universe" (p. 5), or in our case the true complexities of LCT's relationship to broader climate change and sustainability debates.

References

- Allen, J. (2011). Lost geographies of power. Malden, MA: Blackwell Publishing.
- Atwood, T. C., Simac, K., Breck, S. W., York, G., & Wilder, J. (2017). Human–Polar Bear Interactions in a Changing Arctic: Existing and Emerging Concerns. In A. Butterworth (Ed.), *Marine Mammal Welfare* (pp. 397-418). Cham, Switzerland: Springer.
- Bonzanigo, L., Giupponi, C., & Balbi, S. (2016). Sustainable tourism planning and climate change adaptation in the Alps: A case study of winter tourism in mountain communities in the Dolomites. *Journal of Sustainable Tourism*, 24(4), 637-652.
- Brown, J. (2018). Last chance tourism: Is this trend just causing more damage? Retrieved from https://www.independent.co.uk/news/long_reads/last-chance-tourism-travel-great-barrier-reef-amazon-machu-picchu-a8363466.html
- Bunce, M. (2008). The 'leisuring' of rural landscapes in Barbados: New spatialities and the implications for sustainability in small island states. *Geoforum*, 39(2), 969-979.
- Canada Polar Bears. (2018). Visit Churchill for the Experience of a Lifetime. Retrieved from https://www.canadapolarbears.com/stories/churchill-manitoba-vacations
- Cheong, S.-M., & Miller, M. L. (2000). Power and tourism: A Foucauldian observation. *Annals of Tourism Research*, *27*(2), 371-390.
- Dawson, J., Johnston, M., Stewart, E., Lemieux, C., Lemelin, R., Maher, P., & Grimwood, B. (2011). Ethical considerations of last chance tourism. *Journal of Ecotourism, 10*(3), 250-265.
- Dawson, J., Lemelin, R., Stewart, E., & Tailon, J. (2015). Last chance tourism: A race to be last? In M. Hughes, D. Weaver, & C. Pforr (Eds.), *The practice of sustainable tourism: resolving the paradox* (pp. 133-145). Oxon: Routledge.
- Dawson, J., Stewart, E., & Scott, D. (2010). Climate Change and Polar Bear Viewing: A Case Study of Visitor Demand, Carbon Emissions and Mitigation in Churchill, Canada. In C. Hall & J. Saarinen (Eds.), *Tourism and Climate Change in Polar Regions Climate, Environent and Experience* (pp. 89-103). London: Routledge.
- Dickie, G. (2018). As polar bear attacks increase in warming Arctic, Inuits and scientists search for solutions. Retrieved from https://www.pbs.org/newshour/science/as-polar-bear-attacks-increase-in-warming-arctic-inuits-and-scientists-search-for-solutions
- ÉcoRessources Consultants. (2011). Evidence of the Socio-Economic Importance of Polar Bears for Canada. Retrieved from http://publications.gc.ca/collections/collection_2012/ec/CW66-291-2011-eng.pdf
- Eijgelaar, E., Thaper, C., & Peeters, P. (2010). Antarctic cruise tourism: the paradoxes of ambassadorship, "last chance tourism" and greenhouse gas emissions. *Journal of Sustainable Tourism*, 18(3), 337-354.
- Eizenberg, E. (2012). Actually existing commons: Three moments of space of community gardens in New York City. *Antipode*, *44*(3), 764-782.
- Entrikin, J. (1991). The Betweeness of Place. Baltimore: John Hopkins University Press.
- Fisher, D., & Stewart, E. (2016). 'Time' to Explore the Theoretical Underpinnings of Last Chance Tourism. Paper presented at the 4th Interdisciplinary Tourism Research Conference, Bodrum, Turkey.

- Fisher, D., & Stewart, E. (2017). Tourism, Time and the Last Chance. *Tourism Analysis*, 22(4), 511-521.
- Frisvoll, S. (2012). Power in the Production of Spaces Transformed by Tourism. *Journal of Rural Studies*, 28, 447-457.
- Groulx, M. (2017). "Other people's initiatives": exploring mediation and appropriation of place as barriers to community-based climate change adaptation. *Local Environment, 22*(11), 1378-1393.
