ANNOUNCEMENT

Searching for panelists for a panel on the political economy of commodity money (March 11-14, 2021)

Jane Knodell (University of Vermont) and Manuel A. Bautista Gonzalez (Columbia University) are searching for panelists interested in putting together a session proposal on the political economy of commodity money for the 2021 virtual annual meeting of the Business History Conference (March 11-14, 2021). We are particularly interested in exploring the monetary and financial uses of precious metals, their markets, and the actors involved in their intermediation. Our paper abstracts are below. If you are interested in joining our proposal, please contact Manuel A. Bautista Gonzalez at mab2306@columbia.edu. The deadline for panel submissions is November 14, 2020.

Managing Silver Money on the Periphery of the English Empire: Massachusetts Bay, 1640-1720

Jane Knodell, The University of Vermont

Massachusetts Bay Colony is well known as the first colonial government in British North America to issue paper bills of credit in 1690. The literature’s emphasis on Massachusetts as an early issuer of “paper money” has obscured the colonial government’s history and experience as a manager of silver money. Even after their mint no longer operated, even when they were issuing bills of credit, the Massachusetts Assembly, in partnership with leading merchants, consistently pursued
policies designed to keep silver coin in use as currency. Rapidly rising silver prices in New England made it impossible to keep silver coin in circulation, at which point silver coin was used as an inflation hedge and precious metal input at the silversmith.

**Foreign Consignees of Specie Imports in Antebellum New Orleans, 1839-1862**

Manuel A. Bautista González, Columbia University in the City of New York

New Orleans was a central location for the specie market in the early American republic, attracting specie flows primarily from ports in the Gulf of Mexico. A dataset assembled from the *New Orleans Price-Current* identifies consignees for $68.72 million in specie imports (64.7% of the total) from 1839 to 1862. Out of 36 top-tier specie consignees who imported $48.4 million (45.6% of the total), I found that the fifteen foreign importers in my sample received 23.3% of specie imports, a share that exceeds the combined amounts of thirteen American importers (12.4%) and eight banking and financial entities (9.93%). This paper examines some of the factors explaining foreign consignees’ dominance of the New Orleans specie market. Foreign specie importers operated in the interstices of state-nations, did not leave behind cohesive archives, and have gone mostly unnoticed in the business and financial histories of the antebellum South and the mid-nineteenth century Atlantic economy. Spanish, German, Irish, British and French consignees integrated into stable networks of family, kinship, nationality, ethnicity, and business occupations. They combined entrepreneurial activities as commission merchants, commodity factors and dealers, financiers, and real estate investors, pursuing sophisticated profit-making and investment diversification strategies. Most were involved in international trade and financial intermediation, leveraging
New Orleans’ strategic location to import manufactured goods from Europe and the US North and export cotton, sugar, and other commodities from the US South, Mexico, and Cuba.

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**Taming Capitalism before its Triumph: Author meets critics online – Nov 17**


**About this Event**

The history of capitalism has seen a renaissance over the last decade, but relatively fewer works have focused on its early phases, including the early modern period in which England began evolving into the ‘first industrial nation’.


This online symposium brings together renowned scholars from across medieval history, early modern history, historical sociology and political science to discuss the book.

**Venue and registration:**
Zoom (online) please register at
https://www.eventbrite.co.uk/e/taming-capitalism-before--its-triumph-author-meets-critics-online-tickets-126016218903
Provisional Programme

Opening Remarks

Wenkai He | HKUST Hong Kong

Cultural History as the Antidote to Whiggish Histories of Capitalism

Martha Howell | Medieval European history, Columbia University

Projects, Intoxicants, and Early-modern Capitalism

Phil Withington | Social and cultural history, University of Sheffield

Projectors, Petitioners, and One-Dimensional Theories of Power

David Zaret | Early modern British history and historical sociology, Indiana University, Bloomington

“Whiggish History”, Projectors and Corporate Capitalism

Steve Pincus | British history and British empire, University of Chicago

Capitalism: The Means or the End to Common Good

Wenkai He | Comparative history and political science, HKUST Hong Kong

‘Reply by the Author’

Koji Yamamoto | Early modern Britain and business history, University of Tokyo

Prompt for Discussion


The recently enacted CARES Act has exposed glaring problems in the U.S. system of money and payments. Delayed stimulus payments are costly for struggling families and for the economy as a whole. Unfortunately, the United States has one of the slowest payment systems in the developed world. On top of that, millions of Americans don’t have bank accounts. They must receive their stimulus dollars as physical checks, which are slow to arrive and often costly to convert into cash.

Growing awareness of these systemic defects has stimulated renewed interest in public sector solutions. When Democrats in the U.S. House of Representatives released their proposed stimulus legislation in March, they included a provision
giving people the option to receive their stimulus as “Digital Dollars” through a new system of “FedAccounts” maintained at the Federal Reserve. While this provision didn’t make it into the ultimate legislation, Senator Sherrod Brown, ranking member on the Senate Banking Committee, later introduced separate legislation “to allow everyone to set up a digital dollar wallet, called a FedAccount.” Maxine Waters, chair of the House Financial Services Committee, did the same. And Representatives Rashida Tlaib and Pramila Jayapal included similar language in recently proposed legislation.

These proposals intersect with and complement proposals to implement postal banking as a way of serving un- and underbanked households. As these debates unfold in the United States, other central banks, including the Bank of China, are preparing to release their own central bank digital currencies (CBDCs) in the coming months.

In this roundtable, we invite participants to comment on these public-sector initiatives and what they mean for the future of money. Should the Federal Reserve issue a digital dollar, available to the general public? What problem would it solve or mitigate, and what new problems and risks would it create? Should central bank digital currencies take the form of “accounts” or should they try to emulate digital “tokens”? Can and should a FedAccount program be linked to or even merged with a postal banking initiative? Does maintaining the U.S. dollar’s status as the dominant global currency hinge on launching a digital dollar?

Contributions
October 16, 2020
Central Bank Digital Currency: the hidden agenda
Leonidas Zelmanovitz, Liberty Fund
Bruno Meyerhof Salama, UC Berkeley Law School

October 7, 2020
On Equity within Public-Sector Banking Initiatives
Abbye Atkinson, Berkeley Law

September 28, 2020
The Inclusive Value Ledger: A Public Platform for Digital Dollars, Digital Payments, and Digital Public Banking
Robert Hockett, Cornell Law School

September 1, 2020
Designing Financial Services for People with Low and Uncertain Income
James McAndrews, TNB USA Inc., and the Wharton Financial Institutions Center

August 27, 2020
What to Do While Waiting for Fed Accounts
Sarah Bloom Raskin, Duke University

August 18, 2020
How to Fix the Covid Stimulus Payment Problem: Accounts, Information, and Infrastructure
Aaron Klein, Brookings Institution

August 10, 2020
FedAccounts: Digital Dollars
Morgan Ricks, Vanderbilt University
John Crawford, University of California Hastings College of the Law
Lev Menand, Columbia Law School
Nov 9 | “Capitalism on Edge: on Radical Change without Crisis, Revolution, or Utopia” (book talk)

OXFORD TALKS online: 9 November

“Radical change without crisis, revolution, or utopia” (book talk): European Studies Centre, St Antony’s College, Oxford. Albena Azmanova will discuss her new book Capitalism on Edge with Kalypso Nicolaidis, Karthik Ramanna, and Will Hutton.

Full information and registration can be found here: https://www.sant.ox.ac.uk/events/capitalism-edge--radical-change-without-crisis-revolution-or-utopia

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Nov 9 | Online | Aaron Jakes – Egypt’s Occupation | Book Launch & Roundtable

Book Launch & Roundtable

Egypt’s Occupation: Colonial Economism and the Crises of Capitalism by Aaron Jakes
Join us for a roundtable with Professor Aaron Jakes and Professors Benoit Challand, Nancy Fraser, Julia Ott, Emma Park and Ann Stoler.

The history of capitalism in Egypt has long been synonymous with cotton cultivation and dependent development. From this perspective, the British occupation of 1882 merely sealed the country’s fate as a vast plantation for European textile mills. All but obscured in such accounts, however, is Egypt’s emergence as a colonial laboratory for financial investment and experimentation. Egypt’s Occupation tells for the first time the story of that financial expansion and the devastating crises that followed. Aaron Jakes offers a sweeping reinterpretation of both the historical geography of capitalism in Egypt and the role of political-economic thought in the struggles that raged over the occupation.

Sponsored by Historical Studies Department at The New School for Social Research, the Robert L. Heilbroner Center for Capitalism Studies, and the new graduate minor in Critical Perspectives on Democratic Anti-Colonialism.
Happening Tomorrow — Third Conference on Law and Macroeconomics

The Third Conference on Law and Macroeconomics is taking place tomorrow!

You can find the entire program for the event here.

Registration required. To register, click here: https://lawandmacro.org/register

The CMS Colloquium Series Livestreamed, Thursday @ 5pm — “New Money: How Payment Became Social Media”, Lana Swartz

The CMS Colloquium Series Livestreamed, Thursday @ 5pm EST

“New Money: How Payment Became Social Media”

Thursday at 5pm EST, Lana Swartz, ’09, is joined by Aswin Punathambekar, ’03, to discuss Swartz’s new book, framing money as a media technology, one in major transition.
New Money: How Payment Became Social Media
Featuring Lana Swartz, CMS ’09, and Aswin Punathambekar, CMS ’03, both professors at the University of Virginia’s Department of Media Studies

This Thursday, October 29, 5pm EST
Streamed live at: https://mit.zoom.us/j/94087151099. Recording posted Friday.

Lana Swartz, ’09, is joined by Aswin Punathambekar, ’03, to discuss Swartz’s new book New Money: How Payment Became Social Media (Yale University Press). New Money frames money as a media technology, one in major transition, and interrogates the consequences of those changes.

Lana Swartz is an Assistant Professor in Department of Media Studies at the University of Virginia and a 2009 graduate of MIT’s Comparative Media Studies master’s program. Prior to New Money, she published Paid: Tales of Dongles, Checks, and Other Money Stuff (MIT Press). Aswin Punathambekar is Swartz’s colleague at UVa’s Department of Media Studies, where he is an Associate Professor. He graduated from the Comparative Media Studies program in 2003 and is co-author of the upcoming (provisionally-titled) The Digital Popular: Media, Culture, and Politics in Networked India.

Full Talk Info Here
To the extent that “banking [is] the business model of money creation,”[1] it is difficult to conceive of it in truly humanistic terms, i.e. as an institution that could meaningfully prioritize equality and fairness.[2] Indeed, banking, as we know it today, remains steeped in the same capitalism that once fully sanctioned the racialization, commodification, and fungibility of human beings,[3] and that currently finds economic justification in the turning out of people from their homes on the basis of their ability to pay a sum of money.[4] Consequently, it is a profoundly difficult problem to decide how best to incorporate the most socio-economically vulnerable people into a system that itself continuously deems them as consumable and disposable.[5]

The various public-sector initiatives that form the basis of this roundtable represent short-term approaches to this problem insofar as they aim to address an immediate issue: facilitating better and more efficient access to financial services for marginalized people, be it through FedAccounts, postal banking, digital currencies, or otherwise. The value of this approach is, perhaps, most obvious against the backdrop of the current pandemic. In the context of the CARES Act’s Covid-19 relief, access to money promised by the legislation has been vital to those whose economic lives have been disrupted by the crisis. Yet, the proposed longer-term
widening of the banking system engendered by the various public-sector proposals goes beyond the exigencies of the immediate moment. These proposals invite marginalized groups to participate in a broader economic system that remains embedded in the social pathologies of capitalism, including racialized dehumanization, infinite fungibility, and the erosion of communitarian bonds.[6]

For example, one immediate problem that comes to mind is that all bank accounts are not the same. Certainly, this is obvious in a technical sense if one considers characteristics like fees charged or minimum daily balances required, etc. But more than in relation to these surface differences, bank accounts are different in a social sense, insofar as they bear varied social values that impart status (for better and for worse) on their users.[7] In a social sense, then, what would it mean to relegate an already-marginalized community to public interventions like a FedAccount or a postal account? What would be extracted from the un- and underbanked in exchange for some form of state-sanctioned banking? For example, in the context of state-subsidized prenatal care, Professor Khiara Bridges has observed the loss of privacy for “marginalized, indigent women who must turn to the state for assistance.”[8] She further argues that this “invasion of poor, pregnant women’s privacy facilitates the enduring surveillance and regulation of poor families by the state.”[9] Would a public-sector initiative expose the marginalized to similar consequences? Could it begin to address the more deeply-rooted origins of marginalization that persist regardless of banking status?[10]

In my view, these are among the difficult yet crucial inquiries that must accompany the discussion of any public-sector initiative in money and banking. Nevertheless, in the short-term, we should consider meaningfully the various options on the table and more.[11] But, in so doing, policymakers should keep in sight the ways in which the
current banking system, even with any newly-democratized publicly-sourced access to financial services and currency, functions within and together with the broader system of oppression and exclusion.

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[2] See Matthew 6:24 (“No one can serve two masters. Either you will hate the one and love the other, or you will be devoted to the one and despise the other. You cannot serve both God and money.”)

[3] See Edward Baptist, The Half Has Never Been Told: Slavery and the Making of American Capitalism 245 (2014) (observing that “[e]nslavers benefited from bank-induced stability and steady credit expansion” and that by the 1830s “owned…2 million [en]slave[d] worth over $1 billion”); E. Franklin Frazier, Black Bourgeoisie 131-132 (1957) (describing enslaved African-Americans as “as much an article of commerce as the sugar and molasses which he produced” and as “an article of commerce or an inanimate tool”) (internal citations omitted).


[6] See, e.g., Miranda Joseph, Debt to Society: Accounting for Life Under Capitalism 5-9 (2014) (building on anthropologist David Graeber’s account that “state-driven commercial economies destroy human economies” and positing that the credit/debt relationship, among other market-based exchanges, plays an important role in both “abstract[ing] and particular[izing]” social relationships in ways that are harmful);


[9] *Id.* at 132.

[10] See, e.g., Faith Karimi, *A 911 Call, a Racial Slur, a Refusal To Cash A Check. This Is What It’s Like For Some Black Bank Customers*, Phil. Trib., Jul. 2 2020 (describing the “common” indignities attendant to “[b]anking while black”)

[11] E.g., Prasad Krishnamurthy, *The Indian Path to Universal Bank Access in America*, The Startup, Jun. 29, 2020 (suggesting “Liberty accounts,” based on an Indian innovation called “Jan Dhan Yojana (Scheme for People’s Wealth)” in which “all federally-insured banks would be required to offer … a free, no-minimum-balance account with no overdrafts and no fee for bouncing a check…[and] a debit card and unlimited free withdrawals on a large, locally-defined ATM network).
Krisnamurthy argues that “[t]hese features [would] eliminate most of the direct cost concerns that keep unbanked consumers away from banks.” Id.

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**L. Zelmanovitz and B. Meyerhof Salama, Central Bank Digital Currency: the Hidden Agenda**

October 16, 2020

**Leonidas Zelmanovitz** is a Senior Fellow with Liberty Fund

**Bruno Meyerhof Salama** is a Lecturer at UC Berkeley Law School, Legal Studies Program, and a Global Senior Fellow at FGV Law School in São Paulo

Calls for the Federal Reserve (Fed) to consider a Central Bank Digital Currency (CBDC) gained steam after the release last year of a white paper by Facebook and associates proposing to create a stablecoin called Libra. The Fed has obliged, having now partnered with MIT to research technological and policy implications of a CBDC. But, create a CBDC with what purpose?

The creation of a CBDC by the Fed is most often portrayed as an *ad hoc* reaction to a proposal for a privately
issued digital currency. Some also view it as a response to other central banks which are considering pursuing the same path. While the ideas of improving monetary policy and enhancing financial stability and competition are widespread as well, the focus has been on the Fed’s need to catch up with the technological frontier and the challenges posed by geopolitical contenders.

There is, however, a subtler but more relevant interpretation: the effort to develop a CBDC represents one more step in the direction of enlarging the role of “sovereign money.”

The hidden agenda

The proposals for creating digital currencies by central banks have taken the form either of “electronic tokens” or “accounts.” Electronic tokens are designed to mimic paper money. They are similar to electronic pre-paid debit cards or gift cards. For example, the Bank of Lithuania has just released commemorative digital tokens, the “world’s first digital collector coins.”

Account-based CBDCs are basically universal central bank accounts. They are designed to give retail customers access to online bank accounts directly with the Fed. Like electronic tokens – but unlike bank deposits or e-money stored in prepaid cards – these accounts are liabilities of the central bank. They are reserve balances held at the central bank, except that they are available to everyone, and not only to designated financial institutions.

Whether as a token or a bank account, a CBDC will be a form of money created by the US Federal Government through its monetary authority. It will be as much as “sovereign money” as you can get.

It follows that proposals to create CBDCs should be accounted for in practice for what they are in theory: an attempt to crowd out privately created money – and, therefore, an
invitation for a greater degree of government-directed credit, money creation, and financial repression than what we already have today.

Money as a joint creature of government and markets

At least for the last three hundred years, in Western societies money has been supplied partly by the state and partly by the market. The state-supplied money first took the form of coins and later of paper money with legal tender. The other part of the money supply has been provided by commercial banks: first, in the form of banknotes redeemable in government-issued coins, and later in the form of bank credit payable in government-issued paper money, which is why these assets are referred to as money "substitutes."

The supply of money by the government first depended on the availability of precious metals. The sovereign was forced to use real resources to invest in the mining of silver and gold or to purchase bullion from which it could mint coins. Except for the old trick of debasing the coinage and reducing its purchasing power, supplying money was costly.

The quantity of coins with the previously expected purchasing power that a sovereign could mint was therefore dependent on the allocation of real wealth. It was only much later that sovereign money was made possible solely on the will of the government (fiat money). The point, however, is that, in any of these cases the amount of the money supplied by the government is determined "outside" the market. In this sense, "sovereign money" is also "external" money.

At the same time, banks give credit. In doing that, they create banknotes or credit bank account balances for their borrowers – but only when borrowers come with investment propositions that are likely to allow for a profit. Because the amount of money substitutes
created by banks depends on the existence of profitable opportunities for lending in the market, that part of the money supply is called “inside money.” The beauty of this system is the supply of money adjusts “naturally” to the ever-changing demand for money.

Thus, came about what is now known as “modern finances” – that is, fractional reserve banking. This system came about in 1694 with the creation of the Bank of England. Instead of using real metal as a medium of exchange, people started to use the Bank’s promise to pay gold and silver as the instrument for their private exchanges. This promise was represented on the Bank of England’s balance sheet and took the form of banknotes.

The fragility of private money

Over time, the English commercial banks started to create more money substitutes than the counterpart of the amount of money originally borrowed by the UK Crown or the amount of reserves they kept in their vaults. The banks started to finance credit to commerce and, later, farming and industry. These arrangements with “fractional” reserves usually worked well when prudently managed under the rules of their creation. However, in situations of emergency, usually as a result of armed conflicts, said arrangements would end up being shattered: then came inflationary war finance.

The lesson is as follows: where banks are organized under a constitution that allows the sovereign to exercise its monetary prerogatives, banks are forced to lend to the government in emergency cases.

Military crises and other emergency situations therefore reveal the “inherent” fragility of the arrangements under which banks issue more promises to
pay in “base/external” money than the amount of base money in existence. Inflationary war finance, in particular, lays bare the fragility that is inbuilt in fractional reserve banking.

A focus on this fragility should not obfuscate an under-appreciated benefit of this system: it is geared towards directing funding to the most promising investment opportunities. This improves overall economic efficiency: in improving the allocation of funds, as is plain to see; and also (and less obvious but equally important), in giving confidence for depositors and creditors to entrust their savings to the bank.

This trust-based system can be broken in three situations: when the sovereign thinks that it is politically expedient to force the banks to lend money to the state (as in times of war); when banks are perceived to have created more money substitutes than the amount of money people want to hold (leading to bank runs); or when bank lending is politically driven and systematically forgoes the most profitable opportunities. The ensuing evils include bank failures, inflation, capital misallocation, and so forth.

It is because Western societies have been plagued by these three evils for centuries that some politicians, central bankers and academics have considered reducing or abolishing inside money. The reasoning is that the benefits from the circulation of money substitutes are counterbalanced by the costs of financial stabilization; and those costs are borne by taxpayers.

While typically falling short of openly proposing the abolition of inside money, the fact is a good number of CBDC proponents see those costs as excessively high. A progressive reduction in the role of inside money is then advocated. Increasing levels of financial repression are nothing but the logical consequence.
The expected turn to financial repression

Despite private money’s fragility, governments promote its creation. For instance, governments worldwide offer “deposit insurance” and “lender of last resort” facilities to entice people to surrender money in exchange for deposits, propping up private bank deposits by covering it with a public “umbrella.” An older example was the authorization granted to banks to suspend the redemption of banknotes in coins. Typically, the other side of the bargain is that banks finance the government directly or offer subsidized loans to protected segments.

CBDCs offer a more radical solution to the problem of fractional “fragility”: curbing the capacity of banks to create money or further regulating its quantity, depending on the particularities of each CBDC scheme. It is a kind of “devolution” to the government of (inside) money creation powers that, starting in the late 17th century England, were assigned to the private sector. But to return power to the government for what purpose? This is the biggest irony of all: the idea is to create CBDCs to allow the government to continue doing the exact same thing it does today – that is, to gain access to real goods without imposing greater taxation in the present.

What then? Then allocation of credit could be directed to those projects that the political process deems more worthy of receiving the funds even further than what is done today. The name of that is financial repression. CBDC is a tech-based variant of previous attacks on inside money, such as the “Chicago Plan” in the 1930s or recent proposals for “narrow banking.” It is one more stance in which it is advocated that the liquid funds of the community should be politically allocated.

Under current arrangements, government issuance of paper money comprises only a fraction of the total stock of money, and the
credit creation by the private banks serves to allocate resources to productive endeavors. By creating a CBDC through a mechanism like a “Fed account,” under which all bank deposits are in real time transferred to the Fed, the government would force private banks to allocate resources to a single asset – bank reserves with the Fed – that is, public debt. That is funding for ends decided politically, not by the market.

The mechanics

Let us see how any of that can be accomplished. For the sake of simplicity, let us use the Chicago Plan model to illustrate the mechanics of Fed Accounts. Suppose the Fed creates a ledger for all bank accounts in the country directly in its balance sheets. It then announces that depositors can choose between opening new accounts directly with the Fed or keeping their deposit accounts with their current commercial banks – but, in the latter case, under the caveat that each commercial bank must transfer one hundred percent of its deposits in real time to corresponding accounts held with the Fed by their customers.

Under such arrangements, the banks will, in practice, be put in a regime of 100% reserve requirement and will not have money to lend to private borrowers from the floating of their deposits. In turn, the Fed will have as base money (bank reserves with the Fed) the entire liquidity of the country, except for the other component of base money, paper currency – assuming, of course, that paper currency will continue to exist, something that some proposals for CBDC do not permit.

Thus, all the demand for “cash” (paper money and bank deposits) becomes “Fed-accounts”. The money supply becomes a Fed liability, all of it. The counterpart of those liabilities on the asset side of the Fed’s balance sheet is Treasury notes. And if the banks wish to lend money, they first need to
borrow from the Fed or borrow in the capital markets like any other business. Then, of course, banks will cease from being commercial banks and will no longer be able to create inside money through credit creation.

In fact, we talk about a “hidden” agenda precisely because we speculate that the entire exercise with the creation of a CBDC can end in the demise of modern finances premised on inside and outside money creation.

**Politics in the origin**

Imagine the Fed opens lines of credit, say, only to green energy projects, or for businesses with owners coming from minorities (or, more likely, majorities), or any other politically connected group. The system of market-driven allocation of capital is undone and with that the efficiency of wealth creation in society is reduced. Politicians signal virtue, while capital formation suffers. Yet, there is a lag until disposable income and consumption actually drops. In a generation or two we are all much poorer – but who is to blame?

Additionally, we must entertain the possibility of even more aggressive forms of CBDC. Foes of private money may dream of direct retail accounts with the Fed or a “postal bank” associated with the Fed, and lending done directly by the Federal government and some of its agencies. In this more radical scenario, the entire financial sector is nationalized, in one way or other. If the government decides that all the savings of the country should be funneled to finance public projects and none to finance private business, the deleveraging of private businesses ensues. Only well-capitalized firms survive – as is the case in underdeveloped countries with shallow financial systems and bloated public sectors.

Of course, not all proposals of CBDC are that extreme. Some of
the proposals for digital token dollars, for instance, will only marginally (although no one can know for sure by how much) reduce private-banking intermediation by inducing a greater portion of the liquid holdings currently kept in cash, to be kept in digital form.

Motives matter, and the agenda of many of the CBDC proposals is therefore a dangerous one. The operational independence of central banks and the formal separation between monetary and fiscal policy has served Western societies well by insulating central banks and the monetary policy from political pressures. This is not to deny that this separation works best during peace than during war. The point, however, is that now there is a strong movement to undo this framework in times of peace (enthusiasm for CBDC predates the Covid19-triggered crisis).

Symptomatically, central bankers such as the President of the European Central Bank Christine Lagarde and Governor Andrew Bailey, of the Bank of England, have expressed enthusiasm for using the operations of their banks to fight climate change. It is easy to understand their motivations. They will get kudos from the media and from politicians not willing to undergo the regular budgetary process. The costly subsidies and mandates they want to impose could then benefit their favorite sectors and constituents. If politically-driven credit allocation already takes place under current arrangements, imagine what will happen if the central banks gained a new mandate – one to do precisely that?

And there is still one additional aspect to consider. How far down that road have we already traveled? Consider Money Market Mutual Funds (MMMFs). In a way, the financial institutions managing those funds are already off-balance sheet intermediaries between investors willing to hold “cash equivalent” instruments and the Federal government, the main supplier of assets to those funds (that is, the main borrower of those resources, in the form of Treasury notes).
This is already a way for the financial institutions to intermediate credit without leveraging their own balance sheets, without the creation of instruments commonly recognized as “money substitutes.” Now, of course, if one considers that the units of the MMMFs are themselves “money substitutes,” then the banks are already doing “narrow banking” with a substantial portion of the total liquidity of the economy.

The importance of being earnest

Professor Morgan Ricks in his testimony to Congress on the subject stated that “[u]nder the FedAccount proposal, Congress would direct the Federal Reserve to give the general public—individuals, businesses, and institutions—the option to hold accounts at the central bank.” Unlike other scholars, he is clear about the goal of increasing the weight of public money in the monetary base. His honesty should serve as a model for the kind of open discussion that should be taking place.

We are of the opinion that private financial intermediaries, whether commercial banks or not, still perform an essential role in monetary and financial systems. They extend credit to trustworthy private borrowers (even if, sometimes, only to issuers of short-term commercial papers that will be bundled together and purchased by MMMFs and other short-term fixed income mutual funds).

The moment that a CBDC is introduced, even under the least aggressive proposals, the space for standard intermediation will be drastically reduced. That seems to us to be at the heart of the agenda for introducing a CBDC if it comes to pass.

The banking system we have today, with all its problems, at least has been performing its role of creating inside money relatively well. With that, it continues to help the
money supply to smoothly match an ever-changing demand for money. If that is true, it is incumbent on the proponents of CBDC arrangements to explain why the implications of their proposals are not the ones we are pointing out here. Or, if they are, then an open conversation about financial repression should start immediately.

R. Hockett, The Inclusive Value Ledger: A Public Platform for Digital Dollars, Digital Payments, and Digital Public Banking

September 28, 2020

Robert Hockett, Cornell Law School

1. Introduction: Two Takes on ‘Public Money,’ One Institutional Upshot

One fruitful way of thinking about money is simply as ‘that which pays’ in a payments system or ‘that which counts’ in a system of transaction-associated value accounting. A ‘public’ money might then be plausibly characterized as ‘that which pays’ and ‘that which counts,’ respectively, in a publicly
provided payments and associated accounting system. That would be a system that even ‘private-sector’ parties have come jointly to recognize as an ineluctably ‘public good,’ and hence undertaken jointly to provide to themselves and indeed all who are constituents of their ‘public’ or welcome guests of their republic.

Another, complementary way to think about money is as a liability issued by some entity whose obligations ‘pay’ and ‘count,’ in the senses just described, in a payments and associated accounting system maintained by that entity. A ‘public’ money, then, will be describable as a species of liability issued by some public entity – for example, a public fiscal or monetary authority, or ‘public bank’ – that administers a payment and associated accounting system.

If we now draw together the observations just made in the previous two paragraphs, something quite interesting emerges where the relations among (a) public money, (b) a publicly administered payments system, and (c) a full public balance sheet are concerned. It is that (a) the public money is that which shifts between and among even private sector balance sheets, while (b) those private-sector balance sheets in turn jointly constitute part of the full public payment ledger, which (c) is itself in turn simply one piece of the liability side of the full public balance sheet.

In other words, even as deployed in private-sector transactions, money to be thoroughly understood and characterized will have to be understood and characterized in relation to its role on a public ledger, which itself will be understood in relation to its role on a full public balance sheet.

Now as it happens, many interesting implications emerge from these observations if one elaborates a full account – indeed, an accounting – of the full ‘public balance sheet’. Hence, I’ll be saying more on this bigger subject in due course. But
a fair bit that’s useful can be said even now about just that portion which I am calling the public ledger. For our nation is faced with a ‘moment’ right now in which digitally upgrading the national payments infrastructure, which just is that ledger, is not only technically feasible, as it has been for some time now, but also is urgently needed and politically viable at long last as well. And since many state and now federal legislators are considering a proposal I’ve pushed for some time, while the current pandemic gives reason to hasten adoption and implementation, this public money and payment platform proposal seems worth elaborating here, in this timely forum on public money, in its own right.

I’ll proceed, then, as follows. First, I provide a bit more on the present moment to which I have just referred. Second, I elaborate on the public payments architecture to which I’ve alluded – what I am calling ‘the Inclusive Value Ledger.’ I’ll then describe distinct state, local, and federal renditions of this ledger – including both Treasury and Fed flavors of the same. After that, I’ll conclude and look forward – both to next steps on the ground and to the bigger reform that I’ve referenced.

