Issue Title: Decolonizing Open Access in Development Research

Introduction: The Politics of Open Access - Decolonizing Research or Corporate Capture?

Kate Meagher, November 2020

Introduction

Debates about scholarly Open Access (OA) are reaching fever pitch in the context of digitization, the COVID-19 pandemic, and the imminent deadline of Europe's Open Access initiative known as Plan S. Active discussions have been ongoing for a few years in a range of OA blog sites, such as the Scholarly Kitchen, SciDev Net, Sustaining the Knowledge Commons, the London School of Economics Blog, among others. Layered on top of these have been a growing number of articles and special issues in academic journals. Most recently, *Geoforum* (2020) has taken a hard look at how Open Access is shaped by capitalist power relations in the scholarly publishing industry, while *Nature* (Calloway 2020, van Nooden 2020b) has published a series of articles on how the COVID pandemic has advanced the aims of Open Access in scholarly journals.

Yet, the richness of the discussion has often been fractured by disconnections between Open Access fora and scholarly journals. This has aggravated the fragmentation and polarization of debates about the merits and best methods of OA in contemporary academia, often generating more heat than openness. The variety of recent OA initiatives have also tended to exacerbate disputes about the best way forward. In the process, synergies as well as tensions have emerged that reveal a more equivocal relationship between forms of OA and the global public good. On the one hand, public interest concerns have led dozens of journals and academic publishers to make coronavirus research free to read, including Cambridge University Press, Oxford University Press, the British Medical Journal, as well as the big 5 academic publishers, Elsevier, Sage, Springer Nature, Taylor and Frances, and Wiley (Calloway 2020). On the other hand, in July 2020, public interest goals led the European Research Council (ERC) to withdraw from Plan S owing to its lack of attention to equity concerns among less advantaged scholars and research communities (ERC 2020).

This special issue on Open Access and development research will look beyond the power plays and ideological red herrings to consider the deeper historical processes and equity concerns underlying OA debates in Development research. Using a Development lens, this series of articles and opinion pieces brings together a wider range of scholarly interests and reflections on models of OA emanating from the Global South as well as the Global North. Collectively, they illuminate the different needs and perspectives of scholars in different parts of the world, shaped by disciplinary and regulatory as well as regional concerns. In place of moral imperatives and 'yes' or 'no' options, more penetrating questions are raised about OA: open for whom and by whom? Access to what and through what systems? In the process, these scholarly pieces seek to uncover the ways in which the framing of OA debates have concealed alternatives, as well as creating false friends and separating natural allies. By challenging prevailing models and reflecting on how access can be made more open in low resource environments, this special issue directs attention to more equitable forms of Openness and more democratic forms of access in Development research ecosystems. This introduction will provide a background to contemporary OA debates by examining key historical, institutional, infrastructural, and policy issues that have informed the trajectory of Open Access in scholarly publishing and Development research.

History Matters: Digital Publishing, Big Deals and Historical Legacies

Understanding the history of the Open Access debate in scholarly publishing is key to deciphering the forces driving various aspects of the debate and shaping particular Open Access models. Awareness of the key historical moments underpinning the rise of OA helps to cut through legitimating narratives that obscure the strengths and weaknesses of various models of OA. As the eminent Open Science advocate, Leslie Chan (2019), points out, 'Openness, when decontextualized from its historical and political roots, could become as exploitative and oppressive as the legacy system it seeks to displace.' Two historical issues have been central to framing the OA debate: the digitization of scholarly publishing, and the journal pricing crisis, occluding in the process the history of scholarly journals themselves.

The institutional legacies that shape scholarly publishing are an important but poorly integrated part of the OA debates, despite the fact that journals date from long before their association with corporate publishers. As highlighted by Kamerlin et al. (this issue), academic journals date back over 300 years, and evolved to structure knowledge sharing within non-profit, disciplinary frameworks of scholarly societies and academic bodies (Lariviere et al. 2015). Their engagement with corporate publishers only emerged in the late 20th century, amid academic funding cuts and corporate takeovers of smaller publishers, particularly affecting the social sciences. Scholarly ecosystems still persist in comparatively low subscription prices for independent society journals geared to actual running costs and scholarly activities, and internal norms of free contribution of content, and free academic labour. These scholarly ecosystems are also associated with knowledge hierarchies, which some see as a framework for expertise and quality assurance, while others associate them with exclusion and the colonization of knowledge production (see Kamerlin et al., Faciolince and Green, and Moore, this issue).

Pressures for OA are associated with the digitization of publishing in the 1990s, which created the possibility of a 'global knowledge commons' for the more open and equitable dissemination of scholarly research (Morrison and Rahman 2020; Poynder 2019; Gray 2006). For cyber-optimists, digital technologies offer collaborative, non-market approaches to scholarly publishing, releasing it from the grip of corporate publishers and breaking down the knowledge hierarchies and high paywalls that lock resource-poor scholars out of subscription journals (Poynder 2019; see Faciolince and Green, Moore, this issue). Yet the ideal of a digital knowledge commons has been confronted by the reality of corporate power. Academic publishing not just a scholarly pursuit; it is a \$25 billion a year industry, dominated by 5 major corporate publishers: Elsevier, Sage, Springer, Taylor and Francis, and Wiley, who collectively account for over half of the titles indexed in Clarivate Analytics (previously known as Web of Science), and are intent on shaping OA publishing according to their own interests (Bosch et al. 2019; Posada and Chen 2018; Morrison and Ahmed 2020:5; Shorish and Chan 2019; Mirowski 2018; Lariviere et al. 2015).