- Groulx, M., Boluk, K., Lemieux, C., & Dawson, J. (2019). Place stewardship among last chance tourists. *Annals of Tourism Research*, *75*, 202-212.
- Groulx, M., Lemieux, C., Dawson, J., Stewart, E., & Yudina, O. (2016). Motivations to engage in last chance tourism in the Churchill Wildlife Management Area and Wapusk National Park: The role of place identity and nature relatedness. *Journal of Sustainable Tourism*, 24(11), 1523-1540.
- Groulx, M., Lewis, J., Lemieux, C., & Dawson, J. (2014). Place-based climate change adaptation: A critical case study of climate change messaging and collective action in Churchill, Manitoba. *Landscape and Urban Planning, 132*, 136-147.
- Halfacree, K. (2007). Trial by space for a 'radical rural': Introducing alternative localities, representations and lives. *Journal of Rural Studies*, 23(2), 125-141.
- Hall, C., & Saarinen, J. (2010). *Tourism and change in polar regions: Climate, environments and experiences*. Oxon: Routledge.
- Halvorsen, S. (2015). Taking space: Moments of rupture and everyday life in Occupy London. *Antipode, 47*(2), 401-417.
- Hamilton, C. D., Kovacs, K. M., Ims, R. A., Aars, J., & Lydersen, C. (2017). An Arctic predator—prey system in flux: climate change impacts on coastal space use by polar bears and ringed seals. *Journal of Animal Ecology, 86*(5), 1054-1064.
- Handcraft Creative. (2017). Know I'm Here. Retrieved from http://handcraftcreative.com/know-imhere
- Hayward, J. (2017). Grinning it and Bearing it in Churchill. Retrieved from https://www.pressreader.com/canada/winnipeg-free-press/20170617/281479276406466
- Higgins-Desbiolles, F. (2018). Sustainable tourism: Sustaining tourism or something more? *Tourism Management Perspectives, 25,* 157-160.
- Higgins-Desbiolles, F., Carnicelli, S., Krolikowski, C., Wijesinghe, G., & Boluk, K. (2019). Degrowing tourism: rethinking tourism. *Journal of Sustainable Tourism*, 1-19.
- Hindley, A., & Font, X. (2018). Ethics and influences in tourist perceptions of climate change. *Current Issues in Tourism, 20*(16), 1684-1700.
- Hoogendoorn, G., & Fitchett, J. M. (2018). Tourism and climate change: A review of threats and adaptation strategies for Africa. *Current Issues in Tourism*, *21*(7), 742-759.
- Hutton, M. (2019). The doom boom: 'Last-chance tourism' causes more harm than good, and why travellers should stay away. Retrieved from https://www.scmp.com/magazines/post-magazine/travel/article/2183143/doom-boom-last-chance-tourism-causes-more-harm-good
- Innis, H. A. (1999). *The fur trade in Canada: An introduction to Canadian economic history*. Toronto: University of Toronto Press.
- IPCC. (2001). Climate Change 2001: Impacts, Adaptation and Vulnerability (IPCC Third Assessment Report). Retrieved from https://www.ipcc.ch/report/ar3/wg2/.
- Johnston, M., Dawson, J., & Stewart, E. (2019). Marine Tourism in Nunavut: Issues and Opportunities for Economic Development in Arctic Canada. In R. Koster & D. Carson (Eds.), *Perspectives on Rural Tourism Geographies* (pp. 115-136). Cham, Switzerland: Springer.
- Johnston, M., Viken, A., & Dawson, J. (2012). Firsts and Lasts in Arctic Tourism: Last Chance Tourism and the Dialetic of Change. In H. Lemelin, J. Dawson, & E. Stewart (Eds.), *Last Chance Tourism: Adapting Tourism Opportunities in a Changing World* (pp. 10-24). London and New York: Routledge.

- Jopp, R., Mair, J., DeLacy, T., & Fluker, M. (2015). Climate change adaptation: destination management and the green tourist. *Tourism Planning & Development*, 12(3), 300-320.
- Kaján, E., & Saarinen, J. (2013). Tourism, climate change and adaptation: A review. *Current Issues in Tourism*, 16(2), 167-195.
