

# Fintech, Philanthropy and Development: Emerging Issues with Digital Inclusion

Juvaria Jafri

City, University of London, and University of Kassel  
juvaria.jafri@city.ac.uk

March, 2021

Financial Geography Working Paper #30



U N I K A S S E L  
V E R S I T ' A ' T

## Fintech, Philanthropy and Development: Emerging Issues with Digital Inclusion

### Abstract

This paper explores the relationship between digital identity data and fintech, showing that security, and not just financialisation, is the appropriate lens to examine technologies for financial access. These technologies are supported by the nexus of finance, development, and philanthropy, ostensibly to facilitate welfare policies. But they are also part of a global security imperative. This is because the need for digital identity databases emerges from regulations to counter terror finance. Examples from India and Pakistan show how such strategies drive collaborations between governments and fintech companies that complicate policy transparency.

## Introduction

New digital strategies and technologies, commonly known as fintech, have strong implications for financialisation in the Global South. While earlier studies of this phenomenon, such as those on microfinance, have been concerned about how such practices are counterproductive and reproduce inequalities (e.g Roy, 2010; Soederberg 2014; Mader, 2015), more recent studies have explored the phenomenon of 'digital financialisation'. The focus of this latter set of scholarship has been on the monetisation of data and the inequities that emerge as a result. Empirically, the scope of this work has considerably widened as fintech infrastructures have become foundational to e-governance through the provision of digital identity.

This article expands upon this relationship. This is done by highlighting how new technologies of finance are centred on know-your-customer (KYC) procedures. The financial inclusion movement has repeatedly highlighted how KYC requirements are an impediment to financial access because the poor people often lack identification documents. This can be overcome by providing such individuals with a digital identity. As a result, tech firms are increasingly collaborating with financial institutions, development organisations, and philanthropic foundations that enhance access not only to the financial system through digital identity databases.

This is because the proliferation of fintech has caused digital identification to become central to many development interventions. Particularly, digital identities have gained prominence because of digital financial transactions. Most of these transactions are welfare payments as in poor countries, digital identity infrastructures are being discussed, funded, and studied as prerequisites for digital financial inclusion. This is itself a key facet of e-governance and also what Van Zoonen (2020) describes as a digital welfare state, characterised by the increasing uptake of digital data and technologies in welfare design, partnerships, administrative processes, and service provision. Aside from forming the infrastructure for governance and welfare in poor countries, digital financial transactions are a favoured strategy because they are cost effective, growth friendly, business friendly, and inclusive. Additionally, digital transactions restrict corruption, terror finance, human and drug trafficking, tax avoidance and evasion.

The institutionalisation of digital identity to promote finance-based development strategy thus exemplifies how the War on Terror, which began after 11th September 2001, is a crucial turning point that has shaped contemporary finance. As noted by Stanley (2020), political economy tends to underplay how the war on terror has initiated its own authoritarian turn prior to the global financial crash (GFC). So, 2008 is a less compelling turning point than 2001 for understanding the uneven power relations between large finance and technology companies and the public. While the resilience of financial power was analysed extensively following the GFC of 2007-9, the growing fixation with digital identity can only be fully analysed as an extension of the post 9/11 national security agenda (see Bennett and Lyon, 2008).

As such, digital identity initiatives are also closely linked to austerity measures. Austerity has been deployed since the GFC of 2007-9 — in developed as well as in developing countries — when economic necessity has been used to justify practices that ‘seek to marginalize, discipline and control dissenting social groups and oppositional politics rather than strive for their explicit consent or co-optation’ (Bruff and Tansel, 2018: 234). For Stanley (2020), the trend of states to impose austerity after the GFC through authoritarian practices is closely connected to the ostensible need for security linked to the War on Terror. This resonates with the recent work of Marieke de Goede on the new geopolitics of sanctions. The example of restrictions placed by SWIFT — or the Belgian-based Society for Worldwide Interbank Financial Telecommunications — on Iran exemplify how financial infrastructures are not only a salient feature of global security politics and counter-terrorism financing, but also a product of colonial violence (de Goede, 2020).

Recent examples of digital systems of welfare in Pakistan and India illustrate how fintech is increasingly being used in the service of development but also simultaneously for security.[1] These trends have emerged from earlier initiatives, beginning in the 1970s, in which financial access — in various forms, including mobile money — was presented as a transformative development intervention.