Despite the declining costs of knowledge production, research institutions have been thrown into crisis by declining library budgets and the predatory and non-transparent pricing of corporate journal subscriptions. Corporate subscriptions involve the bundling of journals into assortments known as 'Big Deals', which include annual price increases hardwired into multi-year contracts (Bosch et al. 2019; Bergstrom 2014; MacLeavy et al. 2020). Cambridge mathematician Timothy Gowers (2014) observed that between 2001 and 2009, as production costs declined, the mean expenditure on journals in university libraries in the United States rose by 82% while expenditure on

books stagnated (see also Shu et al. 2018:9)¹. Boycotts and cancellations of Big Deals began to gather pace after the launch in 2012 of the 'Cost of Knowledge' campaign against Elsevier, witnessing the withdrawal from Big Deals by research consortia in Hungary and Finland, as well as Max Planck in Germany, Lund University in Sweden and a number of major US universities, culminating in the dramatic termination of the Big Deal between Elsevier and the University of California in February 2019 (Lariviere et al. 2015:13; Bergstrom 2014; Gowers 2014; Lund University 2018; Hiltzik 2019).

Yet, the apparent threat of OA and Big Deal boycotts has done little to harm the profits of the major academic publishers. Profit margins of the top corporate publishers have continued to rise even after the shift to OA, reaching between 20% and over 30% per year among some of the top publishers which makes them comparable to Walmart and Amazon (Lariviere et al. 2015; Hiltzik 2019; Posada and Chen 2018; Shu et al. 2018). Far from being reined in by OA, corporate publishers have become key players in shaping the OA agenda. This corporate coup has been accomplished by appearing to make common cause with OA activists, research librarians, practitioners and researchers in NGOs, independent consultants, and scholars from low-resource environments, but more questions need to be raised about whether they share the same interests.

Open Access Journals: Green, Gold, Diamond and Black

The parameters of OA debates have been further muddled by a profusion of OA journal options involving differing access, financing and licencing arrangements. These are framed as a colour-coded selection of OA models which often conceal more than they reveal (Taubert et al. 2019; Barnes 2018; Schmitz 2019). Key options include Green, Gold, Diamond/Platinum and Black OA. Policy endorsements and definitional sleight of hand have promoted Gold OA over other models, without much clarity about the wider implications of these models and whose interests are served.

For the past few years, debate has been focused around Green vs Gold OA. Green OA is presented as the transitional poor cousin to Gold, with little attention to the fact that Green OA relies on a predominantly public infrastructure of university and public research repositories. As a number of our contributions explain, Green OA is the favoured model of a range of publicly funded OA systems, such as Latin America's Amelica, or the Confederation of Open Access Repositories (COAR) (see Shearer and Becerril García, Irawan et al., Berger, this issue). By contrast, Gold OA is widely promoted as the gold standard of OA publishing, owing to its immediate openness and removal of copyright barriers to sharing or reuse.

More recently, discussion has shifted to a sharper focus on the costs of the Gold model of radical openness. The introduction of article processing charge (APC) to finance Gold OA effectively shifts journals from a pay-to-read to a pay-to-publish model, posing serious problems for authors in less well-funded disciplines or countries. While staunch OA activists have joined with the corporate publishing lobby in support of Gold OA, serious concerns have been raised about the implications for scholars in the Global South, and researchers in the Social Sciences and Humanities. As then Vice President of the American Council of Learned Societies, Steven Wheatley (2015) put it, less well-funded researchers simply don't have enough gold to comply with Gold OA (Fuchs et al. 2013; Harrington 2019; International African Institute 2019). In the field of Development in particular, the potential for Gold OA to bake in new inequalities that disadvantage both Development research in

¹ To add insult to injury, the price of Big Deals varies widely among institutions, protected in some cases by mandatory confidentiality clauses (Bergstrom 2014).

general and scholars from the Global South in particular, is seriously problematic. While fee waivers have been created for developing country researchers, these have been described by one critic as 'academic charity', and even Elsevier has admitted that the waivers are poorly coordinated and difficult to access (Pooley 2020; Powell et al. 2020:3). A number of contributions in this issue examine the potential and limitations of Gold OA for researchers in the Global South.

Less prominent are debates about the use of ambiguous definitions of Gold OA in ways that suppress awareness of a no-pay model of full OA, known as Diamond or Platinum OA² (Fuchs et al. 2013; Suber 2012:138; Hall 2012). Diamond (or Platinum) OA refers to journals with immediate online access to the published version, where a journal's costs are covered directly by some combination of institutional grants, scholarly society subventions or voluntary academic labour, with no charge to authors or readers (Fuchs et al. 2013). Tom Wilson (2007), Information Science scholar and publisher of the pioneering electronic journal *Information Research*, highlighted the:

danger of perpetuating the myth that the only form of open access publishing is that made available through the commercial publishers, by author charging. This is why I distinguish between open access through author charging, which is what the Gold Route is usually promoted as being (and which all official bodies from the NIH to the UK research councils assume as 'open'), and the Platinum Route of open access publishing which is free, open access to the publications and no author charges. In other words the Platinum Route is open at both ends of the process: submission and access, where as the Gold Route is seen as open only at the access end (See also Wilson 2010; Tottossy and Antonielli 2012).