- Kelman, I. (2019). Critiques of island sustainability in tourism. Tourism Geographies, 1-18.
- Kristen. (2017). Murals that Tell a Story of Climate Change in Churchill, Manitoba. Retrieved from https://www.bemytravelmuse.com/seawalls-murals-churchill-manitoba/
- Kruczek, Z., Kruczek, M., & Szromek, A. (2018). Possibilities of using the tourism area life cycle model to understand and provide sustainable solution for tourism development in the Antarctic Region. *Sustainability*, 10(1), 89.
- Lai, P.-H., Hsu, Y.-C., & Nepal, S. K. (2013). Representing the landscape of Yushan national park. Annals of Tourism Research, 43, 37-57.
- Laidre, K. L., Stirling, I., Estes, J. A., Kochnev, A., & Roberts, J. (2018). Historical and potential future importance of large whales as food for polar bears. *Frontiers in Ecology and the Environment*, *16*(9), 515-524.
- Lefebvre, H. (1991[1974]). The production of space (Vol. 142). Oxford: Blackwell.
- Lemelin, H. (2005). Wildlife tourism at the edge of chaos: Complex interactions between people and polar bears in Churchill, Manitoba. In F. Berkes, R. Huebert, H. Fast, M. Manseau, & A. Diduck (Eds.), *Breaking ice: renewable resources and ocean management in the Canadian Arctic* (pp. 183-202). Calgary: University of Calgary Press.
- Lemelin, H., Dawson, J., & Stewart, E. (2012). *Last chance tourism: Adapting tourism opportunities in a changing world*: Routledge.
- Lemelin, H., Dawson, J., Stewart, E., Maher, P., & Lueck, M. (2010). Last-chance tourism: The boom, doom, and gloom of visiting vanishing destinations. *Current Issues in Tourism*, *13*(5), 477-493.
- Lemelin, R. (2006). The gawk, the glance, and the gaze: Ocular consumption and polar bear tourism in Churchill, Manitoba, Canada. *Current Issues in Tourism*, *9*(6), 516-534.
- Lemelin, R., & Baikie, G. (2013). 12 Bringing the gaze to the masses, taking the gaze to the people. In R. Lemelin, J. Dawson, & E. Stewart (Eds.), *Last Chance Tourism: Adapting Tourism Opportunities in a Changing World* (pp. 168-181). London: Routledge.
- Lemelin, R., Koster, R., & Youroukos, N. (2015). Tangible and intangible indicators of successful aboriginal tourism initiatives: A case study of two successful aboriginal tourism lodges in Northern Canada. *Tourism Management*, 47, 318-328.
- Lew, A., & Cheer, J. (2018). Lessons Learned: Globalization, Change, and Resilience in Tourism Communities. In J. Cheer & A. Lew (Eds.), *Tourism, Resilience, and Sustainability: Adapting to Social, Political and Economic Change* (Vol. 319-323). London: Routledge.
- McCarthy, A. (2018). 'Last chance travel' the growing trend for 2018. Retrieved from https://www.lonelyplanet.com/news/2018/03/08/last-chance-tourism-trend/
- McDonald, J. R. (2009). Complexity science: an alternative world view for understanding sustainable tourism development. *Journal of Sustainable Tourism, 17*(4), 455-471.
- McManus, P., & Connor, L. (2013). What's mine is mine (d): Contests over marginalisation of rural life in the Upper Hunter, NSW. *Rural Society*, 22(2), 166-183.
- Merrifield, A. (1993). Place and space: a Lefebvrian reconciliation. *Transactions of the Institute of British Geographers*, 516-531.
- Merrifield, A. (2013). Henri Lefebvre: A critical introduction. London: Routledge.
- Michailidou, A. V., Vlachokostas, C., & Moussiopoulos, N. (2016). Interactions between climate change and the tourism sector: Multiple-criteria decision analysis to assess mitigation and adaptation options in tourism areas. *Tourism Management*, 55, 1-12.
