Revisiting the Concept of the Edited Collection: Bioinformational Philosophy and Postdigital Knowledge Ecologies

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Introduction

The edited collection is a standard publishing vehicle that stands alone among other collections as an academic form of writing that since its beginnings in the nineteenth century has been taken for granted and has remained unchanged in terms of its conventions. The edited collection is a collection of original scholarly chapters written by different authors and arranged or organized by the editors of the collection to reflect different perspectives on a theme, generally chosen by the editors and developed in a ‘call for chapters’ that summarizes the main ideas and indicates the sub-themes. It is different from anthologies which republish important articles, normally chronologically, or the edited book series, both of which are forms of academic publications that involve editing contributions from different authors. Much of the responsibility for the edited collection rests with the editor or editors who craft the volume’s purpose and structure and generally provide an introduction to the major themes of the work and mention each chapter and its contribution to the work as a whole.

Michael Peters and Petar Jandrić have published many edited collections including Education and Technological Unemployment (2019) with Alex Means and
Knowledge Socialism: The Rise of Peer Production: Collegiality, Collaboration, and Collective Intelligence (2020) with Tina Besley and Xudong Zhu. In our latest edited collection, Bioinformational Philosophy and Postdigital Knowledge Ecologies (forthcoming 2022), edited with Sarah Hayes, we have decided to theorize and experiment with this form of scholarly communication in the humanities and social sciences.

Historically, the edited collection has had much value. In order to stretch its limits, we will explore the way in which we might encourage greater reflection on a major form of academic publishing whose form and standard conventions are often taken for granted. In this paper, we provide a brief overview of history, philosophy, and practice of the edited collection. We design a new approach to collaboration in our forthcoming edited collection, Bioinformational Philosophy and Postdigital Knowledge Ecologies (Peters et al. 2021a, b, c), and we invite authors to join us in this exciting journey into the unknown.

The Edited Collection—Openness, Collaboration, Trust

We recently discovered Peter Webster’s (2020a, b) The Edited Collection: Pasts, Present and Futures, focused on church history that at the same time begins the process of rehabilitating the notion of the edited collection as a ‘lesser work’, where he writes:

Edited collections are widely supposed to contain lesser work than scholarly journals; to be incoherent as volumes, no more than the sum of their parts; and to be less visible to potential readers once published. It is also often taken as axiomatic that those who make decisions in relation to hiring, promotion, tenure, and funding do so agree. To publish in or edit an essay collection is thought to risk being penalised for the format before even a word is read. After examining the origins of this critique, this Element explores the modern history of the edited collection and the particular roles it has played. It examines each component part of the critique, showing that they are either largely unfounded or susceptible of solution. It proposes the edited collection as a model of one possible idea of scholarly community: collaboration, trust, and mutual obligation in pursuit of a wider good. (Webster 2020a).

Webster proposes a defence of the format of the edited collection, examining the elements of the critique to show that they are unfounded ‘or (if they are of real substance) that they may be resolved’ (Webster 2020b).

We think that Webster’s defence and proposal that the edited collection is a scholarly model of community based on ‘collaboration, trust, and mutual obligation in pursuit of a wider good’ (Webster 2020a) is a theme and philosophy that reverberates with us. We would argue that there is a need to retheorize the form of the edited collection, as a scholarly format of academic publishing in the age of peer production, where collegiality, collaboration, and collective intelligence take on new value (Peters et al. 2020a, b, c). This enables us to use it
more constructively to explore themes of the collection. We can do this by writing papers that act as a springboard, reference point, and theoretical position, which contributors can use to spur their own thinking either in use, modification or criticism of the ideas proposed. This additional material in this case is generated by the editors (in three separate but related papers) together with this reflection on the publication format of the edited collection. When taken together, these materials may provide additional resources, research directions and perhaps greater research coherence, extending and broadening the concept of the edited collection.

During this global pandemic, the principles of free online scientific articles has been an urgent priority, especially where the speed of exchange, nature and new scientific findings are required in a sense able to compete and overruns the speed of infection and the mutation and development of new strains of Covid-19 (Peters et al. 2020). At the same time, the concept of ‘community’ must be distinguished in terms of scientific and scholarly communities exchanging academic work on the basis of argument and evidence, from media sites and cultures where there is no emphasis on science, evidence, testing and rigorous analysis. Bioinformational and biodigital philosophy has the job not only of observing and analysing the evolving forms of science and knowledge, its production under different modes, its publication forms, but also of understanding and explaining the differences between the social epidemiology and epistemology of conspiracy thinking. This includes differentiating between viral forms of disinformation (infodemics) (Peters et al. 2020b), those forms of public science that are open and available free to all—so-called open science—but also with regard to the mode of open knowledge production and its associated forms of open education.