Major policy pronouncements such as the Open Access decision of Germany's Bundesrat in 2007, UK's 2012 Finch Report on Open Access, and Europe's Plan S initiative all use a broad definition of Gold OA -- publication costs 'paid upfront' rather than through subscriptions. This effectively disguises the difference between Gold and Diamond OA. The elimination of Diamond OA from the major policy debates has been so effective that recent publications on the subject frequently refer to Diamond OA as a new model (Raju 2017; Normand 2018). Yet, Diamond OA existed long before Gold OA, and remains the model used by the majority of OA journals (Morrison and Ahmed 2020:10). In 2013, only 32% of Open Access journals listed in the Directory of Open Access Journals (DOAJ) charged APCs (Fuchs et al. 2013). As a number of our contributions show, to date over two-thirds of OA journals listed in DOAJ still do not charge APCs (Morrison 2018).

At the opposite end of the spectrum is a less savoury model known as Black OA (Taubert et al. 2019; Barnes 2018). Black OA refers to the OA underworld of predatory journals and pirate OA platforms like Sci Hub. Viewed by some as the liberating work of 'disruptors', others argue that Black OA exploits the epistemic exclusion of Southern scholars. Inequities in reading as well as publishing access, and in scholarly and editorial infrastructure, drive developing country scholars disproportionately into the arms of Black OA, as indicated in the contributions by Sagemuller and by Berger in this issue.

Colour-coded OA models tend to obscure a further issue in need of more open debate: copyright licences. OA activists and major OA initiatives like Plan S favour the most liberal copyright licence, such as a Creative Commons Attribution license (CC-BY). CC-BY licences allow the author to retain copyright, preventing publishers from acquiring exclusive rights to publicly funded research which they sell back to the scholarly community – effectively privatizing publicly funded research. As

² I will use the term Diamond OA henceforward, but other commentators and contributors sometimes use the term Platinum OA, which seems to have been the original term, but is less frequently used in contemporary literature on OA models.

Poynder (2019:69) points out, however, CC-BY licences 'allow anyone' to reuse, redistribute or adapt the content for academic or commercial purposes. This allows 'better resourced researchers in the [Global] North who have superior computing facilities to mine and analyse data' of Southern scholars, and to publish the results themselves, as well as to translate or republish for sale without the author's permission or oversight. It also allows commercial firms to capture and monetize research from across the world without any constraints -- in effect, allowing a much wider spectrum of commercial actors to privatize publicly funded research (Poynder 2019:10). Mirowski (2018:178) highlights the propensity of liberal OA advocates to insist that scholarly research funded by public grants should be publicly available to all, while public grants to private corporations are not accompanied by similar public access requirements.

Open Access Infrastructures: For Profit, Non-Profit and Unable-to-Profit

A growing number of scholars from the Open Science movement have expressed frustration regarding the fixation of OA debates with journals (Chan 2019; Okune et al. 2018; Gray 2006). In terms of the colour-coded OA classification, journals are seen as something of a 'red herring'. Critical Open Science scholars, such as Leslie Chan, Angela Okune and others, argue that focusing on types of OA journals obscures the underlying governance infrastructures in which these journals are embedded, and the role of power in shaping them. They shift attention from increasingly sterile debates about acceptable forms of 'openness' and 'access', to more evidentiary debates about how particular forms of openness are created and regulated, and the power relations that determine what is and is not being accessed (Chen 2019; Shorish and Chan 2019; Okune et al. 2018).

While some OA scholars adhere to a utopian faith in the internet as a global knowledge commons, Chan (2014) and others scrutinize the 'new organizational forms' enabled by digital technologies – the specific digital systems, platforms, standards and connections that regulate resource and knowledge flows within OA publishing. Moral injunctions about openness are replaced by analyses of whether particular forms of OA address or reproduce inequities in knowledge production (Morrison and Ahmed 2020; Shorish and Chan 2019). As Angela Okune and co-authors (2018:6) explain, attention is directed to 'how knowledge infrastructures (many of which are assumed to be neutral or apolitical) may in fact replicate and reinforce the gendered, raced and other socio-political imbalances that exist within existing systems of knowledge production'. In place of arguments about the importance of 'openness', debates focus on the technical arrangements that surround the delivery of particular OA ecosystems, the regulatory standards embedded in them, and the political, economic and scholarly interests that drive and benefit from them.

A number of the papers presented in this special issue look beyond discussions of Green vs Gold to reflect on different types of OA infrastructures. Two broad types of OA infrastructures can be distinguished: For-profit and Non-profit, while a third category reflects on experiences of openness in scholarly contexts in which digitization is still patchy, research funding is limited, and access to digital ecosystems is as problematic as access to journals.

Debates about For-profit OA infrastructures centre on their role in capturing rather than liberating scholarly publishing, and their role in exacerbating rather than reducing epistemic inequality between North and South. From a Development perspective, critical commentators raise concerns about the role of For-profit OA in the neo-liberal transformation of scholarly publishing through the development of proprietary end-to-end digital platforms owned by or affiliated with large corporate publishers (Shorish and Chan 2019:2; Chan 2014; MacLeary et al. 2020; Büscher 2020; Mirowski

2018). Terms such as 'scholarly enclosures', 'surveillance capitalism', and 'the platformization of scholarly infrastructure' are used to describe the use of For-profit OA in shifting control of knowledge production from academic to market imperatives (MacLeary et al. 2020; Mirowski 2018:172, 188; Chan 2019; Posada and Chen 2018).

