"The Only Almost Germ-Free Continent Left"

Pandemics and Purity in Cultural Perceptions of Antarctica

ELIZABETH LEANE
School of Humanities, College of Arts, Law and Education, University of Tasmania, Australia

CHARNE LAVERY
Department of English, University of Pretoria, South Africa, and WiSER, University of the Witwatersrand, South Africa

MEREDITH NASH
College of Engineering and Computer Science, Australian National University, Australia

Abstract This article examines the role of pandemics and viruses in cultural perceptions of Antarctica over the past century. In the popular imagination, Antarctica has often been framed as a place of purity, refuge, and isolation. In a series of fiction and screen texts from the nineteenth century to the present, viruses feature prominently. The texts fall into two categories: narratives in which Antarctica is the sole source of safety in a pandemic-ravaged world and those in which a virus (or another form of contagion) is discovered within the continent itself and needs to be contained. Viruses in these texts are not only literal but also metaphorical, taking the form of any kind of threatening infection, and as such are linked to texts in which Antarctic purity is discursively connected to racial and gendered exclusivity. Based on this comparison, the article argues that ideas of containment and contagion can have political connotations in an Antarctic context, to the extent that they are applied to particular groups of people in order to position them as "alien" to the Antarctic environment. The authors show that the recent media construction of Antarctica during COVID-19 needs to be understood against this disturbing aspect of the Antarctic imaginary, and also that narratives of Antarctic purity are imaginatively linked to both geopolitical exclusions and the melting of Antarctic ice.

Keywords Antarctica, virus, COVID-19, pandemic, purity

Just before Christmas 2020, the Latin American media reported an outbreak of the COVID-19 virus at Bernardo O'Higgins Station, a Chilean scientific base on the northern tip of the Antarctic Peninsula. A second base on King George Island in the South Shetlands, where the vessel carrying personnel from O'Higgins had landed, also reported

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an incident. The outbreak eventually totaled fifty-eight cases, including both military and civilian personnel.[1] Reported worldwide, this outbreak in the Antarctic was figured as the completion of the virus's spread throughout the planet: "With the first positive tests in Antarctica," ran a *New York Times* headline, "no continent is untouched by the virus";[2] an Indian media source likewise announced, "Coronavirus Infiltrates All Seven Continents."[3] The events brought to an end a year-long period during which Antarctica had been regularly framed as the planet's last substantial COVID-19-free zone: a place of "splendid isolation,"[4] the "final coronavirus-free frontier,"[5] "Earth's one virus-free continent."[6]

Given the popular cultural imaginary of Antarctica as the most remote place on Earth and the most extreme environment for human habitation, it is not surprising that the continent was so readily evoked in terms of refuge, isolation, purity, and resistance to infection. In this article, we demonstrate that these thematic framings are neither new nor neutral. Rather, they draw on a tradition established in cultural texts—narratives of literal and metaphorical viruses that need to be kept inside or outside the Antarctic Continent. We trace this cultural historical tradition, arguing that discourses of containment and contagion come with their own politics of not only what but also who belongs in Antarctica. The idea of Antarctica as an uncontaminated space can itself act like a virus, refusing to be contained within environmental discourse and instead mutating and spreading into other domains, with potentially damaging consequences.

Metaphorical and Literal Viruses in Antarctic Fiction

From at least the time Antarctica began to be explored on foot, the continent has been associated in the public imagination with lack of disease. Edward Evans, second in command of Robert F. Scott's ill-fated South Polar expedition, reported from Antarctica in 1912 that "the great advantage of this place is that one never gets ill. . . . No colds, chills, or other little ailments trouble us."[7] Australian explorer Douglas Mawson, when raising interest in his planned 1911 expedition, touted Antarctica to fellow scientists as "the only almost germ-free continent left," arguing that "its scenery, contrasting absolutely with that common to Australia, and its never to-be-forgotten invigorating atmosphere, determine for it, indisputably, the location of the future premier sanatorium of this portion of the globe."[8] In a series of essays Mawson wrote while living in Antarctica he lists sanatoriums, along with more obvious options such as minerals and whaling, among the continent's "commercial resources."[9]

1. Vergara, "More Coronavirus Cases."
2. Levin and Kim, "With First Positive Tests."
3. TWC India, "Coronavirus Infiltrates."
4. Abramovich, "Antarctica's Splendid Isolation."
5. Letzing, "Antarctica."
6. McKie, "Antarctica."
7. *Daily Telegraph*, "'Never Get Ill,'" 10.
8. *Daily Telegraph*, "Wireless to the South Pole," 2.
9. *Adelie Blizzard*.

This idea of the ice continent as a salubrious, rejuvenating environment entered the literary culture of the day. A playful poem in the Australian *Bulletin* magazine, inspired directly by Evans's comment, begins, "No snuffles, no sneezing, no 'flue,' / That's the place both for me and for you!" before going on to ironically point out that frostbite and death in a crevasse nonetheless remain strong possibilities.[10] A 1913 short story by Kathleen Watson—another Australian writer—has an Antarctic explorer reflect that "the weakling who soon dies [in the tropics] would, on the contrary, be made whole in the life-giving tonic of these ice-bound shores."[11] As this quotation suggests, while the isolation of an Antarctic community is an obvious reason for lack of contagious illness, the idea of the polar regions as health-giving also dovetailed with nineteenth-century beliefs about climate and race.[12] If hot and tropical environments were considered to have enervating and degenerating effects on white explorers and settlers, then the cold and dry polar regions should logically do the opposite: colder meant cleaner, whiter, and stronger.

