

Cultures of Climate. On Bodies and Atmospheres in Modern Fiction: An Introduction

Solvejg Nitzke

Technische Universität Dresden, Germany

Solvejg.Nitzke@rub.de

Eva Horn

University of Vienna, Austria

eva.horn@univie.ac.at

DOI: [HTTPS://DOI.ORG/10.37536/ECOZONA.2020.11.1.3639](https://doi.org/10.37536/ECOZONA.2020.11.1.3639)



Global warming epitomizes a paradox in the relationship between humans and climate. While for centuries we have understood climate as one of the most pervasive forces shaping human lives, societies, and cultures, today we have to recognize the immense human influence on climate. Climate is a condition *and* a product of human civilization, responsible for *and* a threat to human existence (Hulme 2017, Horn 2018). Yet, at the very moment when humans assume responsibility for climate change on a planetary level, it seems more difficult than ever to relate cultures to climate. This difficulty is due to a new—and somewhat counter-intuitive—definition of climate which underlies all current forms of climate science. Defining climate as “the average weather” (as established by the World Meteorological Organisation) disconnects it from human bodies, souls, cultures and societies. This “weather-biased understanding of the atmosphere” (Fleming and Jankovic 2) has uncoupled climate from human experience and forms of life, and has thus made it all the more difficult for individuals and societies to relate to climate change.

Yet climate has been omnipresent in the history of human cultures and societies, and is everywhere to be found in the historical forms of their aesthetic, political and scientific representation. This is why we believe it is necessary to look carefully at the long tradition of thinking about climate—a tradition dating back long before the awareness of anthropogenic climate change. Looking at climate and climate change culturally illuminates an understanding of climate as “an intimate ground-level *experience*” (Fleming and Jankovic 4), connecting bodies, places, cultures, and social institutions. It is time to re-address and re-assess the multifold relations of climates, bodies, communities and their environment, as well as of individuals and their ways of living with the weather. “Making sense of climate and its changes,” writes Mike Hulme, “cannot be separated from how weather enwraps itself with landscapes, memory, the body, the imagination and routine practices in particular places. Approaching climate this way demands an explicitly geographical and cultural interrogation of how people live climatically, how they become weathered” (57). Such a cultural approach to climate is necessary, we believe, for understanding climate not just as a natural but also as a *social and cultural fact*. Beyond

the realm of measurable data, averages, and variations of the states of the atmosphere provided by the natural sciences, understanding climate culturally draws on a vast and heterogeneous set of phenomena and discourses: the many different everyday practices, individual accounts, social institutions, objects and architectures, fictions, myths, and stories, perceived atmospheres, visual representations, as well as the theories and narratives on the effects of climate on human bodies, mentalities, and societies. A cultural approach to climate includes heterodox forms of knowledge about climate, such as historically “outdated,” indigenous, tacit, or fictional forms of making sense of *being in climate*. Aesthetic representations or imaginations can convey a view of the air from the “inside,” setting local experiences, perceptions and practices in relation to the knowledge and the news we get about the changing state of the atmosphere. It means focusing on the different spatialities of the climate (the tension between the local and the global, the fixed and the roaming, the stable and the flowing), as well as its different temporalities (cyclical and linear, expectation and event, repetition and singularity). Instead of merely casting climate as an object of science, we need to understand how it resists a distancing and objectifying gaze, its ‘stickiness’, as it were, that always already implies and engulfs the observer (Neimanis and Walker).

Recently, a growing body of research has started to address the need to explore cultural responses to climate change by looking at the imaginaries connected to climate and weather phenomena (Hulme, Jasanoff, Neimanis and Walker, Horn “Air conditioning” and “Global Warming”, Nitzke, Büttner and Theilen, Jasanoff, Milkoreit, Yusoff and Gabrys, Corbin and others). What connects these diverse approaches from the humanities and social sciences is the attention to narratives, metaphors, and images designed to give form to the abstraction that the atmosphere has become in modern science. Climate change may only be one aspect in the array of human-caused changes in the earth system that mark the advent of the Anthropocene. But it is, we contend, particularly suited to the analysis of the complex environmental crisis we are facing from a cultural studies perspective, namely in its historical, aesthetic, ethical and social dimensions. Climate change, as well as climate as such, is neither merely cultural nor merely natural but a contact zone where human and non-human forms of life, natural environments, economies, and technologies are inextricably intertwined.