The objective of this article is to explore the tensions between the respective security and inclusion imperatives in digital financialisation; particularly, the contradictory nature of digital inclusion, when financial access is seen to enhance security but also compromise it. This is revealed through a historical explanation approach including an analysis of the key actors and infrastructures of digital financial inclusion; these are (1) national governments, (2) international development organisations, and (3) financial institutions. Over recent years, these types of organisations have collaborated through a global partnership model to advance what Gabor and Brooks (2017) describe as the finance-philanthropy-development nexus (see also Lai and Samers, 2020).

The remainder of this paper is structured as follows. Section 2 discusses the globalised agenda, promoted by international organisations, for digital financial access. Section 3 outlines how digital identity has come to be a part of the development narrative of financial access because of security concerns. Section 4 describes the ‘stack’ model, which is the infrastructure, built and used by technology companies, that links digital identity to fintech applications, and section 5 concludes.

## Converging agenda

The globalised agenda for digital financial access is a product of two initiatives guided by two respective institutions: CGAP and ID4D. Both these institutions are led by the World Bank, using a partnership model that involves philanthropic and development organisations. The CGAP or Consultative Group to Assist the Poor was launched in the 1990s as ‘a multi-donor effort to broaden and deepen the success of

the work done by pioneer institutions' in microfinance (CGAP, 1998). Eventually, as the financial access agenda expanded, the CGAP established itself as the leading think tank for knowledge, particularly 'best practice' on financial inclusion; Roy (2011) and also Mader (2015) offer critical commentaries on this process.

This success of the CGAP has arguably driven the creation of another World Bank project; the ID4D initiative, that frames digital identification technologies as having transformative potential for poor countries (ID4D, 2020; 2016). This initiative acknowledges that 'individuals who lack birth registration and official forms of identification are typically the most vulnerable people in the poorest countries' (ID4D, 2016: 2). The World Bank's access to global knowledge and expertise, financial instruments, and private-partnerships are salient features of an approach which seeks to establish digital identification systems for the delivery of basic services to the poor. At the core of this strategy is the ID4D Multi-Donor Trust Fund, which was established in 2016 and is supported by a number of organisations including the Bill & Melinda Gates Foundation, Omidyar Network and the Australian Government (ID4D, 2020).

Digital identification technology has thus gained a reputation as the leading edge of technology for development and builds on earlier narratives around the transformative potential of access and connectivity. These perspectives are fuelled by copious examples of development interventions based on digital technology. One such instance is that of 'e-governance' to automate day to day government activities (see Dattani, 2019; Madon, 2009).[2] Walsham (2019) observes how the use of ICTs in development, since the mid-2000s, is now in a 'proliferation' phase, spurred by an explosion in mobile phone usage. This also reflects a shift from ICT4D 1.0 to 2.0, particularly as personal mobile phones became substitutes for 'community owned' devices such as television, radio and internet devices, etc. (Heeks, 2009; 2008). Contemporary strategies for development and poverty reduction are engrossed with mobile phones and particularly their role in supporting collaborations with private businesses. The SDGs or Sustainable Development Goals of 2030 capture this fixation. For instance, not only are mobile phones described as 'enablers' for all 17 SDGs; they are also seen as central to the delivery of these goals (WEF, 2018). This has provided the rationale for a stream of financial technologies or fintech that combine profitability with social goals — a double bottom line — and are funded by both the public and as the private sector.[3]

The push for digital financial access comes from three multilateral agendas for global development: these include the ICT4D or information and communications technology for development, the Finance for Development (FfD), and more recently the ID4D initiative.[4] Across these agendas there is a consensus on three points: (1) that information and communications technology are key tools for financial access and therefore development, (2) that development initiatives need private sector funding, and (3) that the lack of digital identification impedes development initiatives.

These agendas and their complementarities are laid out very clearly in the United Nations Sustainable Development Goals for 2030, particularly Goal 16.9: 'to provide legal identity for all, including birth registration' (United Nations, 2020).

Because identification is ‘also a key enabler of many other SDG goals and targets’ including financial and economic inclusion, this particular target has attracted the support of international organisations such as the World Bank, corporate donors and large philanthropic foundations (see World Bank, 2020).

Essentially, the purpose of a digital identity is simply to formalize the individualization of access to computer networks (see Kiennert et al, 2015). But as instances grow of digital financial transactions replacing those based on physical cash, the scope for the use — and misuse and abuse — of digital identity has multiplied. In critical studies of finance in the Global North, these tendencies are revealed in practices such as algorithmic credit scoring; these have been shown to drive financial exclusion but also financial subjectivity (e.g. Kear, 2013; Hall, 2012; Appleyard, 2011; Collard and Kempson, 2001; Leyshon and Thrift, 1999). More recent work on digital transformation in the Anglosphere and in European countries draws attention to how platforms and financial infrastructures produce — and are also produced by — new collaborations and competitions between the financial and tech industries (Westermeir, 2020; Langley and Leyshon, 2020).