2. The Special Relevance of the Present Moment

Even last year, well before the present pandemic, Facebook’s announced Libra project had pushed central banks to accelerate already-ongoing efforts to develop new central bank digital currencies (CBDCs). Sweden and China, for example, were nearing test-launches of their own proto-CBDCs even before June of 2019, when Facebook announced its proposal. Other nations weren’t far behind, thanks to CBDCs’ promise of both more efficient transacting and ready means of publicly banking their unbanked and under-banked citizens, households, and small businesses.
The sharp drop in economic activity brought on by Covid in early March of this year rendered CBCD development all the more urgent. The productive and social distancing measures necessitated by the pandemic were and remain antithetical to productive activity in sectors outside of the so-called ‘knowledge economy.’ That imperiled, and still imperils, the incomes of those who can’t labor remotely as well. State, local, and national economies everywhere accordingly confronted and still confront both supply- and demand-side shocks simultaneously.

All of this has necessitated the rapid development of demand and supply side relief measures. The production of both medical and so-called ‘personal protective equipment’ (‘PPE’) has had to be sped-up quickly. Means of shoring-up individual, family, and business budgets as well, be it through UBI payments, government lending, or both, has had to be (and must still be) further optimized. Relatedly, means of storing and transferring value – of making and receiving payments – has had to be, and again still must be, sped up as well.

Publicly issued digital currencies and their payment platforms are well adapted both to the speeding-up task just noted and to more longstanding system-improvement imperatives, including those posed by the ongoing scandals of commercial and financial exclusion, unauthorized financial data extraction and exploitation, slow and uncertain settlement of transactions, and leaky monetary policy that plague American monetary arrangements. But if a currency is, as suggested above, just ‘that which pays’ in a payments system, then to design a universally inclusive digital currency will in the first instance be to design a universally inclusive digital payments platform. And, thanks to the role played by ‘digital wallets’ in constituting modern digital payments platforms, it will also effectively be to supply a banking and financial architecture by supplying a commercial architecture.

Fortunately a growing number of US cities and states, as well
as members of Congress, seem now to ‘get’ all of this, and hence to be waking to the need of providing, as quickly as possible, both a publicly issued digital dollar and an associated publicly administered digital payments platform. Over the past several years, and especially over the past several months, public officials nationwide have begun considering this author’s aforementioned Inclusive Value Ledger (IVL) Plan, which has colloquially come to be known as the ‘Public Venmo’ plan ever since two visionary New York state legislators – Assemblyman Ron Kim and State Senator Julia Salazar – proposed this author’s draft bill last autumn. And because the IVL can be instituted by municipal, state, or national authorities, and at the national level can be administered by either the Fed or the Treasury, some version of it now would seem poised to begin operating soon.

In light of the Covid-related and longer-standing needs noted above, states and their subdivisions will do well to move forward with the IVL plan notwithstanding how quickly or otherwise Congress moves on the matter. For the same reasons, Congress itself, once it decides to act, will do well to begin with the Treasury version of IVL, then gradually migrate the system over to the Fed and our full monetary-policy apparatus with careful deliberation and planning. I’ll elaborate further upon these reasons while schematizing the IVL Plan first in its basic structure, then in its local and state, and finally in its Treasury and Fed renditions.

3. The IVL Architecture

It will be helpful to begin by first sketching the basic structure that all IVL systems share. We can think of this as the plan’s ‘chassis,’ onto which any number of distinct automotive ‘bodies’ selected by any government, at any ‘level’ of government, can be installed.
3.1. Basic Architecture

The IVL’s architecture and implementation are strikingly simple, requiring only two functionally distinct components. First, every citizen, legal resident, and business-owner or -operator is given a digital wallet accessible by smartphone or other ‘smart’ device. Second, each such wallet is afforded (a) ‘vertical’ connectivity to a public sector ‘master account,’ and (b) ‘horizontal’ (peer-to-peer, or ‘P2P’) connectivity to all other wallets. Wallet holders are thereby enabled to pay taxes, licensing fees, and other remittances, as well as to receive tax refunds, program moneys, and other disbursements, along the IVL’s vertical dimension. They are able to make real-time payments, meanwhile, to one another along the IVL’s horizontal dimension. Diagrammatically,
Non-arrowed line-segments here represent institutional linkages, while arrowed line-segments represent payment instructions and associated value flows. A payment occurs when a Payor instructs the public sector Master Account Administrator, via a chip card, strip card, or smart device app (Payment Step 1), to debit her own wallet account in the Master Account and correspondingly credit the Payee’s wallet account in the Master Account (Payment Step 2). Along the vertical dimension of IVL, counterparties in any transaction comprise one public and one private-sector party. Along the ‘horizontal’ dimension, wallet transactions occur among private-sector parties.
3.2. Virtues of the IVL Architecture

The reasons to put an IVL in place are many. The short-term reason is that the IVL enables us to meet urgent pandemic-associated needs to get stimulus money to hard-hit American businesses and individuals in non-paper form as quickly as possible. The longer-term reasons are more varied.

3.2.1. Commercial & Financial Inclusion

First, in any commercial society or exchange economy like our own, a payment system must be considered an essential public utility – a functionality that justice requires we make freely available to all who legitimately take part in our collective commercial life. We don’t pay to use sidewalks, nor do we or small businesses pay to use nickels or dollar bills. Neither, then, should we have to pay to use digital payment media as these now increasingly replace paper currencies and metal coins. Call this the justice, inclusion, or public utility rationale for IVL.

3.2.2. Growth & Efficiency

Second, we measure the size and growth of our economy by reference to transaction volume. It follows that a more seamless and efficient payments system, by enabling more rapid transacting and hence larger transaction volumes within any time interval – what economists call greater ‘money velocity’ – means greater growth and a larger economy over time, all else being equal. So, of course, does greater inclusion itself. Call this the growth or efficiency reason for IVL.

3.2.3. Leak-Proof Monetary Policy

Third, an IVL system, if administered by a nation’s fiscal or monetary authority – in the US, that’s either Treasury or the Fed – will enable much faster fiscal stimulus or monetary policy transmission than does our present system of private-
sector banking institutions, which we can only hope will transmit federal stimulus money to consumers in the form of cheap credit. Instead we will be able to drop digital 'helicopter money' directly into our digital wallets.

In more ordinary times, the administering agency even can offer interest on savings in wallets, enabling us to move such rates up or down when we must slow down or speed up spending activity, diminishing or augmenting transaction volumes. We will even be able to micro-target specific sectors of our economies where spending appears to be either overheating or dangerously cooling.

3.2.4. Data Privacy

Finally, going digital offers financial data privacy benefits too. Unlike private sector banks and many online payment service firms, public-sector administrators of the IVL do not do what they do for profit – there are no non-criminal ‘carrots’ to entice ‘data harvest’ and sale. Such administrators also are subject to 4th Amendment constraints as state actors, unlike, say, Wells Fargo or Facebook – there is a ‘stick.’

* * *

The case for an IVL platform, then, is strong. But where best to administer the IVL as among cities, states, or our Fed or Treasury?

4. State and Municipal IVL Plans

As noted above, states or their subdivisions inclined to act quickly in capitalizing on IVL technology need not await federal action. And indeed they should not. For our states and our cities have become our nation’s ‘first responders’ in addressing the national Covid pandemic – and unlike our nation, they cannot issue their own currencies.
Even apart from pandemic response, many American states and their subdivisions regularly experience chronic shortages of dollar-flow into their jurisdictional domains—a fact that inspires occasional calls to adopt ‘community’ or ‘complementary’ currencies. With an IVL platform, the dollar itself becomes a community currency, for local spending by local residents even of income received from elsewhere grows easier.

Structurally speaking, a city or state IVL plan looks just like the ‘chassis’ schematized in Figure 1, with the state or municipality serving as account administrator and maintaining the master account.

The state or municipality receives payments—taxes, fines, fees, etc.—over the system. It disburses its own payments—refunds, program benefits, care work, etc.—over the same. And all participants, be they businesses or individuals, are then able to make people-to-people payments among themselves too.

5. Treasury and Fed IVL Plans

As noted above, the IVL can be adopted at the federal level as well as the state or local level. The federal rendition for its part is adaptable to both Fed and Treasury use. Let us consider these prospects in turn.

5.1. The ‘TreasuryDirect’ / ‘Digital Greenback’ IVL Plan

A Treasury-administered IVL would simply add two functionalities to Treasury’s already existing network of digital ‘TreasuryDirect’ accounts (TDAs)—a long-standing but surprisingly little-known facility through which any citizen or legal resident of the United States can already open, at any time, a digital account through which to transact with
Treasury in its own securities. To convert this existing platform into an IVL digital payment platform, we need take only two simple measures.

First, we add horizontal P2P connectivity between TDA digital wallets to the already existing vertical connectivity between Treasury itself and all TDAs, in the senses elaborated above. And, second, we either permit ordinary dollars to move into and out of TDA wallets or confer legal tender status on the ‘Zero-Percent Certificates of Indebtedness’ that Treasury already issues through TDAs. We’ll call them ‘Treasury Dollars,’ or ‘Digital Greenbacks’ in honor of the national dollar that Treasury effectively issued from the mid-1860s until the Fed’s establishment fifty years later.

Again, all would be as it was in Figure 1, save that the Treasury would administer the system. As with the state and municipal versions, in any vertical transaction, participants would be able to pay taxes, fines, fees and the like directly to the Treasury, and will be able to receive tax rebates, program benefits, and the like in the same manner. Counterparties in horizontal transactions, in turn, will simply be private-sector persons and businesses.

Under this Digital Greenback rendition of IVL, Treasury would in effect be issuing a digital dollar and maintaining a digital public-banking and payments system. If this aroused insurmountable political opposition from banks or raised serious systemic stability concerns, we could simply cap the amounts Treasury wallets can hold – say, at $2,000 – and note the following: First, people with so little savings are largely unbanked now. Second, once publicly banked, many of the presently unbanked might at last save enough to be enabled to become even privately banked.

5.2. The ‘FedWallet’ IVL Plan

While TreasuryDirect seems the obvious route to go in
digitizing the dollar in the short run, where time is of the essence, we might nevertheless wish to migrate any national IVL system over to the Fed in the longer run. In effect, we would then construct a digital wallet rendition of something like the ‘FedAccounts’ proposed by Professors Ricks, Crawford, and Menand. The primary reason to do so would be to keep the digital dollar fully integrated under one administrator, with the nation’s broader monetary policy apparatus and payments system, both of which are presently conducted and administered by the Fed.

What we can call a ‘FedWallet’ rendition of the IVL Plan would simply alter the compositions of both the Fed’s and private sector banks’ current balance sheets in a couple of straightforward ways. First, the Fed IVL Master Account would simply be a large portion of the liability side of the Fed’s balance sheet, as noted above in introducing this post and as bank Reserve Accounts already are. Payments among businesses and individuals would then manifest as shifting allocations on that portion of that side of the Fed balance sheet (see Figure 3, below). Second, there would be a corresponding reduction in the sizes of private sector bank balance sheets.

Diagrammatically, then, in going the Fed route for an IVL system we would move from a banking system like that depicted in Figure 2 to a banking system like that depicted in Figure 3 where national money flows and associated assets and liabilities are concerned. The payment platform component of the plan would fit in the structure in the manner depicted in the lower portion of the diagram, which as an accounting matter should be imagined on the right hand (Fed liability) side of the same.
Figure 2: Current Fed/Bank/Depositor/Issuer Arrangements & Financial Flows
Figure 3: Reformed Fed/Bank/Depositor/Issuer Arrangements & Financial Flows, with Fed-Administered ‘FedWallet’ IVL Platform

Borrowers & Other Issuers

Loans & Other Investments

Debt

Banks

Discount Window Loans

Debt

Fed

Fed Platform Administrator

Platform Master Account (Included among Fed Liabilities)

1. Payment Instruction

Payor

Payor Account Wallet

‘Pay’

2. Debit $
Once again all is the same as in the previous renditions, the sole difference being that the system is now integrated into the Fed / private-sector bank nexus that constitutes the foundation of our present day national banking and payments infrastructure. This additional complication of course necessitates careful planning and sequencing. Hence my recommendation that cities, states, and the US Treasury adopt IVL plans immediately, with the latter then to be migrated over to the Fed in due course.

It might bear noting that insofar as we go this route, we shall recapitulate in the digital-currency space much of our previous monetary development in the paper currency space. The latter evolved from (1) state-chartered and -regulated banks issuing their own paper ‘bank notes’ (the earlier version of our current ecosystem of privately issued crypto-currencies) before 1863, through (2) nationally chartered and -regulated banks effectively issuing a national bank note (the ‘Greenback’) administered by the US Treasury from 1863 to 1913, to (3) the Fed-issued and -administered ‘Federal Reserve Note’ (a.k.a. ‘dollar bill’) that we use today.

6. Conclusion: From Public Money and Banking to More Fully Public Finance

The technology involved in establishing IVL systems is not particularly daunting, and industry professionals aver that the author’s Digital Greenback plan could be up and running in a few months. Designing and building digital-payment platforms and associated currencies has been done before, after all, by multiple firms and networks for multiple purposes, over recent years. All that differs now is that we will be doing this for a forthrightly public purpose – that of installing a universally accessible, fee-free and frictionless, state-of-the-art national value-storage and -payments architecture. In
effect, as noted above, we’ll be supplying a commercial infrastructure fit to morph into a universally-accessible banking and financial infrastructure.

For the reasons elaborated above, this is desirable in all times, not only in crisis times. So much the better, then, that in doing this now we will also be opening saving and paying to 50 million unbanked and underbanked households, businesses, and individuals in need of immediate aid during the current crisis and any subsequent crises. But we will also be doing yet more. We will be taking a crucial first step, should we decide as a polity to go further, toward a more complete renovation of our national financial system – a system that is falling apart at its productive republican seams. For more on that reconstruction, kindly stay tuned.

K-Sue Park, How Did Redlining Make Money?

September 25, 2020

K-Sue Park, Georgetown Law[1]
One of the principal insights and analytical charges presented by scholars of racial capitalism is that racism makes money. That is, beyond the question of distribution or the way differently racialized groups receive uneven access to or shares of pre-existent common social resources, this tradition of thought underscores how the capitalist economy has grown by “producing and exploiting group-differentiated vulnerability to premature death.”[2] This follows Cedric Robinson’s demonstration that this mode of profit-seeking has for centuries been a central organizing principle through which capitalism developed;[3] it is still in the process of exploring how many strategies of modern markets were innovated and honed through institutions to further conquest and expand the slave trade in North America. This analytical frame poses a crucial challenge to us: we must try to understand the myriad ways how the reproduction of racism creates new financial value because these dynamics remain key to market processes and the social violence they feed upon today.

In this post, I look briefly at the infamous case of redlining to ask, how did it make money? It is a common habit to characterize the problem with redlining as a matter of inequitable distribution: after all, during a national housing crisis, the Federal Housing Administration (FHA) used redlined maps to decide where it would insure mortgages; and, as a result, ensured that banks would extend affordable mortgages only to white families, and not to Black or other non-white and immigrant groups. Analyzing redlining in terms of distribution, however, is misleading; it does not capture the crucial role of the practice in engineering the mass-production of a new form of property whose value derived precisely from the segregated landscape it produced – the suburban single-family home. Redlining indeed institutionalized segregation’s monetary value, transforming the landscapes of housing and racial relations in America. Below, to explore this question, I situate redlining within a
longer history of leveraging racial value to produce financial value in land; then, I draw on monetary theory to spell out how the FHA’s redlining program created new monetary value.

Translating Racial Value into Financial Value

During the era of Jim Crow, the FHA responded to the housing crisis of the Great Depression with a plan to spur the private sector to mass produce housing. This housing would then divide America into white suburbs and disinvested, mostly non-white urban centers. Before the FHA, the Home-Owners’ Loan Corporation (HOLC) had also tried to address the national housing crisis with mortgage loans, and it created the redlined maps, which coded neighborhoods based on the presence of racial minorities, in order to assess risk in a uniform way across the country. But where the HOLC had directly issued new mortgages itself — to replace mortgages facing imminent foreclosure — the FHA instead insured private banks that made mortgage loans; further, the FHA redeployed the maps to place conditions on that insurance. The HOLC had extended mortgages to both whites and non-whites, or across different levels of “risk” it perceived; however, the FHA used the maps to deny insurance to banks for mortgages where non-whites were present, thereby ensuring that mortgages would go only to neighborhoods characterized by white racial homogeneity.[4]

The FHA did not only oversee the development of commodities whose desirability issued from the promise of living in new all-white spaces. It also confined non-whites to urban centers, where it discouraged lenders from providing financial support for rehabilitating or renovating the older and multi-family structures.[5] It therefore starved non-whites in urban centers of resources, forcing them to live in deteriorating and frequently unsafe housing and incentivizing the flight not only of white families but also the businesses that catered to them from cities. As Beryl Satter has shown, the rabid
predation that descended upon Black urban neighborhoods to offer “services” in their stead ensured their decline. While whites acquired new access to property as a means of building intergenerational wealth in the suburbs, the FHA’s redlining program fostered white wealth accumulation in cities as well, and innovative ways of seeking out “the riches that could be drawn from the seemingly poor vein of aged and decrepit housing and hard-pressed but hardworking and ambitious African Americans.”[6]

This combination of innovative predation and property-making introduced a new formal turn in a centuries-long approach to property in America. That is, the FHA drew upon very old, widespread hunger for property and practices of translating investment in racial exclusion into financial or monetary value. In colonial America, land did not become a commodity – nor part of Anglo jurisdictions – except through the removal of the Native peoples who lived on it.[7] The monetary value of all property in America therefore derives historically from the value of white presence and the absence of non-whites, as well as from innovative predatory practices. To outline this long history in the broadest of strokes, Anglo-Americans grew the slave trade to support their conquest of Native Nations’ lands and rapid territorial expansion; by the dawn of the founding, this land and enslaved Black people constituted over 75% of wealth held by white colonists. After abolition, longstanding white resistance to Black landownership, in particular, intensified in scale, energy and organization. This resistance became a major factor shaping land policy and the regulation of land ownership in the late 19th and early 20th centuries.[8]

The FHA’s redlining program followed upon decades of white citizens’ organizing for racial exclusion through racially restrictive covenants and zoning laws and must be understood within this long history. While the interest in segregation had frequently translated into monetary terms before, the FHA
took advantage of the HOLC’s racist equation of non-white presence to coolly up the ante and make “risk” the basis of a national, standardized appraisal system. It used its famous Underwriting Manual to capitalize upon the white interest in segregation and uniformly assign monetary value to it. The FHA therefore transformed HOLC’s model by establishing a set way of assessing the financial value of racially segregated housing to create a massive market for it. As David Freund observes, its program fundamentally transformed whites’ ideas about race and the relationship between race and property, to naturalize this commitment to segregation as a common-sense investment of “homeowners” in maintaining property values that still pervades the real estate market today.

Making Credit Makes Money

We can be quite precise about how redlining made money, or constituted a program of public-private money creation, thanks to legal theorists, heterodox economists and more recently, Modern Monetary Theory, who have helped us see, practically, historically, and theoretically, that money is made through the extension of credit, both to the government and to private individuals. On one level, as Christine Desan has shown, governments create national stocks of money that stand for the governments’ liabilities – the public debt or other government investment assets – that are purchased by the central bank. Commercial banks, as Robert Hockett and Saule Omarova have explained, also play a critical role in adding to the money in circulation through the credit they extend to individuals and businesses. Banks extend such credit not based on assessments of deposits they already hold in individual accounts, but rather, on assessments about profitable investment opportunities made by these institutions, which are authorized by the government to credit and open borrower accounts with contents spendable as money. These private institutions therefore expand the money in circulation as
franchisees of the government, not as intermediaries that merely move preexisting money around.[13]

Money is credit, whether it is created by governments or by banks. The FHA used its resources to incentivize banks to lend, and therefore intervened as a public agency to spur private money creation. By guaranteeing banks’ loans, it subsidized them to catalyze their production; at the same time, it ensured the profitability of construction enterprises that followed what amounted to its mandate to build segregated housing. The FHA therefore neither unevenly distributed existing resources or new resources—some putatively neutral “access to credit.” Rather, it created new property and new money out of the raw material of the high value that racial exclusion held for white citizens. It created mortgages for segregated housing, producing a new landscape of segregation by commodifying it and monetizing its value to people.

Redlining made money, increasing the nation’s financial wealth during a time of economic crisis. The FHA’s program illustrates how profoundly the production of money is shaped by values of the social order – the specific locus of wealth within it, the history of patterns and modes of wealth accumulation that explain it – as well as how it produces values within it.[14] Just as those people with the standing and resources to invest in the government are those who have historically accumulated wealth,[15] redlining shows how banks decide to extend credit to people. In America, whether banks or the government think the borrowers are “worthy” or likely to use the loans “productively” has long been code for a commitment to segregation. Through the FHA, the government coordinated with banks (its private franchisees) to construct all-white communities in a program that we should recognize as an act of making money – and one that was “allocatively partial.”[16] This act also produced value in a qualitative sense, both monetary and social, in relationships between people and to land.
The impact of the FHA’s use of redlining to create a large-scale residential purchase-money mortgage market in America — where none had existed before — on the landscape of housing and the American economy cannot be overstated. At a time when we are again in the midst of rapidly ripening national crises of intensifying racial violence and homelessness, redlining offers crucial lessons for us about how the government remade the economy to usher in an era of profoundly racist and violent prosperity. We should attend closely to its plans now with the understanding that there are many ways of making money and many ways that racism makes money in America — and that the power of racism to generate financial value perpetually incentivizes the production of novel forms of racism as well.

[1] Many thanks to Raúl Carillo, David Freund, and David Stein for their thoughtful comments on a draft version of this piece.


[5] *Id.* at 206.


Neither the FHA nor the HOLC, of course, invented correlations between non-white presence, risk, and the price of real estate; this essay is concerned with the ways they formalized, institutionalized, and nationalized this commonsense grammar of the market. See Jackson, Crabgrass Frontier, 198; see also Margaret Garb, City of American Dreams: A History of Home Ownership and Housing Reform in Chicago, 1871-1919 (2005); David Freund, Colored Property: State Policy and White Racial Policy in Suburban America (2007).

Freund, Colored Property, 6.


See generally Robert C. Hockett and Saule T. Omarova, The Finance Franchise, 102 Cornell Law Review 1143, 1154-55 (2017); see also David Freund’s contribution to this series.

Hockett and Omarova, “The Finance Franchise,” 1154-55. See also their contribution to Justmoney.org’s Roundtable on Banking & Money Creation.

See generally Desan, “The Key to Value.”

Id., 19-20.

Id., 15.
The Center for Responsible Lending reported in June 2020 that U.S. banks collected over $11 billion in overdraft fees annually, with most of those fees coming from only five percent of the banks’ depositors. Overdraft fees are an awful consequence of having a bank account, especially for those who have low-and-uncertain income. Overdrafts combine access to a transactions account with the provision of credit. For those with low-and-uncertain income, it is a toxic mix, one that traps people into a spending their resources on exorbitant fees rather than on helpful services. Overdraft fees concentrate our attention to the need for both transaction services and credit as necessary features in designing useful financial services for the poor.

An appropriate design for financial services for low-income people must address the entwined needs for both transaction services and credit access. The first step is to provide to people in need a “positive-balance account.” That is, an account whose balance is not allowed to drift into negative territory. Such accounts are now possible because “high-availability” network management has become widespread with the growth of the internet. As a consequence, an account provider can limit access to an account to real-time electronic means via debit cards used at the point-of-sale,
online banking, and through automated teller machines.[1] At the same time, credit access needs to be improved for people with low-and-uncertain income. It is extremely costly to provide people with low-and-uncertain income credit privately because of the combined effects of the small amounts of credit involved, the largely fixed costs of underwriting, and the high risk of default. In the private sector, then, credit on reasonable terms is not available for those who are most in need of it. They rely on overdrafts, check-cashers, and pawn brokers; what John Caskey has called fringe banks, to supply their demands imperfectly at shockingly high interest rates.[2]

Surprisingly, positive-balance accounts are widely provided today in convenient forms through almost all government benefit programs, with the notable exception of federal tax refunds. Several easy-to-implement improvements in these services can transform benefit accounts into more all-purpose positive-balance banking accounts. Much more needs to be done by the public sector to subsidize credit access to people with low-and-uncertain income. The private sector, using conventional underwriting technology cannot provide small-loan credit at reasonable costs. I outline a new approach here. In it, the federal government would create a new federally sponsored enterprise to guarantee securities backed by credit card balances that are drawn on by owners of the eligible positive-balance accounts. Such credit can be limited in amount and partially secured by compensating deposits of savings by the borrower, greatly lowering underwriting costs and, for the borrower, preventing debt-spirals. With this approach, the cost of credit provision can be capped at reasonable levels. In these ways, individuals with low-and-uncertain income can have access to both deposit and borrowing services at low cost, and which use the dominant means available to higher-income people: debit and credit cards.

Positive-Balance Accounts
Three laws enacted between 1996 and 2000 are responsible for a vast expansion in the provision of positive-balance accounts to everyone who receives federal benefits and most state benefits as well. The laws mandated: first, that the federal food stamp program, administered by the states, provide all services electronically;[3] second, that all the states use methods that were portable and interoperable across states;[4] finally, that all federal benefits, excluding tax returns, be provided electronically.[5] These steps resulted in a nationwide system of “electronic benefit transfer” accounts for more than 40 million beneficiaries, accessible via debit cards (most affiliated with the Quest network), ATMs, and over the counter. Further, the federal program enables approximately 5 million beneficiaries to access their accounts by Direct Express cards, ATMs and over the counter services.[6] The accounts in the federal program, managed by a contracting bank, are insured by the FDIC and covered by the protections on fraud and loss outlined in Regulation E. The funds in the accounts cannot be garnished; the accounts are more available after disasters, such as hurricanes, less subject to loss or theft of funds, and more convenient than prior methods involving paper checks.[7]

The expansion of access to payment services provided by these accounts led the Federal Reserve, in 2016, to revise its definition of “transaction account” in the Survey of Consumer Finances. In that year’s survey, the Fed measured that approximately 93.2 percent of U.S. households had (traditional) bank accounts, while the 2017 FDIC Survey estimated that 93.5 had bank accounts, showing a high degree of coherence in measurement between the two separate surveys. But the Fed reckoned in 2016 that 98 percent of households had transactions accounts, where they included responses to questions about ownership of either reloadable prepaid debit cards or electronic benefit transfer and Direct Express cards. These positive-balance accounts provide many services that owners would otherwise obtain via a bank account, but without
the risks of overdrafts, and significantly less risk of garnishment. Fear of garnishment of bank accounts is another disincentive to establishing bank accounts for those with outstanding debts or judgments. The costs to the account holder are low; in many systems, fees can be avoided altogether by using in-network ATMs and planning one’s withdrawals, while in others fees of a few dollars per month are imposed.

However, the existing positive-balance benefit cards have three limitations that should be overcome if we wish to better provide transactions services to those with low-and-uncertain income. First, the existing cards don’t allow owners to deposit value into their accounts—the accounts are restricted to providing government benefits to the recipient. Without the ability to deposit funds, for example, wages, into the account, the recipient’s transaction options are unduly restricted. Adding that functionality to the accounts would not add to the risks of their provision and would only add a modest amount of costs. Second, the services should be expanded by providing owners a savings account, one whose balances are not available to make purchases from a point-of-sale, but are transferable (with delay) into the transaction account at an ATM. As we will see below, funds placed in the savings account can provide the saver access to credit, so the account can serve as a commitment device to future repayment. These two expansions of services would make these benefit accounts true general-purpose accounts. Third, non-beneficiaries with limited income, for example up to 1.5 times the poverty level, should be able to establish accounts in these systems. We can call these expanded, buy-in accounts, public-option transaction accounts, or POTAs.

Part of the increased costs that would be incurred by allowing deposits to be made into the pre-existing benefit account and to allow non-beneficiary account holders is a result of the requirements to know your customer (KYC), engage in anti-money
laundering (AML) actions, and conduct other due diligence under the Bank Secrecy Act. These requirements create costs that are difficult for banks to recover from accountholders that hold only modest balances. The administrators of government benefit programs, however, are well-positioned to economize on these costs as they already have good methods of identification of beneficiaries to match their benefit payments to the beneficiary.[8]

To sum up, I recommend that the current state and federal electronic benefit delivery systems be expanded to allow deposits, to create a separate account for savings, and to allow low-income non-beneficiaries to establish accounts in the system. Congress could accomplish this by requiring that the EBT program of the states and the Direct Express program of the federal government be jointly administered with those features. The legislation could appropriate money to subsidize, to a limited extent, these services. Accountholders could afford modest monthly fees, and non-beneficiary account holders could pay higher fees for access to the accounts.

Credit Access Corporation

Access to credit is severely restricted for people with low-and-uncertain income. That restriction is very costly as credit is so valuable to them. People with low-and-uncertain income have high demand for credit for obvious reasons. The banking sector cannot supply the credit at reasonable cost. The reason is that each loan must be underwritten, which takes time and labor. Because the amount of credit that is feasible to repay for people with low-and-uncertain income is low, and because people with uncertain income are at a high risk of default, the costs-per-dollar of credit provision are enormous. Consequently, the market fails to provide the credit that is needed by this population. Without access to credit from mainstream financial institutions and services, people respond by using overdrafts, payday loans, pawn brokers, and loan sharks, all of which are extremely costly and inflexible.
The key to surmounting this mismatch is to underwrite credit in a different way. Here I recommend a three-pronged approach. First, the federal government should create a government-sponsored enterprise, the Credit Access Corporation (CAC), that would guarantee the principal and interest paid on securities backed by credit-card balances of eligible participants. Second, owners of POTA accounts are eligible to be provided credit guaranteed by the CAC (and extended by a bank that services the debt). Finally, credit extended on these credit cards is limited to small amounts, say a maximum of $1000, and must be partially backed by a compensating deposit in a POTA savings account. For example, a borrower may be required to fully secure her borrowing to begin accessing credit. After some successful repayments, the borrower could ascend a ladder of credit, where she would only have to secure her credit by up to 75 percent, and so on. In other words, to get access to credit, an individual must save up amounts in a savings account. As she demonstrates success, she will have access to unsecured credit, which will be guaranteed by the CAC. This method of securing credit card debt is now common in the “secured credit card” market.[9] In this way, the interest rate at which the person can borrow can be capped at reasonable levels. If the borrower defaults, she loses the compensating balance, and is excluded from accessing credit for some period, such as two years, and thereafter must secure her credit fully for an extended period, but the funds in the POTA accounts (other than the compensating balance) cannot be seized by the lender.