Reducing climate to *climate change* as a mainly socio-political, scientific and technological problem means to ignore both the rich conceptual history of “climate” and the ways in which individuals and societies perceive and make sense of their weather. This reductionism contributes significantly to the difficulty that contemporary societies have in addressing climate change as a problem of individual and collective concern. Focusing solely on a notion of climate as global averages, and of climate change as a slow, long-term process has obfuscated the ability to perceive and relate to climate as an essential dimension of human existence. In order to truly understand the social, individual and affective dimensions of climate change, we first have to rediscover the cultural meanings of *climate*.

This cultural understanding of climate needs to be grounded, first and foremost, in a detailed account of the ways in which weather and climate were perceived and

understood before, and in the course of, globalization and industrialization. In literary studies, the representation of climate change is currently being analyzed, first and foremost, with regard to contemporary Climate Fiction (Trexler and Johns-Putra, Johns-Putra, Bracke, Goodbody and Johns-Putra), focusing on the individual and social consequences of climate change and the ways these translate into dystopic, elegiac, utopian, satirical and other narrative forms. Some of the articles gathered in this special issue follow this perspective asking if, and how, Climate Fiction and its narrative strategies can help to provide a deeper understanding of climate change and its social and affective consequences. Others take a different perspective: They address the cultural and intellectual functions of climate, aiming to develop an understanding of climate beyond climate change. Clearly, climate is more than climate change and more than the “average weather.” In order to understand the functions of climate more broadly a historical perspective on climate discourse—in terms of environmental, intellectual and literary history—is paramount. However, as Fabien Locher and Jean-Baptiste Fressoz have pointed out, this involves dealing with seemingly outdated epistemic forms and figures of thought. “To understand the environmental reflexivity of eighteenth- and nineteenth-century societies, we need to shake off our innate/acquired, body/environment, living/inert, or nature/society dichotomy-based classifications to think our way into a now defunct epistemological realm known as climate theory where technique, political form, environment, and bodies all overlapped” (581).

In the eighteenth century, most notably in the writings of Montesquieu, Buffon and Herder, the climate was conceived of as a natural factor both influenced by and influencing human cultures (Montesquieu, Buffon, Herder, see Horn “Klimatologie um 1800”). Cultures, in this perspective, were shaped or “bent” by climate—while, in turn, civilizations evolved by transforming the landscapes and climates that were their natural environment. Only with the advent of institutionalized meteorology and climate science in the second half of the nineteenth century was climate abstracted into the average weather, cast as a global system, and measured according to long-term developments (Edwards). Until the end of the Enlightenment, climate knowledge unfolded in a space between geography and anthropology, serving as a universal explanation for human health, national characters, the rise and fall of empires, social institutions, the differences between civilizations or human bodies, economic success, and many other phenomena. As a category of social explanation, climate persisted until the beginning of the twentieth century, when “climatic” explanations of social facts fell under the spell of “climate determinism” (Stehr and Machin). At the same time, climate started to become a merely meteorological category. It was, for the first time, defined as the average of local weather conditions by the Austrian climatologist Julius von Hann: “Unter Klima verstehen wir die Gesamtheit der meteorologischen Erscheinungen, die den mittleren Zustand der Atmosphäre an irgendeiner Stelle der Erdoberfläche kennzeichnen” (1). In her study of the “imperial climatographies” of the Habsburg Empire, Deborah Coen has shown how the understanding of climate as a geographical category shaping landscapes and life-forms was transformed into a standardized set of data by moving from detailed chorographic descriptions of local climes towards measurements that could be scaled up to a national

and eventually planetary scale (Coen “Big is a Thing of the Past” and *Climate in Motion*). Climatology in the modern sense thus shed its geographical, anthropological and cultural dimensions in favor of large-scale statistical analysis. The local and specific knowledge of different climates, as well as the disciplines and genres in which this heterogeneous body of knowledge was documented, yielded to vast sets of data that could then be fed into the models used today by meteorology and climate research (Coen “Imperial Climatographies”, Sörlin). From being a mediation between nature and culture, environments and civilizations, the individual and the collective, the ephemeral weather and the steady ways of life in a given place, from being, in short, an object of the humanities, climate became a set of complex data and models, exclusively the object of the sciences.