Scholars of the Global South have expressed heavy scepticism about the intrusive nature of digital financial inclusion and the practice of alternative data capture to expand financial markets (Bernards, 2019; Gabor and Brooks, 2017; Aitken, 2017). These concerns are amplified as these practices have become centred on digital data, including biometrics and locational data.

By relying on the hardware and software of personal mobile phones, fintech is utilised through ‘platforms’. Platforms enable payments to be made electronically for various services and goods.[5] Platforms have, for instance, had great success in advancing alternative modes of banking: this is reflected in the success of mobile money in several — African and South Asian — countries, and in the profitability of many various online platforms, including for e-commerce, food delivery, taxis, etc. [6] As such, digital finance is now the leading edge of development interventions centred on technology.

“For example, one of the Sustainable Development Goals is reducing hunger. Digital finance contributes to this goal by giving farmers financial tools to cope with income variations and smooth consumption between harvests. Another example is the climate change and clean energy goal. Digital payments make it possible for households to use pay-as-you-go methods for solar panels and other clean technologies” (McKinsey, 2016: 11).

Because of these shifts — in technology and in development strategy — digital finance has augmented the need for digital identification. Another way of putting this is that digital finance has raised the stakes for financial inclusion. The notion that financial access is elusive for those who lack official identification documents is a recurrent theme in the inclusive finance scholarship, but for many years the fix for this was to offer alternative products to enhance financial access (see Collins et al, 2009). Now, it has become increasingly common to see identification documents as complementary to digital finance, and projects to increase access to identification documents are attached to initiatives for financial access. Identification projects,

which have sought to issue documents to prove citizenship and entitlements to public goods and services, precede digital identity databases. But digital finance has created the need for identification to be available digitally.

## Identification for Development

An estimated 1.5 billion persons globally have no form of identification; most of them live in the Global South and many are migrants and refugees (ID4D, 2016). This overlaps with the estimated number of persons globally who are considered financially excluded or unbanked: 1.7 billion according to the World Bank's financial inclusion database (Global Findex, 2018).

Increasingly seen as a tool to enhance financial inclusion, the use of digital finance is now a regular theme in the financial access literature. This notes how financial access has undergone a series of conceptual shifts, as microcredit gave way to microfinance, and microfinance gave way to the more nebulous terminology of financial inclusion and inclusive finance, which includes mobile money. These transformations are discussed in detail in Natile (2020).

As a development tool, digital finance has two primary utilities: (1) as mobile money, and (2) for government to person (G2P) payments. Mobile money does not, in theory, require digital identification to operate; but there is increasing regulatory pressure to link mobile money with digital identification. This is guided by the Financial Action Task Force (FATF) recommendations on KYC or know-your-customer: digital identification should be a requirement for mobile money transactions, for anti-money laundering (AML), and counter-terrorist finance measures (CFT) (see FATF, 2020).

The role of the FATF in shaping the financial systems of developing countries is regularly overlooked in the scholarship on financial development. The FATF was created by the G-7 in 1989 to address money laundering; after 2001 it rapidly transformed to become the global money laundering and terrorist financing watchdog (FATF, 2020). This also relates to an earlier discussion on mobile money and financial integrity (De Koker and Jentzsch, 2013; Buku and Meredith, 2012). FATF support for enhancing formal financial access assumes that informal financial transactions impede anti-money laundering and counter-terrorist finance or AML/CFT efforts (De Koker and Jentzsch, 2013). Because FATF (2012) sees financial inclusion and financial integrity as complementary policy objectives, enhancing financial integrity through digital identification also enhances financial inclusion.[7]

The other use of digital finance in development strategies is for G2P payments. These include social transfers — including conditional cash transfers — as well as wage and pension payments. The advantages of digitising G2P payments are covered in CGAP (2009): they include improvement in financial inclusion by connecting recipients to branchless banking channels, but also reductions in government costs by streamlining transactions, and decreases in leakages through theft, fraud, and corruption. Recent analyses by organisations such as the World Bank (2018), and the United Nations (2020) find that 'the identity gap' (Beduschi,

2019) sizeably impedes access to basic healthcare, education services, and social safety nets. To address this, development interventions led by international organisations have been actively assisting states in expanding digital identity. These efforts have been targeted at domestic as well as refugee populations with the support of organisations such as the World Bank, the Asian Development Bank and the United Nations High Commissioner for Refugees (see Beduschi, 2019).