The value of openness here is part of an emerging economy of knowledge ecologies that has a range of applications in open access, open data, open methodologies, open peer review, and open educational resources. These emergent social forms tend to focus on collaborations and distributed computing and cognition, and both open submissions systems and open public access. This kind of open science knowledge, distributed free by publishers suspending the paywall or publications in open science, advanced the speed and development of the vaccines in the international community, hopefully to save millions of people from dying from Covid-19 globally. The United Nations Web site (2020a) indicates that ‘[t]he UN is calling for authoritative scientific information and research to be made freely available, to accelerate research into an effective vaccine against the Covid-19 virus, help counter misinformation, and “unlock the full potential of science”’. The United Nations news story (2020a) indicates that ‘115,000 publications have released information related to the virus and the pandemic, and more than 80 per cent of them can be viewed, for free, by the general public’.

Another United Nations news story (2020b) records, ‘[t]he heads of three UN agencies joined forces on Tuesday to appeal for a global push towards “open science”, citing the value of cooperation in the response to Covid-19 and the dangers of treating evidence-based knowledge as an exclusive asset, or simple matter of opinion’. The story indicates how ‘UNESCO is taking the lead in building a global consensus on values and principles for Open Science’ and contains reference to the first
draft of the UNESCO (2020) Recommendation on Open Science that declares six aims and objectives including:

1. Universal access to scientific knowledge [as]… an essential prerequisite for human development and progress towards planetary sustainability.
2. …Open Science sets a new paradigm for the scientific enterprise based on transparency, sharing and collaboration…
3. As Open Science turns into a global movement, robust institutional and national Open Science policies and legal frameworks need to be developed by all nations to ensure that scientific knowledge, data and expertise are universally and openly accessible and their benefits universally and equitably shared. (UNESCO 2020)

The first draft is to promote ‘a common understanding of Open Science’, to develop ‘an enabling policy environment’ and encourage investment in Open Science capacity and infrastructures that will ‘transform scientific culture’ and ‘promote international cooperation on Open Science’ (UNESCO 2020).

Michael Peters has examined and advocated the virtues of openness (Peters and Roberts 2011) and tried to develop the philosophy of openness in relation to building knowledge cultures (Peters and Besley 2006) and understanding the concept of open science and open education (Peters 2006; Peters and Britez 2008; Peters et al. 2011, 2012). Peters uses the concept of radical openness as a new logic for public organizations, economy and management and as a means of fostering large group creative collaboration and co-creative labour based on being open, peering, sharing, interdependence and acting globally. He argues that openness should be considered as the basis of the global knowledge commons as an emerging mode of social production for education and science (Peters 2012, 2013b, c, a). In this context, his argument and concept is that ‘co(labor)ation’ refers to the wisdom of the crowd (so-called crowdsourcing), and a systematic mode of collective learning processes that offers the prospect of encouraging ‘creative labour’ (Peters 2013b, c, a).

This same value of openness can be applied to the notion of the edited collection as a basis for promoting coherence or consistency in research focus and aims. It promotes a creative flexibility especially in the area of the postdigital-biodigital convergence (Peters, Jandrić and Hayes 2021c), where past philosophy and digital studies are still scattered in silo-ed disciplines and have been slow to address this new convergence that is determining of the global knowledge ecosystem as a whole.

The Edited Collection in the Age of the Postdigital-Biodigital Convergence

The edited collection, as we have come to know it, has been shaped as something of a standardised production, within our neoliberal political economy. Critiqued from a scientific point of view as a lesser publishing vehicle to a journal article, particularly in research measurement exercises (Webster 2020a, b), the writing of book chapters has almost become something that many of us do (and perhaps actually enjoy)
‘behind closed doors’. Whilst aiming for acceptance in a high impact journal to meet institutional demands, we might simultaneously write a chapter because collaborating on an edited collection involves a creative process, dialogue, topic of interest and being a part of a writing community. Within a neoliberal political economy however, the direct individual ‘impact’ from such communal aspects of the writing and editing process is hard to measure, and so is less valued. Metrics applied to journals mean that a particular place of publication is deemed more important than the actual written content (Jandrić and Hayes 2019: 381). However, ‘measuring research excellence brings a particular concept of research excellence into being’ (Jandrić 2020). It is a concept that sits within, and is dialectically related with the neoliberal process of academic publishing, which ‘is a form of “social production” that takes place across the economy, politics and culture, all of which are in turn accommodating both old and new technology in our postdigital age’ (Jandrić and Hayes 2019: 381).