- Miller, J. (2017). SeaWalls: Artists for Oceans, Churchill: Canada's famous 'ocean' murals, a major tourist attraction. Retrieved from http://www.traveller.com.au/canada-murals-in-remote-churchill-restore-hope-h17cfx

- Miller, J. (2019). Churchill, Manitoba, Canada: What it's like to visit the 'polar bear capital of the world'. Retrieved from http://www.traveller.com.au/churchill-manitoba-canada-polar-bear-capital-of-the-world-h176k5
- Milne, S., Grekin, J., & Woodley, S. (1998). Tourism and the Construction of Place in Canada's Eastern Arctic. In *Destinations: Cultural Landscapes of Tourism* (pp. 101 120). London: Routledge.
- Montsion, J. (2015). Churchill, Manitoba and the Arctic Gateway: a historical contextualization. *The Canadian Geographer/Le Géographe canadien*, *59*(3), 304-316.
- Moscardo, G., Konovalov, E., Murphy, L., McGehee, N. G., & Schurmann, A. (2017). Linking tourism to social capital in destination communities. *Journal of Destination Marketing & Management*, 6(4), 286-295.
- Moyle, C.-l. J., Moyle, B. D., Chai, A., Hales, R., Banhalmi-Zakar, Z., & Bec, A. (2018). Have Australia's tourism strategies incorporated climate change? *Journal of Sustainable Tourism*, 26(5), 703-721.
- Mulvaney, K. (2019). Churchill Canada Polar Bear Capital. Retrieved from https://www.theguardian.com/world/2019/feb/13/churchill-canada-polar-bear-capital
- National Geographic. (2018). Canada's 50 Places of a Lifetime. Retrieved from https://www.nationalgeographic.com/travel/canada/places-of-a-lifetime/
- Nevin, O. T., Swain, P., & Convery, I. (2014). Bears, place-making, and authenticity in British Columbia. *Natural areas journal*, *34*(2), 216-222.
- Newton, S., Fast, H., & Henley, T. (2002). Sustainable development for Canada's Arctic and Subarctic communities: A backcasting approach to Churchill, Manitoba. *Arctic*, 281-290.
- O'Leary, M., Orlikowski, W., & Yates, J. (2002). Distributed work over the centuries: Trust and control in the Hudson's Bay Company, 1670-1826. . In P. Hinds & S. Kiesler (Eds.) *Distributed work*. (pp. 27-53). London: MIT Press.Ooi, N., Duke, E., & O'Leary, J. (2018). Tourism in changing natural environments. *Tourism Geographies*, 20(2), 193-201.
- Petani, F., & Mengis, J. (2016). In search of lost space: The process of space planning through remembering and history. *Organization*, 23(1), 71-89.
- Pierce, J., & Martin, D. G. (2015). Placing Lefebvre. Antipode, 47(5), 1279-1299.
- Piggott-McKellar, A., & McNamara, K. (2017). Last chance tourism and the Great Barrier Reef. *Journal of Sustainable Tourism*, 25(3), 397-415.
- Reilly, J. (2018). The Drilldown: Climate change could bring opportunities for Churchill. Retrieved from https://ipolitics.ca/2018/07/25/the-drilldown-climate-change-could-bring-opportunities-for-churchill/
- Saarinen, J. (2004). 'Destinations in change' The transformation process of tourist destinations. *Tourist Studies, 4*(2), 161-179.
- Saarinen, J. (2018). Beyond growth thinking: the need to revisit sustainable development in tourism. *Tourism Geographies, 20*(2), 337-340.
- Schmid, C. (2008). Henri Lefebvre's theory of the production of space: Towards a three-dimensional dialectic. In K. Goonewardena, S. Kipfer, R. Milgrom, & C. Schmid (Eds.), *Space, difference, everyday life* (pp. 41-59). New York: Routledge.
- Schweinsberg, S. & McManus, P. (In press). Coal Seam Gas: A Space-Based Perspective. *Geographical Research*.
- Schweinsberg, S., Wearing, S., & Darcy, S. (2012). Understanding communities' views of nature in rural industry renewal: the transition from forestry to nature-based tourism in Eden, Australia. *Journal of Sustainable Tourism*, 22(2), 195-213.
- Scott, D. (2011). Why sustainable tourism must address climate change. *Journal of Sustainable Tourism*, 19(1), 17-34.