But even beyond basic healthcare and education service, critical scholars have raised concerns about the increasing use of fintech to disburse refugee assistance. For instance, Bhagat and Roderick (2020) show that fintech designed for refugees living in camps and informal settlements in Kenya facilitates racial forms of capital accumulation and expropriation. This occurs because institutions in the Global North, including Mastercard, Safaricom and Western Union determine who is included and excluded from various forms of monetary assistance, including credit (Bhagat and Roderick, 2020).

These examples, of international development through fintech, connect patterns of individual mobile phone usage and the digitisation of social transfers by the state, with the business models of private technology companies and financial institutions (see Gabor and Brooks, 2017). For some scholars this is evidence of a need to review how financialisation operates in the Global South (e.g. Jain and Gabor, 2020; Langevin, 2019; Aitken, 2017). For instance, Aitken (2017) shows how new practices, attached to financial inclusion projects are data gathering exercises to identify and extract value from those without formal credit scores in contemporary financial markets.[8] More recently, Jain and Gabor (2020) use examples of recent events in India — particularly demonetisation and the United Payments Interface — to show ‘digital’ financialisation, is distinct from ‘analogue’ financialisation: whereas the latter is driven by financial deregulation, financial innovation and financial globalisation, the former is advanced through innovations in digital infrastructures, supportive and pro-active government.

To some extent, such analyses imply that fintech — particularly for poor countries — is simply a new face of financialisation. Digital identities play a crucial role in this form of financialisation by widening the client base for financial institutions; this is done through increasing the number of those who can use the financial system. Digital identities also deepen the client base using differential rates and pricing for financial services (see Mader, 2016). These perspectives see digital financialisation as form of what Zuboff (2019) calls ‘surveillance capitalism’, a system in which firms grow by collecting and monetising data for profit.

In this perspective, large financial institutions and technology companies are responsible for imposing their policies and practices in poor countries. The shortcoming of this view is there is only limited acknowledgement of the security imperative that is imposed primarily by rich countries on poor countries, through the FATF. These concerns are reflected in the growing identification literature on developing countries. The issue of digital surveillance — which operates through identification data, including biometrics and government issued documents — is a problem from the lens of human rights, particularly the right of individuals to privacy.

These challenges are covered in the work of legal scholars such as in Beduschi (2019), Beduschi et al. (2017) and in the grey literature of international and national non-profit organisations such as Privacy International (e.g., 2019) and CITRIS (Nonnecke et al, 2019). In this literature, the increasing use and expansion of digital national identity databases — spurred by SDG focus on legal identity — is particularly concerning. Digital identity systems can advance but also limit civil and political rights within the areas of data protection, political participation, and the inclusion of diverse ethnic identities (Nonnecke et al, 2019; Privacy International, 2019; Beduschi et al. 2017).

In another stream of the identification literature the focus is on the role and implications of public-private collaborations. These have allowed large technology companies to become instrumental to government programmes that use digital transactions, including G2P payments infrastructures. Digital identification databases are at the core of such infrastructures; these are increasingly common for providing and managing official documents, including to control and secure external borders, and to distribute humanitarian aid to populations in need.

Many of these trends are captured in the research on fintech for international development, including financial inclusion and refugee assistance projects, in which large corporations such as MasterCard develop and operate government schemes (e.g., Bhagat and Roderick, 2020; Bhagat and Soderberg, 2019; Gabor and Brooks, 2017). This theme of public-private partnerships is also revealed in the respective experiences of India and Pakistan with the 'stack model'. This is the digital infrastructure which combines fintech led development strategies with the security imperatives of governments.

## The 'stack model' in India and Pakistan

A stack is the foundation of any digital application. Essentially a combination of projects, a stack is created by linking the technologies required to operate an application: this includes computer languages, architecture, libraries or lexicons, servers, user interfaces and experiences, software, and databases. These utilise Applied Programming Interfaces (APIs), which are a set of algorithms and code that allows different platforms to 'speak' to each other. The 'India Stack' is described as 'set of APIs that allows governments, businesses, start-ups, and developers to utilise a unique digital infrastructure to solve India's hard problems towards presence-less, paperless, and cashless service delivery' (India Stack, 2020). In India's case, the model allows third party private developers to use the Aadhaar database for customer authentication and verification. This has created an infrastructure primarily geared towards fintech because it facilitates access to data based on biometrics and identification documents.