Today, this seems no longer tenable. Anthropogenic climate change, as Dipesh Chakrabarty famously wrote, “spells the collapse of the age-old humanist distinction between natural history and human history” (201). The advent of the Anthropocene challenges old dichotomies between the man-made and the natural, the local and the planetary, the short epochs of human history and the deep time of earth history (Horn and Bergthaller). In this context, climate returns to being not only a social and cultural category but also a mediating framework that links the local to the planetary, the short-term acts of human consumption and technology to long-term consequences in the atmosphere and the earth system, and the course of human civilization to that of a nature understood as a unified, self-regulating system. Climate thus needs to be re-thought from the point of view of the humanities, not in opposition but as a necessary complement to science-based climate research. This, however, also means a shift in traditional methods of historical and literary research. In history, it involves not only shifting attention from social history to the natural and material bases of human civilizations, such as the transformation of energy regimes, the emergence of new materials, and the evolution of cultural practices. It also calls for a genealogy of “environmental reflexivity” (Bonneuil and Fressoz, and Locher and Fressoz), a long-standing and rich tradition of attention to the environmental impact of certain human practices. Some of the papers in this issue try to re-think climate and the perception of climate change as a topic which has, time and again, triggered such environmental reflexivity long before man-made climate change was recognized. In literary studies, it means reading literary texts differently. Literature, we believe, is especially apt at revealing the complex entanglement of human civilizations and cultural techniques with changing climates and environments. This requires a reading of historical and contemporary fiction that challenges the traditional hierarchy between the background and the foreground of a given story. In this perspective, what may seem like the mere setting of a novel—a landscape, a way of life, weather conditions, agricultural practices, architecture etc.—now becomes the main focus of analysis (Kneitz, Ghosh). As perceptions of climate evolve from static, local “backgrounds” of human life to dynamic, historical and global concepts, the shifting states of nature and its frailty move to the foreground. Seeing nature, and more specifically climate and weather, as a mere background has long prevented literary research from taking into account the entanglements between culture and climate. Seen as a “pathetic fallacy” (Ruskin, see

Garrard), weather in literature was often dismissed as merely reflecting the turns of the plot or the protagonist's emotions. What is needed today are methods that decipher the presence of climate and weather in texts that seemingly deal with entirely different problems.

Opening the issue is Johannes Ungelenk who considers "Émile Zola's Climate History of the Second Empire." Ungelenk shows how Zola's novel cycle *Les Rougon-Macquart* casts the social and political history of the Second Empire in terms of a warming climate headed for catastrophe. Drawing on Hippolyte Taine's notion of "milieu," the novel frames the climatic difference between the "old" and the "new" Paris as a process of warming. This can be observed and experienced in particular in urban spaces and architectures, such as the famous department store of Octave Mouret. Serving as a metonymy for the whole of Paris, the department store makes apparent the intertwined relationship between different modes of historiography. Ungelenk's reading of Zola shows how a certain type of climate imagination shapes the understanding of political history.

In his article, "Talking about the Weather. Roland Barthes on Climate, Everydayness, the Feeling of Being, and the Poetic," Urs Büttner takes up Roland Barthes' lectures on poeology, *La Préparation du Roman*. While weather and climate had not played a major role in Barthes' earlier theories of literature and popular culture, in his last lecture series climate emerges as a phenomenological concept shaping human experience of place and time. In a careful reading of several texts by Barthes, Büttner deciphers Barthes' thought about the relationship a text establishes between weather, climate and writing self. Despite his earlier disregard of images of nature, in his late work Barthes tries to understand how poetry can capture the singularity of ephemeral weather phenomena against the background of everyday language. Barthes' poetics of weather is also an early document for thinking about climate change in terms of cultural theory. How, Barthes asks, will climate change impact everyday life and change our notion of "everydayness"?

Climate change and its impact on future societies is at the center of Emanuel Herold's paper, "Nichts als Katastrophen? Klimawandel als Herausforderung für die utopische Tradition." Taking the catastrophist rhetoric of current movements such as Fridays for Future or the Extinction Rebellion as his point of departure, Herold asks how utopian scenarios envisioning climate change can offer not only catastrophist, but also positive strategies for living in a profoundly changed world. As a case in point, he reads Kim Stanley Robinson's novel *New York 2140*, retracing the challenges and possibilities that climate change poses to a contemporary metropolis. Through its proleptic temporal structure, the utopian novel can link individual, social and climatic temporalities. Thus the utopian novel presents a versatile resource for contributing to visions of viable human society in the face of climate change, one that counterbalances the predominant catastrophism, which risks leading only to paralysis and cynicism in the face of environmental degradation.