It is this ‘digitalisation’ in our postdigital age which (whilst it may currently serve neoliberal goals) now offers a fundamental disruption to humanity. This is because ‘biodigital technologies, or the biologization of digital processes, are a reflection of a very different kind of political economy’ to our current one (Peters et al. 2021a). Alongside a technological and biological shift, where ‘biology as digital information, and digital information as biology, are now dialectically interconnected’ (Peters et al. 2020) we can also appreciate a philosophical shift. This is a shift based on environmental self-renewal and synthetic enhancement (Peters et al. 2020a, b) and a philosophy of biodigitalism, as opposed to endless market-led growth within neoliberalism.

This in turn impacts on our understanding of human labour and indeed the academic labour processes relating to the production of an edited collection. If the bioeconomy concerns using for example renewable feedstocks to produce everyday goods and services, this now encompasses a wide range of sectors and activities, such as food, agriculture and forestry. The bioeconomy is a new means of production that will gradually replace fossil-based production and be consistent with the concept of a circular economy (Philp and Winickoff 2018). As such, this combination of digital and biological transformation has significant implications for companies, as it changes the design and handling of production processes and their products. It has significant implications too, for academic labour and publishing processes as these are reimagined in a new philosophy of biodigitalism.

Through ‘exploring a philosophy of biodigitalism, as a new paradigm closely linked to bioinformationalism’ we can therefore appreciate that ‘both involve the mutual interaction and integration of information and biology, which leads into discussion of a biodigital convergence’ (Peters et al. 2021b). Within this unified ecosystem, we now have opportunities to resolve problems that isolated disciplinary capabilities cannot. This has been demonstrated during the Covid-19 crisis, as a new significance of relationships between the biological and the technological has been revealed, along with ‘new knowledge ecologies within a constellation of technoscience’ (Peters et al. 2021b). Thus, against a background of scientific crises and challenges to resolve, we perceive many sites of promise for social change, including new ecologies in publishing.
Through a postdigital-biodigital convergence, we have an opportunity to disrupt the existing set of socially constructed standard conventions that misleads us into thinking that there is only one possible rationality for edited collections. As authors in an edited collection, it is the current norm to be provided with a (usually strict) set of guidelines. Thus, we might play with more ecological and self-renewable models. In this new philosophical configuration, we no longer need to accept that the edited collection is somehow less worthwhile than other publishing formats because we can change this discourse. However, to experiment with the edited collection as a concept, and across a community of writers and editors, will require a certain amount of unlearning for each of us. It will require resistance to the digital obedience we have adopted where Big Tech ‘platform ontologies’ know us better than we know ourselves (Peters 2020). We have become used to strictly following a set of prescribed conventions that lack an ongoing dialogic element and the more open philosophical values of sustainability. It is important then that the few initial new possibilities suggested below are expanded in what we perceive to be an ongoing postdigital-biodigital convergence dialogue, related to the labour and production of edited collections. For this experiment to work, the list below needs to be extended, contended, and further shaped.

We identify some new possibilities for edited collections in general:

1. In the light of the postdigital-biodigital convergence explored in the trilogy of papers we are now seeking to collaboratively establish a research direction and sustainable and creative research practices for the edited collection in the humanities.
2. This means extending the ‘editing’ side of the edited collection through a range of collaboratively developed processes that channel our research and thinking.
3. This means rethinking the ‘collection’ part of the edited collection by recognizing that there are different forms of the genre, including anthologies, encyclopaedias, and others. We might consider how editing could vary with, and across, genres. We might think further about the ideological nature of genres and question whether they normalise certain values in our current political economy, when other understandings and forms of agency might emerge underpinned by a new bioeconomic political economy.
4. This is related also to an ongoing working with, and shaping of, values of ‘radical openness’ (Peters 2014), taking into account how these might be enacted across different regions and cultures. It may involve developing new ‘pledges’ too, like the Open Covid Pledge for Education (Association for Learning Technology 2020), for example.
5. If technological development has taken the lead in scientific inquiry, we might explore the philosophical and social implications of this convergence.
6. A new imaginary could emerge where we may be confident that, if biology can no longer be thought about without technology, then scientific and other disciplinary categories can no longer act as hard borders in edited collections.
7. These ideas could aid our processes of thinking, acting, writing and editing more fluidly and reflexively across existing and new disciplines.
8. As we develop the craft of authoring and collaborating simultaneously, we need creative ways to document the rich interplay that develops, for others to work with.