Around the same time, however, writers began to explore the speculative potential of a converse idea: if Antarctica's remoteness formed a barrier to germs, what would happen if a serious contagious disease occurred in an enclosed polar community? This is the premise of expressionist writer Valery Bryusov's "The Republic of the Southern Cross," a short story first published in Russian in 1905 and translated into English in 1918. Bryusov's tale takes place several centuries in the future when Antarctica has been transformed into a new state—an ostensible socialist democracy that is actually a highly controlled capitalist oligarchy exploiting the continent's mineral deposits to dominate the global metal market. The republic's capital city, Zvezdny, the home of 2.5 million of the state's 50 million people, is located at the South Pole itself and, because of the hostile climate, is covered by a huge opaque dome. The story recounts the outbreak in the city of a "fatal disease," beginning as a "rare and sporadic malady" and developing an "epidemic character" that results in the destruction of the city and potentially the state.[13] The sickness is a psychological one in which "the victims continuously contradicted their wishes by their actions"—turning left when they mean to turn right, harming when they mean to help, and so forth.[14] Hospitals overflow, and those who can flee do so. Other cities in the republic become infected, and a "social panic" takes place until "strong measures taken in time" bring the situation in these cities under control.[15] But Zvezdny, eventually cut off from the outside as railways and the telegraph system fail, descends into chaos, violence, and debauchery, closing in on itself to become an "immense black box."[16] Written in the immediate wake of the 1905 revolution in Russia,

10. de Boheme, "Joys of Antarctica," 38.
11. Watson, *Small Brown Room*, 48.
12. Hains, *Ice and the Inland*, 15–16, 20, 89–90.
13. Bryusov, "Republic of the Southern Cross," 71.
14. Bryusov, "Republic of the Southern Cross," 70.
15. Bryusov, "Republic of the Southern Cross," 83.
16. Bryusov, "Republic of the Southern Cross," 83.

Bryusov's science fiction tale of "psychical infection" clearly requires an allegorical analysis in its use of the ultimate antipodean location to comment on the hypocrisies, paradoxes, and contradictions of political and economic systems.[17] Nonetheless, the association between the isolated Antarctic environment and a contagious epidemic in Bryusov's tale inaugurated a tradition that would be exploited periodically in Antarctic narratives on page and screen for the next century.

In these polar epidemic narratives, an Antarctic community is either the source of a contagion that must be kept isolated from the rest of the world or a last refuge against a disease that has ravaged the remainder of the globe. While sometimes this infection is an actual disease that invites a metaphorical reading, as in "The Republic of the Southern Cross," in others the reverse is true: the form of contagion is not a literal disease but can readily be interpreted as such. In all cases, a key feature of the narratives is the ability to maintain and police the natural boundary formed by the Southern Ocean between the ice continent and lower-latitude regions, which acts as a giant moat around an icy fortress.

The idea that the enemy might be hidden within the fortress itself is a key source of anxiety in several influential Antarctic fictional narratives. This notion of the "enemy within" is the basis of the "frozen alien" conceit that emerged in pulp magazine science fiction of the 1930s, in particular H. P. Lovecraft's *At the Mountains of Madness* (1936), in which a scientific drilling expedition disturbs horrific alien beings beneath an Antarctic mountain range, and John W. Campbell's "Who Goes There?" (1938), in which a shapeshifter is inadvertently introduced to a US Antarctic base, eventually attacking and impersonating its human and animal occupants. The alien beings in both narratives have been explicitly interpreted as contagions. Lovecraft's aliens include amorphous beings that Gilles Deleuze and Félix Guattari liken to "an infectious disease."[18] The parallels in Campbell's story are even stronger, in the sense that the alien passes between its human hosts in concealed form and only a blood test can determine which expeditioner has been infected by the alien and which is still wholly human. While the original alien is vanquished in the story, ambiguity remains as to whether it may have inhabited an albatross and escaped the bounds of the station and the continent.

Campbell's story has been adapted and drawn upon numerous times, most prominently in three film adaptations in 1951, 1982, and 2011. Best known of these is the 1982 film *The Thing*, directed by John Carpenter. *The Thing* has become a cult classic, particularly within Antarctic communities, where it is traditionally (and ironically) screened after the last plane or ship departs leaving the wintering crew—like the men in the film—physically isolated for several months of darkness. Carpenter's version of the story self-consciously emphasizes the alien's invasive and disease-like qualities: during the

17. Bryusov, "Republic of the Southern Cross," 75. For a political interpretation, see, for example, Suvin, "Utopian Tradition," 144.

18. Deleuze and Guattari, *Thousand Plateaus*; quoted as the epigraph to Johnson, "Sick Puppies."

blood test scene, a vintage poster on the wall of the base warns against venereal disease;[19] in another scene, the chief biologist runs a computer simulation of the impact on the human population if the Thing escapes the continent, with the graphics showing an "intruder" cell assimilating dog and human cells, and the results predicting that the entire human population will be "infected" in just over three years if it reaches "civilized areas." In this and other ways the film highlights different forms of invasiveness more than Campbell's original narrative: an initial scene shows the alien spacecraft crashing into the South Polar region of planet Earth—an extraterrestrial invasion; the alien invades the station, first in the form of a seemingly innocuous husky that is given the run of the men's living areas, eventually leading to the destruction of the base; and the bodies of the men are themselves invaded, something gruesomely and excessively brought home through special effects.

