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**Chapter 23**

# The platformisation of global development: a political economy analysis

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## <a>Chapter 23: The platformisation of global development: a political economy analysis<a>

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### <b>Introduction<b>

The techno-optimism accompanying calls to "bridge digital divides" and harness the potential of digital technologies as "liberation technologies" for development at the start of the millennium is giving way to concerns about "adverse digital incorporation" (Heeks 2022). The Data for Development (D4D) field has been transformed by technological advances in big data anaytics and the emergence of "platform capitalism" (Langley and Leyshon 2016) , in ways that have yet to be reflected in global governance frameworks (Mann 2018). This chapter draws on key areas of literature to provide a brief critical political economy analysis of emerging issues and trends. It is structured as follows: The next section traces the evolution of D4D from its origins in humanitarian spaces, particularly refugee camps, which have become "living laboratories" for new technologies of digital surveillance (Iazzolino 2021). 'Financial inclusion' initiatives deploying fintech platforms are also highlighted, as more diffuse laboratories for experimentation with new types of privatised behavioural governance. The subsequent section focuses on the digital platform as a business model whose *raison d'etre* is the extraction of monopoly rents. In development settings, transnational firms have been able to profit from platform infrastructures that extend and lock-in market dominance, capture monetisable data streams and stifle domestic economic development (Mann and Iazzolino 2019). The final section discusses processes of subjectification underway in the platformisation of global development. The contemporary behavioural 'turn' in global development aligns with the deployment of platforms that scale up enrolment through algorithm-driven behavioural manipulation. In this case, platforms function as infrastructures of "high-tech modernism" that re-order societies into segmented populations of "users" and erode human agency by design (Farrell and Fourcade 2023).

### <b>Data for development: a living laboratory<b>

Data for Development (D4D) is a field of knowledge and practice that emerged in the mid 2000s as international organisations (IOs) such as the United Nations (UN) Global Pulse and the World Economic Forum (WEF) became aware of the potential of "'big data' (high-volume, machine-readable data)." Initially deployed by humanitarian agencies in the design of emergency responses, these data are increasingly seen as "as a developmental resource" that can be applied to all manner of development problems (Mann 2018, p. 4). In developing country contexts where capacity of public institutions has been eroded by successive structural adjustment reforms, development agencies rely increasingly on big data analysis to inform intervention design. Debates about the governance of D4D, however, tend to reflect its origins in top-down modes of humanitarian response. These debates centre on a reductive view of development subjects as "beneficiaries of better designed developmental solutions" rather than as social and economic agents (Mann 2018, p. 7). This solutionist mindset obscures the politically-charged contexts into which digital technologies are often introduced. Within the humanitarian field, for example, the use of big data analytics amplifies tensions between care

and surveillance resulting from the increasing securitisation[1] and privatisation of contemporary humanitarianism (Iazzolino 2021).

The following examples (all from 2019) provide snapshots of a reality very different to the one envisioned in the early 2000s by proponents of "Information and Communication Technologies for Development (ICD4D)" as "liberation technologies" of the future (Heeks 2010): The World Food Programme's (WFP) engagement of US data analytics firm Palantir to "help streamline delivery of food and cash-based assistance across its global operations"; the launch by Facebook, Mercy Corps (a global humanitarian nongovernmental organisation) and various other commercial and non-profit partners of a cryptocurrency and cross-border financial infrastructure to facilitate 'financial inclusion' (of which more later); and the WFP's decision "to suspend food and distribution in parts of Yemen, following the Houthi authority's refusal to accept the introduction of a biometric registration system" (Martin et al. 2022, p. 2-3). Biometric verification and digital 'financial inclusion' are two areas of D4D intervention for which there is a high level of support among IOs, philanthropic foundations and governments, so these warrant further discussion before returning to issues of global governance.