9. We might give more space to each author’s postdigital positionality (Hayes 2021) as part of the new philosophy of openness outlined above. This may involve a deeper exploration of the fluid identities, spaces and power relations that surround each contributor. Such details emerged freely, for example, when a large collective group of authors responded to a call to provide personal Covid-19 testimonies and workspace images (Jandrić et al. 2020).

10. Exploring new alternatives to our current political economic discourse through a political bioeconomic discourse in our institutions and organisations, businesses and community groups could take the form of live debates (Hayes et al. 2020) that shape edited collections verbally, as well as textually.

11. New diverse collaborators might participate in different ways, or through contributing to establishing different and new genres. The role of genre to assist during the writing process, rather than simply as categorisation, might be explored. Perhaps genres are more fluid in a bioeconomic political economy; therefore, this gives us more scope to negotiate their boundaries ‘in social interaction between writers and readers through texts, shifting to reflect changing social contexts. Through the decision to conform to or subvert genre conventions in their writing, writers contribute to these changing genre boundaries.’ (Grimmer 2017).

12. Where once we might have discussed a ‘literary style’ and forms of ‘literacy’, we may now need to question more deeply what we mean by literary, and literacy, at the intersections where humanities, biology, technology, economy and politics meet.

The above are just a few possibilities raised to provoke discussion, for development and for further elaboration, to break down the ‘established’ conventions for the edited collection that a neoliberal political economy has structured. Inspired by a postdigital-biodigital convergence, we look forward to collectively redefining the edited collection through a new dynamic bioeconomic political economic discourse.

Revisiting the Edited Collection in Bioinformational Philosophy and Postdigital Knowledge Ecologies

In late 2020, we launched the Call for Chapters for our new book Bioinformational Philosophy and Postdigital Knowledge Ecologies (Peters et al. 2022). The title contains something of a platform for reflection on the nature of the form of the edited collection, especially in the area of ‘bioinformational philosophy’, where we want to argue that there are interesting technological convergences among the disciplines that bring to life a new configuration of the postdigital and the biodigital (Peters et al. 2021b). We try to advertise this theme in relation to the concept of ‘knowledge ecologies’ that suggests the disciplinary boundaries are no longer firm or distinct but
rather fluid, converging and driven by new biodigital technologies that can change the structure, substance and research methodologies of the fields in question. This is the Call for Chapters that we sent our potential contributors:

According to Freeman Dyson (2007), ‘the twentieth century was the century of physics and the twenty-first century will be the century of biology’. In our pandemic age, even those who succumbed to the capitalist fallacy of ‘bigger, faster, better’ computers, transportation, and economy, will now agree that twentieth century focus to machinery needs to be succeeded by a focus to better understanding of living systems and their interactions with technology at all scales – from viruses, through human beings, to Earth’s ecosystem.

This change of direction cannot be made by simple relocation of focus and/or funding from one discipline to another. In our age of the Anthropocene, (human and planetary) biology cannot be thought of without technology. Today’s curious bioinformational mix of ‘blurred and messy relationships between physics and biology, old and new media, humanism and posthumanism, knowledge capitalism and bio-informational capitalism’ (Jandrić et al. 2018: 896) defines the postdigital condition and creates new knowledge ecologies.

Postdigital knowledge ecologies are mutually constitutive with bioinformational capitalism. Coming ‘after mercantile, industrial, and knowledge capitalisms’ (Peters 2012: 105), bioinformational capitalism is ‘based on a self-organizing and self-replicating code that harnesses both the results of the information and new biology revolutions and brings them together in a powerful alliance’ (Peters 2012: 105). In the general public, bioinformational capitalism develops new media ecologies burdened by posttruth, fake news, infodemics, etc. In scholarly research, new knowledge ecologies are built upon emerging forms of scientific communication, big data deluge, opacity of algorithmic operations, etc. Many of these developments can be approached using the concept of viral modernity, which ‘applies to viral technologies, codes and ecosystems in information, publishing, education and emerging knowledge (journal) systems’ (Peters et al. 2020a, b, c; Peters and Besley 2020). Based on theories of bioinformationalism (Peters 2012), viral modernity (Peters and Besley 2020), the postdigital condition (Jandrić et al. 2018; Jandrić 2020), and others, this book asks, Which new knowledge ecologies are now emerging; which philosophies and research approaches do they require?