The success of the India Stack is almost completely dependent on the Aadhaar system. This is managed by the Unique Identification Authority of India (UIDAI), which was established in 2009. The objective of this organisation is to issue 'Aadhaar' or UID's to adult citizens, or residents, of India. From its inception in 2010,

the Aadhaar project was framed as centred on welfare, with identity and inclusion as twin objectives. In this narrative, welfare in the form of social support programmes had been hampered by corruption from ‘middlemen’; Aadhaar would overcome this problem by removing the middlemen and also facilitating a shift to cash transfers, as ‘in kind’ programmes were prone to corruption (Khera, 2019).[9]

Since India’s central bank, the Reserve Bank of India allowed banks to accept Aadhaar as proof of identity for opening bank accounts to support financial inclusion, Aadhaar has been advantageous for the financial sector particularly for fintechs. This is primarily because of the impact it has had on KYC costs: with Aadhaar, financial institutions can conduct ‘eKYC’ checks at 15% of the cost of a non-digital KYC (PwC, 2018). The financial sector in India has also been a massive beneficiary of the infamous demonetisation drive in India. Those holding cash were pushed to deposit this in the financial system when the Modi government removed the largest bank notes — 86% of currency by value — from circulation (Jain and Gabor, 2020).

Particularly controversial is the role of ‘iSpirit’, or the Indian Software Product Industry Roundtable, which has taken to coordinating the India Stack and hence the digital ecosystem centred around Aadhaar. This is organised as a not-for-profit think tank, staffed mostly by ‘volunteers from the tech world, who dedicate their time, energy, and expertise towards India’s hard problems’ (iSpirit, 2020). An interest group formed by influential individuals and technology firms, iSpirit has been scrutinised for lobbying for data localisation, for special access to central bank policies, and for individuals who have left government roles to assume private ones, allegedly to profit from Aadhaar-related businesses (Quartz, 2019).

Across the border there are similar concerns. The Digital Pakistan initiative uses a model similar to Aadhaar. As a non-profit organisation, the Digital Pakistan Foundation sought to operate much like India’s iSpirit. And like iSpirit, the Digital Pakistan Foundation saw the National Database Registration Authority (NADRA) biometric repository as a backbone of digital infrastructure that could be deepened and widened to create a ‘Pakistan Stack’. Launched in 2017 and relaunched in 2019, Digital Pakistan was received positively when Tania Aidrus, a former Google executive, was appointed as special advisor to the Prime Minister to lead a new initiative to enhance connectivity and improve digital infrastructure, skills and literacy, innovation, and entrepreneurship in Pakistan (Dawn, 2019). The NADRA repository was a core part of her initial plans. This database contains the biometric data and other personal information of Pakistani residents and citizens. As such, in Pakistan, like in India, national identity numbers — issued by NADRA — can be used to verify identities and thus for eKYC.

Unfortunately, digitisation initiatives were set back because of transparency concerns. Aidrus strived for a model based on voluntary support from individuals who were high net worth individuals or leaders of large technology companies; for this she became a founding board member of the Digital Pakistan Foundation, a non-profit company registered in Pakistan shortly after her appointment (Dawn, 2020). But within six months Aidrus was weighed down by conflict-of-interest allegations because of close ties between the foundation’s board members and prominent

entrepreneurs in fintech, who were seen to be influencing regulatory policies on payments applications. As such, the leadership of the Digital Pakistan Foundation struggled to assert that the non-profit, yet government affiliated model was legitimate, and Aidrus and her colleagues from her advisory role in the government just six months after the initiative was launched (Dawn, 2020).

It is not surprising that both the Indian and the Pakistani case have drawn attention to governance and transparency concerns around large biometric databases, particularly when the boundary between entrepreneurs and regulators is unclear. Dattani (2019) describes this concern as ‘governpreneurism’, a practice which obscures the distinction between the state and corporations:

“The ‘revolving door’ of movement between government and the private sector allows individuals to benefit from the knowledge gained and contacts made while within government, in this case creating winners in the corporate and fin-tech arenas” (Dattani, 2020: 416).

This problem of revolving doors and conflicting interests is also discussed in the context of financial regulators and executives migrating between positions in Shrive and Foster (2017), demonstrating that digital national identity databases have their own political economy; but also how, as discussed in Chaudhuri and König (2017), such technologies augment a market concept of equality, while turning ‘citizens’ into ‘customers’.