Critics and commentators have explicitly noted the viral qualities of the Thing. An early example is Ernesto Guerroro, who proposes that the "repressed, latent meanings of blood as well as the replication and covert spread of the alien and monstrous" in the 1982 film reflect "public dread" of "biological threats of pandemic spread of bacterial and viral agents through our physical bodies." Noting that the isolated, biracial, homosocial, and substance-abusing station community "becomes a nearly literalized microcosmic model consonant with how the 'gay plague' was perceived in the media and public imagination" at the time, he argues that the film anticipates "the public's first panicked coming to awareness of AIDS."[20] The Thing as HIV/AIDS or "aggressive illness" more generally has become "one of the best known readings of the film."[21] Characters in the 2011 prequel to Carpenter's film (also entitled *The Thing*) use terms such as *virus* and *quarantine* in reference to the alien.[22] Elena Glasberg's review article "Viral Things," which includes discussion of the 2011 film, extends this interpretation from the alien to the film, which reproduces versions of itself.[23]

The cultural resonances of the Thing-as-virus have not gone unnoticed during the COVID-19 pandemic. In early April 2020, not long after the pandemic was officially declared, critic K. Austin Collins wrote that if the film were not already a cult classic, he would "say its time had finally come."[24] Collins reflects on the way the paranoia of *The Thing*, in which no one knows who is infected, seems "eerily relevant right now,"

19. The poster shows a woman in a seductive pose with a sign around her neck reading "I have VD"; the heading above reads "They aren't labeled, chum!" The poster sales website Limited Runs suggests this is an actual US propaganda poster from around 1943. L/R Limited Runs, "Take a Pro, They Aren't Labeled, Chum," https://www.limitedruns.com/original/advertising-posters/propaganda/take-a-pro-they-aren-t-labeled-chum/ (accessed August 11, 2021).

20. Guerroro, "AIDS as Monster," 86–93.

21. Altobelli, "Cold, White Reproduction," 33–49.

22. Relevant dialogue occurs at 52:44 in van Heijningen, *The Thing*.

23. Glasberg, "'Viral Things,'" 201–10.

24. Collins, "Watching *The Thing*."

paralleling his experiences in New York as coronavirus cases spread: "On a late-night walk through my shut-down neighbourhood someone to the rear of me sneezed. I don't know who; I didn't look; I didn't want to confirm that they were as near to me as I suspected they were. . . . A sneeze was all I needed to be nudged into hating this person—to fearing this person. And from there to fearing most everyone else."[25] As in other viral interpretations of the film, it is not the biological threat itself that Collins finds most terrifying but rather the human behavior it induces.[26] Another popular cultural commentator, writing in July 2020, similarly considers the film to be "the Ultimate Pandemic Lockdown Movie," noting that, among other coronavirus parallels, the US base men are endangered when "a contagion makes the leap from animal to human host."[27] Since early 2020, industry magazines have reported rumors of a new version of *The Thing*.[28] While these plans cannot have been COVID-inspired, it is hard to imagine that any new version would not take the opportunity to foreground its themes of contagion and isolation in this new context.

Between the appearance of Campbell's original story "Who Goes There?" in 1938 and its first two film adaptations, the world had entered the Cold War, a period when contagion and containment narratives became acutely resonant. During this time, imaginative narratives set in Antarctica were increasingly dominated by postapocalyptic science fiction as well as geopolitical thrillers. One of the most enduring examples of the former genre is *Fukkatsu no hi* (*Day of Resurrection*) by Sankyo Komatsu, a prominent Japanese science fiction writer.[29] Published in 1964, the novel is set at a Japanese Antarctic station in the immediate future (1973). The narrative centers on the accidental release of an anthropogenic virus produced as a Cold War weapon. Over several months, the human (and much of the animal) population of the world succumbs to the disease, but the virus's susceptibility to cold temperatures coupled with the continent's isolation means that ten thousand people living in Antarctic stations survive. Despite various threats due to automated nuclear weapons, this population becomes the basis for the human race's ongoing survival (putting considerable pressure on the small number of women expeditioners). Cold War national rivalries are set aside as the survivors transform into "Antarcticans" rather than "people of this or that country."[30] While Antarctica functions as a very literal refuge in the narrative—"sealed in by ice" and "quarantined from the rest of the world"[31]—its resistance to infection is also figurative. In the narrative, the dominance of the remaining population by scientists ensures that the community has the kind of values that will ultimately enable harmonious survival.[32] Komatsu's

25. Collins, "Watching *The Thing*."
26. Collins, "Watching *The Thing*."
27. Myles, "John Carpenter's *The Thing*."
28. Kiefer, "John Carpenter."
29. Bolton et al., "Interview with Komatsu Sakyô," 238–39.
30. Komatsu, *Virus*, 247.
31. Komatsu, *Virus*, 198, 242.
32. Komatsu, *Virus*, 278.

novel was adapted in 1980 into a film featuring an international cast and including both English and Japanese dialogue; the release for English-speaking audiences was titled *Virus*. In 2012, an English translation of the novel, also titled *Virus*, was published, indicating the text's continuing cultural currency.