Attention is also drawn to the Eurocentric standardizing and universalizing of knowledge production in For-profit OA initiatives through citation metrics, language requirements and Best Practice guidelines in ways that risk turning the global knowledge commons into a global knowledge divide (Shorish and Chan 2019:3; Morrison and Rahman 2020:24; Sengupta 2020). Digital ecosystems for managing OA publishing tend to restrict participation to those who can meet stringent conditions that ignore local constraints with regard to resources, capacity, infrastructure, or familiarity with technical requirements. Fatima Arkin (2018) shows that even the iconic OA platform, the DOAJ, screens out large numbers of Southern OA journals and contributions based on technical and copyright requirements which do not necessarily reflect academic quality. The Research 4 Life coalition, formed to promote scholarly OA in the Global South, only indexes journals that meet DOAJ criteria. In addition to the financial barriers imposed by the author-pay requirements of Gold OA, the proliferation of specific technical, software and copyright standards in OA platforms threatens to silence alternative views from the Global South. In the process, 'openness' could be turned into a one-way flow of knowledge and rules from North to South, embedding neo-colonialism at heart of OA by denying Southern participants a voice in shaping knowledge production (Sengupta 2020; Morrison and Rahman 2020).

The Eurocentric monocropping tendencies of For-profit OA infrastructures tend to eclipse alternative OA systems better adapted to the specific needs of less advantaged regions, such as Amelica, African Journals Online, or Bioline International (Arkin 2018; Shorish and Chan 2019; Morrison and Rahman 2020: 20). This special issue draws attention to the existence of these alternative scholarly OA infrastructures, often emanating from the Global South, and geared to meet the varied needs and interests of scholars in diverse and often low-resource environments. Contribution by Shearer and Becerril García, and by Berger, reflect on the best known example, Latin America's Amelica, which relies on non-commercial OA ecosystems involving digital repositories, Green or Diamond OA journals, and open-source or locally available software (Arkin 2018; Morrison and Rahman 2020:5; Aguado López and Becerril García 2020). In a recent blog, Aguado López and Becerril García (2020) argue that 'Investing directly in non-profit open infrastructure including journals, platforms, directories, services, tools and ultimately academic communities, is the best way to keep these resources focused on the needs of researchers.' As noted by a number of commentators and contributors, the diversion of funding within developing regions to finance author-pay systems of Gold OA risk undermining decades-old non-profit forms of OA publishing in Latin America and in other nascent Non-profit OA ecosystems better suited to the needs of the Global South (Aguado López and Becerril García 2020; Morrison and Rahman 2020:27).

Across much of Africa, OA debates are less about specific type of OA infrastructure than about the terms of access to any digital scholarly infrastructure, as discussed in the pieces by Okune et al., by Asare et al., and Faciolince and Green (this issue). As of 2011, African scholars only produced 1.1% of articles in the Web of Science data base, compared to 66.4% produced by scholars from North America and Europe (Ojanpera et al. 2017:40). Widespread lack of research funding, information and effective internet access continue to close off access despite the expansion of OA publishing. Some argue that the solution lies in more openness, more information, and more supportive initiatives such as workshops, copyright awareness and fee waivers (Nobes and Harris 2019; Powell et al. 2020). Others have pointed out that the severe marginalization of African scholars within the

global knowledge economy and publishing ecosystems cannot be resolved by doubling down on digital openness (Gray 2006:3; Bezuidenhout 2017). As Bezuidenhout (2017:45) explains, discussions about OA and Open Science often 'push towards more data accumulation, more openness and more internationalization, without however considering the local conditions under which such openness can help researchers.' The detachment of OA initiatives such as Plan S from African research realities is reflected in the willingness of research funders to finance APCs for African researchers, but not the computer hardware of cyber-connections that would allow them to access the digital research arenas to which they to contribute (Bezuidenhout 2017:45).

Policy Process and Policy Paradoxes

In addition to directing attention to infrastructures, constructive engagement in OA debates calls for more direct attention to the policy process behind the emergence of OA arrangements. OA infrastructures are shaped by a range of policy initiatives and powerful actors, often concealing diverse objectives behind the quest for 'openness' (Morrison and Rahman 2020:6). Plan S is a prime example. As of April 2020, it is supported by 17 national funders, two EU bodies, and five charitable and international funders, including the Bill and Melinda Gates Foundation and the WHO. In addition to the front-line players, a number of commentators have highlighted the 'outsized influence' of corporate publishers and corporate philanthropists in policy decision about OA arrangements in the Global North, including Plan S and the Finch Report on Open Access (Harrington 2019; Okune et al. 2018:5; Posada and Chen 2018). The result has been a policy paradox in which efforts to liberate scholarly publishing from the grip of corporate publishers has put corporate publishers at the centre of policy decisions about the design of OA. More systematic attention to the policy process surrounding decisions about OA raises new questions about whether existing policy coalitions involve alignment of interests, or false friendships and divide-and-rule strategies.