What has escaped enquiry in the scholarship on digital financialisation is that of the regulation itself. Throughout the literature on financial access — analogue as well as digital — the problem of lack of documentation, which impedes KYC, is a recurrent theme. There is a demand as well as supply for digital identity projects. In the digital financialisation literature there is a focus on the supply; this comes from financial institutions and tech companies who use digital identity as the raw material for the applications they produce. This is done in response to demand expressed by national governments who, prompted by global development institutions, see technology as a developmental fix and an instrument with which to govern. The revolving doors lens problematises the relationship between governments and fintech because suppliers are seen to be creating demand by colluding with governments.

The focus should instead be placed on the regulatory regime which is in this case the most powerful mechanism of demand, that is, the KYC requirements of the Financial Action Task Force. Countries where banks fail to follow these requirements are placed on ‘blacklists’ and ‘grey lists’ (Sharman, 2009). This threat has been an impediment to financial inclusion and also flawed in limited potential terror finance (De Koker, 2014).

## Conclusion

This paper has explored the relationship between digital identification data and fintech. This relationship has emerged from a globalised agenda promoted by a

number of international development organisations through a consensus that information and communications technology, which necessitate digital identification, are key tools for financial access and therefore development. This approach to development requires private sector involvement, not only for finance but also for technological expertise. One prominent outcome of this approach has been the phenomenon of digital financialisation, and its reliance on the mapping and monetisation of digital data. Another outcome has been the immense role that the fintech sector has played in shaping the demand for and supply of technology centred on digital identification. This is revealed through the case examples of India and Pakistan. In India, the Aadhaar identification project has at various stages relied on the expertise of quasi-volunteers, with interests both within the government as well as the private sector. Pakistan's experience has been similar, with blurred lines between the government and private sector resulting in concerns about how much fintech can benefit from the national biometric database. The consistent theme across these examples has been the burden of the KYC process which has been considerably lightened with technology from the private sector.

## References

- Aitken, R. (2017). 'All data is credit data': Constituting the unbanked. *Competition & Change*, 21(4), 274-300.
- Bennett, C. J., & Lyon, D. (Eds.). (2008). *Playing the identity card: surveillance, security and identification in global perspective*. Routledge.
- Bernards, N. (2019). The poverty of fintech? Psychometrics, credit infrastructures, and the limits of financialization. *Review of International Political Economy*, 26(5), 815-838.
- Bhagat, A., & Roderick, L. (2020). Banking on refugees: Racialized expropriation in the fintech era. *Environment and Planning A: Economy and Space*, <https://doi.org/10.1177/0308518X20904070>.
- Bhagat, A., & Soederberg, S. (2019). Placing refugees in authoritarian neoliberalism: reflections from Berlin and Paris. *South Atlantic Quarterly*, 118(2), 421-438.
- Bruff, I., & Tansel, C.B. (2019) Authoritarian neoliberalism: trajectories of knowledge production and praxis. *Globalizations*, 16(3), 233-244.
- Castells, M. (1999). The social implications of information and communication technologies. Informe preparado para el Informe Mundial de las Ciencias Sociales de UNESCO.
- CGAP (1998). The Consultative Group to Assist the Poorest: A Microfinance Program. <https://www.cgap.org/research/publication/consultative-group-assist-poorest-microfinance-program> [Accessed 15 February 2021].
- Collard, S., Kempson, E., & Whyley, C. (2001). Tackling financial exclusion. Policy.