Conclusion

The emphasis of this policy proposal is to build on the enormous success of electronic benefit transfer systems and the familiarity that the tens of millions of users have with those systems. These systems have extended access to electronic financial transaction services to millions of the most vulnerable Americans at low cost, low levels of fraud,
high levels of user satisfaction, and low stigma of use. Expanding these services is likely to be the least expensive way of providing electronic financial transaction services to other Americans who need them. By combining deposit services with already established benefit accounts, owners experience a true convenience in managing their finances.[10] The federal and state systems could be managed jointly, by adopting the standards of the federal system, namely that the balances in the accounts are insured by the FDIC and subject to the protections against loss and theft by Regulation E. By having the federal and state governments contract for these facilities, competitive bidding can be used to provide these services efficiently.[11] Furthermore, the use of the debit card networks that are already in place and are the most widely used means of payment in the U.S. takes advantage of both familiarity and ubiquity to provide services to people with low-and-uncertain income.

By marrying the ownership of a POTA account to the option to have credit provided through a credit card, the design here leverages information contained in the deposit and savings behavior of credit recipients. In expanding credit, the design uses a currently successful service, secured credit cards, as a model. Rather than attempting complicated underwriting on a loan-by-loan basis, the underwriting is provided by the account owner saving some amount and being rewarded with credit. If the borrower keeps current on her payments, credit will continue to be available to her. Here again, by using credit cards and modern information systems, the cost of credit is kept low. The likely losses to the Credit Access Corporation would be quite low, given the incentives of borrowers to maintain their credit.

Consider the situation when the eligible owners of a POTA are adults with up to 1.5 times the poverty level of income. In 2018, that group consisted of about 35 million adults. If each had a maximum amount of credit outstanding on their cards, the
maximum possible amount of securities in the program would be only slightly more than $35 billion, a small amount when compared with other government credit guarantee programs. Further, only a portion the outstanding credit would be unsecured, so expected losses in the program would be very small. The CAC could be created separately from the POTAs, but the use of the savings account enables the provision of secured credit cards, and it is likely that the two proposals have high complementarity as a result.

Significant progress has been made in recent decades in expanding the use of transaction accounts, with the Federal Reserve’s Survey of Consumer Finances showing that the number of American households with transaction accounts rising from 75 percent in 1970 to 85 percent in 1990, and to 98 percent in 2016. That these gains are not sufficient is clear from a simple review of the overdraft costs incurred by account owners. Checking accounts are not necessarily desirable for people with low-and-uncertain income, and banks don’t typically offer credit on reasonable terms to that population. The private sector alone is not well equipped to provide a minimum range of needed financial services. The positive balance accounts now in use, such as electronic benefit accounts, are limited in purpose, and should be expanded to offer deposit facilities, savings accounts, and the ability for low-income Americans to establish these accounts regardless of whether they are due federal or state benefits. These accounts could be built from the base of existing benefit accounts of states and the federal government, with Congressional legislation to provide only modest subsidies to the system. By linking ownership of broad POTAs with a secured credit card, one whose uncollateralized credit is guaranteed by a government-sponsored enterprise, low-income Americans would have access to the most widely used financial technologies in use today: debit and credit cards.
In general, because checks are paper-based instruments drawn without knowledge of the account provider, and because of the random delays between the check being written and being presented to the bank on which it is drawn, a check writer can easily and inadvertently overdraw her account.


A provision of the Debt Collection Improvement Act of 1996, EFT 99 requires federal agencies to use electronic funds transfer (EFT) for most payments, with the exception of tax refunds, starting Jan. 2, 1999.

More specifically, each state manages its own EBT system. Those systems are all interoperable, in that a beneficiary may receive and spend benefits while out-of-state. Most of the systems are members of the Quest electronic funds transfer network. In most cases, the funds that are provided in the accounts of beneficiaries are direct liabilities of the state. As the states distribute food stamp or Supplementary Nutritional Assistance Program (SNAP) benefits, the number of recipients is so large that other state-specific benefits are also often distributed via these systems. The federal system is managed by a bank-contractor. The benefits provided in accounts are insured by the FDIC. The system distributes a variety of federal benefits including Veterans’ benefits, Social Security benefits, and others.

Susan Herbst Murphy, “Conference Summary: Government Use

[8] Another element of this recommendation is for Congress to amend the Bank Secrecy Act to create a tiered KYC regime that exempts electronic benefit accounts with balances under a certain limit.

[9] See Larry Santucci, “The Secured Credit Card Market,” November 2016, The Federal Reserve Bank of Philadelphia, and “Moving into the Mainstream: Who Graduates from Secured Credit Card Programs?,” May 2019, The Federal Reserve Bank of Philadelphia. The second paper finds that “Secured card graduation rates have accelerated in recent years across all credit score groups as well as within the initially unscoreable consumer population. Twenty percent of accounts in the 2012 cohort graduated by age 61 (months)…” Reporting of credit histories to credit reporting agencies can also provide incentives for borrowers to build a good credit history.

[10] This provides, in other words, an economy of scope in demand, that greatly reduces costs relative to establishing separate systems, one for benefits and another for other deposits, each with their own sign-up procedures, etc.

[11] There need not be a single nationwide provider. Instead, competition can be enhanced by providing services in different regions of the country, and maintaining the interoperability requirement that currently exists for state EBT programs.
My children couldn’t quite wrap their heads around the scene: a long line of cars snaking across a vast parking lot, inching slowly toward the food bank’s delivery window. They think there is a technological solution to problems of lines. “Can’t we create an app for that?” they like to say. But where they see lines of cars at a food bank, I see lines of anxious parents waiting for checks to clear. The pandemic has pushed people who entered this crisis with little financial security to the brink. Half of all Americans live paycheck to paycheck. Now that the job market has been decimated and roughly twenty-seven million of those paychecks are no longer forthcoming, it takes sitting in your car in a food bank line to get a meal on the table.

An equitable economic system would ensure that the people suffering loss of income from this crisis would benefit from the same swift, efficient technology that allows other people to execute a trade in a matter of minutes, even seconds. There is no such efficiency for those trying to cash their stimulus or unemployment checks. The benefits of technology don’t work for everyone. For example, 70 to 100 million people waited one to three months for their stimulus payments. In the meantime, many missed payments on their rent or their credit cards, jeopardizing credit scores and threatening personal bankruptcy. Whether or not you think this is fair, it is certain to slow the economic recovery.
Bravo to JustMoney.org for illuminating the opportunity that accounts at the Fed might provide. Unfortunately, the Fed tells us that it won’t be until 2023 before we see a real-time digital payments system. The sense of Fed urgency as it pertains to market functioning is not sufficiently present when it comes to the needs of people to pay their bills on time.

While a broader fix along the lines recommended by members of this Roundtable will take some time, there are two things that can be done now to expedite the delivery of money at this perilous economic moment for Americans.

The first action is for Treasury to make it clear when it sends its payments out the door that the full federal payment is for the beneficiary. The banks should be told – explicitly this time – that they are not to withhold any portion of the payments for the debt collectors or garnishment companies or apply the funds to overdrafts owed to the bank. The full and complete amount (whatever that amount turns out to be) needs to land with the beneficiary, with no holdbacks. Talk to one of the operational types within the Fiscal Division at Treasury and they will explain that there is a computer code – known as a “flag” – that already exists and needs but a mere click to execute. Once that flag is attached to the payment instructions, banks get their directions loud and clear; it is unequivocal that they are to provide the entire amount to the beneficiary without set-off or payments to creditors. This flag has been used extensively in the past, but Treasury chose not to use it during the last round of stimulus payments.

The second action is for the Federal Reserve to require banks to make stimulus payments available immediately – with no holds. Holds on checks make sense when the bank needs to check the creditworthiness of the check writer. But when the check writer is the US government, the full faith and credit is assured. The government’s check is not going to bounce. There is no rationale for a holding period on a U.S.
government check, and allowing that check to clear immediately matters to economic well-being.

I look forward to learning from other Roundtable contributors about more comprehensive ways to expand access to faster and fairer electronic payments. Until those can be developed and implemented, Treasury and the Fed should use their existing authorities to accelerate the delivery of the cash Americans need now.

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**Book Review: Law and Macroeconomics as Mainstream**

**Author: Bruno Meyerhof Salama**

In spite of its name, economic analysis of law is mostly unconcerned with money and markets. In a recently published book, Law and Macroeconomics: legal remedies for recessions, Professor Yair Listokin challenges this doubtful convention. He advocates “expansionary legal policies” to stimulate the economy when monetary policy reaches the zero-lower bound. This proposal is presented as a straightforward application of mainstream economic views, not a heterodox deviation. My review considers how the book’s main arguments depart from established views in economic analysis of law and discusses how its applications fare in light of the Keynesian perspective that it purports to uphold. I conclude with a discussion of the book’s relevance for the current recession.
A. Klein, How to Fix the Covid Stimulus Payment Problem: Accounts, Information, and Infrastructure

August 18, 2020

Aaron Klein, Brookings Institution

The financial response to the Covid crisis demonstrated the inability of the federal government to rapidly get money to people during times of crisis. It took between three weeks and three months for Americans to receive a single penny of their emergency impact payments, aka the Covid stimulus.

These delays impose significant hardship and costs on those most dependent on emergency funds, undermining the payments’ economic and social impact in a deeply regressive fashion. Half of American families live paycheck to paycheck, and
cannot afford to wait for emergency assistance when a national emergency interrupts their income stream.

Nor is this a one-off problem: Covid stimulus payments were the third time in the past twenty years that the federal government has authorized direct stimulus payments to individuals (2001 tax cut, 2008 recession bill).

This problem is easily solved, just not in the manner frequently proposed. Creating a world where emergency financial assistance streams as quickly as Netflix is actually quite easy. The solution is three-pronged:

1. Accounts: Americans need to have accounts to receive funds.
2. Information: The federal government needs to have the information to match people to their account.
3. Infrastructure: The payment system’s infrastructure must be able to rapidly transmit funds from the government to people.

This paper examines each of these prongs. It proposes solutions that address the gaps that exist in each of them. A key takeaway is that the biggest impediments have to do with infrastructure and information. Thus, solutions that focus simply on universal accounts without fixing information and infrastructure will fail to improve delivery of stimulus payments.

Accounts

The vast majority of American households have accounts: 93.5% of American families (more than 14 out of 15) have an account at a bank or credit union. This figure has grown a few percentage points over the past decade, demonstrating progress within the current framework.
Unbanked rates are much higher for Black and Latinx households, with account access at 84% and 86% respectively (roughly 6 out of 7). This highlights the importance of universal accounts for communities of color and is a good reason why disproportionate attention is paid to creating universal accounts. However, it is also a reminder that the vast majority of people of color have accounts.

The reasons why people are unbanked largely have to do with the cost of banking and anti-money laundering (AML) and fraud systems. These problems require different solutions from the commonly cited problems of limited physical branch locations and hours, lack of trust or faith in banks, and lack of financial “literacy” or education. Those issues are not major drivers of households being unbanked (see Figure 1).

The main problem for the majority of unbanked people is money, specifically how expensive accounts are and how little money they have. The cost of accounts and lack of consumer funds are cited by 4 in 9 unbanked households (44%) as the main reason they do not have an account. More than one-third of households cited lack of funds as the main reason for not having an
account (and more than half cited it as one of the reasons). Another ten percent cited high or unpredictable fees. Combined, the cost of accounts and lack of funds explain the majority of unbanked individual’s decisions.

The solution is to make banking cheaper. Simple, no-cost bank account programs have been developed by the Cities for Financial Empowerment Fund’s Bank On initiative, which works in conjunction with financial institutions, and by the FDIC through its Safe Account program. Both have a series of features including low balance minimums, minimal fees, and (importantly) no overdrafts. Customers leverage technology to access the accounts, which function very much like traditional bank-transaction accounts, sometimes without a physical checkbook. These accounts have proven remarkably popular. For example, more than 1 in 5 of Citibank’s new accounts are structured as so-called Access Accounts modeled on this program.

All banks and credit unions are chartered by either the federal government or a state government and due to that charter and other benefits (including deposit insurance) have a fundamental duty to serve their community and their members. Congress or federal regulators should require all institutions to offer basic transaction accounts that meets these criteria. As many banks and credit unions have shown, this can be a profitable endeavor, particularly when AML compliance cost can be contained (discussed below). Regardless, Americans have a fundamental right to participate in economic life, and having a transaction account is necessary for full participation. This requirement tackles the main problem facing the unbanked: the high cost of banking for those with less money.

High AML costs and concerns about past consumer behavior are the next biggest obstacle to universal banking. There are 8.5 million households without bank accounts according to the FDIC. To apply for a bank account, an applicant goes through a screening system to see if they are on the “do not bank” list,
a list comprised of people who have had accounts flagged for money laundering or fraud violations. Data on the “do not bank” system are limited but the National Consumer Law Center report estimated that 2.3 million people applying were rejected as a result of this list over the course of a single year. A person is different than a household and every unbanked household may not apply for an account in a given year. However, if this report is even a rough indication, it shows that as many as 25 to 30 percent of those without bank accounts may be on the “do not bank” list. At the very least, the FDIC’s own survey indicated that over 15% of unbanked households had accounts involuntarily closed or refused due to credit or identification issues, setting a lower bound for the share of unbanked as a direct result of the “do not bank” list.

Solutions designed to provide universal bank accounts will fail unless they deal with the AML and fraud issue. For example, simply establishing a postal banking option to serve these Americans will not work unless the post office is exempt from AML requirements or required to provide services for people who have records of fraud.

**Policy solutions need to stop the de-risking phenomenon whereby banks refuse to grant accounts to anyone on the “do not bank” list.** To start with, bank regulators, Treasury’s Financial Crimes Enforcement Network (FinCEN), and the Consumer Financial Protection Bureau (CFPB) should conduct robust regulation and oversight over the companies like ChexSystem that control these lists. The government likely has to do a better job of tailoring its AML regulation to catch bad actors without unfairly excluding innocent people from the banking system, while private industry has to provide consumers a fair method to contest involuntary account closure and inaccurate placement on the list.

When it comes to explaining why the unbanked don’t have bank accounts, the cost of accounts and AML obstacles dwarf other
issues. Distrust of banks and privacy concerns combine to account for 15% of the unbanked not having accounts, while limited branch locations and hours only another 6%. Put a different way, only 1 in 5 unbanked people cite these concerns as the main reason why they do not have an account. That translates into about just over 1 percent of the entire population for whom distrust of banks and limited branch locations and hours is the main reason why they do not have an account. That constitutes fewer households (1.8 million) than people who are estimated to be on the “do not bank” list.

Information

While most American families have bank accounts it turns out that Uncle Sam lacks the information to link people to their accounts. The Treasury Department simply does not know your bank account. It is a mistake to think that between all of the various arms of the government (IRS, Social Security, employment and food benefits, etc..) such information would be stored and easily accessible in times of emergency. The fastest way that Treasury could find people’s account was to look at those who had filed taxes and asked for their refund to be send via direct deposit. That constituted only roughly half of taxpayers, in part because 20-25 million households filed using a tax advance product that did provided the Treasury department a bank account controlled by a tax preparation service, not by the tax filer.

Eventually, Treasury was able to coordinate with the Social Security Administration to get bank account information for social security recipients who had not filed taxes recently. For 70 million people Treasury had to simply do it the old fashioned way, write a check or issue a prepaid debit card.

The simplest solution would be to ask Americans to provide their bank account information to the federal government as
part of filing taxes. At the same time, Treasury can use 1099 interest filings to pair individuals who do not file taxes with bank accounts registered in their name. While there are some privacy concerns, it should be noted that banks are already required to report 1099 interest income to the IRS.[1] Further, all bank accounts are already subject to AML requirements that allow bank regulators and FinCEN to identify individuals who hold personal accounts. Simply connecting that information to the Treasury Department’s payment arm should not worsen privacy concerns.

There are some individuals who are banked but only through non-interest-bearing accounts (including checking) and who do not file taxes. For those individuals, the Treasury Department could use other means to identify their accounts. First, some have already submitted that information as part of Treasury’s attempt to collect account information to send the COVID checks. This information should be kept on file and the ability to add to it should be made permanent. Second, numerous online systems such as Stripe, PayPal, and Plaid are able to identify individuals with their bank account. Treasury could easily engage these companies to identify individuals and link to their accounts, while allowing individuals to opt out. Finally, consumers who opt to use pre-paid reloadable debit cards as their primary ‘banking’ method could give Treasury their card information, either directly or through the pre-paid card company.

It should also be noted that bank accounts held by corporate entities with secret ownership are prime vehicles for money laundering, and bipartisan legislation has been proposed in Congress to require beneficial ownership information for all corporate bank accounts. That legislation is gaining traction, having been included in a recent National Defense Authorization Act, and may well become law soon.
Infrastructure

The final issue, slow payments, is in some ways the simplest and in other ways the most difficult. The Federal Reserve has the legal authority to require immediate funds availability to customers for all payments, as well as for just Treasury payments. One of the Fed’s levers, the Expedited Funds Availability Act, empowers the Fed to set minimum times for funds availability for a variety of payment instruments, including Treasury payments (see EFAA Section 4002(b)). Other payments laws give the Fed broad authority to set availability schedules. Put simply, the Fed could solve this problem tomorrow with one regulation.

Why haven’t they? The problem is not technological; real-time payment systems already exist in the US. The problem is that the Fed is both regulator of all payment systems and operator of its own system, the Automated Clearing House (ACH). The ACH is incapable of transitioning to real-time, leaving the Fed with unappealing alternatives: either establish a regulatory standard its own system cannot meet, or build a new system. The Fed has chosen the later, announcing the creation of FedNow which they hope to have operational sometime the mid 2020s.

The Fed’s failure to upgrade the U.S. payment infrastructure provides tremendous profit opportunity for banks in the form of overdraft fees. Banks and credit unions earn as much as $35 billion a year from these fees, which are economically equivalent to the extension of credit at annualized percentage rates in the hundreds to thousands. Some banks have become so dependent on overdraft income that it constitutes 50 percent or more of their total profit (see Armed Forces Bank). Reducing overdraft fees would reduce banks’ profitability and could impact the basic safety and soundness of a handful that have basically become check cashers and payday lenders with charters.
These costs are born by consumers who by definition have nothing left in the bank. Eight percent of all bank customers are ‘heavy overdrafters’ who pay $300 a year or more in overdraft fees, according to the CFPB. This is more than the number of people who are unbanked. Reducing the delay between incoming payments (credits) and debits would substantially cut the incidence of overdrafts, both directly through the faster flow of funds and indirectly by providing consumers more information about the actual money available in their accounts. Wells Fargo alone reported over 2 million customers had overdrafts attributable to only a 24 hour delay in direct-deposit payments, which like all ACH payments are not instant. (Wells has instituted a program to forgive those overdrafts—an indicator of the size of this problem).

Returning to the specific example of Covid stimulus payments, the first batch of Treasury’s Covid payments were sent on Good Friday but were not available to consumers until the following Wednesday. Those six days cost families dearly if they overdrafted or went to a payday lender to make up the difference.

Solutions

To improve its ability to deliver economic impact payments to individuals, the federal government should do the following:

1) Require all financial institutions to offer no/low-cost basic banking services, similar to the Bank On initiative and the FDIC’s Safe Account programs. The main cause of the problem of unbanked households is the cost of basic banking. Banks are governmentally chartered entities tasked with serving public purposes as well as making private returns; there is no reason why they cannot be required to provide simple, no/low-cost accounts. With technology and with reductions in the cost of AML compliance, these accounts can be profitable or, at least, impose only modest costs on
institutions. The financial system has spent too long using the poor to cross-subsidize the rich through payments and fees; providing this basic universal service is not too much to ask.

2) Empower consumers and regulators to vet the “do not bank” list to enhance access. Offering universal accounts will not help those who are blackballed. Insufficient incentives and structures exist to fix these systems. Unless they are addressed, millions will be financially marginalized regardless of the type of universal account system created.

3) Connect existing information between silos to effectuate payments, gathering and retaining information where it is lacking. Everyone has a financial relationship with Uncle Sam, and having account information on file will allow for rapid payments in emergencies.

4) Require immediate funds availability for all Treasury payments and, even better, for all payments. Legislation proposed by Senators Van Hollen (D-MD) and Warren (D-MA) would accomplish this. Their legislation would also require the Fed to build a real-time payment system, but this is not essential. What is crucial is that the legislation require banks to make funds available immediately. Consumers should not have to continue to suffer while a new system is built.

[1] Note this covers accounts that generate over $10 of interest income, thus exempting accounts some accounts.
In 1989 the Board of Governors of the Federal Reserve System came out against the “basic banking” legislation that Congress was then considering, which would have required U.S. banks to offer no-frills transaction accounts at cost to all Americans.[1] While the Board “share[d] the belief that banking services should be widely available to all,” it doubted that there was really a problem to begin with. Low-income households might just have difficulties managing bank accounts and might distrust banks and prefer dealing with alternative payment service providers, it noted. “The Board does not believe that enough of a problem has been demonstrated to justify sweeping legislation.”[2]

But even granting that there was a problem, the Fed said, the proposed solution was wrongheaded. “[A]s a general matter, we question whether it is wise for the government to mandate the services that financial institutions must provide.”[3] A mandate to serve low-income households with basic banking services might “stifle innovation and experimentation,” it warned. “The Board believes that voluntary efforts by financial institutions will continue to be successful in meeting many of the concerns that have been expressed without
the burden and cost that rules and regulations inevitably impose.”[4]

Thirty years later, those voluntary efforts have not borne much fruit. Today, 6.5 percent of U.S. households are unbanked, meaning that no individual in the household has a bank account.[5] Another 18.7 percent of U.S. households are underbanked, meaning that, despite having a bank account, they rely to some degree on expensive nonbank services—such as nonbank money orders, check cashing, and payday loans—for payments and other financial needs.[6] These un- and underbanked households are primarily low-income and disproportionately minority.

In contrast to the United States, bank account penetration in other advanced economies like Canada, France, Germany, Japan, and the United Kingdom exceeds ninety-nine percent. At least some of those other jurisdictions achieve universal service through just the sort of mandate that the Fed opposed back in 1989.[7]

If universal service mandates are off the table, another possibility is direct public provisioning: a public option for bank accounts. The United States already has a big public bank, the Federal Reserve, and it already offers bank accounts (with trillions of dollars in total balances) and processes payments between them. These accounts consist of digital dollars—they are dollar balances maintained as ledger entries on the Fed’s electronic books. The Fed’s digital dollar accounts are highly attractive, offering instant payments, higher interest than ordinary bank accounts, and full government backing no matter how large the balance, with no need for deposit insurance. These accounts, however, are restricted to an exclusive clientele, consisting of banks, certain other large financial institutions, and certain governmental entities. Privileged access to these accounts creates a striking asymmetry at the core of our monetary framework: government-issued physical currency is an open-
access resource, available to all, but government-issued digital currency (in the form of central bank accounts) is not.

This asymmetry is a policy choice—one that appears increasingly anomalous in the modern digital world. Other policy choices are available. In particular, Congress could direct the Fed to make its digital dollar accounts—call them FedAccounts—available to anyone who wants one. Digital dollars would be an open-access resource, available to all, just like the physical dollars that the Fed issues. Why should the central bank make its physical dollars available to the general public but restrict its digital dollars to banks?

FedAccounts might offer all the functionality of ordinary bank transaction accounts—debit cards, ATM access, direct deposit, online bill payments, online and mobile phone access, and so forth—but without any fees or minimum-balance requirements. Moreover, the Fed could partner with the U.S. Postal Service to serve as a ubiquitous physical branch network to service these accounts. Thus, FedAccounts could be merged with postal banking proposals[8] to create a robust public system for money and payments. The U.S. money-and-payments system would, in effect, become fully public infrastructure akin to roads, sidewalks, public libraries and the judicial system.

Opening up access to FedAccounts would have an astonishing range of benefits, which we describe in detail in a paper outlining the proposal. It would foster financial inclusion, bringing millions of households into the mainstream system of money and payments and lessening their reliance on expensive and subpar alternatives. It would reduce the likelihood of future financial crises by “crowding out” unstable deposit substitutes, which are a major source of financial instability. It would make the U.S. payment system faster and more efficient, because all payments between the accounts would clear in real time. It would improve the transmission of monetary policy, because the Fed’s interest-rate adjustments
would be transmitted directly to a wide swath of the public rather than just to banks. The Fed could also conduct direct “helicopter drops” of money into FedAccounts for emergency stimulus if necessary.[9] And it would reduce payment system tolls, because the Fed would not charge interchange fees to merchants accepting its debit cards.

Over the past few years, central bankers around the world have become increasingly worried that privately controlled digital currencies, like Facebook’s Libra, will relegate them to the sidelines of monetary affairs. To avoid this fate, central banks have been studying, and in some cases actively pursuing, issuing digital currencies of their own: so-called central bank digital currency (CBDC).

The FedAccount system is a CBDC—it is a digital dollar—and it would be far superior to the CBDC approaches that dominate current discussions. Most existing proposals portray CBDC as a sort of disembodied physical currency—a digital “token” that retains physical currency’s properties of anonymity and direct peer-to-peer transfer.[10] These proposals typically envision a closed system of digital “wallets” that is segregated from the existing system of money and payments and that is based on distributed ledger technology, like the blockchain technology that undergirds Bitcoin and (prospectively) Libra.[11] We question these design features. We do not think that the Federal Reserve and other central banks should be eager to facilitate anonymous transfers, which can be used for terrorist financing, money laundering, tax evasion, and other illicit activities. Nor is it apparent to us why central banks should wish to create a segregated, closed system that is walled off from the mainstream payment system. When it comes to money and payments, integration and interoperability are demonstrably better than fragmentation and balkanization. On top of that, distributed ledger technology, however ingenious its conception, remains extremely slow and inefficient compared to centralized ledger systems. For central banks,
these cryptocurrency design features are a needless distraction.[12] The FedAccount system would be seamlessly interoperable with the existing system of money and payments and would rely on low-cost, reliable systems and technologies that the Federal Reserve has used successfully for decades.

The Federal Reserve should keep it simple. CBDC does not require new technologies, it merely requires expanding access to a desirable, proven product that the Federal Reserve already offers: bank accounts at the central bank. Physical currency is already an open-access resource; digital dollars should be as well.


[2] Id. at 555.

[3] Id.

[4] Id. at 557.

[5] See 2017 FDIC National Survey of Unbanked and Underbanked Households 1 (“Approximately 8.4 million U.S. households, made up of 14.1 million adults and 6.4 million children, were unbanked in 2017.”).

[6] See id. (“Approximately 24.2 million U.S. households, composed of 48.9 million adults and 15.4 million children, were underbanked in 2017.”).

[7] For example, Canadian banks are required to open accounts for applicants unless an enumerated exception applies (generally relating to fraud prevention). See Access to Basic Banking Services Regulations (SOR/2003-184), § 3 (issued
pursuant to §§ 448.1(3), 458.1(2), and 459.4 of the Bank Act (2001)).


[11] See, e.g., Tommaso Mancini-Griffoli et al., Casting Light on Central Bank Digital Currency, IMF Staff Discussion Note, Nov. 2018, at 29 (describing a CBDC design involving “preloading tokens onto a wallet”); Benoit Cœuré, The Future of Central Bank Money, speech at the International Center for Monetary and Banking Studies, Geneva, May 14, 2018 (“[C]entral banks today could make use of new technologies that would enable the introduction of what is widely referred to as a ‘token-based’ currency—one based on a distributed ledger technology (DLT) or comparable cryptographic technology.”).

When it comes to U.S. monetary policy, the Federal Reserve looms large. But a lesser-known agency also plays an important role: The Office of the Comptroller of the Currency (“OCC”). Congress created the OCC in 1863 — fifty years before it set up the Fed.[1] Congress charged the OCC with chartering, regulating, and supervising a system of “national banks.” Today there are 1,200 of these privately-owned federal instrumentalities. They issue and maintain $15 trillion of deposit balances, and these balances — not the paper notes issued by the Fed — make up the vast majority of the U.S. money supply.

Exactly two years ago, the OCC announced that it would begin granting new “special purpose” national bank charters to financial technology (“fintech”) companies that do not issue or maintain deposit balances. These new national banks would be exempt from federal regulations governing depository institutions, while still benefitting from the federal status national banks enjoy. Thus, they would be entitled to ignore many state business regulations as well as large portions of the federal securities laws (from which banks are explicitly exempt).

In September 2018, the Superintendent of the New York State Department of Financial Services (“DFS”) challenged the OCC’s proposed charter in federal court.[2] It argued that a nondepository national bank was an oxymoron. In October 2019, the Honorable Victor Marrero agreed, entering judgment in favor of New York and enjoining the OCC from issuing its proposed charter. In December, the OCC appealed. The substantive question presented in the appeal is whether the OCC has the authority under the National Bank Act (“NBA”) to charter nondepository national banks.
This week, thirty-three banking law scholars[3] filed a brief in support of the DFS.[4] The brief — available below — argues that the OCC has no such authority. It explains that the OCC’s position is based on a fallacy: that “banking” is just another word for “lending.” As the amici put it:

Banking involves lending, but mere lending does not constitute banking. When a bank makes a loan, it posts a credit in the amount of the loan to the borrower’s deposit account. It need not have any cash on hand. By contrast, before a nonbank lender can lend, it must procure cash or its equivalent. Thus, while nonbank lenders “deal” in money, “banks do not merely deal in[,] but are actually a source of, money.” United States v. Philadelphia Nat’l Bank, 374 U.S. 321, 326 (1963) . . . [I]t is for this reason that banks are subject to strict federal oversight.

A ruling in favor of the OCC would conflate banks’ permissible activities with their essential activities. While, under prevailing doctrine, national banks are permitted to engage in a wide range of financial commerce, the OCC does not have the power to charter entities that do not augment the money supply. The OCC’s contrary position contravenes not just the text and purpose of the NBA, but also the Federal Deposit Insurance Act, the Bank Holding Company Act, and the Federal Reserve Act, the last of which it would undermine by giving nondepository companies that play no role in monetary policy the ability to participate in selecting six of the nine members of the Boards of the regional Federal Reserve Banks. The consequences of a judgment in favor of the OCC would also extend far beyond money and banking — opening up the possibility of general business incorporation at the federal level for much of the financial sector and perhaps large portions of the nonfinancial sector.