The OA advocate, Tom Wilson (18 Nov 2007), was one of the first to call out the influential role of commercial publishers in shaping OA policy: 'It is, of course, in the publishers' interest to encourage the assumption that 'gold' involve[e]s user charging.... So perhaps the EU would benefit by having less close ties to the industry and exercising a little more imagination about the options.' While some point to genuine need to consider the actual costs of publication (see Okune et al. this issue), the inclusion of legacy publishers in high-level OA working groups and coalitions has led research councils and funders to prioritize corporate profits over much lower costs of small academic publishers and society journals (Fuchs et al. 2013:433-4; Harrington 2019). It is not clear that providing public block grants to universities and promoting 'transformative agreements' with corporate publishers facilitate OA arrangements that conserve public funds or prioritize the needs of universities, small publishers and researchers with limited access to funding.

Indeed, the continued high profits of large corporate publishers, and the eye-watering cost of APCs in major journals suggest otherwise. Plan S and the UK Finch Report contend that more transparent OA pricing arrangements will drive down the cost of APCs and reduce the drain on public funds (Gowers 2014; Wheatley 2015; Hall 2012). However, the evidence seems to point in the opposite direction. Research by the Universities UK Open Access Coordination Group (OACG) found that average APCs increased by 16 percent between 2013 and 2016, with impact factors serving to drive APCs up rather than down (Kenneally 2020; Fuchs et al. 2013; Bosch et al. 2019). Similarly, 'transformative' agreements between universities and corporate publishers seem to be continuing in the tradition of non-transparent predatory pricing of the hated 'Big Deals', making these new 'Read and Publish' deals anything but transformative (Poynder 2019; Pooley 2020). Pooley points out that

signatories to Springer's transformative deals come from countries with an average GDP per capita of is \$ 47,000 per annum – roughly four times the global mean – indicating little difference from those able to afford journal subscription deals. Moreover, the pricing details of these deals are not made public, undermining the transparency that was supposed to drive down APCs.

There are indications of growing concerns about the economic sustainability of Gold OA, and about its potential to liberate public resources and serve the public good (Kenneally 2020; Fuchs et al 2013; Gowers 2014; Poynder 2019). One could argue that APCs are just a different way of 'paying twice' for publicly funded research. Concerns are also being raised about whether the policy process driving Gold OA is becoming increasingly coercive (van Noorden 2020b; Poynder 2015). On the one hand, momentum for Gold OA is driven less by public debate than by arm-twisting initiatives such as Plan S. On the other, academic promotion and university ranking policies in the Global South have created further incentives to drive developing country researchers into OA systems from which they derive little benefit (Gray 2006:16; Chan 2019). As observed by Irawan et al., Berger and others (this issue), instead of using OA to support development priorities and scholarly research needs in the Global South, major OA initiatives such as Plan S tend to offer 'a leg up to legacy publishers', while introducing new distortions in local publishing ecosystems (Pooley 2020).

These paradoxical policy dynamics raise questions about the nature of coalitions behind OA. Many hardline OA activists have put their shoulder behind the Gold OA initiatives driven by liberalizing governments, research institutes and corporate publishers. This special issues examines whether such alliances represent strategic moves on the way to full openness, or corporate capture of the OA agenda. OA activists also tend to lump subscription journals together with profiteering corporate publishers, which are collectively regarded as enemies of OA. Yet the history, ethos and internal operations of most academic journals, particularly in the social sciences, are quite distinct from the practices of corporate publishers. Most scholarly journals remain mission driven, still run on the voluntary labour of academics, and share a strong commitment to the scholarly commons that lies at the heart of the OA agenda (Wheatley 2015; Harrington 2017, MacLeavy 2020; Fuchs et al. 2013; see Okune et al., and Kamerlin et al., this issue).

Realizing the vision of equitable scholarly openness may require OA advocates to look beyond a fixation with paywalls and copyrights to examine the underlying ethos of their allies. We need to ask more questions about the forms of OA that nurture academic freedom and independent scholarship, rather than coercion and private profit (Kamerlin et I., Anderson and Moore, this issue). While many society and university-run journals are resistant to Gold OA and Plan S, they are largely supportive of non-profit scholarly communication. Indeed, strong scholarly societies have been key to keeping journals out of the hands of corporate publishers, while Plan S threatens to push them into corporate hands (Harrington 2019; Lariviere et al. 2015:10). Far from colluding with corporate interests, many society journals are experimenting with non-commercial OA options such as Green or Diamond OA (MacLeavy 2020, Harrington 2019; Bosch et al. 2019). According to Harrington (2017) 'Diamond OA may represent a way for societies to mark out a unique path to success in a way that a commercial enterprise that needs to satisfy shareholder value would be unable to match. Perhaps this is part of the future for society publishers.' Greater attention to the ecosystems of scholarly associations and society journals, with their non-profit, cooperative commitment to the service of the scholarly community may reveal natural allies for the OA movement within the ranks of subscription journals.

Summary of Articles:

The articles and thought pieces presented here fall into three categories: reflections on the distinctive needs and visions of Open Access by scholars from various regions of the Global South, including Latin America, Asia and Africa; reflections by Northern Scholars on the implications of Open Access and Plan S for the Global South more broadly, and reflections by Northern scholars on the costs and benefits of OA and Plan S within their scholarly and disciplinary ecosystems.