- Dattani, K. (2020). "Goventrepreneurism" for good governance: The case of Aadhaar and the India Stack. *Area*, 52(2), 411-419.
- Dawn (2019). Digital Pakistan. 07th December, Editorial. <https://www.dawn.com/news/1520932>. [Accessed 05 August 2020].
- Dawn (2020). Company linked to PM's Digital Pakistan unit stirs controversy. <https://www.dawn.com/news/1564826>. [Accessed 05 August 2020].
- De Koker, L. (2014). The FATF's customer identification framework: fit for purpose? *Journal of Money Laundering Control*, 17(3), 281-295
- De Koker, L., & Jentzsch, N. (2013). Financial inclusion and financial integrity: Aligned incentives? *World Development*, 44, 267-280.
- FATF (2020). History of the FATF. Financial Action Task Force. <http://www.fatf-gafi.org/about/historyofthefatf/> [Accessed 05 June 2020].
- Gabor, D., & Brooks, S. (2017). The digital revolution in financial inclusion: international development in the fintech era. *New Political Economy*, 22(4), 423-436.
- Hall, S. (2012). Geographies of money and finance II: Financialization and financial subjects. *Progress in Human Geography*, 36(3), 403-411.
- Heeks, R. (2009). The ICT4D 2.0 manifesto: Where next for ICTs and international development? *Development Informatics Working Paper*, #42.
- ID4D (2016). Identification for Development: Strategic Framework. World Bank Group. <http://pubdocs.worldbank.org>. [Accessed 05 June 2020].
- ID4D (2020). About us. World Bank Group. <https://id4d.worldbank.org/who-is-involved> [Accessed 05 June 2020]
- India Stack (2019). What is India Stack? <https://www.indiastack.org/about/> [Accessed 05 June 2020]
- Jain, S., & Gabor, D. (2020). The rise of digital financialisation: The case of India. *New political economy*, 25(5), 813-828.
- Kear, M. (2013). Governing homo subprimicus: Beyond financial citizenship, exclusion, and rights. *Antipode*, 45(4), 926-946.
- Kiennert, C., Bouzefrane, S., & Thonié, P. (2015). Authentication Systems. In Laurent, M., & Bouzefrane, S. (eds.) *Digital Identity Management* (pp. 95-135). Elsevier.
- Lai, K. P., & Samers, M. (2020). Towards an economic geography of FinTech. *Progress in Human Geography*. July 2020. Doi:10.1177/0309132520938461
- Langley, P., & Leyshon, A. (2020). The Platform Political Economy of FinTech: Reintermediation, Consolidation and Capitalisation. *New Political Economy*, 1-13. DOI: [10.1080/13563467.2020.1766432](https://doi.org/10.1080/13563467.2020.1766432)
- Leyshon, A., & Thrift, N. (1999). Lists come alive: electronic systems of knowledge and the rise of credit-scoring in retail banking. *Economy and Society*, 28(3), 434-466.

- Mader, P. (2015). *The Political Economy of Microfinance*. Palgrave Macmillan.
- Madon, S. (2009). *E-Governance for development: A focus on rural India*. Palgrave Macmillan.
- McKinsey and Company (2016). *Digital Finance for All: Powering Inclusive Growth in Emerging Economies*. McKinsey Global Institute. <https://www.mckinsey.com/>. [Accessed 12 June 2020].
- Nonnecke, B., Ruhrmann, H., & Geroski, A. S. (2019). *Responsible Digital ID: Effects of Data Governance Policies and Practices on Human Rights*. CITRIS. [https://citripolicylab.org/wp-content/uploads/2019/09/Responsible-Digital-ID\\_CITRIS-Policy-Lab\\_September-2019.pdf](https://citripolicylab.org/wp-content/uploads/2019/09/Responsible-Digital-ID_CITRIS-Policy-Lab_September-2019.pdf). [Accessed 12 June 2020].
- Pieterse, J. N. (2010). Digital capitalism and development: The unbearable lightness of ICT4D. In Kalantzis-Cope, P., & Gherab-Martín, K. *Emerging digital spaces in contemporary society: Properties of technology*. Springer. (pp. 305-323). Palgrave Macmillan.
- Privacy International (2019). *The Identity Gatekeepers and the Future of Digital Identity*. <https://privacyinternational.org/long-read/3254/identity-gatekeepers-and-future-digital-identity>. [Accessed 12 June 2020].
- Privacy International (2020). *Why the Huduma Namba ruling matters for the future of digital ID, and not just in Kenya*. <https://www.privacyinternational.org/news-analysis/3350/why-huduma-namba-ruling-matters-future-digital-id-and-not-just-kenya>. [Accessed 02 August 2020].
- PwC (2018). *Balancing Privacy and Benefits*. PwC India. [www.pwc.in/consulting/financial-services/fintech/fintech-insights/balancing-privacy-and-benefits.html](http://www.pwc.in/consulting/financial-services/fintech/fintech-insights/balancing-privacy-and-benefits.html). [Accessed 10 Jan 2021].
- Quartz (2019). *Is the Indian central bank falling for lobbyists in seeking to widen digital transactions?* Quartz India, January 9<sup>th</sup>. <https://qz.com/india/1517823/nilekanis-ispirt-shadow-on-indias-rbi-digital-payments-panel/> [Accessed 20 April 2020]
- Qureshi, S. (2020) *Why Data Matters for Development? Exploring Data Justice, Micro-Entrepreneurship, Mobile Money and Financial Inclusion*. *Information Technology for Development*, 26(2), 201-213.
- Roy, A. (2010). *Poverty capital: Microfinance and the making of development*. Routledge.
- Sharman, J. C. (2009). *The bark is the bite: International organizations and blacklisting*. *Review of International Political Economy*, 16(4), 573-596
- Shive, S. A., & Forster, M. M. (2017). *The revolving door for financial regulators*. *Review of Finance*, 21(4), 1445-1484.
- Stanley, L. (2020). *The authoritarian turn after the crash: beyond economy and security*. Sheffield Political Economy Research Institute PREPPE blog series. <http://speri.dept.shef.ac.uk/2020/01/16/the-authoritarian-turn-after-the-crash-beyond-economy-and-security/>. [Accessed 16 June 2020].