It is exactly this type of cynical and escapist reaction to the climate crisis that forms the topic of Brad Tabas' article, "Hatred of the Earth, Climate Change, and the Dreams of Post-Planetary Culture." Tabas examines the movement of "post-planetarists" as a

particularly lurid, and potentially pathological, reaction to the crisis of the Anthropocene. Instead of working against climate change, post-planetarists dream of taking human civilization to other planets and thus escaping a degraded earth. Tabas argues that one of the key characteristics of post-planetary culture is a feeling of hatred and alienation towards the earth. This hatred feeds on a mix of Science Fiction and futurist thought by scientists and entrepreneurs, and can be analyzed in an early example of environmental dystopia, David Brin's novel *Earth*. Kim Stanley Robinson's *Aurora*, however, can be read as an antidote to this affect, as it is both a critique of post-planetarism and a guide to renewing an affective attachment to the earth.

Time and history are at the center of Michael Boyden's foray into "The Pathogenesis of Modern Climate." The article offers a conceptual history of the word "climate" through the lens of Reinhart Koselleck's theory of historical semantics. It sketches the transformations of the term "climate" from the eighteenth century to the present, highlighting its rise to an ubiquitous explanatory function in a vast array of disciplines throughout the nineteenth century. In the twentieth century, the term returns to a much more specific and narrower meaning within the rising field of climate research. Yet, with the recent emergence of collocations such as "climate crisis," the paradox of climate communication lies in a contradictory attitude towards historical, economic and technological progress. Progress is both cast as the solution to climate change, and framed as its cause. Boyden's suggested solution to this paradox is to pay closer attention to these temporal implications and contradictions underlying climate change communication.

Looking at the narrative pitfalls of climate depiction, Solvejg Nitzke examines the difficulties of "scaling" as an epistemological, narrative and physical technique to approach heights. In "Scaling High Places. Mountaineering Narratives as Climatological Tales," Nitzke compares Christoph Ransmayr's novel, *Der fliegende Berg*, and Thomas Glavinic's *Das größere Wunder* with respect to "scaling," a physical technique that the texts epitomize in the process of acclimatization. In aligning biography with the ascent of the respective peak, the narratives present themselves as mediations between personal and planetary scales. Climate, Nitzke argues, is not only present as an obstacle to overcome, but as a narrative device negotiating increasingly precarious relationships between humans and nature. In comparison with non-fictional mountaineering accounts these narratives resurrect apparently outdated notions of climate as a local and bodily entity.

Thinking through climate, literature can serve as a medium of close observation and attention to its symptoms and effects. The abstraction and imperceptibility of climate in its modern sense can thus be reversed and turned into vivid images, metaphors and stories we can relate to cognitively and affectively. Literary texts can also highlight different emotional attitudes towards a world profoundly changed by environmental degradation. Last but not least, literature can serve as a space of exploration for new forms of awareness and new "arts of living on a damaged planet," as Anna Tsing puts it (Tsing et al.). Rather than offering "better" stories for the current crisis, the variety and diversity of literature can provide an array of possible ways of relating culturally to a changing climate. In the words of Mike Hulme: "There is another story to be told about climate-change, one which starts with the cultural origins of the idea of climate".