For those who are interested in the case, we have included links below to other public documents, including an amicus
brief filed by Wharton Professor David Zaring in support of the OCC’s position and several amicus briefs filed in support of DFS.

**Documents Related to Spotlight:**

District Court Opinion

Brief of 33 Banking Law Scholars

Brief of the OCC

Brief of the DFS

Brief of David Zaring

Brief of ICBA

Brief of Consumer Groups

Brief of State Credit Regulators

Brief of State Conference of Banking Supervisors

[1] And twenty-five years before it created the Interstate Commerce Commission, what is often erroneously considered to be the country’s first regulatory agency.


In this brief post, I attempt to summarize the main themes that emerged from the *Just Money* roundtable on banking. In ten blog posts between January and March 2020, before the coronavirus pandemic turned the world upside down, our contributors set out to answer the question of what it is that banks do; and more importantly, why understanding what they do is so important. The prompt for the roundtable asked our contributors to discuss the two known paradigms about how banks work: on the one hand, the view that banks intermediate funds between savers and borrowers (often the ‘orthodox’ view), and, on the other, that banks create money through lending (the ‘heterodox’ view). Most of our contributions also address, some more directly than others, what is at stake in choosing between these views about banking. Our contributors, as we will see, disagree on how and whether the choice of
paradigm dictates normative choices about the regulation of financial market entities, and, perhaps more fundamentally, whether the debate over views about banking is enmeshed in a broader ideological struggle about the relationship between public power and economic activity.

Marc Lavoie, in the first contribution to the Roundtable, answers the prompt most directly, offering a clear statement of the heterodox ‘money-creation’ view and its venerable historical antecedents. For Lavoie, this view puts the difference between the banking system and the ‘shadow-banking’ system in sharp relief – and thus offers a path ahead for regulators in handling crises in financial markets. Howell Jackson on the other hand, argues that policy makers ought not to abandon the orthodox intermediation theory, because crises such as bank runs are, in his view, events of dis-intermediation. For Jackson, the intermediation theory persuasively describes the behavior of practical bankers, always interested as they are, in acquiring their deposits. And this, in my view, opens up an interesting question: in picking between these two theories, should we look for one that best approximates the experience of bankers or one that best captures some fundamental dynamic about the banking system? The case that Jackson and Charles Kahn make is that intermediation view describes the constraint that bankers face in lending. Others, as we will see below, believe that this constraint is a tangential consideration in picking the better theory.

Sir Paul Tucker, formerly of the Bank of England, argues that there is nothing heterodox about the view that bank deposits, which are money, are created by banks in their act of lending. But for reasons of mathematical simplicity, the idea that banks intermediate funds according to rules of fractional reserve banking and the related idea of the ‘money multiplier’ are embedded in economics textbooks. These concepts may have made better sense in a context where central banks regulated a
bank’s ability to create money by controlling the supply of reserves, not in the (more current) context where the primary policy tool for central banks is regulating interest rates. Tucker’s bigger takeaway, however, is that debating theories of banking is to put the cart before the horse. What matters more is to craft policy measures that keep the monetary system stable, given our agreement that banks affect the money supply and are volatile institutions. In a stable monetary system, where bank deposits are safe assets, banks will be able to drive money supply by extending credit.

But others take the flip side of Tucker’s cart-and-horse. They argue that the view that we adopt about the nature of bank activity shapes our approaches to bank regulation. For Morgan Ricks, the distinction between the two views of bank operations influences the question of how to regulate financial entities at a normative level. In his view, the ‘intermediation’ approach primarily serves to blur the distinction between banks and other financial institutions in service of two conservative policy outcomes. First, the intermediation paradigm suggests a deregulatory bias for banking, since it appears similar to other financial entities and second, the paradigm invites other financial market participants, such as hedge funds, to stake claims for support from the central bank. Stephen Marglin echoes Ricks by noting the mediation orthodoxy is ultimately an “ideological tool in the fight for deregulation.” This is why it remains in textbooks, despite the flawed underlying assumption that banks play a passive role in the economy. For Marglin, the difference between the two views on banking does not turn on the question of how constrained bankers are in making loans (indeed, he admits that reserves can be constraining). Instead, it turns on understanding whether reserves or the money multiplier are exogenous to banking activities — a premise he rejects. Reserves and the money supply are determined by the actions of bankers, which explains the frequent situation of excess reserves in the banking system.
One broad takeaway from Marglin’s contribution is that how we pick between the two ideal-type accounts depends on some broader conceptions of the field of macroeconomics. This much is evident in the disagreement between Charles Kahn on the one hand and Kumhof and Jakab on the other. Kahn’s argument is that while it is true that banks create ‘money’, this is predicated on defining money to include bank deposits and to exclude many other forms of credit. Conceptually, for Kahn, the important consideration is not whether an asset (debt) is money, but whether it is liquid – for if it is liquid, it can function like money. If the more relevant macroeconomic variable is liquidity, then banks are similar to many institutions that issue, or are capable of issuing, liquid debt. Without the backing of deposit insurance, or implied too-big-to-fail protections, banks would be constrained in issuing debt, just like other financial institutions. Thus, Kahn argues that without reference to the macroeconomic context in which particular banks operate, it would be misleading to state that bankers can simply issue debt with the ‘stroke of a pen.’ To Kahn, given that there is nothing fundamentally exceptional about banks, the intermediation paradigm is a good fit.

Michael Kumhof and Zoltan Jakab disagree pointedly. For them, focusing on liquidity as the appropriate marker for differentiating (or obliterating the difference) between banks and other financial institutions is a mis-step, one that will undermine our understanding of crisis and regulation. Instead, the fact that a banker can create debt ex nihilo and a non-banking financial institution cannot (all conditions being equal), is critical. It explains why bank balance sheets are more fragile and why the increase or contraction of money flow is much faster in response to slight perceived changes in macroeconomic conditions. Their point, of course, is not to deny that bankers are constrained in how they make out loans, but that the constraint is ultimately based on the banker’s view of profitability, which is theoretically (yet
significantly) distinct from the need to first have attracted deposits.

I noted above that Morgan Ricks approached the debate between the two views of bank operations as a proxy for the fight for deregulation. For Daniel Tarullo, this overestimates the significance of differentiating between the two views. Deregulation created a financial system with a shrinking role for traditional deposit-creating (or deposit-taking) banks and increased prominence of ‘shadow banking’ institutions, paving a path to the 2008 crisis. Given that the financial crisis arose out of risks that had little to do with traditional banking, for Tarullo, the importance of picking the right view of how traditional banks work is exaggerated. Instead, for Tarullo, managing risks in the financial system requires a stronger regulatory framework for non-banking financial entities, even if that does not exactly mimic traditional banking regulation.

We might differ with Tarullo however, if we believe that views about banking are embedded within larger frameworks about the relationship between finance and economic activity. As Christine Desan argues, the intermediation view about banks bears an emphatic connection with the idea that economic activity is the outcome of individual initiative: saving and borrowing. Taken as truth, this casts a shadow over our understanding of the history of economic development and the role of state institutions. Thus, Desan places the debate about banking operations within a set of discourses that constitute the neoclassical *veridiction* for the State’s role in the economy. We are led to mistakenly believe what the drivers of economic development were, and thus to forget that it was creation of novel forms of credit, not the accumulation of existing funds, that prompted capitalist growth.

Like Desan, Hockett and Omarova take to task assumptions about the essentially ‘private’ nature of banking activity. Flipping the intermediation account on its head, they argue that banks
intermediate between us (as the sovereign people) and our ‘selves’ (as private actors). In their account, when a bank creates money by issuing credit, this is a way of transforming our private credit-worthiness into a public form, backed ultimately by the ‘full faith and credit’ of the polity. It is this ‘full faith and credit’ that banks are capable of putting into circulation—making them franchisees of the ultimate asset of the sovereign state.

As I noted at the start, at the heart of this Roundtable prompt was the question of what is at stake when we investigate what is it that banks do? Here, I might simply paraphrase from Christine Desan’s contribution addressing what her colleagues understood the stakes to be—matters of disciplinary accuracy, normative questions of regulation and macroeconomic policy, the relationship of public power to private economic action, or of “expositional fit.” To this mix, she adds her own—our understanding of the process of economic development, and thus she concludes that “the stakes could not be… bigger.” I am tempted to agree with her. How we interpret the world of banking appears linked to how we understand some fundamental aspects of production and distribution in society. The distributional stakes remained somewhat hidden from view in this Roundtable, but they lurk under the surface. If banks are the “means of money creation,”[1] then the better account of banking will offer the better account of inequality. We will still have to answer whether a firmer understanding of banking fulfills the great task of philosophy—which is to change the world (for the better)!

[1] I owe this phrase to Christine Desan—it emerged during our conversations over the last two years.
When discussions arose concerning the potential redesign of the US twenty-dollar bill, with the visage of Andrew Jackson replaced by an image of abolitionist Harriet Tubman, I was reminded of the scandalously neglected writing on race, money, and representation by the Kenyan feminist and political theorist Wambui Mwangi. Mwangi’s work on money includes an excellent unpublished University of Pennsylvania dissertation titled *The Order of Money: Colonialism and the East African Currency Board*, alongside articles in the academic journals *Geopolitics* and *Comparative Studies in Society and History*. Throughout, she explores many of the questions and themes of race and money animating the interventions hosted by *Just Money*. She also offers an important critical extension of these debates. Mwangi considers the political economy of colonialism that necessarily undergirds these conversations in the African context, but are also applicable, I would argue, to the United States — and to the debates over representation, race, and the design of twenty-dollar bill.

Mwangi’s *The Order of Money* is an important and innovative history of colonial currency policy that should be read alongside J. Lawrence Broz’ studies of the international
origins of the US Federal Reserve system and Eric Helleiner’s discussion of the emergence of national currencies.[2] Yet where these studies, and many others beside them, utilize a top down approach to money, finance, and the logistics and infrastructure of circulation, Mwangi’s research has taken a radically different approach. While she is well attuned to the institutional politics and the organizational architecture of finance in the colonial context, Mwangi also provides us with a pioneering example of what we might call monetary history from below. That is, she also writes of how Black subjects have used, or, more properly, abused, colonial currency. Through defacement and defilement, Mwangi shows us how everyday holders of currency engaged in small acts of autonomy, critique, and resistance that challenged the prevailing political and economic orders represented by colonial currency and from which colonial currency draws its political, economic, and symbolic legitimacy and authority. Racism — that is, white supremacy — is a constitutive part of these orders and, through the use of money, those normative colonial racial orders are challenged.

Mwangi’s Geoforum essay, titled “The Lion, the Native and the Coffee Plant: Political Imagery and the Ambiguous Art of Currency Design in Colonial Kenya,” (based on a chapter of The Order of Money) is a case in point. She begins the essay with an elegant and canny observation on money’s visuality. She writes that money is meant to be seen but not looked at. She draws a distinction between the basic registers of visibility required for the everyday practices of circulation and exchange, and those more critical optics of scrutiny and interpretation that are embedded in currency design and are central to the functioning of money as a symbolic representation of power. Drawing on Walter Benjamin, Mwangi’s distinction between seeing and looking anticipates a discussion of the tactile, febrile, and perhaps even affective registers through which money is experienced and understood on the ground, as it were. This distinction also gives us a
theoretical and conceptual pathway for further research into the history of money. Mwangi’s work does not so much invoke that age-old investigative adage to follow the money, with the end goal of understanding money’s sources of power and authority. Instead, her research prompts us to look at money, through a kind of counter-hegemonic exegesis of currency design by which the signs of power, often hidden in plain sight, can be read, interpreted, and, ultimately, destabilized.

In “The Lion, the Native and the Coffee Plant,” Mwangi provides detailed readings of not only the currency issues of the East African Currency Board (EACB), whose territory included Kenya, Uganda, Tanganyika, Zanzibar, Somalia, and Aden, but she also offers close comparative readings of the moneys of the various European colonialisms operating across the African continent. Quite brilliantly, she shows how forms of colonial administration were represented in currency iconography and design. Of the issues of the EACB, Mwangi notes how the face of the currency included a portrait of the reigning British monarch with text in English, Gujarati, and Arabic. Their reverse contained stylized images of a lion superimposed on Mount Kenya. Pointedly, the EACB currency, unlike that of other European colonial territories, was devoid of representations of African people. The currency’s iconography inscribed the foundational mythologies and imaginaries of white settler colonialism in the East African territories: that of the African landscape as empty and uninhabited.

Mwangi notes that from the 1920s to the 1950s, EACB currency and coinage design remained relatively stable and unchanging. Even though advances in printing technology encouraged potential forgery and counterfeiting, colonial authorities believed that design changes could potentially undermine trust in the currency. It was a belief based on a vision of Black illiteracy and incapacity. They believed that African people
would be disturbed by changes to the currency, and that change would undo the pedagogical work colonial administrators had done to teach them to accept and value European currencies in the first place.

However, by the mid-1950s, there was a sudden willingness among EACB officials to consider redesign of the currency. As Mwangi observes, the primary reason for this shift in attitudes was the onset of the armed insurrection against British colonial rule by the Kenya Land and Freedom Army (KLFA), pejoratively known as the “Mau Mau.” The revolt had an impact on all aspects of life in Kenya, including monetary exchange and circulation. Through a wonderful archival discovery, Mwangi demonstrates how the KLFA, or its supporters, used colonial currency as a means to both transmit ideas about the insurrection and, just as importantly, to undermine both the authority of the British and the divine status of whiteness in the colonies. In the files of the Kenya National Archives, Mwangi found a secret memorandum dating from 18 February 1955, written by the Office of the Director of Intelligence and Security and sent to the Secretary of the Treasury. Accompanying the memorandum was a defaced note, “a perfectly legitimate five-shilling note of the old King George VI issue, then still in fairly wide circulation.” Mwangi writes:

On the face of this note, however, over the inscription “The East Africa Currency Board,” and the signatures of the members of the EACB, had been scrawled the words “Mau Mau Very Good.” The portrait of George VI had been quite deliberately defaced and scribbled over. [3]

The British were highly attuned to the significance of the defacement of the iconography of the Crown, and the effective rewriting of the text endorsing the currency with the phrase “Mau Mau Very Good.” Fearing that the distribution and exchange of such defaced notes would encourage insurrection
and undermine colonial authority, the colonial offices withdrew it from circulation. Certainly, one can imagine the revelatory and revolutionary significance of the defaced currency for any African suffering under British rule who received, held, and then looked at such notes before passing them on to another colonial subject. The anecdote suggests a sly, subtly subversive intervention into the everyday practices of circulation, and of circulation’s role in colonial rule.

Mwangi’s reading of money in the East African context offers an important addition to our understanding of money’s uses and functions beyond its traditional, somewhat hoary, definitions as a store of value, a medium of exchange, and a unit of account. Instead, for Mwangi, money is also both a symbol of colonial power and a technology of what David Scott has called “colonial governmentality”[4] through which power is exercised at some of the most quotidian, everyday levels. More importantly, for Mwangi, money also takes on a paramonetary function as a bearer of the signs (and scribbles) of anti-colonialism. This paramonetary capacity creates a parallel circuit of circulation and exchange whose velocity is tied to insurrection, and whose worth might be thought of in terms of the production, circulation, and exchange of anti-colonial values.

The questions Mwangi raises concerning race, money, colonialism, and anti-colonialism bring us back, in a slightly circuitous way, to the United States context, to the meanings behind the Harriet Tubman twenty-dollar bill, and to the question of US racial capitalism, to use that suddenly ubiquitous phrase, that are by necessity embedded in any discussion of race and money. [5] Certainly, we can understand the desire, in some circles, to not only have Tubman represented on US currency, but to have Andrew Jackson removed. It is both a conciliatory gesture towards African American incorporation into the national polity and an
acknowledgement of a history of dispossessive violence and the lingering-on of a disgraced social and economic order. Yet, while the Tubman bill represents a desire for incorporation, and for recognition and redemption, it is a desire that does not question the fundamentally exploitative and racist political economy of the United States. The Tubman twenty represents representation without reparation. Or perhaps, it is a gesture guided by an idea that through the mere fact of representation, reparation is supposed to occur. In either case, such gestures presume that the “racial” in racial capitalism is merely a symbolic appendage to, not a structural foundation of, the political economy of US capitalism.[6]

It could be argued that depicting Harriet Tubman on the twenty-dollar bill actually promotes a misrepresentation and encourages a mode of misrecognition that resists Mwangi’s call to look at money. It asks us to reverse Mwangi’s optical progression. Instead of moving from seeing to looking, we are asked to revert from looking critically to merely seeing. Through this reversal, we are obscuring, or indeed, erasing the African American presence in the political economic history of the United States. We are encouraged to look away not only from the United States’ history of slavery and settler colonialism but also, if we follow the analysis of both Kwame Ture and Charles V. Hamilton in *Black Power*, and of Robert L. Allen in *Black Awakening in Capitalist America*, from the actual colonial conditions under which Black people in the United States are living.[7] This is to say nothing of the United States’ external colonies, of its long history of overseas military intervention and imperial venturing, and of the dollarization of the world as the engine of US neocolonialism.[8] Until such colonial relations have ended, perhaps the most faithful representation of the US economy remains Andrew Jackson, with his grim, stentorian countenance a constant reminder of the glorification of white supremacy and of the pure extractive violence of primitive accumulation that is the history of the United States.[9]
Mwangi observed how one of the colonial reactions to the Mau Mau insurrection was to begin a process of currency redesign. For the first time, Africans were depicted in East African currency. It was not an act of decolonization. Far from it. As with the demand for Black representation on US currency, it was meant as a conciliatory gesture, in this case one that would reconfigure, preserve, and extend British colonialism. Mwangi’s research suggests that we should be wary of such conciliatory gestures, that we should resist those invitations to see without looking. We would do well to deploy Mwangi’s analysis of currency in the British colonial territories in East Africa to think through the monetary history of the African American colony within the United States. Her work has the potential to provoke an audacious and radical research agenda on race and money in the US context. It asks us to search for those defaced, defiled, and discarded currencies in the US colonial archive, and to properly look at the history of money and currency design as it is reinscribed and rewritten from below.


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**S. Das, Roundtable Wrap-up**

June 29, 2020

*Sannoy Das, Harvard Law School*

*Download PDF*
The *Just Money* roundtable was convened to analyze policy responses, emerging mostly from monetary authorities, to the economic dislocations that occurred or became imminent as the coronavirus crisis hit every corner of the globe. Most of our contributions focused on the responses by the Fed in the United States – and while this is obviously limiting in one sense, in another we gained from zooming in on the actions and authority of that agency. The institutional role of the Fed in the American economy evolved in response to the 2008 financial crisis, and does so again here. The deployment of the tools fashioned in that crisis offers insight into the role that monetary authorities can, and should, play in the governance of the economy. The contributions here generally underscore the influential, even outsize, role that the Fed plays in shaping the course of the American economy. In fact, given the position of the dollar, the Fed’s interventions will surely have significant impact on other economies too, and will condition the response of other monetary and fiscal authorities.

Sixteen contributions were published between March and May – as America moved from the earliest days of scattered local lockdowns, to deeper and more widespread orders, to down shutters. These posts were written in the backdrop of a rapidly evolving context and speak to a wide range of questions. In this brief summary, I am going to attempt to distil a set of fundamental concerns from otherwise very divergent contributions. Naturally, I cannot capture all the arguments that all our authors made, and I try, post hoc, to draw connections between contributions that may be somewhat tenuous. Nevertheless, I hope this summary offers some helpful guidance on reading the roundtable. The entire roundtable – with a serial presentation of the contributions – is available here.

Several of our contributors ask a fundamental political question – as the Fed intervenes to protect the financial
system, and the Congress passes a trillion-dollar relief package – to whom do the benefits of these interventions flow? That distributional question sits at the heart of the Fed’s legitimacy and political identity, particularly as the COVID-19 crisis threatens to worsen escalating inequality.

Duncan Kennedy suggests that the Fed should buy up debt that is secured by mortgages over low income housing properties, conditioning this bailout on the landlord extending protection to tenants. Similarly challenging the Fed’s focus on shoring up banks, Gerald Epstein proposes that the Fed inject liquidity into municipal governments by accepting new forms of local and state bonds – paper issued on the basis of local human capital rather than tax revenue. Certainly, both these interventions would fall within the scope of the Fed’s powers, but they involve going beyond the role that economists conventionally assign to a central bank. To be sure, in 2008, the Fed acted in ways that went far beyond what conventional wisdom would have admitted; donning the avatar of Oscar Perry Abello’s ‘Brave New Fed.’ This is precisely the argument now – that any constraint on the Fed acting for benefit of the American working class is ideologically constructed. In the broader context of how politics responds to the pandemic, J.K. Moudud underscores this point about ideology, arguing that we must look beyond the ‘market fundamentalist’ obsession with shoring up stock markets and economic growth alone in response to a crisis. By contrast, Dan Awrey mounts something of a defense for the Fed’s conventional intervention to back up banks and financial institutions by stabilizing the money market. To be sure, Awrey’s point is not to deny the importance of monetary system reform for the benefit of American households, but merely that the Fed’s ‘subsidies’ for Wall Street are not entirely without social purpose.

Fundamental to Keynes’s challenge to nineteenth century economic wisdom was the insight that workers don’t bargain for a real wage – they bargain for the money wage. If what matters for a stable and equitable economy is money in the
hands of people, Katharina Pistor and Robert Hockett, in slightly different ways, suggest that rethinking how the dollar circulates as currency can serve that purpose. Pistor, borrowing from the history of cooperative monies, suggests that the central bank should issue a digital currency – ‘Free Dollars’ – that depreciate over time so that recipients are incentivized to spend. Hockett, similarly, suggests utilizing the existing digital architecture of the Treasury to create digital ‘treasury dollars’ that people can spend from their treasury direct wallets, and which would be convertible to Fed dollars. Despite important differences between these two proposals, they have two insights in common. First, they agree that money is ‘created’ by the banking system because that system is backed by the sovereign. Accordingly, new ways to create money for the benefit of the people are always within sovereign prerogative. Second, and as I noted above in respect to other posts, they reiterate that our assumptions about the Fed’s role being limited to managing the ‘financial’ system are ultimately tenuous. Leah Downey sharpens the focus on this point by reminding us of how the abiding divide between monetary and fiscal matters serves to blunt the possibility of transformative political interventions in times of crisis. And Saule Omarova notes that once the economy comes to be sustained on the basis of monetary and fiscal interventions, there is good reason to reconsider the possibility of a developmental role for the State by instituting a national investment authority.

Enduring questions about the vulnerability of a financial system in uncertain times appear in three contributions: one by Nadav Orian Peer and two by Carolyn Sissoko. They address matters of risk assumption by financial market participants and the regulation of that risk by the Fed. Orian Peer addresses the rise in transactions in the ‘sponsored repo market,’ different from the tripartite repo market, where participants are better regulated by the Dodd Frank Act and Basel III norms. The turn to sponsored repo transactions, a
case of regulatory arbitrage (which Orian Peer, with literary flourish, describes as an existential feature of the human condition), threatens the stability of the financial system by undermining the regime of regulatory oversight over repo transactions that followed the 2008 crisis. More concerning is how this ‘sponsored repo market’, now unwittingly supported by the Fed, would affect its future response as a financial crisis looms large following the pandemic. Carolyn Sissoko points to the more general volatility of a financial system with high volumes of repo transactions. The nature of the repo market makes it inevitable that any decline in the value of assets that are collateral for repo borrowing (the inevitable outcome of some negative sentiment in the economy) will lead to margin calls from repo lenders, triggering a ‘fire sale’ of assets, all the way down to the otherwise safe Treasury bonds. As this played out in March, the Fed intervened to stabilize Treasury bonds, but with negative sentiment always just around the corner during a pandemic, the dark clouds of a crisis gather overhead. In another contribution, Sissoko turns to a more fundamental question of risk and bailouts under capitalism. State capacity under capitalism exists because the private sector is characterized as risk bearing. Bailouts threaten that underlying compact and must for those reasons (rather than the more ubiquitous ‘moral hazard’ arguments) be considered with caution.

Two contributions by J. van’t Klooster and E. Saeidinezhad, in very different ways, offer some perspective on the global context for the Fed’s interventions. Saeidinezhad explains how the Fed’s re-establishment of central bank swap lines with five other major central banks was designed to ensure stability in the ‘Eurodollar’ market (foreign deposits denominated in US dollars), when instability became inevitable with the disruption to global trade and supply chains. Thus, paradoxically (or not), the risk emanating from a disruption of the chained global ‘real’ economy could only be managed by the further globalization of money. Van’t Klooster offers a
brief comparative insight into the Fed’s willingness to inject liquidity against that of the European Bank. Their point is to demonstrate that while central bankers have committed to “do whatever it takes” to keep the wheels of the financial system well-oiled, they are simultaneously concerned about managing the central bank’s exposure (more so, in Europe). Central bankers guard against risks of ‘technical insolvency’ in order to retain their regulatory authority; committing to large scale quantitative easing requires bankers to overcome their fear of insolvency. Unlike those who might dismiss this view of insolvency risk as pure ideology, Van’t Klooster takes this psychological condition seriously, and argues that it accordingly makes sense for the Congress to earmark a part of the relief package for the Fed itself.

Finally, while many of our contributions are invested in the thickets of monetary policy, two pieces by James McAndrews help us think more generally about managing the economy in the midst of a crisis. How we evaluate effective economic policy depends on our basic sense of how the world (the economy) works. Thus, McAndrews suggests that if we diagnose the economy as a set of circular flows, and the pandemic causes leakages in particular streams, then policy prescriptions designed to fix one set of flows can generate imbalances elsewhere. Therefore, monetary policy fixes – designed to increase available credit – must be applied alongside interventions that provide income support, increase flexibility of repayment on existing debts, and enable workers to steadily rejoin the economy. Along similar lines, in his second contribution, he reminds us that our current crisis did not arise on account of a particular problem with the money market. Accordingly, standard tools of monetary policy will likely be insufficient, and attention must be paid to support firms through the crisis. Policy must evaluate which firms to prioritize for support, and how best to support them.

Following leads from the contributions to the Roundtable,
we’re left with many ways to think about monetary (and fiscal) interventions in a crisis. The conventions by which we conceptualize and implement these interventions may be suspect (Downey, Omarova) and ideologically constructed (Moudud). They include our notions of what the “economy” is (McAndrews), and influence our judgment about the distributional stakes (Kennedy, Epstein, Abello, Awrey). Indeed, a distributional question is subtly at play in how we think about all matters of finance – how currency circulates (Pistor, Hockett), how risk and profit are engineered at the level of high finance (Orian Peer, Sissoki), and how monetary dynamics are tied together globally (van’t Klooster, Saeidinezhad). I might close with a word of caution: our view of the present is often fragile. In the years to come, how we evaluate this period of crisis might be well beyond our grasp at the moment.

Virtual Roundtable— “Making Money American: The Monetary Regimes of the New United States”

Thursday, October 1, 2020, 11:00 am-1:00 pm

Register here

The Rhodes Center for International Economics and Finance at
Brown University is pleased to announce a virtual roundtable on new directions in the history of money in the Early Republic United States. This event will take place on Thursday, October 1 from 11:00 am to 1:00 pm eastern. The roundtable will address the history of money as an emerging interdisciplinary field; explore emerging conversations at the intersection of history, law, economics, and political economy; and consider how the distinctive monetary regime of the new United States broadens our understanding of money as a historical project.

Panelists include:

Christine Desan, Harvard University
Jane Knodell, University of Vermont
Jeffrey Sklansky, University of Illinois at Chicago

Although this event is open to the public, registration is required. You can sign up and learn more at this link.

You may contact Ann Daly ann_daly@brown.edu and Seth Rockman Seth_Rockman@brown.edu with any questions.

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**D-DebtCon Happening This Week!**

From our colleagues at the Institute of International Economic Law: the Distributed DebtCon is **happening this week.**

All information for past and upcoming sessions, including paper and video links can be found here.
Launch of the Financial History Network and Webinar Series

Justmoney.org is passing along the below announcement from our colleagues at the Financial History Network:

Dear colleagues,

We want to inform you about the launch of the Financial History Network (@financialhist) and its webinar series. The network aims to promote scholarship in the fields of financial history and the history of finance, broadly defined. The network will launch a webinar series in September 2020 to provide a space for the presentation and discussion of works in progress, dissertation chapters, or R&R manuscripts. The webinars are open to scholars primarily from a qualitative perspective, willing to engage in productive conversations by providing supportive and constructive comments to peers.

We are currently looking for presenters and attendees to get things moving forward. We especially welcome submissions from graduate students and early-career researchers. We strongly encourage women, people of color, members of minority groups, scholars based in or working on under-represented geographies (such as Latin America, the Mediterranean Basin, the Middle East, Africa, and Asia), and scholars from disciplines other than economics and history to participate in the webinar series.

We are aware there are alternative outlets like the Bonn Macrohistory Seminars, the YSI Economic History Graduate Webinars, and the Virtual Economic History Seminars. We aim to
complement these initiatives by giving prominence to works that employ a more qualitative or institutional perspective in the fields of financial, banking, monetary, and accounting history, the history and sociology of finance, and the history of capitalism. We are also open to other approaches.

If you are interested in taking part in this initiative, please fill in the form here. You will be able to choose whether you want to join as a presenter, a discussant, as a member of the audience, or to help organize future webinars.

The webinar sessions will take place once a month starting in September 2020 on Mondays, at 5 pm Frankfurt / 4 pm London / 12 pm Sao Paulo / 11 am New York / 10 am Mexico City.

We look forward to hearing from you.

Kind regards,

Bernardo Bátiz-Lazo (Northumbria University (Newcastle), United Kingdom)

Manuel Bautista-González (Columbia University in the City of New York, United States)

Sergio Castellanos-Gamboa (Prifysgol Bangor University, United Kingdom)

Paula Vedoveli (Fundação Getulio Vargas, Brazil)

Financial History Network

Website / Twitter / Email

Join the network here.
The LPE Project is Hiring!

The Law and Political Economy (LPE) Project, housed at Yale Law School, is seeking a Deputy Director who will play both an organizational and intellectual role in the development of the Project, as well as have approximately 50% of their time to focus on their own scholarly or scholarly-adjacent research and writing.

The ideal candidate will be at the early stages of a career in legal scholarship, advocacy, or policy and will have a developed and independent set of related interests. If this sounds like you, one of your students, or someone you know, please apply and/or encourage them to apply!

Applications will start being reviewed August 1st and continue on a rolling basis until the position is filled.