The use of biometric systems of verification in refugee camps exemplifies logics of solutionism and securitisation that underpin a "humanitarian rationality tasked with both managing and policing populations in need" (Iazzolino 2021, p. 111; also see Molnar, this volume). Iazzolino draws on ethnographic research in Kakuma refugee camp in Northern Kenya to contrast the "rigid moral categories" of aid workers with the more nuanced moral economy of refugees who view formal rules and transactions though a lens of social relations and mutual obligations. Aid workers value the "efficiency" of biometric systems which they justify in terms of "fairness" (understood as the ability to police "illicit" claims and activities). For marginalised refugee groups without access to remittances, informal "illicit" activities like trading surplus rations are essential livelihood strategies that are threatened by the intensified surveillance capacity of biometric systems. In this case a suggestion by elders that acceptance of biometric registration be reciprocated in the form of increased food rations showed, not a misunderstanding of the rationale for the system, but a realisation that it threatened to "exacerbate their condition of subordination to Somali traders from dominant clans" through increased indebtedness. In this way, technologies viewed by implementers as introducing accountability and "fairness" amplified the marginalisation and stigmatisation of disadvantaged groups within the refugee population. Moreover, biometric 'precision' concentrated accountability checks on those beneficiaries, rather than more significant instances of fraud further upstream in the humanitarian ecosystem (Iazzolino 2021, p. 123).

Perspectives of poorer refugees anticipating introduction of a biometric verification system show how these technologies "introduce a new sociotechnical layer" that "exacerbate[s] existing biases, discrimination [and] power imbalances … against a backdrop characterised by securitisation of refugee policies" and "steeped in the country's postcolonial history." The neo-colonial foundations of digital infrastructures and their tendency to amplify inequalities are themes to which we will return throughout this chapter. Indeed, humanitarian intervention has been described as the "canary in the coalmine" for reimagining power in the digital age (Martin et al. 2022, p. 5). As Iazzolino (2021, p. 114) notes, refugee camps are "spaces of exception" that have been turned into "living labs for experimentation without properly accounting for the risks associated with each technological component of the biometric assemblage" (an

[1] The term securitisation is used in this section to refer to the ways in which the post-September 11 "War on Terror" has transformed international refugee policy and increased the emphasis on surveillance.

assemblage integrating biometrics, artificial intelligence (AI), and blockchain). While these technologies, which are increasingly employed outside these spaces of exception, in immigration and asylum processing, are new, they revive a much older, colonial practice of rendering populations legible and therefore manageable (Scott 1998).

The promotion of digital finance infrastructures in humanitarian spaces is indicative of "the attention that corporate-philanthropic actors are paying to the need to 'financially include' refugees" (Iazzolino 2021, p. 114). This financial inclusion imperative is not confined to refugees, however. Since the 2008 Global Financial Crisis a global consensus has formed around financial inclusion as an overarching development paradigm for the Sustainable Development Goals (SDGs) era (Lahaye, Abell, and Hoover 2017). This agenda centres on the promise of the financial technology ('fintech') sector to reach "unbanked" populations on their mobile phones. The fintech boom capitalises on "disruptive" innovations in credit risk assessment of consumers with no banking history based on harvested online behavioural data, or "digital footprints" (Gabor and Brooks 2017) and an emergent "platform" business model (of which more later). "Fintech platforms are highly capitalized by venture capitalists, private equity and other forms of investment", for example, that of for-profit foundations like the Omidyar Network. "Their core rationale … is the reintermediation of monetary and financial relations", particularly in Sub-Saharan Africa "which is home to roughly three-quarters of the estimated 1.7 billion 'unbanked' people across the globe" (Langley and Leyshon 2022, p. 403).