Contributions by Shearer and Becerril García, larwan et al., Asare et al. and Okune et al. reflect on OA ecosystems and aspirations within their own regions of the Global South, and consider the implications of Plan S and wider For-profit OA systems. Shearer and Becerril García draw attention to the strengths of the Non-profit OA infrastructures in Latin America, as well as their commitment to 'bibliodiversity' in place of the centralizing tendencies of For-profit infrastructures. Irawan et al. highlight the extensive development of a free-to-read, free-to-publish OA culture in Indonesia, and trace the ways in which new academic promotion policies and pressures from For-profit initiatives threaten to erode Indonesia's dynamic OA environment.

Conversely, contributions by Asare et al., and Okune et al. reflect on the barriers to OA faced by African researchers. Asare et al. undertake a quantitative analysis to show how resource constraints push African researchers in the field of education into low quality OA journals or high quality subscription journals. Limited digital infrastructure and poor access to APC fee waivers severely constrain the ability of African researchers to read or publish in prevailing For-profit OA systems. Using novel Open Science techniques, Okune et al. curate a discussion with African publishers and Open Science activists to explore the politics of Open Access on the continent. Austerity-ravaged publishing ecosystems, combine with a lack of funding and digital infrastructure to push African OA advocates toward arduous and dependent engagement with European and North American Forprofit systems. Okune et al. advocate a reimagining OA infrastructures that prioritize the decolonization of knowledge production and are better adapted to infrastructurally-challenged, low-resource environments.

Faciolince and Green, Berger, and Sagemuller offer a more overarching view of OA in the Global South. All three papers reflect on the capacity of OA initiatives to contribute to epistemic equity in global knowledge production. Faciolince and Green present a web-based discussion with scholars from across the Global South to explore the limits of Gold OA. They argue that Gold OA is step on the way to realizing a fully open knowledge commons, and call for a deeper decolonization of knowledge through the incorporation of non-profit alongside For-profit approaches to OA, and a dismantling of wider knowledge hierarchies. Berger voices similar equity concerns about Gold OA and for-profit infrastructures, but contrasts for-profit OA platforms with non-profit OA infrastructures in Latin America, Asia and Africa, and with shadowy phenomenon of 'predatory publishing' which uses APCs in the service of scholarly fraud. These are viewed as competing systems of OA rather than as parts of an overarching OA infrastructure. Berger calls for the decolonization of OA itself, though enhanced funding and support for non-profit OA systems emerging from the Global South.

Sagemuller delves deeper into the shadow world of Black OA through an examination of the role of the pirate site, SciHub, dubbed the 'Robin Hood of Science'. He reflects on the ethics of journal piracy, viewed by some as a disruptor of unjust knowledge hierarchies, and by others as reinforcing the Northern-dominated publishing ecosystem of clicks and Impact Factors by illicitly widening its market. A quantitative analysis of SciHub downloads from Development journals confirms that the removal of paywalls through SciHub fosters a flow of Development knowledge from Northern authors to Southern readers. Even in the paywall-free world of Black OA, the promise of epistemic justice seems a long way away.

Contributions by Kamerlin et al., Anderson and Moore examine the controversy triggered by OA initiatives such as Plan S among scholars from the Global North. The three articles centre on tensions among OA, 'academic freedom', and policy coercion. Kamerlin et al. reflect on the role of scholarly societies in ecosystems of academic quality and collaboration. They argue that efforts by Plan S to disrupt scholarly ecosystems risk undermining academic freedom and communities of disciplinary expertise, arousing deep concerns among scholars across global regions, across disciplines, and across academic statuses. Anderson takes a systematic look at controversies around the implications of OA for academic freedom. He highlights disputes about copyright licences, the effect of APCs on academic content as well as journal choice, and the role of coercion in the development of OA. By contrast, Moore challenges debates about OA and academic freedom as an attempt by Northern academic elites to protect inequitable knowledge hierarchies. The undesirable elements of Plan S are viewed as imperfect steps on the road to a more radically inclusive global knowledge commons. We are left to reflect on whether epistemic equality is best served by efforts to disrupt and deregulate scholarly ecosystems, or by efforts to strengthen collaborative public ecosystems among scholars, North and South.

Rethinking Open Access

The contributions in this special issue interrogate what a genuinely transformative approach to OA for Development researchers in the Global North and South should look like. While some subscribe to Gold OA as a path to greater openness and epistemic equality, others question the transformative capacities of a model so heavily influenced by the corporate interests OA sought to circumvent. Indeed, the viability of Gold OA models is increasingly being called into question. Plan S has pushed full compliance to OA to 2024, and has further softened compliance models by eliminating the timetable of OA compliance for key hybrid journals, such as *Nature* (van Noorden 2020b). While Robert-Jan Smits, one of the architects of Plan S, regards the COVID-19 crisis as a catalyst for Gold OA, others worry that the ensuing economic contraction may threaten the funding model that drives it forward (Calloway 2020). A recent policy mooted by Plan S to force hybrid journals into compliance by overriding journal copyrights brings the disruptive ethos of Plan S eerily in line with that of SciHub (von Noorden 2020a).