Details available here: https://lpeblog.org/jobs-and-fellowships/

D. Golumbia, Why Do We Keep Taking the Cryptocurrency/Blockchain
In the longer piece on which this one follows, I do what I can to show that nearly all of the claims for cryptocurrency and blockchain are false, and most are based on outright fraud.

If this is correct, it leaves us with a glaring question: why does the crypto-blockchain story persist, and why does it attract so much attention, despite its being false and/or fraudulent?

Some of the answers are obvious. Clearly, the fact that a lot of people have made a lot of money on Bitcoin and other cryptocurrencies is a big part of it. Of course, in every way, that money was earned via get-rich-schemes and other scams. Even those have an obvious attraction for many of us.

A slightly less obvious answer is ironic. Crypto advocates love to say that blockchain technology is “censorship-resistant,” a claim that has driven development of blockchain and cryptocurrency from the fever dreams of far-right cypherpunks. In their minds, software must be allowed to run, preferably anywhere, regardless of what governments—democratic...
or otherwise—say about it. Not just software as written code, but the running of code itself, is speech, they say, and so any attempts to regulate what software can do is “censorship.” (This claim, like so much that animates cryptocurrency, is entirely fraudulent, based on a fantastic misrepresentation of case law advocated by “digital rights” organizations up to and including the cypherpunk-founded Electronic Frontier Foundation.)

One of the true technological innovations in blockchain is that it is, indeed, very hard to shut down. No matter how much energy it wastes, as long as there are processors to run it, energy to power the processors, and network connectivity to share transaction data, it is hard to imagine how it could be shut down entirely. (To many critics, that is not a good thing.)

This makes for a truly interesting phenomenon. I’ve argued at length, following the work of legal scholars, that running software is not and must not be viewed as speech. According to that reasoning, it is false to say that blockchain is uncensorable; stopping it would not be censorship. But practically speaking, at least so far, it is apparently unstoppable, or at least difficult to stop. And because it is unstoppable, people keep talking about it: and so in practical terms, blockchain itself might not be uncensorable, but talk about blockchain does appear to be uncensorable.

This kind of paradox or double truth is found everywhere when we contemplate the guiding question of this essay. Blockchain works, but it doesn’t; cryptocurrency isn’t money, currency, cash, or securities, but it is continually called that, and many people treat it as if it is, and so on.

This has created a powerful cognitive dissonance that haunts all aspects of blockchain discussion. Blockchain is used for almost no real-world purposes, and almost none (and maybe none) of the purposes claimed for it, while people talk about
it incessantly. Yet many technologies are used for those purposes, often ones that pundits claim blockchain will replace, and virtually nobody talks about those. Why is it so much more interesting to talk about blockchains that don’t do very much, than it is to talk about the flavors of SQL, iterations of HTML, spreadsheets, relational databases, existing encryption schemes used by banks, and so on? In reality, implementations of these software products and packages dwarf implementations of blockchain to such a degree that, if drawn on a graph, blockchain would not be visible at all. These technologies really have changed the world. They interest almost nobody, at least not in the breathless, “revolutionary” manner that blockchain does, particularly with regard to culture in general.

The stark disconnect between those revolutionary cultural claims and the facts of what the software does has always seemed to me the real story of cryptocurrency and blockchain. As time goes on, this only comes to seem more and more true.

One of the most interesting notions in discussions of digital technology (and all technology) is the idea that when a technology is really useful, it becomes invisible. The sentiment is sometimes associated with Steve Jobs talking about the technology used by Pixar for animating Toy Story around 1995, and sometimes with Dev Mukherjee, who in 2003 was a Vice President for Strategy at IBM and in a speech at a business conference stated that “technology becomes truly useful when it becomes invisible.”

Technologies like SQL, HTML, relational databases, the iPhone as a whole, and so on have become “invisible” in this sense: they serve hundreds of thousands or millions of users, frequently at enormous scale, and yet most of those users could not tell you a thing about how they work, if they know they exist at all.

That doesn’t mean the iPhone is invisible: it means that the
iPhone itself is made up of thousands of technologies synthesized together, and that outside of development circles, and even inside of them, virtually nobody knows how they do what they do. They work: that’s the important thing.

Blockchain is the opposite of invisible. It isn’t just visible, it’s *ultravisible*. It’s visible even when it isn’t actually doing anything. In not a few corners of the internet, it’s basically the only technology anyone talks about, and they talk about it a lot.

Yet it hardly does anything. Blockchains run, to be sure: but do they do anything at all for consumers, companies (other than those in the blockchain space itself), or other users the way SQL or accelerometers do? It’s not even a fair question: it is hard to find any credible examples of blockchain working that way.

This also isn’t to praise invisibility per se. Those of us who study technologies, culture and cultural systems are often committed to exposing exactly how things work that go almost entirely unnoticed. I would love to see more thick cultural criticism about things like the movement and position sensors in iPhones and the cultural affordances of relational database models. And, as the work of the scholars of money contributing to and organizing this forum suggests, money itself, which remains in far too many ways not just invisible but resistant to rigorous analysis.

Many of us are drawn to proven, clear, or at least plausible stories of achievement and advancement. Some, arguably fewer than those, are drawn to stories that are at best unlikely and more often altogether implausible. Much as a considerable portion of the current Republican base is drawn to stories about climate change, abortion, evolution, and the conduct of prior Democratic administrations that make their lack of contact with reality central pillars of their appeal, far too many are drawn to blockchain and to cryptocurrency precisely
because its promises are implausible. They promise to “stick it to the man,” even if we have no good idea who “the man” is or why we are “sticking it to him” by proclaiming that the US dollar has lost 95% of its purchasing power in 100 years, or that the Earth is flat. And the blockchain story is similarly resistant to fact-checking—indeed, it seems to benefit, like climate change and Flat Earth stories, from the certainty with which it can be disproven. Try arguing with a cryptocurrency devotee over not whether what cost 5 cents in 1920 costs $1 today (which is true enough), but about what that means (almost nothing, since the price of everything, including labor, has risen at about the same rate, so that if you had 5 cents in 1920, you are also likely to have $1 today) and you’ll encounter just the kind of dramatic cognitive dissonance I’m gesturing at.

Blockchain and cryptocurrency attract those who find simplistic explanations superior to complex ones, and to people who (consciously or unconsciously) identify with the perpetrator and not the victim of fraud. This is part of why the project is so inextricably bound up with right-wing politics: no matter how much rhetoric it uses of “helping” the “disadvantaged,” the blockchain proponent or software developer nearly always depicts him- or herself in the position of power. Frequently they engage in a version of rhetorical three-card monte, pointing at (often simplistic, but sometimes accurate) problems with world financial systems as “proof” that the world needs cryptocurrencies including Bitcoin, despite having not only no evidence that Bitcoin addresses those problems, but having to engage in significant deception about the ways that Bitcoin usually only offers to make those problems worse, sometimes much worse.

Despite the fact that blockchains will undoubtedly continue to run, until and unless they start to be adopted with anything like the scale and influence that technologies like the iPhone and SQL are, it would behoove informed commentators to refrain
from speaking as if they are anything but a very specialized and new form of “vaporware”—technology that exists, but that does not do what is claimed for it. Further, if and when blockchain does start to do any of the things claimed for it, discussions of its role must remain grounded in well-informed analyses of the other technologies and systems within which it is embedded, and must be able to answer the question: why are we paying attention to this, instead of something else?

M. Ralph, Finance and Violence

July 17, 2020

Michael Ralph, New York University

I got lynched by some crooked cops. And to this day, them same motherfuckers getting’ major pay. But when I get my check, they takin’ tax out. So we payin’ for these pigs to knock the blacks out.

Tupac, “Point tha Finga” (1993)

In the past few months, longstanding critiques about mass incarceration and police abuse have pushed a plea familiar to abolitionists into commercial journalism and casual conversation.
“Defund the Police.”

It is a fascinating and captivating demand because it distills the two essential features of policing: finance and violence (or, it would be “violence” except that concept refers to the excessive or illegitimate use of force). Prosecutors and judges indifferent to police killings of unarmed African Americans frame the use of force by police as always, inherently, legitimate. Oppressed people call it “state violence”; the privileged, “law and order.” This is America.

While corporations churn out press releases declaring their support for #BlackLivesMatter and affluent allies and academics debate the texts they prefer to include on anti-racism reading lists, low income and working class African Americans (women, in particular) have spent even more time during the past few months doing what they have been doing for the past decade—and increasingly for the past few years, that is, throughout the Trump era—sharing strategies for building wealth and acquiring expertise in firearms. In other words, “defund the police” hooks into the priorities of rank and file African Americans about how to defend the value of their lives in terms of what life means as a precious resource. This is what makes life “matter” and what matters in how we discuss policing.

In other words, low-income and working class black people realize the conversation about why black lives matter is a debate about the value of black lives in practical terms. They also realize that the value of life is tied to the forms of policing and militarism used to defend lives—or to take lives. This means the value of life is central to the history of policing in the same way that it is central to the history of insurance: together, the history of finance and violence.

It is perhaps no surprise that police departments and law enforcement officials sometimes contract insurance policies worth millions of dollars they can use to pay settlements when
they are sued for having used extralegal force to injure or kill someone. Chicago may be battling a deficit of more than $838 million but it has spent over half a billion dollars on settlements for police abuse this decade (including more than $113 million in 2018). Minneapolis—where police officer Derek Chauvin killed the unarmed African American man, George Floyd, on May 25th sparking global cries for police reform—spent $20 million on a single settlement in 2017.

Police precincts sometimes use bonds—what some call “police brutality bonds”—to make settlement payments: claiming that million-dollar settlements drain their budgets, law enforcement officials take capital from investors in exchange for a projected profit. But since we are taxed to pay for law enforcement, we are ultimately the ones who pay for police misconduct. These financial partnerships let police evade accountability and help insurance companies generate record profits.

This relationship between finance and violence has been with us since the dawn of the republic. From the eighteenth century forward, US economic growth was fueled by marine insurance (through which merchants secured cargo—including enslaved people—shipped to these shores); fire insurance (to secure homes); and life insurance (to secure lives, as well as those of the enslaved people merchants grew their wealth by renting out after the slave trade was outlawed in 1808). The same era that witnessed the birth of insurance to secure cherished assets also witnessed the birth of policing to safeguard commerce and to protect property—including slave patrols made up initially of white slaveholders who banded together as armed militias to recover stolen property in the form of African people who escaped slavery to secure their freedom.

Just as law enforcement originated in antebellum slave patrols, the US armed forces derived from efforts to contain adversaries conceived as threats to national security.
The US Army was born from explicit efforts to dispossess and exterminate indigenous people. After the Revolutionary War, public concern about the limits of state power forced the Continental Army to disband. Yet, the state pursued a persistent interest in displacing the prior inhabitants of what is now the United States by passing the Militia Act of 1792 (and then 1795). The Continental Army was succeeded by the Regular Army, succeeded by the Legion of the United States until in 1796 it became known thereafter as the US Army.

With the Naval Act of 1794, the US Navy consolidated a state project to subdue African pirates who interrupted US commerce. Alongside these events, insurance was used to secure the value of property and other assets and to grow capital, while police, militia, military—as security forces—subdued perceived threats to law and order, protecting assets while eliminating obstacles to capital growth.

Capital is not a thing—it is a relationship. It entails an agreement by financial institutions that a person or corporate entity has exclusive access to an asset and that the state—i.e., the police or military—will punish unauthorized access to it. The state does the most to protect the people with the largest capital investments, leaving people with the least capital invested to fend for themselves. Thus, the counterpart to insurance is mutual aid: the community funds and projects people used before the birth of the formal insurance industry (and still use when they are denied access to it).

“Defund the police” is an explicit effort to mobilize medical experts, therapists, teachers, activists, scholars, and social workers rather than outsourcing the complicated task of running society to law enforcement officials who believe they can solve social problems without bothering to study them.

“Defund the police” is a call to revisit the capital relations that have created what economists call “moral hazard”: police
paid to brutalize—for Tupac, “beat”—African Americans, gender non-conforming people, and members of other despised groups. The fact that we are forced to subsidize our own subjugation adds insult to injury and financial liability.

“Defund the police” is part of a broader recognition that “reforms” make it too easy for police departments and insurance companies to make a killing.

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**Technology v Technocracy: Fintech as a Regulatory Challenge**

*Author: Saule Omarova, Cornell Law School*

This article examines fintech as a systemic force disrupting the currently dominant technocratic paradigm of financial regulation. It offers a five-part taxonomy of (i) the key fintech-driven changes in the structure and operation of today’s financial system, and (ii) the corresponding challenges these systemic shifts pose to the continuing efficacy of the regulatory enterprise as it exists today. This exercise reveals the fundamental tension at the core of the fintech problem. In the fintech era, the financial system as a whole is growing ever bigger, moving ever faster, and getting ever more complex and difficult to manage. The emerging regulatory responses to these macro-level changes, however, continue to operate primarily on the micro-level. Surveying the presently fragmented efforts to regulate fintech, this
article highlights the limiting effects of the technocratic bias built into their design. Against that background, it outlines several alternative reform options that would explicitly target the core macro-structural, as opposed to micro-transactional, aspects of the fintech challenge—and do so in a more assertive, comprehensive, and normatively unified manner.


The Phenomenon of Complementary Currencies

Author: Christian Gelleri

The Phenomenon of Complementary Currencies

In times of crisis, people often become creative in order to ensure the survival of themselves, their family, their peer-groups and their environment. Unconventional ideas, which are considered strange and weird in normal times, appear in a completely different way in times of need. When a collective creates its own currency, it tries to solve problems in a material world by defining a unit of account and medium of payment accepted by everyone within that community (Desan
Governments have often held a monopoly on the design and issue of money. In modern history, however, a private-public-partnership model has emerged in which the state defines the currency, but delegates most money creation to commercial banks (Desan 2017). Monetary policy in this framework aims to secure the value of a currency over time and foster high employment, economic growth and other goals of the state.

What motivates people to initiate complementary currencies? A common motivation is a sustained economic shock on the demand side, leading to low turnover and unemployment. A complementary currency offers the possibility of self-help by the participants buying goods from each other using a clearing unit. In this case, the complementary currency only serves to fill a gap in demand. Yet, people who create complementary currencies often have further aspirations. They dream of fair exchanges, of sustainable ways of life, and are critical of money-making for its own sake. These dreams result in very diverse complementary currencies reflecting different visions of their founders and different economic realities. The founder of American time banks, Edgar Cahn, fought for a lifetime against poverty and the deprivation of poor citizens. Cahn had the vision that, through his time bank, differences in the worth of labour could be mitigated, and thus community could be strengthened. Other visionaries in the field of complementary currencies were Margrit Kennedy and Bernard Lietaer, who dreamed of a resilient economic system without the compulsion to grow. For them, money was to serve people through tailor-made design and constant circulation (Kennedy et al. 2012).

When it comes to complementary currencies, one may first observe their variety on a spectrum between idealism and pragmatism. Communities make complementary currencies for many different reasons and according to a wide range of designs. Complementary currencies can be regarded as social innovations.
that respond to economic, social and environmental challenges. They must be distinguished from other parallel currencies which primarily pursue the objective of maximising profits. Those are not the object of this article.

We can distinguish between five types of complementary currencies (Kennedy et al. 2012; Gelleri 2008; Martignoni 2012; Seyfang und Longhurst 2013)

1. mutual credit currencies,
2. reserve-backed complementary currencies,
3. fiat complementary currencies,
4. digital peer-to-peer currencies, and
5. sectoral currencies.

1. Mutual credit currencies

Mutual credit currencies are the “mother of complementary currencies.” They are created within a community without the need for an external reference or reserve currency. They are used locally in noncommercial settings, between companies or in different areas of social life. Mutual credit currencies provide access to credit and liquidity for all those who can and want to contribute to the community. Credit creation is carried out by the participants themselves, but the credit limit is set by the joint institution. The more participants take part the higher is the potential limit. It’s mutual because the limits are mostly oriented on the capacity to perform for other participants.

1.1 Noncommercial mutual credit currencies

Local exchange trade systems (LETS) and time banks focus on the informal and noncommercial sector. The idea is to connect people beyond the logic of economic markets and match their respective capacities with their demand.
Both systems generally define one working hour as the internal accounting unit. Most exchange is done using this unit to measure exchange value. In times when conventional family structures and village communities are dissolving, LETS offer an opportunity to build social networks on a reciprocal basis. Participants start with accounts set at zero and get a credit limit to “buy” services from other participants. The community defines the limit for each participant. When the limit is ten hours you can buy goods and services that are worth ten hours of work.

When Scotsman Michael Linton introduced the first LETS system in 1983 he used a simple folder in which the hours were accounted for as “minus” for the buyer and as “plus” for the seller. Each booking was personally signed by the other participant. Today software is used for this bookkeeping purpose but the principle remains the same: With a minus, I owe services to other participants with a plus. There are a few thousand LETS worldwide, each with between 10 and a few hundred members. A spectacular development took place in Argentina in 2002, when exchange rings took over the function of official money with millions of people trading within LETS (Colacelli und Blackburn 2009).

Many participants in LETS reject the designation of their system as “money”. They perceive the current monetary system as highly unfair and prefer the term “exchange” or “barter”, even though the concept of barter does not really capture the kind of exchange facilitated by LETS. In fact, credit units are being created and circulated.

**Time banks** set the value of the internal currency unit to one hour of work and try to motivate participants to exchange one hour for one hour. They cooperate more often than LETS with local government agencies and philanthropic foundations. There are large timebank networks in the US, as well as in Australia and the UK. Statistics in the US on timebanks show more than 2.5 million hours worked over a fifteen-year period. British
timebanks have run up more than 4 million hours in the last ten years. Some participants report that they have lived completely from such noncommercial mutual credit systems not using any official money for several years.

The work exchanged through time banks includes care work for the elderly and children, assistance for people with special needs and neighbourly exchanges. In many places, time banks operate to redefine the concept of work and to strengthen social cohesion.

1.2 Commercial mutual credit currencies

Commercial mutual credit currencies are often used to “fill the economic gap” in times of deeper recessions. Usually they are called “barter systems”. Again, the term is as misleading as in the case of LETS. Sometimes commercial mutual credit currencies are also designated as counter trade exchange or credit-clearing exchange. Typically these systems have no central lending authority, which distinguishes these mutual credit currencies from credit moneys produced by banks.

Most of these systems refer to the national currency as the unit of account. Internal credit is created by the act of purchase. Each participant is accorded a purchase limit that is based on simple criteria, like the number of their employees or the expectation of future performance in the network. While the buyer incurs a liability, the seller receives a transferrable general claim which cannot be exchanged into national currency. The purchase of goods results in a minus (mostly interest-free) for the buyer and a plus for the seller. This process can be described as an act of decentralized money creation insofar as the positive balance can be used to make further purchases from other participants. Once the network reaches a critical mass, the possibilities for reusing the credit currency multiply and the system becomes more efficient. Large networks use digital platforms with trading and marketplace features that have low
transaction costs — lying between the costs of debit cards and credit cards. The ongoing exchange gives the internal unit the character of money. The process of credit creation and currency circulation only comes to an end when all participants spend their positive account balances matching exactly the negative balances of the other participants.

Successful networks often work with personal intermediaries that bring supply and demand together. They operate mostly on the national level or in larger geographical areas. Examples are Bartercard in New Zealand and Australia with about 6,000 businesses and a turnover of $150 million per year, and the Sardex in Sardinia with more than 3,000 businesses and a volume of more than $50 million in 2019. A few hundred commercial mutual credit currencies exist globally. Most of them operate digitally only. Many are members of the International Reciprocal Transaction Association.

The oldest system in this field is the Swiss WIR, which is licensed to operate as a bank under Swiss law. The cooperative was founded in 1934 and is still active with many thousands of businesses participating. The currency creation of the WIR bank approaches that of a conventional central issuer. Participants borrow the internal currency from the WIR bank and circulate it within in the network. With more than 60,000 small and medium enterprises, the network reached turnovers of more than two billion Swiss francs and relevant shares of GDP in the 1990s when Switzerland was in a recession. Several studies have documented the anticyclical effect of mutual credit currencies (Stodder und Lietaer 2016).

The advantages of such systems are the synergies arising from network effects. Businesses can optimize their sales by using the possibilities of the regular market while also benefitting from secondary market of the network. Difficulties in the regular market can thus be bridged and compensated in many cases.
2. Reserve backed complementary currencies

Reserve-backed complementary currencies operate with the national currency or certain goods functioning as a reserve in order to enhance confidence in the complementary currency.

2.1 Regional currencies

Reserve-backed regional currencies are the most common form. They are emitted by local associations mainly to promote local business cycles, but also to promote further social aims.

Most initiatives begin with paper currencies set at an exchange rate of one-to-one against the national currency. Citizens buy the regional currency from the issuer and bring it into circulation by using it for purchases from local businesses that have agreed to accept the regional currency. The national currency serves as a reserve. Only businesses, not citizens, can exchange the regional currency back into the national currency. When they do so, they are charged a fee between zero and ten per cent, part of which is sometimes used for donations to local organizations. Re-exchange draws on the regional currency’s reserves. Therefore credit can only be extended up to a fraction of the reserves. Small systems often take no risks, and therefore usually hold reserves at 100%. Some regional currencies cooperate with cooperative and savings banks to use the reserve as a basis for loans to businesses.

Most regional currencies are time-limited and have maturities that are comparable to purchase vouchers. Individual regional currencies, such as the Chiemgauer, also operate with a negative interest rate, a strategy recommended for national currencies by Silvio Gesell (Gesell 1958/1916) a hundred years ago and advocated today by some economists, like Kenneth Rogoff (Rogoff 2017). The time limitation is used to keep the
circulation of money high and stable. Comparisons of the speed of money circulation ("velocity") show that regional currencies circulate at higher speed than national currencies (Gelleri 2009). Unlike national currencies, regional currencies do not function as a store of value, but only as a means of payment.

Regional currencies have shown their greatest benefits in times of deflation and depression. In 1932, a regional currency was created by the municipality of Wörgl. The city hired unemployed workers to repair streets and buildings, and paid them in the newly-created currency. Workers had the incentive to spend the currency, which was losing value because it was subject to a negative interest rate of one percent per month. Local businesses could use the local currency to pay municipal taxes. Thus, a local business cycle was established. Nobody was interested in hoarding the local currency. Within a very short period of time, unemployment was reduced by a quarter (Broer 2013). A legal ban, however, ended the experiment, preventing its spread to other municipalities.

Today, regional currencies still face legal hurdles. The key to the success of regional currencies is often that municipalities accept and make payments in them. Those actions may, however, put a municipality at odds with state authorities. When local taxes can be paid with local money, the importance of a reserve decreases. Digital forms have evolved in addition to the paper currencies, but only few regional currencies are digital only, such as the Sarubobo Coin in Japan.

2.2 Complementary currencies backed with energy or other goods

Some regional currencies do not use the national currency as reserve, but real goods such as food baskets or raw materials. In times of high inflation in the 1920s, some local
communities in Germany issued emergency currencies (German “Notgeld”), backed by cereals. In the 1930s, a proposal was drafted to cover the currency with a basket of goods and resources. Bernard Lietaer has taken up this idea again with his proposal of the global “Terra” (Kennedy et al. 2012). Individual regional currencies also use this idea and, for example, write a specific shopping cart of regional products on the back of a paper note. Another popular idea are energy-backed currencies going back to Shann Turnbull’s idea regarding a “renewable energy dollar” in 1977. The distribution is currently very limited because it is difficult to convince businesspeople to use currencies that require their own pricing. Digitalization may overcome this hurdle.

3. Fiat complementary currencies

Fiat complementary currency are the most difficult complementary currencies to imagine. Most national currencies can be understood as fiat currencies. They gain value because they can be used to pay taxes (Grubb 2012). In addition, there is the legal requirement in most countries that tax debts can only be paid in the national currency (Desan 2017).

We can thus imagine a community issuing a complementary local currency that it accepts (in addition to the national currency) for tax payments.

The American colonies made use of “colonial scrips” since the end of the 17th century, thus providing the basis for a regional economic upswing. In the beginning, guarantees were given for redemption, but these were abandoned over time because the provinces rarely had the means to make a material guarantee, while confidence in a currency that could be used for tax redemption increased (Grubb 2012). Similarly to taxation, faith could be a strong anchor insofar as it created demand for coins that were certified by temples and could be used as a means of sacrifice (Braun 2014). For complementary
fiat currencies, it is therefore most important to have a working anchor like taxes.

4. Digital Peer-to-Peer Currencies

Peer-to-Peer-Currencies are the youngest type of complementary currencies. They are a variant of fiat currencies, but with decentralized money creation and circulation. Cryptocurrencies are fiat currencies and derive their value from the participants’ trust. The model is cash passed from one person (peer) to another person (peer). No third party is needed to execute the transaction. It was a long dream of complementary currency pioneers like Michael Linton and Bernard Lietaer to implement digital peer-to-peer-currencies that would be easier to use than centrally-organized systems. Since the 1990’s, cryptographers like Whitfield Diffie and Ralph Merkle have proposed different software solutions, though none have gone into effect.

The inventor of Bitcoin drew on these ideas and proposed a technological solution based on distributed ledger and blockchain technology. Currently, cryptocurrencies are the dominant technical form for the implementation of peer-to-peer currencies. The rules are implemented in the software algorithm and they can only be changed within this design framework. Initially, only few people believed in bitcoin and 10,000 bitcoin were paid for two pizzas. Today, bitcoin is used as a store of value and is compared to “digital gold” because of the limitation on the creation of bitcoin. To the extent that this form of currency serves only to increase inequality and dependence on power structures, a purely technology-oriented debate leads to a dead end.

Peer-to-peer currencies are sometimes used to address social challenges. The point of departure for such currencies is not the technical creation of money, but a collective agreement on shared objectives and values. This agreement is then followed
by the design of a currency as an instrument to achieve these objectives. In this process the community may opt for a design that allows for P2P transfers.

Currently, a few hundred cryptocurrencies with distributed ledger technologies are used to promote social purposes. A basic income, for example, could be easily implemented through a decentralized distribution option. The Mannabase project based in Virginia distributes a basic income weekly to all who register for the currency project. According to coinmarketcap, more than 660 million Manna are in circulation. However, a Manna is worth less than a thousandth of a dollar. Currently, only few business accept payment in Manna.

A lurking problem for cryptocurrencies is that the added value of the technology currently does not, in many cases, exceed the costs of technical implementation (Pinos 2019).

5. Sectoral currencies

**Sectoral currencies** are issue-specific currencies aiming, for example, to finance care for the elderly, environmental protection, youth work and incentive schemes. They operate in a similar manner as the systems described. Like time banks, sectoral currencies counteract individuation and forge community and social networks (Kennedy et al. 2012). They differ from LETS and time banks in their design for particular problems like education, care work or their temporary deployment in the event of a crisis.

An example is the Torekes in Ghent in Belgium. The city rewards social and environmental work with a paper voucher that can be spent in rent for a garden plot or organic food. In the Japanese “Hurei Kippu” or Austrian “Zeitpolster” system, hourly credits are earned through work for the elderly. The credits can be redeemed in old age for care work or they can be transferred to relatives for immediate use. Other schemes include bonus systems, such as a climate bonus,
where customers collect bonus points and redeem them for goods and services.

In times of disasters, sectoral currencies have been used repeatedly, for example within refugee camps to organise mutual aid. The prospect of receiving valuable recognition for one’s own actions motivates people to participate. Issuers are often aid organisations, municipalities and grassroots initiatives. There are also combinations like the Banco Palmas initiative in Brazil. They sometimes cooperate with local authorities to pay subsidies to poor families on prepaid accounts. The families can spend the money in the local area with a smartphone or card.

Sectoral currencies are the specialists among complementary currencies because they often cover only a manageable sub-range, but can therefore be very effective.

The following table provides an overview over the characteristics and differences in the universe of complementary currencies:
<table>
<thead>
<tr>
<th>Type Criteria</th>
<th>Commercial mutual credit</th>
<th>Noncomm. mutual credit</th>
<th>Reserve-backed currencies</th>
<th>Fiat-/P2P-Currencies</th>
<th>Sectoral currencies</th>
</tr>
</thead>
<tbody>
<tr>
<td>Examples</td>
<td>Sardex, Bartercard, WIR</td>
<td>LETS, SEL, Timebanks</td>
<td>Chiemgauer, Eusko, Sarubobo Coin</td>
<td>Colonial Scrip, Mana, Sarafu</td>
<td>Torekes, Banco Palmas</td>
</tr>
<tr>
<td>Goals</td>
<td>Increase utilization</td>
<td>Use skills on private level</td>
<td>Strengthen local business, promote non-profits</td>
<td>All kind of societal goals</td>
<td>Social and ecological goals</td>
</tr>
<tr>
<td>Systems carrier</td>
<td>Trading agents, WIR-cooperative</td>
<td>Associations, groups</td>
<td>Associations, cooperatives</td>
<td>Networks, associations, authorities</td>
<td>Associations, local authorities</td>
</tr>
<tr>
<td>Unit</td>
<td>National currency</td>
<td>Time, national currency</td>
<td>National currency or goods</td>
<td>Own fiat unit</td>
<td>Time, energy, food, points</td>
</tr>
<tr>
<td>Emission</td>
<td>Mutual credits; WIR with central loans</td>
<td>Mutual credits</td>
<td>Exchange and loans</td>
<td>Fiat</td>
<td>Reward, exchange, loans</td>
</tr>
<tr>
<td>Issuer</td>
<td>Borrower or bank (WIR)</td>
<td>Borrower</td>
<td>System carrier</td>
<td>Individual, network</td>
<td>System carrier</td>
</tr>
<tr>
<td>Reserve</td>
<td>Mutual commitment, security</td>
<td>Mutual commitment</td>
<td>National currency, goods, ressources</td>
<td>Often without reserve or contract</td>
<td>Commitment of the community</td>
</tr>
<tr>
<td>Convertible to national currency</td>
<td>No official convertibility</td>
<td>No convertibility</td>
<td>Limited with fees, often used for charity purposes</td>
<td>Floating exchange rate</td>
<td>No convertibility or limited</td>
</tr>
<tr>
<td>Medium</td>
<td>Digital</td>
<td>Digital or cash</td>
<td>Digital and/or cash</td>
<td>Digital</td>
<td>Digital or cash</td>
</tr>
<tr>
<td>Financial laws</td>
<td>allowed, no central issuer</td>
<td>allowed, no central issuer</td>
<td>mostly allowed, limited networks</td>
<td>money trade is regulated</td>
<td>allowed, limited networks</td>
</tr>
<tr>
<td>Taxation</td>
<td>1 to 1, to be paid in official currency</td>
<td>Mostly no taxation when sales are low</td>
<td>1 to 1, to be paid in official, sometimes in local currency</td>
<td>Depends on the purpose</td>
<td>Mostly no taxation with low amounts</td>
</tr>
<tr>
<td>Access</td>
<td>Only members</td>
<td>Only members</td>
<td>Only members</td>
<td>Market, Network</td>
<td>Limited purpose</td>
</tr>
<tr>
<td>Currency holder</td>
<td>Businesses</td>
<td>Private persons</td>
<td>Users in the region</td>
<td>Global or defined</td>
<td>Users within target group</td>
</tr>
<tr>
<td>Structure</td>
<td>Closed circle</td>
<td>Closed circle</td>
<td>Closed circle with limited exchange</td>
<td>Circles, often with open exchange</td>
<td>Mostly closed circle</td>
</tr>
<tr>
<td>Geographic reach</td>
<td>Network, mostly regional</td>
<td>Network, mostly local</td>
<td>Certain territory, often interconnected</td>
<td>Global and local adaptions</td>
<td>Community, mostly local</td>
</tr>
<tr>
<td>Decision-Making</td>
<td>Owner of third party provider</td>
<td>Mostly democratic</td>
<td>Mostly democratic</td>
<td>Designer of technology</td>
<td>Often by stakeholders</td>
</tr>
</tbody>
</table>

P=Peer, B=Business, C= Consumer, I=Institution like local authority, 1=to
Discussion

While it is helpful to categorize complementary currencies in order to understand their commonalities, it is also clear that the borders among the different types are fluid. Successful complementary currencies take advantage of the features of different types, and constantly adapt their design to collective goals and challenges. The Chiemgauer, for example, is a reserve-backed system and is currently developing a sectoral currency to promote climate protection. The Sardex engages consumers via a bonus system and tries to activate euros for the network. Consumers make purchases with the official currency and get a bonus in Sardex. This “top-up currency” can be spent within the network without having to offer a good or service for sale like a business. The colonial scrip in the US and the example of Woergl paved the way for integrating regional currencies into state structures, thus alleviating the need for reserves.