Vulnerabilities created by tying digital finance to biometric verification systems were revealed in a radical experiment undertaken by the India's Modi administration in 2016, when the Indian state rolled out a rapid programme of demonetisation of Rs500 and Rs1000 banknotes. India's *Aadhar* biometric ID system, in place since 2010, had been unevenly applied and was already selectively mandatory for marginalised groups such as poor people receiving food rations. Yet it was the poor who were routinely shut out of a system that requires "having legible fingerprints and irises [excluding older manual workers and individuals suffering from malnutrition], … possessing mobile phones, [and] having a stable family life where the same registrant can collect rations from week to week." These requirements "point to a middle-class standard for normality rather than the precarity and unpredictability of the lives of the poor" (Taylor 2017, p. 5). The disproportionate burden of *Aadhar* on the poor was thrown into sharp relief during the 2016 demonetisation rollout, which placed demands on automated payment systems that discriminated against the poor. Poor people without access to mobile phones and formal banking systems were more reliant on these systems than other groups, yet at the same time more likely to be shut out of those systems because "*Aadhaar*-related technologies failed to identify them correctly" (Taylor 2017, p. 5; Masiero 2017).

Digital financial inclusion, particularly when linked to biometric ID systems, can be viewed as a more diffuse "living lab" for experimenting with new forms of privatised behavioural governance that erase informal practices and untraceable exchanges (cash transactions, "illicit" trading) and render economic activities of previously out of reach populations legible for the first time (Brooks In Press; Gabor and Brooks 2017). Jain and Gabor (2020) have gone as far as to predict the reorganisation of financial systems in the Global South around "digital infrastructures" in a process they call "digital financialisation", which allows "new seams of profit [to] be generated from increasingly granular surveillance of individual behaviour (Jain and Gabor 2020, p. 814). In this context, the introduction of *Aadhar* and the transition to digital finance (accelerated by demonetisation) in India showcases a reorientation of state power towards "creating surveillance infrastructures" and generating demand for (rather than

providing or subsidising) digital financial services “often by coercive means” (Jain and Gabor 2020, p. 824).

The above examples demonstrate how D4D implementation is fraught with macro- and micro-politics in ways that could not have been envisaged by ICT4D advocates in the early 2000s (Heeks 2010). Yet their assumptions continue to underpin the recommendations of IOs. The UN Global Pulse and World Economic Forum (WEF) have led debates that emphasise the “win-win” logic of governance frameworks that encourage data *emission, personalisation* and *centralisation* (Mann 2018, p. 3). While this formulation facilitates ease of data access and use for development agencies, it also creates advantages private firms poised to capture the commercial value of big data in the Global South. For example, the WEF has discouraged the practice, common in many African countries, of owning several SIM cards, and made the case for “tying subscriptions to demographic information . . . to ensure data generated by mobile devices is as individualised as possible” (WEF, 2012: 5). Personalisation of data is at the same time a core requirement of private firms seeking to mine data for ciommercially useful insights. Similarly, their reports showcase projects like IBM’s “Lucy, a US$ 100 million lab in Nairobi” as an exemplar of the benefits of centralisation, enabling data to be drawn from diverse sources and brought to bear on multiple development problems. However the “preference for centralisation has also helped firms like Facebook and Mastercard to position themselves at the centre of a growing information network” (Mann 2018, p. 9).

Transnational corporations are thus emerging as the clear winners in the D4D landscape, particularly in sub-Saharan African countries, where they have “position[ed] themselves as custodians of data” about emerging economies in the region (Mann 2018, p. 7). Governance frameworks promoted by IO’s effectively function as a *de facto* industrial policy through which African governments are "facilitating the learning and innovation of [transnational] firms” rather than developing national innovation systems that can “foster technological learning and upgrading” of their own economies (Mann 2018, p. 9). This *de facto* industrial policy also prevents citizens from acquiring capacity to make informed decisions about sharing their own data (Mann 2018). The consequences of this are particularly severe for poor and marginalised groups who tend to be subjected to more intense digital surveillance than other social groups (as was highlighted earlier in the case of *Aadhar* in India). These groups are disadvantaged, not by digital *exclusion* (as current governance frameworks would have it) but by “adverse digital incorporation” in systems that enable “a more-advantaged group to extract disproportionate value from the work or resources of another, less-advantaged group” (Heeks 2022, p. 689). In other words, inclusion becomes intrusion (Kaminska 2015). While D4D frameworks undermine national development, however, they do not necessarily weaken state power. Rather, state power tends to be *strengthened* by the “overlap between commercial and governance surveillance”. This also has implications for democratic politics, as efforts to make societies more legible to corporations and humanitarian agencies can also "make opposition groups more visible to regimes” (Mann 2018, p. 5). In this scenario, extension of state power becomes the corollary of value extraction by transnational businesses.