A more recent version of a postapocalyptic Antarctic virus narrative is Kevin Brockmeier's *The Brief History of the Dead* (2006). *The Brief History* departs from the typical pattern of postapocalyptic fiction—his novel features a parallel narrative set in a limbo occupied by anyone in the memory of those still living—and the novel was marketed and received as literary rather than genre fiction. The Earth-bound narrative strand is set in the mid-twentieth century, by which time the Coca-Cola Company, along with two other corporations, has purchased the entire (and rapidly melting) Antarctic Continent to produce a safe source of water following a series of water-safety terrorism scares that the company eagerly exploits. This narrative strand focuses on one of the company's employees, Laura Byrd, sent to Antarctica as part of a supposed research expedition (but actually a "publicity stunt") for the planned commercialization of the ice.[33] When their communications fail, the two other team members strike out toward the nearest station but fail to return. Laura follows and in the now-deserted station discovers that a mutagenic virus originating (it eventuates) in deliberately infected bottles of Coke[34] has spread from North America throughout the world, entering Antarctic stations through resupplies. Laura, whose everyday existence is oversaturated by Coca-Cola, habitually avoids the soft drink, and this, along with her accidental isolation, renders her the only person alive who is unaffected by the epidemic. Her name is a play on that of Richard Byrd, a US explorer who deliberately isolated himself in an inland station over the winter of 1934. The story thus becomes the ultimate robinsonade, with Laura finding herself the sole remaining human on Earth (and hence, via her memories, the sole source of all those remaining in limbo), before she too succumbs to the cold. While the virus is a literal infection of Antarctica—a place that, even in this dystopian future, still has an arguable claim to wilderness status[35]—this form of corruption is foreshadowed by the continent's symbolic corporate sullying. Globalization, multinational capitalism, and viral marketing are all framed by the novel as figurative epidemics, and Antarctica's inability to withstand them prepares readers for the epidemiological catastrophe to come.

Antarctica's isolation in relation to invasive biological threats operates temporally as well as spatially. The preserving power of polar ice lends itself to scenarios in which germs that have long been dormant are released through human action. In the early 2000s, for example, a boast in the *Antarctic Sun* (a news site produced by the US Antarctic program) that the continent was a safe haven during US anthrax postal attacks was upended when spores of the bacterium were discovered in a hut used by Scott's expedition

33. Brockmeier, *Brief History of the Dead*, 22.
34. Brockmeier, *Brief History of the Dead*, 179.
35. Brockmeier, *Brief History of the Dead*, 20.

ninety years previously, probably carried down by ponies brought for support in sledging journeys.[36] Antarctic drilling programs provide another source of contamination; while in reality the primary threat is the contamination of the ice, and particularly of lakes beneath the ice, by equipment, the opposite situation makes a better dramatic scenario for fiction. In L. A. Larkin's thriller *Devour* (2016), for example, Antarctica's presumed immunity to geopolitical machinations—"no tanks, no Taliban, no political coups"[37]—is violated after an operation drilling into an underground lake discovers a new species of microorganism that has "survived for thousands, if not millions of years, cut off from the rest of the biosphere."[38] This find, so unusual as to be dubbed "alien" by the researchers, turns out to be "the most destructive bacteria known to man."[39] The protagonist, an investigative journalist, must stop a rogue Cambridge scientist from releasing a vial full of the microbe into the US water system. The discovery on which *Devour*'s plot hinges thus echoes the ancient buried alien idea of pulp science fiction texts and combines this trope with a pandemic threat narrative.

In mid-2020, while the media was reporting record numbers of COVID-19 infections globally and many cities were in lockdown, a new Antarctic thriller appeared: a six-part television series entitled *The Head*, set over winter in an isolated (fictional) station, Polaris VI. The series focuses on a killer in a closed community who is picking his or her companions off one by one, but whose identity is impossible to determine, creating paranoia and suspicion. The similarities with Carpenter's film—which the characters watch near the start of the series—are clear. The parallels extend beyond this basic scenario, however, linking to the viral qualities of *The Thing*. The carnage wreaked by the killer in *The Head* can be traced back to a terrible event at a nearby station, Polaris V. The event in turn relates to a newly discovered microbe (a benign and lucrative CO_2-eating form of bacteria).[40] A flashback shows a female Polaris V scientist working on the bacteria being subject to sexual harassment by the older male leader of the project, John Lynch, and dying in a struggle against his advances. Her female colleague, also the subject of Lynch's sexist attitudes, witnesses the incident but cannot bear to lose everything she has invested in the research project. She systematically blackmails the rest of the winterers into covering up the incident and burning down the station, which sinks into the ice.

This violent secret, which must not be allowed to escape its buried Antarctic location but nonetheless eats away at the Polaris V expeditioners, is the disease equivalent in the narrative. Rumors of its resurfacing send the expeditioners back to the new Polaris VI, where they comprise all but two of the wintering crew. The community of

36. Palmer, "Anthrax Spores."
37. Larkin, *Devour*, 63.
38. Larkin, *Devour*, 74.
39. Larkin, *Devour*, 377.
40. Dorado, *The Head*.

one station is thus infected by its earlier incarnation, the numbers (I–VI) suggesting a pattern of replication that could stretch back further than the narrative explores. Moreover, a last-minute twist rests on a question of concealed identity. While Lynch is arrested for the murders, the series' final moments reveal the true Polaris VI killer to be the station doctor who, unbeknownst to her fellow expeditioners, is also the daughter of the dead Polaris V scientist. Like the Thing, she succeeds in her revenge by effecting an elaborate series of imitations in which she is able to disguise her identity and actions.