Alternative approaches to OA highlight the value of building on non-profit models and OA systems that already exist in the Global South and within scholarly societies. As a number of contributors have suggested, in place of public grants to finance APCs and transformative agreements with corporate publishers, funding could be turned to the much lower costs of Diamond OA, to upgrading public repositories that already exist within academic institutions, and connecting them through the development of interoperable digital systems and other scholarly services. Particularly in the context of global health and economic crises, it is time to widen the debate beyond for-profit systems of Gold OA, to explore the wider range of OA infrastructures for reclaiming the scholarly commons.

References:

Arkin, Fatima (2018) The ambassadors for open access standards in the global south, Sci Dev Net, 27 September, https://www.scidev.net/global/publishing/feature/the-ambassadors-for-open-access-standards-in-the-global-south.html

Barnes, L. (2018) Green, Gold, Diamond, Black – what does it all mean?, OpenBook Publishers, 22 October, https://blogs.openbookpublishers.com/green-gold-diamond-black-what-does-it-all-mean/

Bergstrom, Ted (2014) Secrets of journal subscription prices: For-profit publishers charge libraries two to three times more than non-profits, LSE Blog, 12 August, https://blogs.lse.ac.uk/impactofsocialsciences/2014/08/12/secrets-of-the-big-deal-journal-pricing/

Bezuidenhout, L., Kelly, A. H., Leonelli, S., & Rappert, B. (2017). '\$100 is not much to you': Open science and neglected accessibilities for scientific research in Africa. *Critical Public Health*, *27*(1), 39-49.

Bosch, S., Albee, B., & Romaine, S. (2019). Deal or No Deal | Periodicals Price Survey 2019 [WWW Document]. Library Journal, https://www.libraryjournal.com.

Büscher, B. (2020). Not-so-SMART: Why new platform and surveillance technologies are bad news for science and understanding. *Geoforum*, *112*, 3-5.

Calloway, Ewen (2020) Will the pandemic permanently alter scientific publishing? *Nature*, 3 June, https://www.nature.com/articles/d41586-020-01520-4

Chan, L. (2019). Platform Capitalism and the Governance of Knowledge Infrastructure, *Zenodo*, April, http://doi.org/10.5281/zenodo.2656601

Crawford, Walt. (2011). Open Access: What You Need to Know Now. Chicago: American Library Association.

Department for Business, Innovation and Skills (2012) 'Government to open up publicly funded research,' News, 16 July, https://www.gov.uk/government/news/government-to-open-up-publicly-funded-research

Editors (2020) Revisiting Open Access, Geoforum 112 (2020) 1–2.

ERC (2020) ERC Scientific Council Calls for Open Access plans to Respect Researchers' Needs, 20 July, https://erc.europa.eu/news/erc-scientific-council-calls-open-access-plans-respect-researchers-needs.

Fuchs, C., & Sandoval, M. (2013). The diamond model of open access publishing: Why policy makers, scholars, universities, libraries, labour unions and the publishing world need to take non-commercial, non-profit open access serious. *TripleC: Communication, capitalism & critique*, 11(2), 428-443.

Gowers, Tim (2014) Elsevier Journals – Some Facts, Gowers' Weblog, 24 April, https://gowers.wordpress.com/2014/04/24/elsevier-journals-some-facts/

Gray, Eve (2006) At the South-eastern Frontier: the impact of higher education policy on African research publication, Bridging the North-South Divide in Scholarly Communication: Threats and Opportunities in the Digital Era, CODESRIA-ASC CONFERENCE SERIES 2006, http://citeseerx.ist.psu.edu/viewdoc/download?doi=10.1.1.468.6270&rep=rep1&type=pdf

Hall, M. (2012). Green or gold? Open access after Finch. *Insights*, 25(3), https://insights.uksg.org/articles/10.1629/2048-7754.25.3.235/print/

Harrington, Robert (2017) 'Diamond Open Access, Societies and Mission: real costs to running a journal, and important revenues to put into discipline' *Scholarly Kitchen*, 1 June, https://scholarlykitchen.sspnet.org/2017/06/01/diamond-open-access-societies-mission/

Harrington, Robert (2019) 'Why Scholarly Societies are Vitally Important to the Academic Ecosystem' Scholarly Kitchen, 3 October, https://scholarlykitchen.sspnet.org/2019/10/03/why-scholarly-societies-are-vitally-important-to-the-academic-ecosystem/

Hiltzik, M. (2019) In an act of brinksmanship, a big publisher cuts off UC's access to its academic journals, *Los Angeles Times*, 11 July, https://www.latimes.com/business/hiltzik/la-fi-uc-elsevier-20190711-story.html.

International African Institute (2018) African Studies - Response to Plan S, 6 Febraury, https://africanstudies.org/wp-content/uploads/2017/08/Plan-S-African-Studies-submission.pdf

Kenneally, Christopher (2020) UKRI's Open Access Policy: Implications for Publishers, Copyright Clearance Centre, 21 May, http://www.copyright.com/blog/ukris-open-access-policy-implications-for-publishers/

Larivière V, Haustein S, Mongeon P (2015) The Oligopoly of Academic Publishers in the Digital Era. *PLoS ONE* 10(6): e0127502. doi:10.1371/journal.pone.0127502

Lund University (2018) Sweden stands up for open access – cancels agreement with Elsevier, Lund University Staff Pages, 31 May, https://www.staff.lu.se/article/sweden-stands-up-for-open-access-cancels-agreement-with-elsevier [accessed 15 Sept. 2020].