- Shrikant, A. (2018). Tourists are flocking to locations threatened by climate change. That only makes things worse. Retrieved from https://www.vox.com/2019/3/18/18267675/last-chance-tourism-coral-reef-galapagos-glaciers

- Sisneros-Kidd, A. M., Monz, C., Hausner, V., Schmidt, J., & Clark, D. (2019). Nature-based tourism, resource dependence, and resilience of Arctic communities: framing complex issues in a changing environment. *Journal of Sustainable Tourism*, 1-18.
- Smith, Z. A., & Farley, H. M. (2013). Sustainability: if it's everything, is it nothing?: Routledge.
- Statistics Canada. (2019). Census Profile, 2016 Census. Retrieved from https://www12.statcan.gc.ca/census-recensement/2016/dp-pd/prof/details/page.cfm?Lang=E&Geo1=CSD&Code1=4623056&Geo2=PR&Code2=46&Data=Count&SearchText=Churchill&SearchType=Begins&SearchPR=01&B1=All&GeoLevel=PR&GeoCode=4623056&TABID=1
- Stewart, E., Dawson, J., & Lemelin, H. (2012). The Transformation of Polar Bear Viewing in the Hudson Bay Region, Canada. In H. Lemelin, J. Dawson, & E. Stewart (Eds.), *Last Chance Tourism: Adapting Tourism Opportunities in a Changing World* (pp. 89-102). London and New York: Routledge.
- Stewart, E., & Draper, D. (2007). A collaborative approach to understanding local stakeholder perceptions of tourism in Churchill, Manitoba (Canada). *Polar Geography*, 30(1-2), 7-35.
- Stewart, E., Jacobson, D., & Draper, D. (2008). Public participation geographic information systems (PPGIS): challenges of implementation in Churchill, Manitoba. *The Canadian Geographer/Le Géographe canadien*, 52(3), 351-366.
- Talty, A. (2017). Last-Chance Tourism Named Top Travel Trend For 2018. Retrieved from https://www.forbes.com/sites/alexandratalty/2017/12/28/for-second-year-last-chance-tourism-named-top-travel-trend-for-2018/#207ed4af64be
- Taylor, A. (1993). Churchill Chapter 1931. *Manitoba History*. Retrieved from http://www.mhs.mb.ca/docs/mb history/25/churchill1931.shtml
- Tribe, J. (2008). The art of tourism. Annals of Tourism Research, 35(4), 924-944.
- Tyrrell, M. (2006). More bears, less bears: Inuit and scientific perceptions of polar bear populations on the west coast of Hudson Bay. *Études/Inuit/Studies, 30*(2), 191-208.
- United Nations World Tourism Organisation. (2018). Climate Change & Tourism. Retrieved from http://sdt.unwto.org/en/content/climate-change-tourism
- Vila, M., Costa, G., Angulo-Preckler, C., Sarda, R., & Avila, C. (2016). Contrasting views on Antarctic tourism: 'last chance tourism' or 'ambassadorship' in the last of the wild. *Journal of Cleaner Production*, 111, 451-460.
- Wang, N. (1999). Rethinking authenticity in tourism experience. *Annals of Tourism Research, 26*(2), 349-370.
- Wearing, S., Schweinsberg, S., & Tower, J. (2016). *The Marketing of National Parks for Sustainable Tourism*. Clevedon: Channel View.
- Weaver, D. (2011). Can sustainable tourism survive climate change? *Journal of Sustainable Tourism*, 19(1), 5-15.
- White, R. (2010). What is spatial history. *Spatial History Lab: Working paper [online]* http://www.stanford.edu/group/spatialhistory/cgi-bin/site/pub.php.
- Wood, M. (2017). Sustainable Tourism on a Finite Planet: Environmental, Business and Policy Solutions. Oxon: Routledge.
- Yudina, O., & Grimwood, B. S. (2016). Situating the wildlife spectacle: ecofeminism, representation, and polar bear tourism. *Journal of Sustainable Tourism*, 24(5), 715-734.
- Zerva, K. (2018). 'Chance Tourism': Lucky enough to have seen what you will never see. *Tourist Studies*, 18(2), 232-254.