While *The Head* was in train well before the pandemic was declared and is not a literal contagion story, its action, inseparable from its Antarctic setting, evokes claustrophobia, isolation, and a sense of unseen threat that renders everyone untrustworthy. Harking back to the familiar "secret buried under the ice" conceit, it points to a new concern that this secret may itself center on issues of exclusion: that some kinds of people have been traditionally considered as belonging in Antarctica while others have not. In particular, the multiple allegations of sexual harassment that led to the firing of Antarctic scientist David Marchant, and the larger #MeToo movement, are highly relevant to this twenty-first-century version of the buried secret narrative that *The Head* presents. In the next section, we draw out connections among gender, race, and purity in Antarctic cultural texts, examining the way that they have functioned as discourses of exclusion that can become interconnected with the literal forms of exclusion required to keep the continent virus-free.

Race, Gender, and Myths of Antarctic Purity

South African novelist Fiona Snyckers's thriller *SPIRE* (2017), centering on a viral outbreak on an Antarctic base in the near future, makes explicit the links between contagion and microbial purity, on the one hand, and narratives of gendered and racialized purity on the other. The novel begins, yet again, with a reference to *The Thing*, as the narrator, Dr. Caroline Burchell, describes to her daughter over Skype how she had watched the three movies in order at the start of her overwintering stay at the (fictional) South Pole International Research Establishment (SPIRE). Caroline is the base doctor and is also conducting research about how viruses survive in cold environments, having brought with her a secure chest full of vials of diseases such as smallpox and SARS-CoV-2.[41] She, as a white South African woman, is paired at the base by her countryman Kelebile Chuma, a Black senior nurse, who assists Caroline when person after person at the base falls gravely ill with anachronistic diseases. Their racial identities are significant to the story. When Chuma starts to cough, he reports feeling "not too bad actually" but jokes that "the black guy always dies in the first reel, doc."[42] Unfortunately, this turns out to be true of the novel as well: Chuma collapses within two pages and dies soon after. While the cast of characters initially appears racially and nationally diverse, they soon

41. Snyckers, *SPIRE*, 3.
42. Snyckers, *SPIRE*, 16.

all succumb to disease too, leaving Caroline alone at the base. She is not entirely alone, however, but secretly accompanied by a hidden saboteur. With the focus reduced to two white characters, the central tension shifts quickly from race to gender.

The saboteur is an "environment-nut" who can weaponize viruses by "bonding them to CFCs and creating a small-particulate aerosol solution that could be misted into the air at will."[43] The Antarctic base is the perfect "closed environment" for testing the canisters as well as for pursuing his obsession with the female doctor and women in general. As he thinks:

> Of the whole contagion of humanity that blanketed the earth, women were the most infected. They were the fecund ones, the ones that carried the seeds of the next generation in their wombs. Their diseased ovaries spat out eggs every month, like large-cell bacteria that lived to multiply. If men like him had been able to resist their foetid lure, the human contagion would have died out generations ago.[44]

Viruses are unleashed in the closed society of an Antarctic base in order to remedy the earth's infection by the contagion of women. The novel keys into the literal and figurative association between Antarctica and viral infection, just as it touches on the way in which purity is figured not only in biological but in racial and gendered terms.

The association between whiteness, purity, and Antarctica is long-historied and persistent. South African–Australian novelist J. M. Coetzee evokes its racial imaginary in an essayistic chapter of the novel *Elizabeth Costello*. The chapter is called "The Novel in Africa" but is in fact set in Antarctica and the Southern Ocean. The eponymous Costello is a famous author who agrees to act as a lecturer in exchange for a berth on a cruise from New Zealand to Cape Town via the far south. She would like to visit Antarctica "not just to see with her own eyes those vast horizons, that barren waste, but to set foot on the seventh and last continent, feel what it is like to be a living, breathing creature in spaces of inhuman cold."[45] But the anticipated inhuman continent is not without humanity's divisions. She is paired for the lecture with the Nigerian novelist Emmanuel Egudu, whose lecture focuses on the value of oral literature as anti-imperial form. Written literature is a symptom of empire, and empire in turn can be understood, he suggests, in terms of disease and contagion: "Since the seventeenth century . . . Europe has spread across the world like a cancer, at first stealthily, but for a while now at gathering pace, until today it ravages life forms, animals, plants, habitats, languages."[46] Antarctica was not spared racialized imperialism's virulent spread. During the questions, Egudu laments that "even here, on this ship sailing towards the continent that ought to be the most exotic of all, and the most savage, the continent with no human standards at all, I can

43. Snyckers, *SPIRE*, 148, 92.
44. Snyckers, *SPIRE*, 92–93.
45. Coetzee, *Elizabeth Costello*, 35.
46. Coetzee, *Elizabeth Costello*, 42.

sense I am exotic."[47] Costello, decrying his embrace of exoticism, nevertheless admits that Egudu's is "the one black face in this sea of white"—overlapping the white iciness of the southern seas with their racial exclusivity.[48]

The morning after the lectures, the ship reaches the subantarctic Macquarie Island and Costello goes out early onto deck for her first sighting: "The Southern Ocean. Poe never laid eyes on it, Edgar Allan, but criss-crossed it in his mind. Boatloads of dark islanders paddled out to meet him. They seemed ordinary folk *just like us*, but when they smiled and showed their teeth the teeth were not white but black. It sent a shiver down his spine and rightly so. The seas full of things that seem like us but are not."[49] Costello refers here to Poe's strange early tale of Antarctic exploration, *The Narrative of Arthur Gordon Pym of Nantucket* (1838). While the bulk of this novel is spent on a picaresque ship's journey, it ends farther south, in Antarctica. Drawing on myths of a polar whirlpool and hollow-earth traditions, Poe concludes the novel with Pym pulled into a cataract presided over by a giant white figure. But just before that he meets a tribe of Antarctic natives, their "complexion a jet black, with thick and long woolly hair."[50] Friendly at first, these Antarctic inhabitants lay a trap from which no one escapes except the narrator and two companions, who become "the only living white men upon the island."[51] This racialized fantasy of a tropical, savage, and ultimately colonizable island beyond the ice forms part of a nineteenth-century American projection of colonial desire for new landscapes and peoples to conquer.[52]