**<b>Global development in the age of platform capitalism<b>**

The framing of what Heeks (2008) has called ICT4D 1.0 around a problem of exclusion from opportunity reflected the techno-optimism of the Web 1.0 age. It was also consistent with the economic orthodoxy of the time. The failures of structural adjustment under what became known as the Washington Consensus (Williamson 1990) had led to a re-evaluation of the role of the state in economic development in favour of new institutional economics (NIE) (Fine

2012). This is "a branch of economics that conceptualises economic development as being held up by market barriers in the developing world." Rather than 'leave it to the market', as the Washington Consensus advocated, NIE prescribed an, albeit limited, role for the state in removing domestic barriers that stood between the individual entrepreneur and the global marketplace. In this context, Information and Communication Technologies (ICTs) were viewed as "liberation technologies, levelling the playing field", removing transaction costs and ultimately "flattening the global economy" (Mann and Iazzolino 2019, p. 1). This incrementalist approach assumed that individual level productivity gains would aggregate up to macro-level improvements in domestic economic performance. This ignored well-documented lessons of successful "developmental states" that had intervened directly in the economy to support strategic sectors and channel reinvestment back into the domestic economy (Mann and Iazzolino 2019; Mkandawire 2001Leftwich 1995).

The 2008 financial crisis transformed the global development landscape. In the first instance it triggered a "profound loss of faith" in fundamentals of neoclassical economics such as the idea of the self-regulating market (Berndt and Boeckler 2017, p. 284). NIE, it should be noted, had been embraced by international financial institutions precisely because, unlike developmental state theory, it offered a policy fix that left tenets of mainstream neoclassical economics intact. In the aftermath of the 2008 financial crash, another branch of economics came to the rescue in a similar manner. Behavioural economists stepped in with concepts and tools "designed to correct for market failures in a way that reframed those failures in terms of shortcomings of market subjects themselves" (Brooks 2021, p. 376). Systemic failures were recast as the outcome of a crisis caused by the faulty decision making of multiple borrowers. This narrative allowed the economic mainstream to continue its "meandering course" while retaining its "unifying principles of marginalism, methodological individualism, opportunity costs and the virtuous effects of market exchange" (Berndt and Boeckler 2017, p. 284).

The behavioural economics toolbox of "nudges" and adjustments to "choice architecture" (Thaler and Sunstein 2008) has since been absorbed into everyday governance in the Global North and into the programmes of development agencies and nongovernment organisations (NGOs) (Fine et al. 2016; Berndt 2015). This was acknowledged by the World Bank's selection of behavioural economics as the topic of its 2015 World Development Report (WDR): "Mind, society and behaviour" (World Bank 2015). The recommendations set out in the WDR combined the Bank's traditional pro-market stance with post-market elements that "recognise markets need a little help from 'incentive-compatible' mechanisms" (Klein 2017, p. 489). Poverty, the Bank argued, "poses constraints" on rational decision making that can be remedied by direct interventions to *produce* more effective market behaviour. This was a departure from neoclassical assumptions that the poor are as rational as any other actor (Berndt and Boeckler 2017). Instead, poor people were cast as irrational agents that could be induced to *behave* rationally. This remained "a neoliberal approach", however, as the sole purpose of state intervention was to "advance human efficiency" to the benefit of the individual (Klein 2017, p. 489). Accordingly, NIE imperatives to adjust institutions to 'make markets work for the poor' were set aside as the 'behavioural turn' advocated by the WDR recast global development as a project of "producing responsible, efficient and effective subjects" primed for 'inclusion' in existing market structures (Klein 2017, p. 490; Berndt 2015).