MacLeavy, J., Harris, R., & Johnston, R. (2020). The unintended consequences of Open Access publishing—And possible futures. *Geoforum*, 112, 9-12.

Morrison, Heather (2018) DOAJ APC information as of Jan 31, 2018, Sustaining Knowledge Commons, 6 Feb, https://sustainingknowledgecommons.org/2018/02/06/doaj-apc-information-as-of-jan-31-2018/

Morrison, H. & Rahman, A. (2020). Knowledge and equity: analysis of three models. IAMCR Online 2020 https://iamcr.org/tampere2020. Preprinthttp://hdl.handle.net/10393/40664June 19, 2020.

Nobes, A., & Harris, S. (2019). Open Access in low-and middle-income countries: attitudes and experiences of researchers. *Emerald Open Research*, 1(17), 17.

Normand, S. (2018). Is Diamond Open Access the Future of Open Access?. *The iJournal: Graduate Student Journal of the Faculty of Information*, 3(2).

Ojanpera, S., Graham, M., Straumann, R. K., De Sabbata, S., & Zook, M. (2017). Engagement in the knowledge economy: regional patterns of content creation with a focus on sub-Saharan Africa. *Information Technologies and International Development*, 13.

Okune, A., Hillyer, R., Albornoz, D., Posada, A., Chan, L. (2018) Whose Infrastructure? Towards Inclusive and Collaborative Knowledge Infrastructures in Open Science. ELPUB 2018, June, Toronto, Canada. 10.4000/proceedings.elpub.2018.31. hal-01816808

Powell, A., Johnson, R., Herbert, R. (2020) Achieving an Equitable Transition to Open Access for Researchers in Lower and Middle Income Countries, International Centre for Study of Research, July, STM.

Posada, A. and Chen, G. (2018) Inequality in Knowledge Production: The Integration of Academic Infrastructure by Big Publishers. ELPUB 2018, June, Toronto, Canada. 10.4000/proceedings.elpub.2018.30. hal-018167077.

Poynder, R. (2019). Open access: Could defeat be snatched from the jaws of victory? Digital Commons@University of Nebraska, Lincoln, 19 November, https://digitalcommons.unl.edu/cgi/viewcontent.cgi?article=1132&context=scholcom.

Raju, R. (2017). From green to gold to diamond: open access's return to social justice, IFLA WLIC, Kuala Lumpur, http://library.ifla.org/2220/1/092-raju-en.pdf.

Schmitz, J. (2019) Predatory publishing is the "black sheep" of open access journals, Publisso, April, https://www.publisso.de/en/advice/publishing-advice-faqs/predatory-publishing/

Sengupta, P. (2020). Open access publication: Academic colonialism or knowledge philanthropy?. *Geoforum*.

Shearer, Kathleen (2018) Open is not enough! Sustainability, equality, and innovation in scholarly communication, Zenodo, 16 May, https://zenodo.org/record/1250151#.X7pJ9VDgo2w

Shorish, Y. and Chan, L. (2019) Co-creating Open Infrastructure to Support Epistemic Diversity and Knowledge Equity, ScholarLed, 22 October, https://blog.scholarled.org/co-creating-open-infrastructure-to-support-epistemic-diversity-and-knowledge-equity/

Shu, F., Mongeon, P., Haustein, S., Siler, K., Alperin, J.P., and Larivière, V. (2020) Is It Such a Big Deal? On the Cost of Journal Use in the Digital Era. *College & Research Libraries*, [S.I.], v. 79, n. 6, p. 785, Sept. 2018. ISSN 2150-6701. Available at:

< https://crl.acrl.org/index.php/crl/article/view/16829/18997>. Date accessed: 21 nov. 2020. doi:https://doi.org/10.5860/crl.79.6.785

Suber, Peter. 2012. Open Access. Cambridge, MA: The MIT Press.

Taubert, N., Hobert, A., Fraser, N., Jahn, N., & Iravani, E. (2019) Open Access--Towards a non-normative and systematic understanding. arXiv preprint arXiv:1910.11568.

Tottossy, B., & Antonielli, A. (2012). The White Road to Open Access: A Proposal by the Open Access Publishing Workshop of the University of Florence. In *ECLAP 2012 Conference on Information Technologies for Performing Arts, Media Access and Entertainment* (p. 155). Firenze University Press.

Van Noorden, Richard (2020a) Nature to join open-access Plan S, publisher says, Nature, 9 April, https://www.nature.com/articles/d41586-020-01066-5.

Van Noorden, Richard (2020b) Open-access Plan S to allow publishing in any journal, Nature, 17 July, https://www.nature.com/articles/d41586-020-02134-6.

Wheatley, Steven (2015) Learned Societies and Open Access, Newsletter of the History of Science Society, 44 (2) April, https://hssonline.org/resources/publications/newsletter/april-2015-newsletter/

Wilson, Tom (2010) 'Open access – again', *Information Research*, 21 June, http://inforesearch.blogspot.com/2010/06/open-access-again.html

Wilson, Tom (2007) 'The EU and Open Access' *Information Research*, 18 November, http://inforesearch.blogspot.com/2007/11/eu-and-open-access.html

Wilson, Tom (2007) 'Green, Brass and Platinum - three routes to open access', *Information Research*, 9 November, http://info-research.blogspot.com/2007/11/green-brass-and-platinum-three-routes.html [Accessed 3 November 2020].