The discourse of Antarctica's racial purity works in two directions, similarly to the refuge or worst-hit narratives of viral contamination. There is the sense both that Black bodies might contaminate the pure environment and also that they are excessively vulnerable to its dangers. Historically, one of the key tenets of the racial logic by which people of color were symbolically excluded from the "purity" of Antarctica was the idea that they were ill-suited to the cold. In James Fenimore Cooper's *The Sea-Lions*, the sea-captain hero and his first mate debate the suitability of dark-skinned people to Antarctic conditions: "Black blood won't stand cold like white blood," asserts the mate, "any more than white blood will stand heat like black blood."[53] This is part of a much wider apologetics

47. Coetzee, *Elizabeth Costello*, 47.

48. For a longer discussion of race, empire, the global South, and the Southern Ocean, see Samuelson and Lavery, "Oceanic South."

49. Coetzee, *Elizabeth Costello*, 51.

50. Poe, *Narrative of Arthur Gordon Pym*, 78.

51. Poe, *Narrative of Arthur Gordon Pym*, 91.

52. Wijkmark, "Poe's Pym." Also noteworthy here is Mat Johnson's novel *Pym* (2011), a rewriting of Poe's novel in which the racial logics of Antarctic exploration are surfaced and inverted. In this novel the preserving effects of Antarctic cold, when disturbed, release not a biological virus but nineteenth-century racism, in the form of the body of Pym himself. See Wilks, "'Black Matters,'" 2–3.

53. Cooper, *Sea-Lions*, 333. By the middle of the nineteenth century, the "assumption of racial fixity was . . . frequently asserted in medical texts: to leave the race's ancestral environment was to risk physiological and mental breakdown." Anderson, "Disease, Race, and Empire," 64.

for racialized economic inequality, which blames the underdevelopment of Black societies on their warm, tropical locations rather than the depredations of empire. As Brigid Hains, discussing the "Heroic Era" of Antarctic exploration, notes, "The effect of cold climate was a keystone of racial theories that condemned the languor of tropical races, and valorised the 'Nordic' racial characteristics—supposed to be the outcome of the harshness of the Arctic climate."[54] While these assumptions have long been discredited, it is striking the extent to which imperial exclusions persist in the far south. Now over sixty years old, the Antarctic Treaty has fifty-five signatories from across the globe, but none of Africa's fifty-four countries, other than South Africa, is included. Postapartheid South Africa remains the exclusive representative of the African continent to Antarctic affairs not only in politics but also science, as represented by the Scientific Committee on Antarctic Research, where it is again the only African member.[55]

More progress has been made in combating the exclusion of women from Antarctic space, although until recently that exclusion too was underpinned and fostered by a narrative of contamination. Antarctic space was constructed as pure and cold, a bracing environment for the adventures of men away from the messiness and complexity of social and domestic life: a Boy's Own adventure on ice. Women's entry into the same spaces contaminates them with what Ursula Le Guin's narrator in the short story "Sur" calls "housekeeping."[56] As Elena Glasberg describes, women in Antarctica would disturb the "purity of a homosocial work—and play—environment."[57] Bill Manhire in *The Wide White Page* points to Beall Cunningham's novel of the same name—"a very bad novel about Antarctica"—as the apex of this cultural subconscious, in which "ideas of cleanness, purity and perfection come up repeatedly in writing about Antarctica" and "are very much tied up with sexuality."[58] Another example from around the same time as Cunningham's novel is a short story "Bride of the Antarctic" (1939) by Mordred Weir (pseudonym of Amelia Reynolds Long), published in *Strange Stories*, in which three explorers living in an old hut are haunted by the ghost of a veiled but otherwise naked woman.[59] The spirit is revealed to be the wife of an earlier expedition leader, whom he had included on his otherwise all-male venture, only to eject her naked into the freezing environment when angered by her emotionality. In a variation on the buried alien theme, a frozen corpse is eventually found under the hut. Written by one of very few women publishing in the pulp science fiction and fantasy magazine genre, the story concludes with this narrative of gendered expulsion being turned inside-out when one of the three explorers, who is revealed to be self-same as this earlier leader, goes mad and himself exits the hut to his death.

54. Hains, *Ice and the Inland*, 21–2.

55. For further discussion see Lavery, "Antarctica and Africa," 348.

56. Le Guin, "Sur," 41.

57. Glasberg, *Antarctica as Cultural Critique*, 117. For further discussion of "Sur" in relation to Antarctica and gender, see Glasberg's book as well as Leane, *Antarctica in Fiction*, 99–101.