Alongside multilateral and bilateral development agencies, philanthropic foundations, notably the Gates Foundation and Omidyar Network, have also encouraged the re-conception of global development in terms of micro-market adjustments to compensate for macro-market uncertainties (Mitchell and Sparke 2016). Their enthusiastic support for fintech platforms as a

vehicle for financial inclusion in the Global South exemplifies the alignment of the behavioural turn in development with the emergence of platform capitalism (Langley and Leyshon 2016; Gabor and Brooks 2017). Here "the platform" is understood as a socio-technical assemblage and business model with a "distinctive intermediary logic … which is to make multi-sided markets and coordinate network effects" which is becoming "incorporated into wider processes of capitalisation" (Langley and Leyshon 2016, p. 14). Platforms mobilise "infrastructures of participation" through processes of "*coding*, based on data and metadata; deploy[ment of] *algorithms* for processing relations between data points; use [of] *protocols* to script interactions; and configur[ation of] *interfaces"* with users. The emphasis on "'users' who 'co-create value" rather than on consumers is key to a business model that "targets scale economies and seeks to extract rents from circulations and associated data trails" (Langley and Leyshon 2016, p. 14; see also Zuboff 2019). Techniques of behavioural manipulation are core to a business model that *"must invest in behaviour design"* to "ensure users stick around of their own accord" (Langley and Leyshon 2016, p. 17, emphasis added).

Platforms are modern tools for "the development of underdevelopment" in the Global South (Frank 1966), particularly in sub-Saharan Africa. Digital platforms built by transnational firms function as "privatised epistemic infrastructures" that capture learning as well as value to "lock in competitive technological advantage of rich countries" (Mann and Iazzolino 2019, p. 2). The example of fintech platforms in Africa exemplifies the emerging global consensus around development as "technologically-enabled inclusion" of market-ready subjects "within existing formal economic structures and relations" (Langley and Leyshon 2022, p. 403). Moreover, unlike US, European and Asian fintech sectors, which have been shaped by start-ups, banks and Big Tech platforms, platform architectures in African countries are built on distinctly neo-colonial foundations. The emergence of fintech sectors in Africa has been seized by "neo-colonial telecommunications 'monoliths'" such as Vodacom, MTN, Airtel and Orange as an opportunity to "create platforms that build on their 'enclosure' of telecommunications …and enhance their capacity to extract rents" (Langley and Leyshon 2022, p. 404-405). These platforms "renew and recast colonial relations in the present" as "populations excluded from formal financial relations under colonial regimes" are enrolled into infrastructures of "corporate neo-colonialism" (Langley and Leyshon 2022, p. 403).

The platform business model has also created opportunities for agribusiness firms to collaborate with fintech and telecoms providers in the design of platforms that "bundle" agricultural and financial products and related information for promotion to smallholder farmers (Brooks 2021). In addition to neo-colonial telecommunications infrastructures, "digital farmer" platforms build on the legacy of the "long" Green Revolution (Patel 2013). This trajectory of agricultural modernisation and capitalisation has been driven by US philanthropic foundations who invested in public infrastructures of "high modernist" development in the Cold War era (Scott 1998; Cullather 2004), and the more recent Alliance for a Green Revolution in Africa (AGRA) whose aim is framed in NIE terms as enabling the inclusion of smallholders in global value chains (Alonso-Fradejas et al. 2015; Brooks 2016). Accordingly, "digital farmer" platforms enrol smallholders through mechanisms of data harvesting, digital profiling, and micro-targeted nudging towards adoption of platform "bundles" designed around the commercial priorities of private sector partners (Brooks 2021; Iazzolino and Mann 2019).