When complementary currencies pursue social objectives, they should be supported by a tolerant legal framework and incentives. In some places, cooperation between complementary currencies and public institutions already exists as “public-commons-partnership”: timebanks are used as an instrument to promote social cohesion and are exempt in some countries from taxes. Some regional currencies are recognized by municipalities that allow payments of taxes in the local currency. Other sectoral currencies are promoted by local governments in order to help them achieve their objectives.

An important aspect of complementary currencies is their constitution. If they are to make a contribution to society, they must be participatory and democratic, so that they can contribute to raising awareness of a society’s monetary system. If the complementary currency is directly in the hands of a municipality, decisions are made within the existing democratic structures. If associations or cooperatives are
chosen as the organizational, then their members set the rules of participation. Guaranteeing inclusive participation becomes more difficult when the service structures are managed by private companies, and the question arises as to how the character of social innovation can be sustained in the long term. Geographic reach also plays an important role in this context. A smaller area constrains the number of exchanges but increases the impact of individuals in the democratic decision-making process.

Complementary currencies may work successfully if the following conditions are met:

1. Existing productive capacities are underutilized or can be further developed.
2. A deficit exists in purchasing power.
3. A critical mass of participation is reached and revenue exceeds transaction costs.

**Conclusion**

Complementary currencies offer the opportunity to pragmatically expand the concept of money. Money, as made by state monopoly or conceptualized as a purely competitive medium, does not exhaust the potential of monetary design for social innovation. Complementary currencies can expand our capacities. They can also prompt new forms of value creation based on social justice and sustainability. They may serve to forge financial citizenship and democratize society. Of course, to achieve these aims, complementary currencies have to be supplemented by other policies and reforms. Yet, the stakes are too high to wait for “one big solution”. With decentralized monetary forms, we can start to transform society right now.
Further Reading on Complementary Currencies

Bernard Lietaer et al: Money and Sustainability

International journal of community currencies

People Powered Money

Bibliography


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D. Jenkins, *Debt and the Underdevelopment of Black America*

June 15, 2020
Destin Jenkins, University of Chicago

In his 1983 classic, *How Capitalism Underdeveloped Black America*, Manning Marable asked, “What is development, and what is its structural relationship to underdevelopment?” Marable rejected liberal replies as well as the ontological approach to seeing development as a condition of the West, and underdevelopment as that of the non-West. For Marable, underdevelopment was “not the absence of development; it is the inevitable product of an oppressed population’s integration” into what we might call racial capitalism.[1]

But what was it about capitalism that, in actual terms, underdeveloped Black America? Marable identified four vectors. For starters, the “repressive and bestial force” of slaveholders, judges, juries, prison wardens and police preserved and reproduced “fraud and force,” the essential dynamics of American capitalism. Second, capitalism was the culprit because it generated structural exclusion and discrimination, at one level, and the select integration of the “Black petty bourgeoisie” into the system, at another level. Third, and relatedly, capitalism was to blame because of its ideological tentacles. Black elites theorized that the problem of underdevelopment was not capitalism per se, but that white capitalists hoarded all the wealth. Finally, Marable argued that the very foundations of capitalism—patriarchy and racism—led to the under-compensation of black women in ways that generated “higher profits for white capitalists.”[2]

I want to add to Marable’s thesis. But rather than focus on violence, intra-racial class relations, the theory of black capitalism, or capitalism’s patriarchal and racist foundations as the agentic force, I want to emphasize the role of municipal debt in the underdevelopment of Black America. Marable is surprisingly quiet on the matter of finance in general, and credit-debt in particular. He did not think beyond *consumer debt* and interpersonal lending
arrangements.[3] Because Marable did not consider credit-debt as central to capitalism, it had no bearing on his tragic story of underdevelopment.

Across distinct traditions, it is well established that credit and debt, as much as investment capital and profitability over time, are key dynamics of capitalism. Influenced by Joseph Schumpeter, German historian Jürgen Kocka has recently commented that, “the entrepreneur carrying out innovations requires capital in advance, which he contracts as debt in order to pay it back with interest later if the project is successful.”[4] Whereas Schumpeter emphasized the relationship between credit and innovation, Karl Marx considered how lending to state governments allowed a “class of state creditors” to rechannel their claims on future public revenues into other profitable investments.[5] Clearly, then, credit-debt is key to capitalism’s dynamism. And, from the seventeenth century onward, this crucial dyad has been articulated through race.[6]

Scholars have not yet focused on the relationship between race and municipal debt, one of the principal means through which US state and local governments finance public infrastructure. And because they have rarely directed their sights to the municipal bond market—a politically constructed network linking government borrowers, individual and institutional investors, and sellers of financial information—much less on the role that race plays in structuring assessments of creditworthiness, they have missed how bond ratings and the private bond market more generally furthered illicit white racial advantages.

The organizers of this roundtable have asked us to consider how monetary forms shape racial dynamics. To that end, and in keeping with Manning Marable’s insistence that development and underdevelopment are mutually constitutive processes, I want to spend what space I have left sketching out how municipal debt contributed to the development of white America and
underdevelopment of Black America during the mid-twentieth century.

Housing and labor market advantages for white Americans were structured through New Deal policy and throughout the New Deal Era. The story of federal efforts to revive the US housing market during the Great Depression, and how those efforts were circumscribed by racism, has been adequately told. Federal mortgage guarantees drew white Americans to the suburbs and triggered the divestment of mortgage capital from cities around the country.[7] Yet, federal officials advertised postwar suburbanization as a product of the free market, erasing the government guarantees that made the investments possible.[8]

The transformation of the Cotton Belt into the Sunbelt occurred through the defeat of left Keynesianism (and its program of full employment through federal spending on social welfare) and the domestic implementation of military Keynesianism. Federal support proved crucial to the emergence of the military industrial complex, which meant, in turn, high salaries for white, white-collar suburbanites in places like Orange County, California.[9] And despite the successful efforts of industrial unions to organize across racial and ethnic boundaries, there were far too many instances of local craft unions working to exclude black Americans. White working-class advantages came in the form of union benefits and high wages that might also allow for the suburban dream.

The postwar baby boom and metropolitan development fueled greater demands for debt-financed infrastructure in the suburbs. In 1955, one-third of state and local government expenditures were financed out of current tax receipts. “The remainder is financed by borrowing,” in the words of one student of municipal debt.[10] The municipal bond market had seen 3,300 new bond issues totaling $1.2 billion in 1946. Almost twenty years later state and local governments nearly doubled the number of bond issues, raising $11.1 billion.[11]
Municipal credit was transformed into segregated infrastructure. The carbon copy, assembly-line production of identical homes was often the subject of discussion, but the racially segregated Levittowns across the country depended on debt-financed sewage treatment and water systems to make upscale homes worth the price. To reach fast food chains along and just off the interstates cutting across America required new and improved side streets. Indeed, what good was a Buick Super State Wagon, large enough to fit a family of six, golf bags, and fishing equipment, if the roads were full of potholes and parks and playgrounds left dilapidated?

What’s more, racially structured housing and labor market advantages were foundational to the strong borrowing reputations of suburban communities. There were many variables to which credit rating analysts looked to determine a municipal bond rating. But per capita income was high on the list. “The growth of debt has been almost matched by the growth in income and so sustenance of a high rating for state and local government obligations is reasonable—if income continues to be high.”[12]

To be clear, these were *illicit racial advantages* that furthered the development of white America. The ‘illicit’ is often used to characterize the behaviors and income generating practices of those excluded from, and locked out of, formal labor and housing opportunities. But political philosopher Charles W. Mills inspires for me a very different usage of the term.[13] Indeed, illicit advantages can be produced through formal markets just the same. In this case, the illicit is that which people lay claim principally because of their whiteness; through no work of their own but because of the particular ‘work’ that whiteness does.

The advantages perpetuated by the ‘doubling’ mechanism of both the US housing- and municipal bond markets were plenty. Not
only did white flight benefit homeowners through increased equity, but it also created a more lucrative bond market that could fund their public resources. White middle-class Americans benefited from community resources provided by the bond market, while white upper-class bondholders collected tax-exempt interest income on their investments. Investment in public schools for white children could and did unlock a world of possibilities. Incurring debt to invest in racially segregated suburban schools not only meant increased opportunities for social mobility and improved collective life chances. It also meant, in effect, “expanding the real freedoms that (white) people enjoy,” to quote a notable economist.[14]

It is not true that postwar cities were completely divested. The flight of white Americans who still worked or shopped in the downtowns of urban America mandated not only new highways, but also parking facilities and metropolitan transportation systems. Towering above the anonymous crowds moving through downtown America were garish signs selling some product and experience, and fashionable cast-iron street lamps. Bond financiers profited from white flight and the desperate pursuit of cities to attract white middle-class Americans as workers and consumers. And it was too often the case that black people living in Chicago, San Francisco, among other cities, serviced municipal debt without getting much in return.

Nearly twenty-five years ago historian Thomas J. Sugrue underscored “two of the most important, interrelated, and unresolved problems in American history: that capitalism generates economic inequality and that African Americans have disproportionately borne the impact of that inequality.”[15] What’s more, how is it that, during a moment of relatively low interest rates (roughly between 1946 and 1965), when demand for municipal bonds was relatively strong among institutional investors, and when borrowers issued a plethora of new debt,
black children across the nation still continued to attend dilapidated schools? How is it that they either had poor access to parks or played inside poorly maintained spaces?

I do not have the space to answer these admittedly large questions. And doing so requires more localized research. But I take the following as my starting point for addressing this story of underdevelopment: Lenders did not extend credit to municipal borrowers, and borrowers did not transform credit into public infrastructure without already-existing relations of racial inequality. This implies that to separate yields, interest rates, and credit ratings from shifting racial regimes is not only ahistorical. It is also to buttress the ideological fiction that the market is insulated from race and responsible principally to price signals, supply and demand. My starting point also implies that during the golden age of American capitalism and low interest rates, investment was less about costs than about who or what was rendered worthy of debt, determinations mediated by racial logics.

Across a wide swath of domains, the attempt to code some activities as ‘economic,’ and thus more central than practices coded as ‘cultural,’ has proven remarkably successful. For their part, bond rating analysts participated by insisting that their ratings were reflections of objective economic conditions. Whatever inequality generated through municipal debt or the municipal bond market was the upshot of depoliticized and deracialized processes, they claimed. To illustrate the slippage between their explicit avowals and what ratings actually represented, I want to draw from a Congressional hearing held in the midst of the credit crunch and broader concerns over the urban fiscal crisis of the late 1960s.[16]

Take Moody’s Investors Service, Inc. and Standard and Poor’s (S&P) for example. Founded in 1909 to assess the creditworthiness of corporations, ten years later Moody’s broadened its scope to rate municipal bonds.[17] By the late
‘60s the firm published annual data on some 15,000 political subdivisions and rated bonds issued in amounts $600,000 and above.[18] Letter grades standardized the variety among the thousands of issuers of municipal debt, which enabled bankers to purchase bonds and resell these securities to investors who never set foot in the issuing community. Standard Statistics Company, Inc. and Poor’s Publishing Company merged in 1941 to form Standard & Poor’s. In 1949, the newly consolidated firm began publishing Bond Outlook, a weekly listing of municipal bond ratings. S&P relied on subscriptions and charged municipal borrowers a fee to have its bonds rated.[19]

S&P’s Brenton Harries and Moody’s Robert C. Riehle described a similar ratings process. With federal securities as “the benchmark from which our ratings stem,” S&P attempted to “measure the relative investment quality of one municipal obligation to another.”[20] Harries remarked that the procedure began with “a history of the immediate prior years.” The firm looked to key indicators such as net debt to assessed valuation ratio, overlapping debt, and “economic” and “socioeconomic” factors such as population, industry, tax base, and welfare costs. After analyzing the past and present, S&P analysts postulated on what might happen in the future: how did borrowers plan to sustain economic growth? What if growth stalled?[21] After analyzing similar audited information and a discussion of “impressions and recommendations” with the Moody’s Rating Committee, analysts voted in support or against the rating. Ratings were then “disseminated to the issuer” and published in various trade publications.[22] In the end, Robert C. Riehle explained that despite the usage of different methods by the various rating agencies, ratings depended “upon our individual philosophies at various points.”[23]

Historian Robert Self has persuasively shown how real estate developers, city planners, municipal officials, among others, often saw blight as an “economic problem” rather than “a
symptom of inequality.”[24] Bond rating analysts went further to effectively elevate suburbs over cities. According to Riehle, “few, if any, of the nation’s older and larger cities have been without problems.” Cities were marked by “blight” and the suburbanization of the “young, vibrant middle-income group” had become a fact of urban America. At the same time, older cities could not escape “the influx of others, who through no fault of their own possess modest skills and limited earning capacity.”[25] It was one thing for cities to struggle with higher debt service charges as real estate tax revenue slackened. Perhaps most disconcerting, Riehle noted, was that suburbanization implied “the potential loss of an electorate with a desire for efficient, conservative, sophisticated government” to be filled, presumably, by voters who proposed the opposite: inefficient, fiscally liberal, and primitive government.[26] American cities were being made to pay for a postwar political economy in which they were structurally disadvantaged.

Just as African Americans were beginning to realize the early gains of the civil rights revolution, rating analysts offered recommendations that would only deepen the underdevelopment of Black America. Robert Riehle argued that while the problem of suburbanization was intractable, city officials were not without options. They could charge tuition to attend City College. They could increase water, sewer, and transit fees and fares.[27] One of the major demands of the black freedom struggle was greater access to a more expansive public—access to the public sector, public institutions, and public spaces. After all, racially segregated public institutions had been essential to the upward mobility of white middle-class Americans after the Second World War. But in the late 1960s—before the economic and fiscal crises of the 1970s—bond rating agencies were basically outlining a program of privatization. As the public sector became a crucial mechanism for black mobility, black Americans had the rug pulled out from under.
I want to conclude by returning to Manning Marable. Staring defiantly at the sharp teeth of Reaganism and Thatcherism, Marable declared, “The immediate task before the Black movement in this country is to chart a realistic program to abolish racist/capitalist underdevelopment.”[28] In the face of racial revanchism and the looting of public funds by corporate elites, the task remains just as urgent. And just as violence, black capitalism, and the nexus of patriarchy and white supremacy remain foundational to underdevelopment of Black America, so too are matters of credit-debt. Along with theorization, then, the task is to identify the pressure points, and to press hard.

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[2] Ibid., 2, 9-10, 19, 105-114, 134.

[3] Ibid., 151, 162.


[26] Riehle, Ibid., 238, 246.

Corona Crisis: Lessons of the Stress Test

Author: Perry G Mehrling, Pardee School of Global Studies, Boston University

Perry Mehrling talks to Boston Economic Club June 3, 2020 about the Coronavirus Crisis.

The video can be accessed here: https://mymedia.bu.edu/media/Corona+CrisisA++Lessons+of+the+Stress+Test/1_pk5wohqm

Baker Library Collection of American Currency

The Baker Library at Harvard Business School has made a great resource available, particularly for those doing research or teaching in American monetary history. It has made available
online its digital collection of over 700 pieces of American paper money ranging in date from 1709 to 1878. This collection illustrates the history of American finance and commerce from Colonial times through the Civil War.

The collection can be accessed here: https://curiosity.lib.harvard.edu/american-currency

Jim Crow Credit

Mehrsa Baradaran, University of California Irvine

The New Deal created a separate and unequal credit market—high-interest, non-bank, installment lenders in black ghettos and low-cost, securitized, and revolving credit card market in the white suburbs. Organized protest against this racialized inequality was an essential but forgotten part of the civil rights movement. After protests and riots drew attention to the reality that the poor were paying more for essential consumer products than the wealthy, the nation’s policymakers began to pay attention. Congress held hearings and agencies, and academics issued reports examining the economic situation. These hearings led to new federal agencies and programs, executive actions, as well as several acts of legislation. These Congressional investigations and the theories and explanations emanating from policymakers and academics were the genesis of decades of legislation aimed at supporting minority banks and other institutions. The resulting policy framework is still in effect and includes: the Community Reinvestment Act (CRA), the Community
Development Financial Institution Act (CDFIA), as well as several key provisions and mandates regarding minority banks in banking legislation. In this Article, I will argue that the foundational theoretical premise of these laws and policies is flawed. Though policymakers and scholars accurately diagnosed the root causes of the disparate credit market, the solutions did not correspond with the problem and have therefore been ineffective. These laws and policies were not aimed to address the systemic causes of the disparity but only served to treat its symptoms. The misguided focus on small community banking, minority-owned banks, and mission-oriented institutions as a response to structural inequality has been the dominant framework in banking reform.

In analyzing the varied, but theoretically consistent response to lending inequality, this Article also challenges a long-standing banking myth that “small community banking” or “microfinance” is the answer to poverty, specifically for marginalized communities. This idea was the foundational theory of the minority banking industry, the CRA, the CDFIA, and almost every legislative response to credit inequality for the past fifty years. The premise of these laws is that that marginalized communities, having been left out of the dominant banking industry, will pool their resources and collectively lift themselves out of poverty. As such, these laws are rooted in neoliberal and libertarian concepts of banking market even as they have been championed by progressive reformers and community activists. For most policymakers, activists, and scholars, the buzzword is “community empowerment” and they have legislated accordingly. In doing so, they have avoided addressing the root causes of the problem and have shifted the responsibility of a solution to the disenfranchised communities themselves instead of devising comprehensive federal policy solutions. This Article will trace the genealogy of this legislation and offer solutions that will address the root causes of this inequality.
G. Vidan, Decentralization: The Rise of a Hazardous Spec

June 12, 2020

Gili Vidan, Harvard University

In 2017, Americans wanted to know “what is Bitcoin?” In a report to the US Congress, the Joint Economic Committee dubbed 2017 as “The Year of Cryptocurrencies,” citing a surge in Google searches for the terms “Bitcoin,” “blockchain,” and “Ethereum.” And internet users weren’t just googling the near-decade old creation. Individuals and companies around the globe were purchasing cryptocurrencies and experimenting with blockchains, resulting in record-high prices for individual coins and an influx of investments in anything blockchain. Governments, too, engaged in crypto enthusiasm for the blockchain as a technology that the state should adopt.

The same Joint Economic Report focused on the potential of cryptocurrencies and other applications of blockchain
technologies to respond to a variety of digital threats to the economy, offering the prospect of a future secured by protected private property and contract integrity. The bipartisan Congressional Blockchain Caucus also formed in “The Year of Cryptocurrencies,” as 17 lawmakers coalesced around “using math and cryptography” to produce a “record of authenticity that is verifiable by a user community increasing transparency and reducing fraud.” More recently, members of the caucus urged Treasury Secretary Mnuchin to utilize blockchain technology “to support the necessary functions of government” in disbursements of payments authorized by the CARES Act.

Recent attempts by regulators to control virtual currencies and the withdrawal of several key members from the Facebook-backed Libra Association have led some to forecast a moment of reckoning. The initial embrace of virtual currencies as silver-bullet responses to the challenges of a digital economy might follow in the footsteps of the broader “tech-lash” and disenchantment with the promises of Silicon Valley.

Yet this reckoning is not outright rejection. It is worth reflecting on the ways certain key features and promises of early blockchain discourse successfully captured the imagination of policymakers, technologists, and citizens alike. So much so that such touted features of the technology have now become new standards for the efficacy of the state’s apparatus writ large. Lev Menand outlined the significance of distinguishing between the different kinds of virtual currencies, which often don’t even share similar technological basis, let alone governance structures and regulatory frameworks. In this essay, however, I wish to focus on the family resemblance that connects what Menand defined as “utopian currencies” and the broader discourse around blockchain technologies and the ongoing digitization of the payment system through focusing on the pursuit of decentralization.
The early conversation about virtual currencies centered around their relationship to the state’s backing of money, as the trusted authority that issues currency. But, as political economist Michael Beggs argued, states not only make money, they are also themselves remade through the challenges encountered by trying to manage money itself.[i] In the case of virtual currencies, salient, often promissory, features of non- and even anti-statist innovations emerged as new demands on the state and a measure of its capacity to govern.

The call to decentralize existing market and government institutions is invoked as a multifaceted critique of the failures of large bureaucracies. It captures a geographical metaphor promising greater access, a political critique of concentrated unchecked power, and a technological specification for the secure management of information networks. In the context of blockchain technologies, decentralization appears as a novel, mathematically-enforced way out of the bind of modern political economies: an uneasy reliance on the delegation of power to state institutions for necessary coordination and enforcement. It is both a political and a technical virtue. Its prominence in critiques of the state’s management of money often precedes other calls for reform, by positioning decentralization as both a measure of the technological know-how and the democratic justness of the state.

Critics of the state’s control over money have long appealed to the challenges posed by novel technology. For example, in the 1980s, when the rise of desktop-publishing electronics such as color printers and scanners posed the threat of casual counterfeiting of banknotes at home or the office, then-congressman Ron Paul argued that the acceleration of new electronic technologies meant the state should get out of the money-making business entirely. [ii] Paul’s view was motivated by more than a longstanding libertarian position against state involvement in the payment system. The very potential for new
technologies to upend the security features of state-issued money provided a definitive argument against state involvement in the entire enterprise—the state would just never be up to the technological task. The state, in this view, was always lagging behind the onward march of technology and inherently inept in responding to it. At a time when consumer electronic marketing claimed to empower individuals with a set of new tools, money as a technological object became a new prism through which the state’s investment in public infrastructure could be negotiated and assessed.

The conversation around virtual currencies and technology such as the blockchain has not only echoed these concerns over the state’s ability to regulate the digital economy but has also set a new yardstick against which good governance is measured. Christine Desan has described money as a constitutional project.[iii] This view argues that the design of money and its management are constitutive of the structure of the political economy—they make the market. Money is constitutional because it is not merely an instrument facilitating individual exchanges but fundamentally arbitrating who wins and who loses from the payment system and who gets to participate in it, forming the boundaries of what Lana Swartz has called “transactional communities.”[iv]

Following this work on the material and political infrastructure of money, I argue that such analysis should be read alongside work on science and technology’s own constitutional position in today’s political order. Such work pays special attention to claims of expertise, competency, and legitimacy in the distribution of political power. Tracking claims that the state’s money problems are either the result of an inability to keep up with new technology or solvable through the adoption of new technology reveals how attributes of technical utility and desirable political outcomes are constructed in tandem.

This has been the case with the rise of “decentralization” as
a necessary feature of the digital economy. Many virtual currencies do not rely on cryptographic authentication or decentralized architectures. Yet the union of supposed cryptographic certainty and decentralized record keeping has animated visions for both the adoption of blockchain technologies to fix the state’s woes as well as the claims that blockchain could supplant it altogether.[v] As Lana Swartz noted, these visions often reflected a nostalgic yearning for the early days of the internet and its promise to empower individuals and diminish the salience of state power. Even the recent reckoning with the darker sides of the digital age breathed new life into the hope for a truly decentralized web as a solution for its various failures.

Historians of US politics have recently considered the politics of decentralization as characterizing a retreat from the governmental provision of services and divestment from social welfare projects. While some describe this tendency as a longstanding feature of American governance through public and private associations, others argue that decentralization captures a more specific policy agenda of late 20th-century US, which was malleable enough to emerge as a non-partisan mode of governance, advancing deregulation and privatization.[vi]

But there is also a parallel history of decentralization as a technical specification of communication systems. In 1964, Paul Baran, an electrical engineer who had recently joined the RAND Corporation, published a memorandum describing how different architectures of the US telecommunication network could potentially withstand aerial bombing. [vii] The diagrams provided three possible schematic networks: centralized, decentralized, and distributed (see p. 16 of this PDF). In this tripartite scheme, decentralization emerged as an architectural principle that provided network resilience in the face of an external attack and individual autonomy in the face of internal attempts to subvert the network. It is this focus on the “by design” promises of decentralized
architectures that spurred blockchain advocates to associate its adoption with increased transparency and verifiability of record keeping. Features of trust and verification required for maintaining the payment system, enthusiasts claim, could have far wider applications.[viii]

The Baran diagrams have since circulated broadly as self-explanatory manifestos for the decentralized digital age. Their Cold War military planning origins are often forgotten in favor of a view of the interconnected nodes as a more democratic topography of power and a more secure technological design of communication.

That history is not the only thing that these diagrams tend to obfuscate. Vitalik Buterin, a co-founder of the cryptocurrency Ethereum, went so far as to describe them as “completely unhelpful” in understanding what should be decentralized in the design of a blockchain application. The flatness of the diagrams does not capture the layered material and political arrangements that comprise today’s network society. Buterin, therefore, calls for a more elaborate mapping of decentralization, one that distinguishes infrastructure from political power. But the slippery nature of decentralization cannot simply be solved with the introduction of more precise taxonomies. Decentralization enjoys the position of a technical and political virtue because it successfully paves over the messy work of negotiating conflicting interests and articulating just outcomes. Two genealogies of decentralization—the political economy and the technical architecture—converged over the past five decades to form a powerful vocabulary for describing how digital networks could both resist centralized control from the state and also supplant it as a new political mode of self-governing. This convergence allowed decentralization to find its way into the visions of crypto-utopians and congressional representatives alike. In the process, it appears as a panacea for the inefficiencies of state bureaucracy and the uncertainty of
political action.

Historian Leo Marx warned that the power of such technological concepts to appear to sidestep politics is hazardous. The term “technology” itself, he argued, transitioned in the early 20th century from describing a field of study and a skillset to existing as an autonomous proper noun. Imbuing the term “technology” with a magical agency is perilous because it “relieves the citizenry of onerous decision-making obligations and intensifies their gathering sense of political impotence.”[ix]

By becoming the new measure of a successful redesign of money-making, decentralization similarly runs the risk of taking the sting out of a call for more democratic money. Decentralization is a hazardous goal for the redesign project not because it has so many different meanings, but because it overtakes the richness of democratic imaginings of the political economy. Last year, at a senate hearing on digital currencies and the blockchain, legal scholar Mehrsa Baradaran argued that the case in favor of cryptocurrencies as means for increasing financial inclusion ignores the existing public institutions tasked with this mission, including the Federal Reserve. If the Fed is currently failing to achieve this mission, our political attention should focus on expanding its services rather than framing its very existence as the source of the problem. Baradaran’s reimagining does not begin with the technological specification of a decentralized system or stipulate that it must necessarily be a frictionless digital one. Instead, it proceeds from the vision of inclusion. Likewise, Bill Maurer has suggested this may be a time to solve money’s problems with “more democracy rather than more technology.”

In rising to this call, we ought to be wary of fixing in place what “more democratic” may mean in technology’s image.


[viii] For recent examples arguing for the power of blockchain decentralization to remake large bureaucratic systems see: Kevin Werbach, *The Blockchain and the New Architecture of Trust*, (Cambridge, Mass.: MIT Press, 2018); Michael Casey and
D. Freund, Money is productive, and racist institutions create money

June 8, 2020

David M. P. Freund, University of Maryland

No doubt many readers here will be familiar with the role of the financial sector in shaping America’s peculiar history of racial inequality. Unequal access to money and credit has systematically disadvantaged people of color (an ever-shifting category) and created extraordinary privileges for people deemed to be “white.” Meanwhile, the institutions that produce and circulate wealth in the form of financial instruments have relied consistently upon racial exploitation to fuel economic growth, often blurring beyond recognition the line between public and private power. Money and debt have always been influential drivers of American development and we know that
their allocation and uses have never been wholly colorblind.[1]

But what kind of economic work, exactly, do modern financial instruments perform? What, practically speaking, do sovereign currencies, bank-issued deposits, and an array of credit forms make happen? And what does this question reveal about the history of race in America?

I ask because most scholarly accounts of American finance rely upon a story about money—a characterization of its history and functions—that cannot be documented. Writing on finance regularly trades in powerful fictions that erase money’s dependence upon federal authority and its essential, productive role in economic growth. Thus, while scholars have long demonstrated that the state has been an agent of racism, most have failed to fully reckon with money as an instrument of the state. And most downplay or ignore the fact that monetary issue by states and banks contracts for production: that the creation of money literally makes wealth-creation possible. Reckoning with these truths forces us to rethink the relationship between race, finance, and state power, for it shows that financial instruments and institutions do not simply reflect and reproduce existing racial hierarchies. Rather, the world of finance is essential to creating racial categories and racial difference.