58. Manhire, *Wide White Page*, 21, 22.

59. Weir, "Bride of the Antarctic."

These narratives revolve around an imperial fantasy of masculine exclusivity; in later texts the intrusion of women is sometimes likened to a literal infection. An early episode in Jack McClenaghan's *The Ice Admiral* (1969) sees a group of expeditioners constructing a camp near the edge of the Ross Ice Shelf. As soon as the first building is up, they jokingly place a redundant "Men Only" sign upon it and wonder in passing whether "we'll ever get dames down here." Later in the novel, a direct link is made between women and infection. When the eponymous admiral, soon to fly to Antarctica, tells a journalist that "the rules at present say no women and that's that," she observes him sneezing and ripostes, "Isn't one of your rules that no person with a cold can go down to the ice until the danger has passed of him giving it to anyone in the germ-free air down there?"[60] The journalist, who herself aspires to go to Antarctica, reflects the admiral's discourse of infection and exclusion back onto him. Same-sex-attracted men are likewise expelled from the continent in both literary and popular narratives from the midcentury period through accidental death, suicide, or murder. This occurs in a coded way in Cunningham's *The Wide White Page* and much more explicitly in Geoffrey Peters's *The Chill of a Corpse* (1968) and Thomas Keneally's *Victim of the Aurora* (1977). It is no coincidence that Antarctic-set texts that are concerned with anxieties around gender and sexuality cluster in the 1960s and 1970s, when national Antarctic programs were well established. For some national programs, the specter of women entering the space of the continent had become more real at this time (women began working on the continent in the 1960s),[61] producing a nostalgia for the seemingly simpler homosocial space of the "Heroic Era."

By this time, heroic ideals were also being challenged by the environmental movement, which, alongside the 1959 signing of the Antarctic Treaty, had begun a slow change from a cultural framing of Antarctica in terms of conquest through bodily endurance and technological prowess to one of vulnerability and environmental protection.[62] However, as the following section examines, discourses of purity, earlier applied to particular kinds of humans, did not disappear but became strongly associated with environmental purity, which in turn has taken on geopolitical dimensions.

Environmental Purity and Geopolitical Exclusion

The late twentieth-century shift toward an environmental framing of Antarctic purity was legally manifested in the 1991 Protocol on Environmental Protection to the Antarctic Treaty, which among other things required the removal of all dogs from the continent, thereby ejecting the last remnants of the Heroic Era of sledge-based exploring. Mixed up in this idea of Antarctica as a place that must be kept environmentally pure is

60. McClenaghan, *Ice Admiral*, 20, 110, 113.
61. Burns, *Just Tell Them I Survived!*, 15–19; Herbert, "Woman's Place."
62. Spiller, *Frontiers for the American Century*.

the idea of the continent as a resource for science,[63] a "natural laboratory" with all the connotations of sterility and cleanliness evoked by that metaphor.

With the growing recognition toward the end of the twentieth century of the Anthropocene and the impact on Antarctica of not only local but also remote human activity, the urgency of keeping the continent pure was heightened. The idea of a warming continent threatens traditional images of Antarctica in myriad ways. The myth of its purity is not only a matter of physical distance and the isolation provided by the "moat" of the Southern Ocean but also a function of the cold. As Manhire writes, ironically ventriloquizing the hero of *The Wide White Page*, "Germs can't live there."[64] Antarctica becomes portrayed as sterile, the world's refrigerator: the source of the "cleanest and most isolated way of having a bad time," one of the "clean ends of the earth," and the "last clean place on earth."[65] In this sense, the defrosting effects of global warming can be figured as a kind of sullying of this cleanliness (to be added to a growing list of other forms of pollution of the Antarctic ice and oceans, such as microplastics). On the one hand, the melting ice threatens to reveal ancient and potentially disturbing secrets—what Robert Macfarlane might term "Anthropocene unburials"[66]—that echo the buried alien tradition of pulp science fiction mentioned earlier. A 2017 online BBC feature article, for example, is headlined, "There Are Diseases Hidden in the Ice, and They Are Waking Up."[67] On the other hand, warming temperatures enable the invasion of the continent by species that usually belong outside its space, entering either on their own or introduced by humans.

This concern about invasive species has in turn produced a heightened vigilance to the potentially contaminating effects of both expeditioners and tourists. In her poetic travelogue *Toward Antarctica*, Elizabeth Bradfield portrays the "Purification Rituals" that are a characteristic component of Antarctic travel: "Before horizon is broken, we set up: housekeeping vacuums borrowed, disinfectant bright green in bins. Guests are called by deck. It takes an afternoon. They hand over anything wind might touch or that might touch what we'll call *earth*. . . . J finds a seed in velcro, plucks it out. Shouts *One saved albatross!*"[68] The figuring of these activities as "rituals" implies a performative ineffectiveness to the attempt to keep Antarctica pure, protected from invasive species and infection, as the number of visitors—at least pre-COVID—has exponentially risen. Yet, as Bradfield notes, it remains important that "IAATO (International Association of Antarctica Tour Operators) regulations require that visitors to

63. van der Watt, "Contemporary Environmental Politics," 589.

64. Manhire, *Wide White Page,* 20.

65. Respectively, Apsley Cherry-Garrard, *Worst Journey*; Beall Cunningham and Peter Matthiessen, both quoted in Manhire, *Wide White Page*, 20–21.