Platform architects emphasise their "digital disintermediation" role, in which they claim to "reduce informational and market asymmetries to the benefit of all" (Iazzolino and Mann 2019, np.)." Recent research indicates the reverse, however, as "platform developers actually *re-intermediate* the market and are able to reap profits through lock-in and control over market

governance." They reintroduce transaction costs in the form of "constraints, design values and updates of the user terms". Moreover, as market gatekeepers, platform developers are able to "pressure smaller actors into data sharing protocols that allow them to corral valuable data and determine the framework through which the data is transformed into tangible markets and assets." These platforms not "neutral marketplaces", far from it, as they reset economic relations and create new hierarchies (Iazzolino and Mann 2019, np.).

As platformisation continues, these processes of market consolidation, data capture and lock-in look set to intensify. Meanwhile programme bundles that mirror platform partnership structures are creating new vulnerabilities for smallholders. The inclusion of index-based insurance, despite an evident lack of demand (Johnson et al. 2019), illuminates the prioritisation of platform actors' interests over those of 'beneficiaries.' In this case, the promotion of index-based insurance reflects agribusiness partners' strategic interest in commodifying agricultural risk (Isakson 2015). The platform model allows businesses to sidestep crystal clear market signals and coerce farmers into adopting a product that individualises risk and weakens solidary relations that are an obstacle to market penetration. The bundling of index-based insurance with farming inputs "displaces informal systems of risk pooling linked to local institutions for seed saving and exchange that the long Green Revolution has long sought to render obsolete as 'backward'" (Brooks 2021, p. 388).

Fintech and "digital farmer" platforms share similar features, in that they: i) render populations legible at a more granular level than was previously possible; ii) generate behavioural data streams with potential for future monetisation; ii) facilitate lock-in of economic advantage for dominant market actors; and iii) equate "adverse digital incorporation" with development. In the case of agricultural platforms, a fourth feature can be added. As Langley and Leyshon (2016, pp. 4, 14) note, the platform business model is characterised by "future-facing processes of valuation and capitalisation" that "perform the structure of venture capital investment". This can be seen in the market effects of anticipated technological advances enabling monetisation of behavioural data (Zuboff 2019). What agricultural platforms offer in addition is the generation of micro-scale biophysical data on factors of agricultural production (soils, nutrients, water, climate, etc.). Demand for this type of digital knowledge is likely to grow as distant investors, particularly those with an interest in precision agriculture, calculate the value of land as an investible financial asset (Fraser 2018).

**<b>Development subjects on the risk frontier<b>**

The "platformisation" of global development and humanitarian intervention advances the financialisation of development alongside its datafication (Langley and Leyshon 2022; Mann 2018). The pithy phrase "all data is credit data" (Aitken 2017) serves as a reminder of how intertwined these processes are, not only at the institutional level, but also in the daily lives of market subjects – whose data are 'shared' with organisations through their "interpassive engagement" with digital platforms (Ruppert 2011). Antecedents of the financialisation of development, a term that refers to "the deepening nexus between financial logics, instruments and actors, and intentional 'development': that is, the ideologies, programmes and practices of the 'mainstream' international development community" (Mawdsley 2016, p. 2) go back a long way. Structural adjustment policies and privatisations of the 1980s and 1990s opened up economies in the Global South to "capital mobility required by investors" (Mawdsley 2016, p. 7) and generated income streams amenable to securitisation (pooled with other income-producing assets into investible financial products) (Fine 2012). The ubiquity of microfinance in community development over nearly three decades led to the reframing of empowerment as

*economic* empowerment and the valorisation of individual self-reliance (Rankin 2001). Microcredit providers, meanwhile, evolved from revolving funds administered by community-based organisations to private microfinance institutions (MFIs) progressively exposed to global markets through processes of securitisation – promoted by the World Bank's International Finance Corporation (IFC) – that have driven up interest rates to punitive levels in the drive for profitability (Soederberg 2013; Aitken 2010).