A formidable obstacle to uncovering that history is the conventional wisdom about money: a neo-classical (“orthodox”) model that is factually incorrect, but nonetheless foundational to mainstream economics scholarship. It begins with an origin story still rehearsed in introductory economics textbooks: that money was invented by ancient civilizations to simplify barter-like networks of exchange, essentially the trading of things for other things. Orthodoxy then imagines all money forms as updates of those original, commodity-like tokens; money, even today, still “stands in” for things of value and so performs essential market functions, including
Finally, this narrative insists that credit forms appeared subsequent to money’s invention and only out of necessity, when people and then firms sought the convenience and efficiency of making temporal arrangements for completing purchases (so that they could “buy now,” with borrowed money, and “pay later.”) Banks could not begin lending money, the story goes, until others had first saved it. In the orthodox imagination, money and credit developed organically from market relationships and they have evolved, ever since, to meet the market’s changing needs.

This story is foundational, then, to maintaining orthodoxy’s sharp divide between the “real” and “financial” economies. The former is cast as a generative, wealth-creating sector in which people make and trade things, while the latter is a realm where money circulates to facilitate all of that production and exchange. In orthodoxy’s real sector, strategic use of the “factors of production”—land, capital goods, and labor—creates valuable material and intellectual products, like food, machines, software, and expertise. Then the financial sector includes the institutions and instruments with which people measure, store, and manage the value of their ownable, “real” assets. Finance greases the real sector’s wheels and so helps to unleash its wealth-generating potential. Critically, this means that financial instruments are not intrinsically wealth-creating, or “productive.” Standard macro holds that money is not essential to the growth process or, as A. C. Pigou famously wrote, that money is a “veil” over an economy that ultimately operates on barter principles. Unlike “real” assets such as arable land or factories, so-called “paper” assets are not factors of production.

And it is here that orthodoxy’s significance for our topic comes into view. For this understanding of finance limits, by definition, the public sector’s power to shape economic life. Specifically, it defines insurmountable constraints on a
government’s ability to create wealth. Thus, it enforces an already powerful myth that public policy has played a minimal role in determining winners and losers in the American economy. Of course, the discriminatory impacts of government policy have been documented exhaustively, beginning with conquest and slavery and continuing to present-day mortgage banking, pay-day lending, and incarceration. But, insofar as finance is concerned, most of this work treats state actions—violence, taxing and spending, regulation and chartering, even public ownership of productive capacity—as interventions into a “private” economy and a world of “private” capital that can be separated, at least for purposes of economic analysis, from the public sphere. Accordingly, this work insists that the public purse can only be filled by drawing upon revenues (wealth) generated by the real economy. In the neo-classical imagination, governments can nudge the real sector towards certain productive ends but, short of owning and operating the means of production, they cannot generate new capital.

One final point warrants special emphasis: most scholars argue that the U.S. government faces these constraints as well, despite its monopoly power to issue the domestic money of account. Economic orthodoxy depicts all forms of public spending—including that by the U.S. Department of the Treasury—as a strategic reallocation of private capital. And it casts federal monetary policy as an effort to adjust the “quantity” of currency in circulation so as to meet and, if necessary, manage the market’s financial requirements. Supplying money does not by itself spur growth, in this telling, but instead ensures the smooth functioning of the “real” sector variables that drive the wealth-creation process. In the orthodox narrative, money is not productive and the federal state’s power is limited to managing its supply or, alternatively, redirecting private profits.

This monetary orthodoxy, while hegemonic, is not true. The
The documentary record makes that clear and guides the heterodox scholarship in economics, sociology, history, law, and anthropology that has long explored finance’s real-world history. The earliest money forms appeared not as commodity tokens that “stood in” for wealth but rather as credit forms or IOUs—as promises to pay—and the things considered “money,” today, are likewise monetized debt instruments (“credit-money”). The creation and circulation of such instruments does not merely reflect and serve the “real” economy. Instead, monetary issue establishes contractual relationships between creditors and debtors that organize—socially and legally—the production and exchange of goods. In other words, heterodoxy demonstrates that the creation of financial instruments is not cognate but essential to growth. Money is, in fact, economically “productive.” Finally, this work traces how the creation and circulation of money forms has always depended on sanction by the elites or sovereign authorities who issue them. Money’s value, at the point of issue, has been grounded not in specific “things” per se (like cattle or gold), but rather in a central authority’s willingness to accept it for the payment of obligations. Then the state’s sanction, in turn, enables these currencies to perform a wide range of market functions. What counts as money is an historical question of politics and states, not an incidental side effect of market exchange.[5]

The documentary record tells a story that is heretical to the economics mainstream: namely, that sovereign power is essential to creating financial value and that issuing monetary instruments is integral to the wealth-making process. And for this reason, monetary heterodoxy has a lot to tell us about the federal role in producing racial categories and racial difference.

Consider, first, the seemingly mundane act of monetary issue—technically speaking, the creation of dollar-denominated currency—and the reach of federal monetary policy.[6] Together
the Fed and the U.S. Department of Treasury allocate and oversee the circulation of the so-called “monetary base,” or what economists call “high-powered money.” This is the total value of Federal Reserve Notes (FRNs) and corresponding Fed credits held as settlement balances by the system’s chartered banks. Meanwhile Congress and the Fed shape decisively banks’ ability to create “deposit” currency, which takes the form of electronic ledger entries in customers’ checking accounts and which makes up the lion’s share of the circulating money supply. The remainder of that supply is mostly “cash”—FRNs—held by the public rather than the banks. All told, federal authorities have considerable influence over the dollar-denominated currency created by the central bank and private banking institutions. In its role as a monetary sovereign, the U.S. government issues new money and empowers banks to issue even more.[7]

A casual observer might conclude that this gives the state considerable leverage over macroeconomic outcomes, including the racial wealth gap. But remember that standard macro does not view monetary issue—the creation of financial assets—as essential to growth. And so it reads federal power and discretion in the monetary realm through a very different lens. Orthodoxy tasks the Fed with insulating financial markets against crises by ensuring that the banking system remains sufficiently liquid, providing a backstop for individual banks so that they, in turn, can intermediate between “savers” and “investors.” This intermediation—the story continues—then permits market actors to make the choices that unleash the economy’s productive capacity. Where does racial discrimination factor in to such a calculus? Note that money and credit alike, in this telling, are neutral instruments that simply measure, hold, and transfer existing wealth. Of course, people create wealth by engaging in racist practices (slavery, dispossession, Jim Crow, redlining) and this includes, meanwhile, the use of monetary instruments to do harm. But orthodoxy insists that money itself cannot
discriminate. It argues, instead, that racist money-holders can and unfortunately do discriminate, using their financial assets as a weapon to unfairly wield their power.

The result is the erasure of federal culpability for a broad range of discriminatory market outcomes. As heterodox scholarship reveals, money creation by the state and by banks creates wealth by contracting for production. Financial transactions such as replenishing a bank’s reserve account or extending individual loans are engines of growth. And so the federal state shares responsibility for the results, be they equitable or destructive. Heterodoxy shows that money is created not simply to reward or compensate those who have earned wealth; that is, to “ascertain... who has claims on resources.”[8] Rather, the creation of money is an institutional means of structuring property relationships—of sanctioning rights to production, ownership, and transfer. The state’s authority to issue money is not simply a regulatory but also a constitutive power. The institutions that create money—both federal authorities and the private entities granted this privilege—help to constitute racialized (as well as sexist, ageist, and ableist) economic and political orders and allocate real wealth accordingly.

Next, consider the narrower but no less influential arena of direct federal spending and fiscal policy. Orthodoxy describes U.S. Treasury spending as a reallocation of private and finite real resources that are first collected through taxation, fees, borrowing, and the like. Federal spending is imagined as interchangeable, from an accounting perspective, with spending by state, county, and municipal authorities. Yet money’s real-world history shows that spending by monetary sovereigns is *sui generis*: that they create new financial assets whose value is anchored in state power. When the U.S. Treasury spends, it is not redistributing private wealth but rather introducing new—and again productive—financial instruments into circulation. Indeed, a federal deficit is by definition a
private sector surplus.[9] And this insight demands that we revisit the legacies of federal spending, both domestically and abroad: on the military, infrastructure, housing, welfare and entitlement programs, employment, foreign aid, policing and incarceration, and other arenas. Spending by a money-issuing authority produces wealth. This means that the abuse of power perpetrated by discriminatory federal spending is not simply a state-sanctioned mal-distribution of existing, “real sector” resources. Instead, it represents the federal state’s active creation of economic opportunities and tangible wealth for some but not for others.

Finally, consider the federal role in creating what are commonly called credit forms, as distinct from fully liquid “monetary” instruments like cash or checking deposits. The U.S. government has long subsidized markets for consumer debt by insuring specific categories of loans issued by qualifying private banking institutions. Most famous, perhaps, are the programs created by the “GI Bill of Rights.” First passed in 1944 as the Serviceman’s Readjustment Act, iterations of the GI Bill have funded for decades generous insurance programs for small business, educational, and home-mortgage loans.[10] Yet the opacity of these programs has obscured the depth of the federal contribution. Federal insurance (often called a “guarantee”) gives banks not simply the confidence but also the capacity to lend. It allows them to spend from their stock of settlement balances (FRNs) in return for a quick and profitable re-sale of a loan on the secondary market or, alternatively, a promise of repayment with interest from the borrower. At that point, whoever holds the debt then receives payments over the life of the loan, made with bank-issued deposit currency (the banking system’s IOUs). Those payments are in turn “cleared” between banks by the exchange of Fed settlement balances.

Both the material production and financial returns generated by these insured loans depend upon multiple levels of
sovereign authority. The banking system that allocates credit-money—here the loan itself—is a creature of state authority, as discussed above. Meanwhile the federal guarantee commits the Treasury to protecting lenders against default. Such an offer is difficult to refuse, for if a lender’s gamble on a borrower doesn’t pay off they can still expect compensation, ultimately thanks to the U.S. government’s power and willingness to create financial assets. In the process, finally, the federal backstop supports robust “private” lending nationwide for real estate, consumer durables, construction, education, and the list goes on.

These lucrative markets would not take their current forms if not for decades of federal regulatory and financial support. Meanwhile lenders in these markets have regularly discriminated against racial minorities and other targeted populations, often with the blessing of federal authorities. The vast market for suburban development and homeownership after World War II, to cite a prominent example, would not exist without heavy lifting by the federal state. Beginning in the 1930s, U.S. officials invented and subsidized the use of a new mortgage instrument, created (and invested heavily in) the “secondary” mortgage market to keep their new experiment afloat, and even found it necessary to aggressively promote lending and borrowing, both to businesses and consumers. For decades, meanwhile, federal agencies condoned and often required racial exclusion in these markets.[11] The segregation of American property markets—residential and commercial alike—by both race and wealth provides vivid proof that federal credit programs have not merely “reinforced” popular racism, but rather actively produced race-based material disparities.[12]

The larger point is this: credit- and constitutional-theories of money tell us that financial instruments are factors of production and that their value is anchored in public power. Here is yet more evidence that the U.S. government and the
financial institutions dependent upon its authority do not simply oversee or regulate markets but instead actively create them and by doing so create wealth. Racial disparities in the U.S.—in housing, employment, education, health, and wealth—are inseparable from the federal government’s power to marshal productive resources and give markets their form. As a monetary sovereign, the federal state literally structures the productive economy and so contributes directly to the creation of both opportunity and disadvantage.

[1] For an introduction to these subjects, sample the work of the roundtable participants and notable recent contributions to the scholarship, including: Keeanga-Yamahtta Taylor, Race for Profit: How Banks and the Real Estate Industry Undermined Black Homeownership (Chapel Hill, 2019); Jennifer Troustine, Segregation By Design: Local Politics and Inequality in American Cities (Cambridge, UK, 2018); Walter Johnson, The Broken Heart of America: St. Louis and the Violent History of the United States (New York, 2020); William A. Darrity, Jr. and A. Kristen Mullen, From Here to Equality: Reparations for Black Americans in the Twenty-First Century (Chapel Hill, 2020); and Rebecca Marchiel, After Redlining: The Urban Reinvestment Movement in the Era of Financial Deregulation (Chicago, 2020). Links to a number of influential writings on metropolitan segregation and inequality can be found in David M. P. Freund, “We Can’t Forget How Racist Institutions Shaped Homeownership in America,” Washington Post (April 28, 2016).


[5] For introductions to the multi-disciplinary heterodox scholarship on these topics, see L. Randall Wray, Money and Credit in Capitalist Economies: The Endogenous Money Approach (Aldershot, UK, 1991); John Smithin, ed., What is Money? (London, 2000); Ingham, The Nature of Money, supra note 4; David Graeber, Debt: The First 5,000 Years (Brooklyn, NY, 2011); Felix Martin, Money: The Unauthorized Biography—From Coinage to Cryptocurrencies (New York, 2013); the Law and Political Economy symposium on “Piercing the Monetary Veil”; and the contributions to “Banking: Intermediation or Money Creation” on this website.

[6] For simplicity’s sake, I’ll restrict this discussion to the era of the Federal Reserve, although the pre-Fed story is equally revealing.


Freund, *Colored Property*, *ibid.*; and David M. P. Freund, “Money Matters”.

Private Markets, Public Options, and the Payment System

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The speed at which money moves between people and businesses in the United States lags well behind international standards. Far from being a mere inconvenience, slow payment speeds create needless financial uncertainty, lead to inefficiencies
across the economy, and drive demand for high-cost credit products like payday loans and overdraft protection. To speed up the payment system, the Federal Reserve has announced “FedNow” a platform due in 2023 that would operate as a public real-time payment rail, competing with a privately-run platform in the interbank payment market.

This Article analyzes the problem of slow payments and the Fed’s many roles in addressing it. Against the Fed’s critics, we argue that the Fed’s operational involvement in the payment system holds the capacity to achieve three objectives at the heart of payment policy in the United States: to catalyze innovation, enhance access to developing payment networks, and shore up financial stability. Fed participation in the payment system and public-private competition are not troublesome bugs or unfortunate byproducts of political compromise. Rather, they represent valuable features of the Fed’s hybrid, public-private system and are likely to drive faster payment development in the United States.

We also argue for an expanded use of Fed tools to achieve payment objectives well beyond FedNow, including by using the Fed’s unique status as operator, market participant, regulator, and supervisor of the payment system and the private financial institutions that participate in it. These are different roles that can be harmonized for the same public policy outcome.

The evolution of the Offshore US-Dollar System: past, present and four possible futures

Steffan Murau, Joe Rini & Armin Haas

Little has contributed more to the emergence of today’s world of financial globalization than the setup of the international monetary system. In its current shape, it has a hierarchical structure with the US-Dollar (USD) at the top and various other monetary areas forming a multilayered periphery to it. A key feature of the system is the creation of USD offshore – a feature that in the 1950s and 60s developed in co-evolution with the Bretton Woods System and in the 1970s replaced it. Since the 2007–9 Financial Crisis, this ‘Offshore US-Dollar System’ has been backstopped by the Federal Reserve’s network of swap lines which are extended to other key central banks. This systemic evolution may continue in the decades to come, but other systemic arrangements are possible as well and have historical precedents. This article discusses four trajectories that would lead to different setups of the international monetary system by 2040, taking into account how its hierarchical structure and the role of offshore credit money creation may evolve. In addition to a continuation of USD hegemony, we present the emergence of competing monetary blocs, the formation of an international monetary federation and the disintegration into an international monetary anarchy.

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American debates about money have always reflected our fundamental ambivalence about capitalism itself. The very same people most enthusiastic about the “free market” are often the people most likely to imagine a standard of value outside the market, something impervious to negotiability. For most of American history, into the present, “specie,” gold or silver, has served that purpose. Prices and value might fluctuate, but gold’s allegedly “intrinsic” value would never change. We love the idea of self transformation: the “American dream” holds that no one should be confined by the circumstances of their birth. But that same negotiability undermines the differences between people, and so Americans have long wanted to imagine forms of identity that can never be negotiated. For much of American history we have insisted that white people can renegotiate their social, and economic place at will, but no extent of market commerce makes a black person white. The idea of race stands outside of the market: it’s the “gold standard” that makes other forms of negotiation possible. We can see this clearly in the history of money in the US, particularly in the Civil War and Reconstruction.

For most of our history politics was divided into “hard” and “soft” money positions. Hard money advocates wanted a limited money supply, ideally tied to a specie standard. They often
argued for gold, because gold had a supposedly natural value beyond the reach of politics. Hard money theorists typically spoke for the holders of capital: “hard money” generally meant higher interest rates and greater profits for lenders. “Soft money” partisans wanted a loose, expansionist money supply because it fostered economic growth and drove interest rates down. If hard money partisans imagined a “natural” economy operating with no government intervention, the soft money camp wanted a managed economy, which could expand or contract the money supply as needed. The most extreme soft money position argued for greenbacks, a purely paper money economy with no ties to gold, as we have today.

But the hard money camp had always regarded paper money as an abomination, a lie, a cheat and a fraud. “Let the public believe that a smutted rag is money, it is money,” scoffed a critic in 1858: “a sort of financial biology, which made, at night, the thing conjured for, the thing that was seen.”[1] Those who favored “hard money” saw greenbacks as a violation of natural law, artificial: “paper-money banking,” wrote Andrew Jackson’s advisor William Gouge, created “an artificial inequality of wealth,” as men of dubious character puffed themselves up on paper money. The inequalities of wealth produced by a gold economy Gouge saw as “natural” and just: paper money, “miserable, ragged, and loathsome trash,” destabilized the social order. “Everything of fixed value will lose [its] value” if “vagabond” paper money circulates, insisted one Ohio Congressman. The New York Herald compared those who argued for paper money to real estate brokers who, “with a few strokes of the pen convert a rickety old farm house...into an elegant villa surrounded by a spacious lawn,” or theatrical managers, whose “genius renders a beggarly account of empty boxes into a crowded and fashionable house.”[2] These objections reflect anxiety not just about economic values but about social values, status hierarchies, the differences between things and people. Paper money created “artificial”
social distinctions, as opposed to social distinctions imagined as natural. It elevated the wrong kind of person.

Out of necessity, the Union financed the Civil War by issuing legal-tender greenbacks, a pure “fiat currency” not backed by gold or silver. The greenbacks proved extremely successful; the North won, and the war stimulated economic growth while inflation remained moderate. As the War went on the Union also increasingly embraced the abolition of slavery, and eventually, by 1862, the enlistment of African Americans in the Union Army. Frederick Douglass thought military service would bring about racial equality. He wrote “Once let the black man get upon his person the brass letters U.S., let him get an eagle on his button, and a musket on his shoulder, and bullets in his pocket, and there is no power on the earth or under the earth that can deny that he has earned the right to citizenship.”

But critics argued that black men in uniform represented an artificial inflation. “Great things are expected from this new principle of military amalgamation,” commented the New York Herald: “Whether it will change the Ethiop’s skin to white or convert the white man’s skin to black remains to be tested.” The Herald wondered just how much the uniform—the representation of citizenship—might change its wearer’s basic character. Would African American soldiers become the things they “imitated?” African American soldiers were like the greenbacks themselves: a counterfeit. “For finance, issue Greenbacks; for war, Blackbacks,” one critic of the administration argued. Lincoln’s critics saw paper money and African American soldiers as analogous.

“How Are You Greenbacks,” a song written in 1863 for the minstrel show, began by describing greenbacks as agents of the Union in war:

We’re coming father A-bram, one hundred thousand more
Five hundred presses printing us from morn till night is o’er
Like magic you will see us start and scatter thro’ the land
To pay the soldiers or release the border contraband

And it ended by comparing greenback dollars to African American soldiers led by editor Horace Greeley:

We’re coming, Father A-bram, Nine hundred thousand strong
With nine hundred thousand darkies, sure the traitors can’t last long
With Corporal Cuff, and Sergeant Pomp, to lead us in the melee
And at their head, without a red, Our Brigadier General Greeley.\[5\]

Arguments comparing “negro soldiers” to greenbacks appeared in the Presidential campaign of 1864. “Jokes, Niggers, Greenbacks—all play’d out,” mocked the chorus of one song: “Who will care for Old Abe now?” McClellan stood for the return of gold, the song continued. “When ‘Little Mac’ is in the White House, Greenbacks will vanish—Gold come down!

“We’re fighting for the nigger now,” went another:
I calculate of niggers we soon shall have our fill,
With Abe’s proclamation and the nigger army bill.
Who would not be a soldier for the Union to fight?
For, Abe’s made the nigger the equal of the white.

This song also claimed that the soldier “must be loyal, and his officers obey, Though he lives on mouldy biscuit, and
fights without his pay...Though he waits six months for Green-
Backs, worth forty-five per cent.” The song treats greenbacks,
elevated to a position of equality with gold they can’t
sustain, as part of the same mentality that has elevated
African Americans to a counterfeit equality. It concluded
“when old Jeff Davis is captured, paid up you may be: If you
do not mind the money, don’t you set the nigger free.”

In the decade after the war two debates preoccupied American
politics: what to do with the ex-slaves, and what to do about
money. “Greenbackers” insisted money was nothing more than
what we all agreed to use. Greenback paper dollars derived
their value from the nation’s common purpose, and more
specifically from the courage and sacrifice of those who
fought to support the union cause. “As surely as our flag
represents...the unity of these States,” declared a Michigan
greenbacker, “just so surely, sir, do the United States
Treasury notes represent the cost of life and blood and
treasure, the priceless value of that unity of States.”[6] What
was gold compared to that?

An 1878 campaign poem claimed:

O, Greenback, veteran of the years!
Thou crippled soldier of the war!
Baptized with blood and wet with tears.
To-day thou art without a scar.
Thou stood upon the picket line
Wherever hissing bullets flew...
Thou stormed the forts; thou sped the ships;
Thou dealt the gunboat’s timely blow;
Thou forged the cannon angry lips
Greenbacks, wrote New York Congressman Clinton Merriam, had made citizens of the ex-slaves. “The greenback was the first thing they ever earned that they could call their own, the first thing, save our flag, that stood before them, a symbol of their freedom.” Greenbacks symbolized government’s power to overturn the natural law arguments that justified slavery. “With it they soon learned a power to gather together long-broken families into a common home,” Merriam continued. “To the colored men the greenback rose above the dignity of language; to them it almost bore the dignity of religion.”

Greenbacks made it possible for slaves to own property and establish families, the two bulwarks of republican citizenship. They also taught the religion of saving and self advancement.

After slavery, black Americans could act as free agents: they could negotiate for themselves instead of being negotiated over. They could renegotiate the meanings of their very persons, and for a time, Reconstruction attempted that renegotiation on a grand scale. The response was both to intensify and harden the notion of race, and to insist with equal ferocity on the gold standard and the idea of a natural, Darwinian law of value. Gold money supposedly enabled a “natural law” economy, in which men’s true merit revealed itself, and most gold bugs” had no doubt that in that hierarchy, African Americans would remain on the bottom. Reconstruction failed because it presented Americans with the negotiability of meanings—with the radical implications of market exchange. When white Americans looked hard at the possibility of renegotiating what “race” meant, they doubled their bet on gold. By 1873, the US was on course to a money supply based on gold.
We can see in this period how debates about money and race were enmeshed. Gold stood for allegedly natural values and “real” social hierarchies: greenbacks stood for the idea that social hierarchy was constructed, and that value was nothing more than social convention. Americans regularly fight and die for the freedom to remake ourselves in the marketplace. Yet the US has never managed to rid itself of the problem of racism. Deeply embedded in debates about money, we see our own fundamental ambivalence about the implications of the American dream.

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May 21, 2020

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Introduction

Public education – K-12 and public higher education – have been hit hard financially by the Covid-19 Crisis. General financial problems afflicting state and local governments – the fall off in tax revenues and increased health and public safety expenses associated with dealing with the pandemic – contribute to the shortfall. Specific increases in costs and
declines in revenues afflicting the public education sector itself add to the impact. Given that most states have balanced budget provisions, states and local governments need massive financial help from the Federal Government in order to provide basic services to its residents, including public education. Estimates of the shortfall facing state and local governments suggest an amount approaching $1 trillion dollars through 2021.

In principle, there are multiple mechanisms that could raise and channel these needed funds to state and local governments including public education. In particular, grants from the Federal government would be, far and away, the best solution to the fiscal problems of states and locales. However, even in the best likely scenario, it is unlikely that sufficient funds will be forthcoming through this route.

Fortunately, there are additional available financial channels, namely via the Federal Reserve System (Fed). The Fed has already committed itself to providing an “unlimited” amount of liquidity to the US financial system to prevent a meltdown and to provide credit to some sectors of the economy. Characteristically, this support has been primarily, if not exclusively, for financial markets and businesses. The Fed has created most of these funds through declaring the equivalent of a financial emergency under the authority given to it by section 13(3) of the Federal Reserve Act.

The Federal Reserve has so far made available up to $6 trillion to the financial markets through multiple 13(3)-sanctioned financial facilities, including a number revived from the group it used in the Great Financial Crisis of 2007-2009. Many knowledgeable observers believe this sum could get much higher. In fact, as the crisis has worsened, the Federal Reserve has been expanding almost weekly the kinds of financial institutions and markets it has been willing to support. These have included money market funds, commercial paper markets, and corporate bond markets. The Fed has even
recently expanded its liquidity support measures to “junk bonds” and private equity firms. If the Federal Reserve can support “junk bond” issuers and private equity firms, it can certainly support state and local governments and public education.

Indeed, among the new facilities that the Fed has created is a Municipal Liquidity Facility (MLF) which currently has the capacity to buy up to $500 billion of state and municipal debt. This facility was created in order to calm the massive municipal debt markets which had been experiencing low liquidity, large spikes in interest rates, and financial instability at the onset of the crisis. In principle, this facility could serve as a mechanism to channel needed funds to public education. With $500 billion in lending capacity, this would be an easy way for the Federal Reserve to begin to support the needs of public education. For example, the MLF could be used immediately to help state governments refinance outstanding debt at much lower levels, given that one of the goals of recent Federal Reserve policy has been to drive interest rates lower. This could free up millions of dollars of state funds for covering other Covid-19 costs.

Several obstacles stand in the way of public education accessing sufficient, useable funds through this mechanism. One is that education will be competing with many other institutions and interests for funds from the MLF facility, including those financing infrastructure projects and economic-development projects. Public education would simply be one of many interests vying for these funds and might lose out in this competition. A second potential problem is that the dominant way in which borrowers can access these funds is by identifying a clear revenue stream to finance interest payments and repayment of the loans from the Fed. But in the context of this public emergency, school districts and higher public education may find it difficult to identify a viable revenue source and do so in a relatively short time frame.
(The MLF loans have a three-year maximum duration). Finally, as mentioned earlier, most states have balanced-budget requirements for current expenditures and regular operating expenses for education are considered current expenditures. Thus, borrowing to finance current expenditures for public education is likely to crowd out expenditures for other publicly useful activities or require governments to raise tax revenues, which is not likely during the crisis.

To address these problems, I explore several remedies. For one thing, many of these restrictions could be loosened or eliminated. The Federal Reserve has already loosened the rules governing the MLF once and they could do so again. Alternatively, a new facility might be needed that could best address these obstacles.

**Public Education Emergency Finance Facility (PEEFF)**

With the approval of the Secretary of the Treasury, the Federal Reserve could establish, under section 13(3), a facility that would be designed specifically to provide emergency funding for public education for our children and young adults. I call this the Federal Reserve Public Education Emergency Finance Facility (PEEFF). This facility would provide both short and longer-term support to public education in order to help public education survive the pandemic and continue to provide needed education. Like the MLF, this facility could accept paper issued by state and local governments for the purpose of supporting public education.

The terms of this fund could be tailored specifically to the needs of public education. These terms could include lower interest rates and fees, longer terms (beyond the three years), and the ability to accept paper that it is not tied to immediate revenue generation but to revenue that could be generated over a longer terms period (or forgiven entirely). The PEEFF could be created in a form similar to the MLF, with
the creation of a Special Purpose Vehicle (SPV) with capital put up by the Treasury department (which has been allocated under the CARES act). Alternatively, it could be a stand-alone facility, such as some of the other emergency facilities created by the Fed in the recent pandemic. There is no law requiring it be created through a SPV structure with Treasury backing. (It should be noted, however, that as of this writing, not all of the initial $450 billion allocated by the CARES act to back up facilities at the Fed have been allocated.)

As long as the state is borrowing through its current spending authority, these borrowings might be subject to the balanced budget constraint.

**State and Local Human Capital Bonds**

However, if the borrowings could be put on the capital budgets of states, this could give the states more flexibility. States could innovate by creating *Human Capital Bonds* that the Federal Reserve could purchase.

Most states’ balanced budget requirements apply only to the budgets for current spending. These states have separate capital budgets for longer term investments including new schools, new buildings on college campuses, new roads, etc. that are designed for borrowing. One way around the balanced budget problem is to identify this emergency education spending as a type of capital spending and put it under the capital budget. This would entail denoting these borrowing instruments as investments in *human capital*, using parlance long established in the economics profession. These *human capital bonds* could be issued under states’ capital budgets. An additional innovation would be to allow these bonds to be issued for longer than the current limit in the MLF of 3 years.

The MLF and/or the PEEFF could in turn buy the bonds. That
purchase would be in keeping with the traditional economics understanding of education as building human capital. By putting its stamp of approval on these bonds, making a market in them and providing liquidity for this market, the Federal Reserve could be essential in creating a new financing tool for a critical social and public good for our country. In addition, the Federal Reserve’s financial support for these bonds would enhance their safety and help preserve the state’s bond ratings.

**Federal Reserve District Regional Human Capital Bonds**

A further innovation would be to create a regional consortium to issue human capital bonds. Regional groupings are emerging as important innovations in the way our society is handling the fall-out from the Coronavirus. Regional differences in economics, politics and even culture are leading to these regional consortia and allow for a more flexible type of federalism to overcome acute adversity.