66. Macfarlane, "What Lies Beneath."

67. Fox-Skelly, "There Are Diseases Hidden in Ice."

68. Bradfield, *Toward Antarctica*, 37.

Antarctica clean their gear before setting foot ashore" because "as the climate warms, the concerns warm."[69]

The discourse of preserving Antarctica's wilderness from invasive species has geopolitical dimensions, unfolding in specific ways in relation to the growth of Chinese investment in Antarctica, including Chinese Antarctic tourism. In 2019–20, Chinese tourists accounted for 15 percent of Antarctic visitors—the second largest country of origin after the US[70]—and numbers had increased tenfold over the previous decade. Chinese tourism has been positioned as further evidence that China is making illegitimate claims on Antarctic resources, cementing its goal of becoming a leading power in the Antarctic region.[71] Klaus Dodds and Alan D. Hemmings refer to this kind of scrutiny as "polar Orientalism" in which "anything China, India, South Korea, Russia (and other states which the West might distrust such as Iran and Belarus) do in relation to Antarctica, particularly if it involves mention of the word 'resources,' is cast as intrinsically worrying."[72] Essentialist stereotypes of Chinese tourists as greedy, badly behaved, only interested in mass tourism, and unconcerned for the environment typify this discourse of human invasion in Antarctica.[73] For example, the influx of Chinese tourists in a handful of prearranged landing spots has caused distress internationally around the "'Disneyfication'" of Antarctica.[74]

By the time reports of a new virus in Wuhan Province began appearing in the media in late 2019, anxieties about keeping Antarctica free of outside infection were already amplified by Anthropocenic concerns. The discourse of purity long attached to the continent was readily transferred to the COVID-19 context, producing the kinds of newspaper headlines quoted at the start of this article. Mirroring the jostling for power in the Arctic over recent decades, several media articles position China and Russia as "tak[ing] advantage" of the decreased operational capacity of national Antarctic programs in the West (e.g., Australia, New Zealand, and the United States) during the pandemic by refusing to slow their own programs.[75] China in particular has been called out for ramping up activities such as krill fishing, thereby increasing geopolitical competition for resources and playing into negative Western stereotypes of China.[76] A recent Australian strategy report explicitly states that when dealing with China in Antarctica, Australia must use an "eyes wide open" approach[77]—a familiar trope in relation to China's perceived lack

69. Bradfield, *Toward Antarctica*, 37.

70. International Association of Antarctica Tour Operators, "Visitor Statistics Downloads."

71. Brady, "China's Expanding Interests in Antarctica."

72. Dodds and Hemmings, "Territory in the Wider Geopolitics," 1430.

73. Ooi, "Asian Tourists and Cultural Complexity."

74. Cheung, "Growth of Chinese Tourism," 207.

75. See, e.g., Hoare, "China 'Weaponising' Pandemic."

76. For example, Feiger and Wilson, "Countries Taking Advantage of Antarctica"; Buchanan, "Canberra Shouldn't Use Covid-19."

77. Bergin and Press, "Eyes Wide Open."

of transparency around the coronavirus outbreak. In the same way, experts warn that China and Russia will "expand their Antarctic presence without a watchful eye, especially because most of China's claims lie within Australian Antarctic territory."[78]

In this way, the pandemic has reinvoked Cold War discourses of containment in which border zones between Communist and non-Communist countries are maintained for the purposes of security.[79] The Antarctic Treaty System makes no mention of borders, but, as Nicklin argues, they are implied.[80] Recent media articles position COVID-19 as revealing the dangerous potential for the sponginess of borders. These discourses of infection and containment play out in relation to Antarctica at both an individual level and a global scale.

Conclusion

Perhaps the most striking thing about the arrival of COVID-19 in Antarctica was its anticlimactic nature. After almost a year of regularly printing articles on the continent as the last fortress against the pandemic, the media's response to the Chilean outbreaks was subdued. These infections did not spread elsewhere in the region, and—at least partly because of stringent measures employed by national programs—Antarctica retained its status as (in Mawson's phrase) "the only almost germ-free continent left."[81] Just as women entering the polar workforce did not create total mayhem, COVID-19 entering particular stations has not brought down the continent. Our argument in this article is not that we should always avoid discourses of Antarctic purity; we recognize that it is important to prevent the spread of nonnative organisms and to put strict quarantine systems in place to protect expeditioners from COVID-19. We need to be aware, however, that these discourses can spread in ways that are more damaging than helpful, and more powerful for being subtextual and insidious.

ELIZABETH LEANE is professor of English in the College of Arts, Law, and Education at the University of Tasmania, where she is also associate dean (research performance). She is the author of three monographs, including *South Pole: Nature and Culture* (2016) and *Antarctica in Fiction* (2012), and the coeditor of four collections. Her research focuses on the stories we tell about Antarctica, how they inform our ideas and attitudes toward the continent, and how they can enable new ways of thinking about our relationship to place and environment.

CHARNE LAVERY is a senior lecturer in the Department of English at the University of Pretoria and codirector of the Oceanic Humanities for the Global South project (www.oceanichumanities.com) based at WiSER, University of the Witwatersrand, South Africa. Her monograph *Writing Ocean Worlds: Indian Ocean Fiction in English* appeared in 2021.

78. Feiger and Wilson, "Countries Taking Advantage of Antarctica."

79. Glasberg, "Who Goes There?"

80. Nicklin, "Implied Border Mechanisms of Antarctica."

81. The "almost" is, however, becoming increasingly salient. Following the initial infections at the end of 2020, several more stations experienced outbreaks. At the time this article went to press, nearly one hundred expeditioners at the continent's largest station, McMurdo, had been infected, and inward travel to the continent had been halted. See McClure, "Antarctica's Biggest COVID Outbreak."

MEREDITH NASH is professor and associate dean (diversity, belonging, inclusion, and equity) in the College of Engineering and Computer Science at the Australian National University. She was formerly senior adviser (inclusion, diversity, and equity) at the Australian Antarctic Division and a sociologist at the University of Tasmania. Her research focuses on lived experiences of extreme environments.

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