Machine learning algorithms deployed by plaforms also accelerate *internalisation* of logics of marketisation and financialisation. Returning to Scott's (1998) concept of legibility, the "high modernist" bureaucracies of the twentieth century "crafted categories and standardised processes" and re-order[ed] society in ways that reflected its categorisations and acted them out". High modernism shaped markets, which were "standardised, as concrete goods like grain, lumber and meat were converted into abstract qualities to be traded at scale" (Farrell and Fourcade 2023, p. 226). As twentieth century classification methods are superceded by digital techniques, high modernism has given way to "high-*tech* modernism". This term refers to "the body of classifying technologies based on quantitative techniques and digitised information that *partly displaces, and partly is layered over* the analogue processes used by high modernist organisations" (Farrell and Fourcade 2023, p. 227, emphasis added). Like bureaucracies, algorithms are "technologies of hierarchical ordering and intervention. But whereas bureacracy reinforces human sameness … algorithms encourage human competition…High-tech modernism and high modernism are born from the same impulse to exert control, but are articulated in fundamentally different ways, with quite different consequences for the construction of the social and economic order" (Farrell and Fourcade 2023, p. 226).

The advent of high-tech modernism has transformed people's relationship with their classifications to limit their agency in ways that are invisible to them. Under high modernism, classifications were all too visible to publics who often resisted, albeit in limited ways, particularly under authoritarian regimes. "The pathologies of computational algoritms are more subtle. The shift to high-tech modernism allows the means of ensuring legibility to fade into the background of ordinary patterns of life" (Farrell and Fourcade 2023, p. 228). While bureacratic classifications were often crude and innaccurate they were at least comprehensible, while "digital classification systems may group people in ways that are not always socially comprehensible". Political and social mechanisms through which people previously responded to their classification have been "replaced by closed loops in which algorithms assign people unwittingly to categories, assess their responses to cues, and continually update and reclassify them". These self-correcting, cybernetic categories are "automatically and dynamically adjusted in light of the reactions they produce" rather than in response to human intentions, decisions and actions (Farrell and Fourcade 2023, p. 229).

In the "living labs" of D4D, discussed earlier, classifications were invisible to affected groups but their material consequencies were not: Introduction of biometric verification system in a refugee camp in Northern Kenya exacerbated inequalities between Somali refugee groups, pushing poorer refugees into indebtedness (Iazzolino 2021); while, in India, a biometric ID system designed around middle class lifestyles created a social catastrophe as poor people were denied access to funds in the aftermath of the government's rapid demonetisation intervention. In these cases, and many others, interventions have entrenched social hierarchies and exacerbated vulnerabilities of poor and marginalised groups (Martin et al. 2022). Furthermore, machine learning algorithms have more subtle, insidious effects as they "institutionalise competition between units (whether people, organisations, or ideas) by fostering a market-based vision of fairness" (Farrell and Fourcade 2023, p. 230). This was evident in humanitarian

workers' association of the disiplinary function of biometric verification with "fairness"; despite outcomes that exacerbated inequalites and discouraged the redevelopment of solidary relations and cooperative survival strategies among marginalised groups (Iazzolino 2021).

In the case of fintech-powered financial inclusion, narratives about unqualified benefits of market inclusion circulate among members of an evolving "fintech-philanthropy-development (FPD) complex" of philanthropic foundations, government officials, development agencies and fintech and telecomms firms (Gabor and Brooks 2017). This optmistic framing belies the harsh disciplinary reality of fintech platforms in practice. The example of JUMO, a Cape Town-based fintech firm that partners with telecoms firms and banks to offer unsecured credit products in six African countries, is instructive. JUMO's algorithms gather data points from a range of sources to assess a customer's creditworthiness. These include driving data aggregated from the Uber app along with data points on mobile phone usage and mobile payments. Fraud risk, meanwhile, is calculated from a range of data including "data on mobile phone battery life and the frequency with which users 'let' their phone battery 'die' and how long the phone is off" (Langley and Leyshon 2022, p. 410). In this case, machinaries of financial subject formation do not engage with (far less 'empower') individuals, but with sets of data points:

> JUMO is fundamentally indifferent to singular individuals… JUMO's platforms do not simply enrol individual subjects into formal credit–debt relations but, rather, enlist analytically-defined and segmented groups of users …. users figured by JUMO through data analytics only become known to the firm and its partners in terms of the behavioural and proxy credit history attributes that they share with others. Users are always already differentiated, that is, grouped, segmented, and scored by the platform as a result of its analysis of telecommunication and transaction data points. Put another way … *users are abstract and data-derived figures produced by JUMO to be profitable, and without which they have no role or essential identity* (Langley and Leyshon 2022, p. 408, emphasis added).

The promotion of fintech markets in the Global South as a "new risk frontier" for investors with an appetite for "high-risk, high profit" rewards is thus a more accurate depiction of plaformised microfinance than is the narrative of inclusion that populates the websites of philanthropic foundations and development agencies (Gabor and Brooks 2017). The consensus around financial inclusion *as* development collapses what Hart (2010, p. 117) calls big-D and little-d development (where the former refers to "a post war international project" and the latter to "capitalist development as a highly uneven process of creation and destruction") into the consolidation of privatised infrastructures for coercive, financial*ised* inclusion and extraction of monopoly rents. Platforms function as infrastructures of "high tech modernism" (Farrell and Fourcade 2023) that "sort" customers into credit risk classifications based on harvested data on patterns of online behaviour (Aitken 2017) in a multi-tiered process of financial subject formation (Kear 2013). These classification processes are invisible to customers on the receiving end of algorithm-driven "nudges" towards products selected for them and priced according to their categorisation within an opaque, constantly fine-tuned hierarchical ordering of more or less risky market subjects (Gabor and Brooks 2017; Aitken 2017).

**<b>Conclusion<b>**

The deployment of digital technologies in global development has produced outcomes that have diverged dramatically from the hopes *and* fears that framed debates in the early 2000s, which centred on the urgency of bridging digital divides. The global financial crisis, or, more

specifically, the paradoxical institutional responses to it; technological advances in big data analytics and the diffusion of mobile devices; and the emergence of platform capitalism have transformed the field of Data for Development (D4D). The examples of humanitarian intervention, financial inclusion and technical assistance to smallholder farmers outlined in this chapter deploy platform infrastructures that have extended surveillance of populations and prised open new markets while exacerbating inequalities and vulnerabilities. The scaling up of reach and coverage achieved by these interventions coexists with a scaled-down development ambition (to paraphrase Taylor 2012, p. 604) of technologically-enabled inclusion in structures that perpetuate conditions of inequality, marginalisation and exploitation.

The platformisation of global development is indicative of its incorporation into wider processes of capitalism. Beyond privatisation of discrete programme components, this points towards the potential absorption of "big-D development" into the "small-d" development (Hart 2010) of contemporary platform capitalism. As infrastructures of "high-tech modernism" (Farrell and Fourcade 2023) platforms render populations (and natural resources) legible to private firms and states, to a greater extent and degree than was previously possible, and in ways that are opaque to individuals so classified. Indeed, platforms do not engage with individuals as such, but with "users" that are "abstract and data-derived figures *produced"* by platforms "to be *profitable*" (Langley and Leyshon 2022, p. 408, emphasis added). These processes of subject formation erode human agency by design though continual fine-tuning and (re)classification. The platformisation of development poses particular risks to populations whose livelihoods depend on informal institutions of mutuality and reciprocity. Platforms are designed to perform accumulation strategies of their owners and these include the displacement of informal, solidaristic relations by vertical relations of market dependence.

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