- Soederberg, S. (2014). *Debtfare states and the poverty industry: Money, discipline and the surplus population*. Routledge.
- Thompson, M. (2004). Discourse, 'development' & the 'digital divide': ICT & the World Bank. *Review of African Political Economy*, 31(99), 103-123.
- UNDP (2001). Role of UNDP in information and communication technology for development. United Nations Development Programme. <http://web.undp.org/execbrd/pdf/DP2001CRP8.PDF>. [Accessed 12 June 2020].
- United Nations (2020). United Nations Legal Identity Agenda. United Nations/ Legal Identity Agenda. <https://unstats.un.org/legal-identity-agenda/>. [Accessed 16 June 2020].
- van Zoonen, L. (2020). Data governance and citizen participation in the digital welfare state. *Data & Policy*, 2. DOI: <https://doi.org/10.1017/dap.2020.10>
- Wade, R. H. (2002). Bridging the digital divide: new route to development or new form of dependency. *Global Governance*, 8, 443–466
- Walsham, G. (2017). ICT4D research: reflections on history and future agenda. *Information Technology for Development*, 23(1), 18-41.
- Weldes, J., & Wynne-Hughes, E. (2017). Beyond binaries with feminist secureconomy. *Progress in Political Economy*, University of Sydney. <https://www.ppesydney.net/beyond-binaries-feminist-secureconomy/>.
- Westermeier, C. (2020). Money is data—the platformization of financial transactions. *Information, Communication & Society*, 23(14), 2047-2063.
- World Bank (2020). The ID4D Initiative. ID4D Identification for Development. <https://id4d.worldbank.org/about-us>. [Accessed 12 June 2020].

## Endnotes

- [1] While a close analysis is outside the scope of this article, these tendencies also reflect what scholars of feminist international relations describe as 'secureconomy' to highlight how the distinction between security studies and political economy is artificial (see Weldes and Wynn-Hughes, 2017).
- [2] Other instances include poverty reduction strategies for farmers, such as those that facilitate the sharing of information on commodity prices, weather predictions, and also agronomic practices and farming methods (e.g Fabregas et al. 2019; Asenso-Okyere and Mekonnen, 2012; Jensen, 2007). Further examples are available in a comprehensive review of ICTs and poverty reduction by Adeya (2002).
- [3] For instance, fintech and digital finance are regularly invoked by private equity and venture capitalists as tools for international development (see Gabor and Brooks, 2017).
- [4] The acronyms ICT4D and ID4D are remarkably similar and potentially confusing but their agendas are distinct. ICT4D is backed — but not led — by the United

Nations Development Programme and was ‘born in a flurry of publications, bodies, events, programmes and project funding’ during the 1990s (see Heeks, 2009); ID4D was launched in 2014 by the World Bank and supported by the Bill & Melinda Gates Foundation, the Australian Government, Omidyar Network, the UK Government, other development partners and the private sector (see World Bank, 2020).

[5] Please see next section for details on platform capitalism.

[6] For example, digital finance as a pro-poor growth strategy is a central theme for the Bill and Melinda Gates Foundation: <https://www.gatesfoundation.org/what-we-do/global-growth-and-opportunity/financial-services-for-the-poor>

[7] These recommendations were updated for 2019.

[8] Missing collateral was the original problem of lending to the poor: the unbanked are often so because they lack collateral and credit data allows them to participate in financial systems. According to several studies, the novelty of fintech is that it evades the need for collateral (see Vasudevan, 2020; Greenacre, 2020; CGAP, 2014).

[9] Examples of in kind programmes include subsidised grain and free school meals (Khera, 2019).