Works cited

- Bonneuil, Christophe, and Jean-Baptiste Frescoz. *The Shock of the Anthropocene: The Earth, History and Us*. Verso 2017.
- Bracke, Astrid. *Climate Crisis and the 21st-Century British Novel*. Bloomsbury Academic 2017.
- Büttner, Urs, and Ines Theilen, editors. *Phänomene der Atmosphäre: Ein Kompendium literarischer Meteorologie*. Metzler 2017.
- Buffon, Georges-Louis Leclerc. *Les Époques de la Nature*. 1778. Imprimerie Royale, 1780.
- Chakrabarty, Dipesh. "The Climate of History: Four Theses." *Critical Inquiry*, vol. 35, 2009, pp. 197–222.
- Coen, Deborah R. *Climate in Motion: Science, Empire, and the Problem of Scale*. Chicago UP 2018.
- . "Big is a Thing of the Past: Climate Change and Methodology in the History of Ideas." *Journal of the History of Ideas*, vol. 77, no. 2, 2016, pp. 305–21.
- . "Imperial Climatographies from Tyrol to Turkestan." *Osiris*, vol. 26, no. 1, 2011, pp. 45–65.
- Corbin, Alain. *La pluie, le soleil et le vent. Une histoire de la sensibilité au temps qu'il fait*. Aubier, 2013.
- Edwards, Paul N. *A Vast Machine: Computer Models, Climate Data, and the Politics of Global Warming*. MIT Press, 2010.
- Fleming, Roger and Vladimir Jankovic, editors. *KLIMA*, *Osiris* vol. 26, no.1, 2011.
- Garrard, Greg. *Ecocriticism*. 2nd edition. Routledge 2012.
- Ghosh, Amitav. *The Great Derangement. Climate Change and the Unthinkable*, Chicago UP 2016.
- Goodbody, Axel/Johns-Putra, Adeline. *CliFi. A Companion*. Peter Lang 2018.
- Hann, Julius von. *Handbuch der Klimatologie*. Vol. 1: *Allgemeine Klimalehre*. Engelhorn 1908.
- Herder, Johann Gottfried. *Ideen zu einer Philosophie der Geschichte der Menschheit. Text. Werke Bd. III/1*, edited by Wolfgang Proß, Carl Hanser Verlag 2002.
- Horn, Eva. "Air conditioning. Taming the Climate as a Dream of Civilization." *Climates: Architecture and the Planetary Imaginary*, edited by James Graham, Lars Müller 2016, pp. 233-243.
- . „Klimatologie um 1800. Zur Genealogie des Anthropozäns,“ *Zeitschrift für Kulturwissenschaften*, no. 1, 2016, pp. 87-102.
- . "Global Warming and the Rhetoric of Heat." *REAL* vol. 33, 2017, pp. 65–83.
- . "Air as Medium." *Grey Room*, vol. 73, 2018, pp. 6-25.
- . and Hannes Bergthaller. *The Anthropocene. Key Issues for the Humanities*, Routledge 2019.
- Hulme, Mike, *Weathered. Cultures of Climate*, SAGE 2017.

- Jasanoff, Sheila. "Imagined and Invented Worlds." *Dreamscapes of Modernity: Sociotechnical Imaginaries and the Fabrication of Power*, Chicago UP 2015, pp. 321–342.
- Jasanoff, Sheila. "A new Climate for Society." *Theory, Culture & Society* vol. 27 no. 2–3, 2010, pp. 233–253.
- Johns-Putra, Adeline. *Climate Change and the Contemporary Novel*, Cambridge UP 2019.
- Kneitz, Agnes. "“As If the River Was Not Meat and Drink to You!”: Social Novels as a Means of Framing Nineteenth-Century Environmental Justice." *ISLE: Interdisciplinary Studies in Literature and Environment*, vol. 22, no. 1, 2015, pp. 47–62.
- Locher, Fabien and Jean-Baptiste Fressoz. "Modernity's Frail Climate: A Climate History of Environmental Reflexivity." *Critical Inquiry*, vol. 38, no. 3, 2012, pp. 579–98.
- Milkoreit, Manjana. "Imaginary Politics: Climate Change and Making the Future." *Elementa. Science of the Anthropocene*, vol. 5, no. 62, 2017, pp. 1-18.
- Montesquieu, Charles de. *De l'esprit des lois. Dt.: Vom Geist der Gesetze*, translated by Ernst Forsthoff. 1748. Mohr (Paul Siebeck), 1992.
- Neimanis, Astrida and Rachel Loewen Walker. "Weathering. Climate Change and the 'Thick Time' of Transcorporeality." *Hypatia* vol. 29, no.3, 2014, pp. 558-75.
- Nitzke, Solvejg. "Creating 'Klima' in a Changing World: Weather and Environment in Peter Rosegger's Forest Fictions." *REAL* vol. 33, 2017, pp. 121-140.
- Sörlin, Sverker. "The Anxieties of a Science Diplomat: Field Coproduction of Climate Knowledge and the Rise and Fall of Hans Ahlmann's 'Polar Warming'", *Osiris* vol. 26, no. 1, 2011, pp. 46-88.
- Stehr, Nico and Amanda Machin. *Society and Climate. Transformations and Challenges*. WSPC, 2020.
- Trexler, Adam and Adeline Johns-Putra. "Climate Change in Literature and Literary Criticism." *WIREs Climate Change*, vol. 2, 2011, pp. 185–200.
- Tsing, Anna, Heather Swanson, Elaine Gan and Nils Bubandt, editors. *Arts of Living on a Damaged Planet: Ghosts of the Anthropocene*. University of Minnesota Press, 2017.
- Yusoff, Kathryn and Jennifer Gabrys. "Climate Change and the Imagination," *Wiley Interdisciplinary Reviews: Climate Change*, vol. 2, no. 4, 2011, pp. 516-34.