In accordance with this description of themes, we have highlighted the question of philosophy as a social theory of bioinformation, an account of bioinformational science, and in the vein of biopolitics and bioinformational capitalism that involves a philosophy of biodigital becoming and ties in with aspects of social and
environmental epistemology. From the perspective of viral modernity, this asks the role and function of big data/viral data/artificial intelligence as well as the social epidemiology and viral systems of postdigital theory that focuses on the role of posttruth (lies, bullshit, fake news, etc.) and infodemics/conspiracy theories and the educational importance of being able to distinguish between disinformation and knowledge in a way that supports an infrastructure of openness, open knowledge and knowledge socialism.

Peters, Jandrić, and Hayes have published three related papers which set the ground for Bioinformation Philosophy and Postdigital Knowledge Ecologies. The first paper, ‘Biodigital Philosophy, Technological Convergence, and Postdigital Knowledge Ecologies’, explores ‘a philosophy of biodigitalism as a new paradigm closely linked to bioinformationalism’ which involves ‘the mutual interaction and integration of information and biology, which leads us into discussion of biodigital convergence’. This creates new knowledge ecologies and reconfigures theory and practice all the way to the notion of critical reason itself. ‘This heralds a new biopolitics which brings the philosophy of race, class, gender, and intelligence, into a compelling dialog with genomics and information.’ (Peters et al. 2021b)

The second paper, ‘Biodigital Technologies and the Bioeconomy: The Global New Green Deal?’, explores the emergence of bioeconomy including policy documents by various countries and organizations such as OECD. It historicizes biodigital convergence and reminds us that it ‘is not a completely new paradigm; it is merely the latest (and by now the widest) techno-social convergence, based on earlier convergences (such as digital-analog), which are built into its very core’. The paper projects a lot of faith into initiatives such as The Global New Green Deal, yet it warns that ‘in our age of bioinformational capitalism (Peters 2012), all these changes and initiatives will be worthless without a solid material base’ and calls for development of ‘new understandings of bioeconomy fit for our biodigital moment in history’ (Peters et al. 2021c).

The third paper, ‘Postdigital-Biodigital: An Emerging Configuration’, clears up some conceptual mess caused by rapid emergence of concepts such as biodigital philosophy, postdigital knowledge ecologies, bioeconomy, viral modernity, and others. Focusing to an emerging configuration of postdigital-biodigital, it reaches deeply into various postdigital convergencies. ‘The paper also reviews these developments within familiar landscapes of posthumanism and postmodernism, raises the question of political bioeconomy and the role of postdigital education within it.’ This triologue paper, which gives each author a distinct voice, walks its talk by seeking ‘a common ground between its authors’ positions’ while also exposing ‘various cracks and tensions’ (Peters, Jandrić, and Hayes 2021a).

For this edited collection, we are asking the question: which new knowledge ecologies are now emerging; which philosophies and research approaches do they require?
What is Next?

In order to address this question against the background of the call for chapters, we invite each author to:

1. Consider Webster’s (2020a) proposal that the edited collection is a scholarly model of community based on ‘collaboration, trust, and mutual obligation in pursuit of a wider good’.

2. Think about the role of openness, as an essential aspect of an emerging global knowledge commons that fosters open science and open education (Peters 2013b, c, a). Think too about how radical openness and collective learning might encourage creativity and coherence in our edited collection.

3. Read the additional material generated by the editors of this volume. This is the three separate, but related, papers outlined above and this paper on revisiting the edited collection.

4. Use this material to explore the themes of the collection and to provoke your own thinking concerning how you might modify, extend, or critique the ideas proposed.

5. This additional material, together with this reflection on the publication format of the edited collection, are intended to provide additional resources, research directions and hopefully a greater research coherence, that will extend and broaden the concept of this edited collection.

We do hope that prospective authors for Bioinformation Philosophy and Postdigital Knowledge Ecologies (Peters et al. 2022) will share our belief in the value of this experiment. The edited collection is a collective enterprise, and this experiment is fully in the hands of its contributors. We look forward to reading and editing your contributions!

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