PEEFFs could be organized at the Federal Reserve District level, for example. The Federal Reserve Bank of Boston or the Federal Reserve Bank of San Francisco could host a PEEFF facility which issued regional Human Capital Bonds, and allocated the proceeds to states within the regions. State governments would take responsibility for allocating these funds for public education and for ultimately servicing their share of the bond issue. This regional plan builds on Federal Reserve practices developed during the Great Depression and enhanced during World War II.[2]

The Regional Federal Reserve approach has several advantages. First, it could help states overcome state-level debt issuing restrictions and ratings problems while being able to take advantage of regional risk-sharing facilities, lines of credit, and discount facilities through the District Federal Reserve. The District Fed would thus be able to reduce the risks to participating states. In addition, a Federal Reserve
District Facility could help develop mechanisms for a more accountable and democratic Federal Reserve through effective elements of a more decentralized Federal Reserve System (see Epstein, “Reforming the Federal Reserve for the 21st Century”, in Epstein, The Political Economy of Central Banking: Contested Control and the Power of Finance. Elgar Press, 2019, chapter 23.) Building a more democratic Federal Reserve starting at the Regional level would build on a founding idea of the US central bank, but would help transform it into more accountability to the people, rather than to the bankers.

Conclusion

In addition to the huge direct human toll, the Covid-19 crisis is de-railing many crucial social and public functions, including the education of the next generation. While federal government revenue-sharing would be the best way to confront this problem, the Federal Reserve can also contribute by creating additional needed resources and allocating them to state and local governments, as they have created many billions of dollars for corporations and financial institutions. I have indicated how the current Municipal Liquidity Facility might be utilized for this purpose, and how a new, specially-targeted educational facility, the Public Education Emergency Financing Facility, could serve the purpose of keeping public education afloat during this trying time. In either event, the Federal Reserve’s support of a new public financial instrument, Human Capital Bonds, might help funding of this crucial social good, especially in the context of an economic and social emergency.

[1] The author thanks, without implicating, Michael Ash, Doug Cliggott, Hasan Comert, Jane D’Arista, Christine Desan, Nancy Folbre, Dean Robinson, Max Paige and Esra Nur Ugurlu, for help with this paper.
In order to achieve racial justice in America, we must confront and then thoroughly reject simplistic and ahistorical myths about markets and capitalism. We have mistaken notions that (1) colorblind economic policies can fix vast inequalities created by centuries of explicitly race-based policies and (2) that free markets are an antidote to heavy-
handed state policies of economic exploitation and exclusion. More narrowly, the reason that the United States has never significantly contemplated a meaningful program of racial justice is because demands for economic justice have been crushed by myths of self-reliance and neoliberal free market fundamentalism. The most recent and least understood of these political decoys was the Nixon era “black capitalism” program that was used to block meaningful reforms by offering capitalist dogma. These programs linked the Civil Rights coalition’s demands for justice with threats of communism in order to hide the history of heavy state intervention that created vast racial inequalities in wealth and income.

The 1968 Kerner Commission Report, which was the closest the US ever got to an official acknowledgement of its history of racial injustice, spoke to the phenomenon of protests and unrest in America’s segregated cities. The final report determined that the riots stemmed from poverty, racism, inequality and other social ills, but that the underlying cause was segregation. “Segregation and poverty have created in the racial ghetto a destructive environment totally unknown to most white Americans,” the report said. “What white Americans have never fully understood—but what the Negro can never forget—is that white society is deeply implicated in the ghetto. White institutions created it, white institutions maintain it, and white society condones it.” The report was an unapologetic excoriation of white society, which the commission deemed guilty not just of racism, but of apathy toward black poverty. The only way to address these injustices, according to the report, was through a robust federal response. Nixon won the 1968 election by promising that he would do no such thing. But first, his campaign had to get the messaging right. Alan Greenspan, who served as Nixon’s economic advisor, addressed claims by black activists for reparations in a private campaign memo to candidate Nixon in 1967 called “The Urban Riots of the 1960’s.” He wrote that
capitalism itself was under attack by demands made by black militants and that “ghetto riots have become a rallying cry for an attack upon America’s system of free enterprise and individual rights.” Greenspan outlined his reasoning:

The critical question is, of course, whether the Negroes are correct in claiming that they have been exploited and that their violent reaction is the rational response. There can be little doubt that discrimination has been rampant. However, the charge of exploitation in the sense of value being extracted from the Negroes without their consent for the profit of the whites is clearly false . . . . This distinction between discrimination and exploitation is all the difference in the world.\[^1\]

In other words, because whites had not profited directly from black misery, reparations should be rejected. Moreover, he underscored in the memo that any capitulation to demands for federal spending in the ghetto was a threat to free enterprise.

Greenspan believed that the cries of exploitation were misguided because black activists had misunderstood capitalism and the natural market of the ghetto, and had erroneously and unfairly blamed whites for exploitation. He was correct when he said that “profit rates in slum areas are doubtless distressingly low considering the risks,” but he erred when he concluded based on that observation that the white community was not gaining any “advantage and profit” and that therefore cries of “injustice” were “erroneous.” He could not see that the same system that discriminated against blacks had brought benefits to whites. Nor did he acknowledge that for blacks who were being crushed by the ghetto debt trap, it could still
feel like an “injustice” even though the lenders were not making direct profits. He rejected the liberal notion that “the Negro ghetto must be elevated to the level of affluence of middle-class America” because “this can only be done by massive governmental expenditures.” Instead, he advised Nixon to pursue programs to “help Negroes help themselves.”

In line with the Greenspan-Nixon approach, Milton Freedman used theories and models of free market capitalism (as opposed to the actual economic history) to fight basic anti-discrimination laws in his foundational 1962 book, “Capitalism and Freedom.” The intellectual father of neoliberalism opposed such laws as a violation of free market capitalism. He decried discrimination as a matter of bad taste, but said that Civil Rights laws were an “interference with the freedom of individuals to enter into voluntary contracts with one another.”[2] He compared laws prohibiting discrimination to laws requiring discrimination—it was all unjustified government intervention. Friedman believed that markets would themselves root out discrimination because it was costly and inefficient. Friedman claimed that anyone who opposed buying goods from black businessmen or employing black employees was expressing an inefficient preference and would therefore pay a higher price for that preference. Theoretically, this was true, but historically it was not. Because the ghetto had cordoned off a segment of risky borrowers, whites actually paid significantly less for goods, credit, and housing. Racial discrimination had not cost whites, but had actually brought many advantages through all-white suburbs, lower competition for lucrative jobs, and, for a time, even labor protections that benefited whites at the expense of blacks.

Friedman, Greenspan and other market capitalists grounded their arguments in economic theory. They were chasing a
libertarian vision of the economy, but what they were describing was a hypothetical future—it had no relationship to the actual lived experience of American history. The historical American reality was that blacks had never fully participated in free market capitalism and that whites had benefited from heavy government interventions that had worked to the direct disadvantage of blacks. The arteries of trade and commerce had not flowed freely through the ghetto, at least not in the realm of credit and banking. Credit markets laid atop a federal government apparatus including guarantees, secondary markets, deposit insurance, and federal reserve support. The only places where those forces were not working were inside the ghettos. The ghetto itself had been an unnatural creation of anti-market impositions of racist policies. Indeed, discrimination was incredibly costly, but only to blacks.

The neoliberal faith in capitalism and market efficiency was rooted in an ideal much like the egalitarian principles of the founding documents. They were aspirational faiths, but they were not accurate descriptions of the real world. In theory, it was costly to refuse to buy products from blacks if they were offering the same or lower prices. In reality, whites often refused to associate with blacks at any cost. Besides, even if discrimination did suddenly disappear, the broken markets of the ghetto would not. Discrimination had created macro market forces that were now operating on their own. Yet neoliberal dogma and market fundamentalism demanded adhesion to market theory, which meant an aversion to any and all “government intervention” aimed at black poverty.

The neoliberal right demanded smaller government involvement and spending in all spheres. Without spewing the racial animus of the George Wallace wing of his party, Goldwater, Nixon, Reagan and the rightwing judiciary and Congress opposed Civil
Rights laws, integration, and any affirmative racial remedies—all in the name of free market capitalism. Since any redress for past economic exclusion required heavy federal government action, an immediate libertarian backlash began to delegitimize all government action. Conservatives began to demand a bill of rights that guaranteed the right to free use of property, including the right to segregated neighborhoods. The movement could hardly be seen as anything but a direct response to the economic demands of the black movement and the government anti-poverty program. Nixon was not a libertarian—he expanded the federal bureaucracy and created more government agencies than any modern president—but he still opposed government interference of any kind when it came to integration or anti-poverty measures. Republican strategist Lee Atwater gave away the playbook in a 1981 interview: “You start out in 1954 saying nig***, nig***, nig***. By 1968, you can’t say nig***—that hurts you, backfires. So you say stuff like, uh, forced busing, states’ rights, and all that stuff, and you’re getting so abstract. Now, you’re talking about cutting taxes, and all these things you’re talking about are totally economic things and a byproduct of them is, blacks get hurt more than whites…”

The theory of economic dogma which James Kwak has called “Economism” began to be adhered to like a religious dogma and used to fight each and every government intervention to remedy past sins. Economism even provided a new justification for stark wealth inequality and exploitation. Inequality along racial lines has been a constant on the American scene, but different eras have justified it with different myths. Christianity was corrupted to hold that white men had a divine right—even duty—to subjugate and enslave blacks. When religious theory fell out of favor, social Darwinism and skull measurements held that blacks were an inferior species who had lost the evolutionary race and thus their subjugation was nature’s will. Now, economic theory held that “the free
market” decreed that blacks hold the bottom rung because, for example, it was the laws of supply and demand that caused blacks to pay more for credit, the market that determined how much their labor was worth, and that integration was anti-market. Any effort to change these markets were delegitimized and labeled as harmful government interference with what President Regan called “the magic of the marketplace.” And just as “God’s will” was difficult to challenge in the 1800s, so too was free market economic theory in the 1960s, lest one be labeled a heretic or a communist. For the ascendant libertarians that were taking hold of American politics, the only acceptable remedy for a history of exclusion was black capitalism. But what these white policymakers surely meant by black capitalism was capitalism only for blacks. Government intervention in markets had been the norm, as were government-imposed Jim Crow laws. Capitalism had not created the ghetto and black poverty—racist laws and state intervention in the markets had created both. There had never been free market capitalism for blacks. After years of exclusion, Jim Crow, segregation, and the deviant markets these state interventions had created, the Nixon administration was actually proposing that maintaining that segregated market was the remedy. That somehow by attaching the word “black” to “capitalism” would remedy past wrongs. In order to achieve racial justice, we must offer economic remedies that adequately address a long history of exclusion. And in order to do that, we must confront and reject simplistic and ahistorical models of Capitalism.

The Federal Reserve Public Education Emergency Finance Facility (PEEFF): A Proposal

Gerald Epstein, University of Massachusetts Amherst

State and local finances, including for public education, have been hit hard by the COVID-19 crisis, leaving more than a $500 billion hole in their budgets. Grants from the federal government would be the best solution for these temporary fiscal problems, but, even in the best-case scenario, it is unlikely that sufficient government funds will be forthcoming. Fortunately, additional resources could be made available through the Federal Reserve System (the Fed). This paper describes how the Fed’s newly created Municipal Liquidity Facility (MLF) can be used to provide substantial emergency assistance to the public education systems of states and cities. Although the MLF has a $500 billion lending capacity, public education would have to compete with many other institutions for this funding. This paper proposes a new special Fed facility, **The Public Education Emergency Funding Facility (PEEFF)**, which would be dedicated specifically to funding public education. To fund education, as a new innovation, this facility could buy long-term **human capital bonds** from the states at very low interest rates. By buying these bonds, the Federal Reserve could help states maintain
the crucial public job of educating our children and young adults during the pandemic, rather than only bailing out Wall Street.


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**D. Kennedy, The Fed Should Bail Out Low-Income Tenants and Not Just Banks and Landlords**

May 12, 2020

*Duncan Kennedy, Harvard Law School*

In the last financial crisis millions of American home owners lost their homes while low-income renters were evicted *en masse*. This time the policy consensus is that renters thrown out of work by the crisis are already bearing the brunt of what may be an even worse disaster. For extremely low-income (ELI) households, the COVID crisis is aggravating what is
already a highly distressed environment. The number of affordable units for ELI households is only 36 per 100, reflecting a shortage of 7 million units. 71% of ELI households are already spending more than half their income on housing (all figures from NLHIC 2020). There are many worthy plans on the table to avert the COVID rental crisis, pushed in editorials and op-eds in the New York Times, the Washington Post and the Boston Globe. They all have the serious drawback that they require not just legislative action but taxpayer dollars in a hopelessly polarized political environment.

An alternative plan would be for the Fed to exercise, creatively, its vast powers over the monetary system to relieve poor tenants and prevent decimation of the remaining supply of low income housing. The Fed could buy mortgage debt, secured by low-income housing. Then it could bail out low-income landlords in exchange for tenant protection. The Fed would need Treasury support in order to protect against credit risk; without that protection the Fed would not be able to lend under current law. But the Treasury has generously extended protection against credit risk from its existing Exchange Stabilization Fund for large corporations, municipalities, the fossil fuel industry, and a variety of other borrowers. Surely the Treasury would do same to stop meltdown in the market for low-income mortgages.

The Fed should offer to buy the debt for more than the value of the underlying property but for significantly less than the face value of the mortgages. Creditors choosing to sell their debt would liquidate their losing investments for the price of a “haircut.”[1] Mortgage debt in hand, the Fed’s bailout of landlords and tenants would be done through the issuing banks that now hold the servicing contracts with the investors in the mortgage-backed securities into which individual mortgages are bundled. The Fed as creditor then instructs the servicing banks to forgive or defer some or all of the mortgage carrying charges of qualifying owners of low-income rental housing.
In exchange, landlords agree to a moratorium on evictions for non-payment and to forgiveness or deferral of the rent obligations of qualifying tenants. Landlords also agree to limits on their power to take units out of low-income residential housing use, and to strict enforcement of maintenance standards.\[^{2}\]

The plan is based on the prediction that crisis conditions will push (are pushing) down the market value of the low income rental stock so that buildings are worth less than the face value of their mortgages – and that those conditions will persist well beyond the present moment.\[^{3}\]

A realized plan to take advantage of the moment would be full of devilish details such as: how much if any means testing for tenants; what mix of rent forgiveness and forbearance; how big a haircut for the investors in mortgage backed securities; what restrictions on landlords’ rights to alienate their now rent-restricted property; how the Fed would exercise or dispose of its new creditor rights.

A big objection is likely to be that the Fed doesn’t know how to administer loans directly and certainly not low income loans containing complex tenant protections. The answer is that the servicing banks, usually originators with their own sub-servicers, will administer for the Fed just as they did for the holders of the mortgage when it was part of a mortgage-backed security. The Fed will have to supervise the servicers but not administer loans directly. This is not out of line with standard portfolio maintenance.\[^{4}\]

As negotiated, the plan could be watered down so as to do practically nothing for low income tenants and a lot for landlords and holders of mortgage backed securities, or it could signal a vast gain for the working poor.\[^{5}\]

The argument for a seriously pro-tenant version of the
proposal goes beyond the mere assertion that if it worked it would benefit low-income tenants faced with economic wipe out and possible homelessness. Here are some of the assumptions that justify the various parts of the scheme as a response to the peculiar circumstances of the health crisis within the housing crisis that has been unfolding in metropolitan areas all over the country.

The various relief and bail out provisions of state and federal law will not come close to closing the rent gap for newly unemployed workers. The unemployment insurance system, backlogged with unprecedented claim volume, will not substantially overcome the gap for many months. Millions of workers now unemployed are not covered in the first place. The CARES Act provides certain forbearance and eviction moratorium to landlords and tenants in multifamily housing with a federally backed (=GSE or FHA) mortgage. But these provisions only cover one quarter of rental units, and even for those lucky few, protections are of limited duration. These provisions are also already running into administrative difficulties.

Owners of low income housing will see a precipitous decline in their rent rolls and in the present value of their equity in their buildings. Rent rolls will not cover mortgage covering charges, real estate taxes and current maintenance expenditures.

Among the decisions owners will have to make, a big one will be when to exercise their absolute legal power to evict tenants (except the very few represented by expert legal services lawyers) for failure to pay even part of a single payment when due, regardless of hardship. One possibility will be to empty a building and put it on the market not for low income housing but for conversion to middle or upper-income use. Another will be to forgive rent to the extent necessary to keep a building occupied while cutting back or eliminating maintenance, “milking” the building as it deteriorates.
The long-term trend in many metro areas of displacement of low income tenants in favor of middle and upper-income buyers will continue, even though middle and upper-income groups are losing wealth and income in the recession. Income inequality keeps bargaining power unequal in the housing market whether the economy is going up or down.

The recession will paralyze high cost upper-income development by new construction away from the city. Falling prices will make conversion of existing units in the remaining low income neighborhoods in and near the city much more desirable. Banks and brokers and builders will arbitrage units out of low into middle and upper income use, devastating what is left of affordable housing in the metro area.

A Fed intervention by conditional bailouts might prevent this result. (Note that passing a rent control bill with tenant eviction protection could accomplish some of the same.) That would be a major collateral benefit of preventing a chaos of eviction and displacement in the immediate future as low income people lose their ability to pay rent.

The beauty of it all: no legislative action required. No new taxes – federal, state or local. The Fed would be doing good first of all for big business, stimulating the economy through the familiar form of quantitative easing. The conditionalities for once support the survival of the poor rather than attacking them in the name of austerity.

The author is a retired Harvard Law School professor who taught low income housing law and policy for many years and still writes in that field.

1. What it is a “haircut” you ask? In ordinary times, property value (say, $10 million) is greater than mortgage face value (say, $8 million). But in crisis, property values can drop such that the relationship inverts. For example, the mortgage can become $2 million
“underwater”, meaning the property’s liquidation dropped to $6m. In a stylized example, the Fed bids, say, $7m for the mortgage. The difference between the bid and the property price (=$7 million - $6 million) is the bailout to the seller; the difference between mortgage’s face value and the Fed’s offer ($8 million – $7 million) is the “haircut” or loss to the seller. ↑

2. Both my friend and a hyper critical semi-sympathetic legal economist X remind me that the structure of mortgage backed securities makes it difficult to identify creditors. X says that the trustee for the first syndicate that bought this mortgage to bundle it is the first responsible party, and could sue. But according to him the trustee could reassemble and sell the dispersed fragments by agreement of the dispersed crowd of the fragment owners, with no pre-set process to unbundle or deal collectively. It does seem that unbundling will involve substantial transaction costs, for someone. It also seems plausible that if the Fed offers hundreds of millions of bail out money to banks struggling with massive business failure all around them, quick witted finance entrepreneurs will figure out a way to get a share by helping the creditors get theirs. ↑

3. The Fed offers to buy mortgages at prices that reflect the extent to which the loan is under water. Everyone thinks the crash in rent means possible massive landlord default and concomitant loss in market value and danger of foreclosure. The creditors will only sell to the fed if something like that is happening. The amount of the haircut negotiated by the fed with the MBS holders depends on the level of distress and could be done for example, by a single fed offer to everyone or different offers for different situations.

The whole idea is that there might be a lot of
distressed cases (listen to the moaning from the industry) but even a few would be all to the good. So the proposal is not dependent on there being some large minimum number of properties underwater by a particular amount. ↑

4. The concessions that need to be enforced cover:

- rent, building maintenance and evictions (again, forbearance or forgiveness, eviction moratoria with or without good faith eviction protection), and

- the agreement not to take the units out of the low-income stock (for some period of time).

The part that needs enforcement is the landlord’s promises to the tenants. The prohibition of conversion to higher-income use is easy because the landlord can’t convert the building without getting the Fed’s permission as mortgagee. That involves simple portfolio management.

The enforcement of the tenant protections is more complicated. The servicing of the mortgage is in the hands probably of the initiating bank, contracted out to a servicing firm. That firm collects the landlord’s payments and transfers them to the Fed. The servicer enforces tenant concessions by requiring the landlord to report rents charged, evictions for cause, code inspections and the like. Lying is a federal offense. The section 8 program enforces some tenant rights through this kind of mechanism.

The second enforcement mechanism is tenant self interest in the reduced rent, maintenance obligations and eviction protections. The Fed would require landlords to give a lot of information to tenants and would make it clear to the local legal services bar that it welcomes complaints to the servicer of landlord abuse of its
agreement. Portfolio management of this kind would be new, but not that new, given that the Fed is already in the business of enforcing its bank operation regulations for the benefit of bank customers (analogous to renters). ↑

5. The outcome of the plan is that the losses of income suffered by renters are born as follows:

- some portion by mortgage-backed securities owners (according to the size of the haircut);

- some part by landlords, who get carrying charge relief to avoid foreclosure but have to make all kinds of concessions to tenants;

- some part by tenants, in multiple ways determined by the amount of rent left to pay after forbearance and not forgetting the indirect benefit of the preservation of the stock;

- and some part by taxpayers, who assume the risks of default on the mortgages the Fed has bought.

Readers have had a lot of trouble grasping that this scheme distributes the cost of tenant relief among all parties with no predetermined specific outcome: it all depends on negotiations. ↑

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CFP: Critical finance studies
'virtual' conference, 2020


This year the annual Critical Finance Studies conference goes online. This event will include online keynote sessions by Gargi Bhattacharyya (University of East London) and Annie McClanahan (University of California, Irvine), online panels, and networking sessions.

Topics could include but are not limited to:

- Finance and the environment
- Critical finance in times of COVID-19
- Racial capitalism and finance
- Gender and financial capitalism
- Financialization and climate change
- Finance and the rise of populism
- Financialization and the Global South
- Risk societies and cultures of volatility
- Art and finance
- De-financialization and divestment strategies
- Financialization and subjectivity

There will be two ways to participate: either by submitting a video or audio presentation, or by sending in a paper. The application deadline is 15 June 2020. Submission guidelines and a full blurb for the conference are available here.
American Predatory Lending and the Global Financial Crisis

American Predatory Lending and the Global Financial Crisis, a website with data visualizations, oral histories, and policy analyses, is now live, under the rubric of the Bass Connections project within Duke University. It is the creation of a multidisciplinary team, including fifteen Duke and two University of North Carolina students under the leadership of Edward Balleisen, Professor of History and Public Policy and Vice Provost for Interdisciplinary Studies; Lee Reiners, Director of the Global Financial Markets Center at Duke Law School; Joseph Smith, former North Carolina Commissioner of Banks, and Debbie Goldstein, Director of the Duke North Carolina Forum.

Why is this Happening? with Chris Hayes: Saving the Economy with Saule Omarova

Why is this Happening? Podcast Talks with Saule Omarova

Are we doing enough to keep the economy alive through this crisis? So far, economic relief efforts have been messy, convoluted, and inequitably distributed. But while we talk
about the steps taken to save the economy, we first need to know the structures in which that recovery originates. Who decides where the money goes, how are those decisions being made – and can these mechanisms be more effective? Not just in this current pandemic-induced economic contraction, but on a more permanent institutional level. How can we ensure our financial system is stable enough to weather these types of crises? After dedicating her academic career to answering these types of questions, law professor Saule Omarova joins to discuss her proposal for what that new type of institution can and should look like.

You can find the episode here: https://podcasts.apple.com/us/podcast/why-is-this-happening-with-chris-hayes/id1382983397?i=1000473624817

The Class Politics of the Dollar System

Yakov Feygin & Dominik A. Leusder

The global dollar system has few national winners. The typical frame for understanding the US dollar is that of “exorbitant privilege.” But the role of the dollar in structuring the international financial system and defining the relationship between a hegemonic US and the rest of the world is ambiguous—as is the question of who exactly benefits from the current arrangement. Dollar primacy feeds a growing American
trade deficit that shifts the country’s economy toward the accumulation of rents rather than the growth of productivity. This has contributed to a falling labor and capital share of income, and to the ballooning cost of services such as education, medical care, and rental housing. With sicknesses like these, can we say for certain that the reserve currency confers substantial benefits to the country that provides liquidity and benchmark assets denominated in that currency?

Feygin, Yakov and Leusder, Dominik. Phenomenal World May 1st, 2020: https://phenomenalworld.org/analysis/the-class-politics-of-the-dollar-system

Analyzing the Constitutional Theory of Money: Governance, Power, and Instability

Jamee K. Moudud, Sarah Lawrence College

At the heart of the constitutional theory of money is the argument that money is central to governance. This article explores the ways in which the core mechanism of the publicly undergirded monetary system, involving the incentivization and disciplining of private investors in the money creation process, creates its ‘fiscal value’ and generates both power struggles and possible instability in the unit of account. This twin dynamic of power and instability is intrinsic to
a longue durée analysis of money. It is argued that since the current jural relations allocate money and power in particular ways, the basis is created for potential future political challenges to the status quo ante, thereby creating instability. Further, the article emphasizes the centrality of the indeterminacy criterion which is at the core of the critical legal studies (CLS) framework, and its intimate connection to Keynes’s notion of uncertainty. The indeterminacy/uncertainty nexus is used to explore how currency stability is determined or undermined by expectations, power struggles, tax contestations, and broader policy frameworks. Finally, the article relates this monetary theory to the literature on state-led industrialization and shows how such a constitutional money theory of industrialization is an alternative to the New Institutionalist perspective which emphasizes the centrality of ‘clear and well-defined’ property and contracts in order to create an ‘efficient’ economy.


F. Brunton, Virtual Money at the Edge-of-State

April 28, 2020
Finn Brunton, NYU Steinhardt School

To the themes already taking shape in this roundtable on the relationship between states and virtual currencies, I would like to add the role of a zone that I’ll call “edge-of-state.” This is inspired by the use of edge-of-grid as a term in electrical infrastructure to describe those spaces which are neither outside existing infrastructure – self-sufficient, off the grid – nor inside and completely and reliably embedded on-grid. “Edge-of-state” is my way of talking about two conditions at the fringes of the money apparatus of states and central banks, which together have shaped the facts and fantasies at play in the creation of virtual currencies. These edge-of-state conditions, interstitial and interregnal, involve plenty of non-virtual monetary practices, while also providing considerable latitude for dreams – space in which to imagine scenarios. They are productive of the speculations (in both senses) that characterize utopian virtual currency.

Many of the founding notions of virtual currencies – particularly Bitcoin – involved the idea of money that could function in the seams of the operational spheres of central banks. Of course, many existing assets and forms of money occupy exactly this zone, whether offshore, freeport, or haven. Virtual currencies draw less on this set of actual practices (anyone with that kind of wealth has no need for rickety software projects with earnest YouTube evangelists and dank-meme in-jokes) than on the idea of a disruption of central banking, technological and political, which creates new kinds of interstitial space. The interstitial is the idea that the “agora” can be everywhere, as Ross Ulbricht envisioned when creating the Silk Road Bitcoin-denominated darkmarket: “every single transaction that takes place outside the nexus of state control,” he wrote, “is a victory for those individuals taking part in the transaction. … [E]ach one makes a difference, strengthens the agora, and weakens the state” – not any state in particular, but the very idea of the state
itself. For this model, the bitcoins you hold act as tokens of your divided loyalty. They don’t place you outside one state monetary regime and inside another, like holding a foreign currency or paying fees to send a remittance payment. Instead they situate you in an interstitial zone where part of your ready money is only “ready” for other outsiders who operate part-time in the same vacant spaces of the as-yet-unregulated, the unnoticed, untaxed, or illegal — and the money itself, unlike bags of laundered but legitimate dollars or euros, belongs to that space. Interstitial currency is the spatial experience of edge-of-state: the areas on the margins of monetary regimes and state structures, where it’s easier to envision wildcat techno-financial inventions in the negative space of existing institutions.

This expansive fantasy of true liquidity is one that can flow into every interstitial space: from refugees between countries, to sans papiers without bank accounts, to the business of selling citizenship-of-convenience “passports for Bitcoin” to panicky suckers. This notional liquidity imagines the architecture of issue, transaction, and settlement working everywhere and nowhere, smeared out into the edges of the world’s systems and infrastructures wherever they pull apart and create gaps, or squeeze too tight together and create jurisdictional overlaps, interference, and opportunities for arbitrage. (In practice, of course, this technological architecture is emphatically, physically somewhere, and very much on-grid, but let that pass.)

Attempts to produce actual territory for utopian virtual currency — a truly offshore zone, a permanent interstice — have about them the cranky charm of all micronational movements, obsessed with issuing declarations and franking stamps as proof of existence: Liberland, for instance, which aims to occupy a disputed island in the Danube, and initially plans to launch its micro-state based on a blockchain governance platform with a seafaring habitat called Bitcoin
Freedom. (Liberland’s history includes a relationship with Roger Ver, the Bitcoin booster who tried to sell citizenship and passports issued by St. Kitts and Nevis — the smallest sovereign nation in the western hemisphere — linked above.) However extreme their goals, the starry-eyed unreality of the new-nation approach — somewhere between performance art, satirical hoax, and the earnest bullet points one associates with Esperanto, decimal time, and orthographic reform — points up how much utopian virtual currencies need the edges of existing systems as their terrain. Without the interstitial, obliged to function as something other than the rebellious alternative to a dysfunctional or restrictive establishment, they rapidly hit the limits of their particular functionality.

In this roundtable Lev Menand has described a class of virtual currency as “utopian coins” (as distinct from backed-and-tethered stablecoins, or the corporate initiatives built on points and rewards — and hybrid projects like the top-heavy broken mecha suit of Facebook’s Libra, blowing gaskets and sinking deeper into the mire with every colossal step). The utopian imagination of virtual currencies is distinct from classic utopian social models, which tend to be fixed, eternal, and spatially planned: Campanella’s City of the Sun, neat as a Swiss watch within its seven circular walls. Instead, fired up by the idea of transacting within the ragged interstitial chaos between areas of authority, the utopian space of the utopian coin has its foundation in the particular libertarian spatial necessity of an edge, a frontier, or an underground within the system as it currently exists, where the new currency and its philosophy can take root: the Colorado town concealed from the world in Atlas Shrugged, the parallel network of wildcat banks and contraband emporia woven through the failing state in the founding novel of agorist libertarianism Alongside Night, the encrypted partition on a laptop’s hard drive.

If the interstitial imaginary locates currency within in-
between spaces of states, the closely related *interregnal* is the occupation of failures of or transitions between monetary authority, likewise productive of both fantasy and actual practice. Think of Curzio Malaparte’s account of a Ukrainian collective farm immediately after the Germans arrived in summer 1941 (he was covering the war for an Italian newspaper): a soldier comes in to buy a goose, kicking off a debate about what currency to use. The farmers finally sell it for fifty Romanian lei (five lire, Malaparte translates for his readers, comically cheap); “what can you expect us to know about prices?” asks a younger farmer carrying around a German requisition warrant for two horses, which she doesn’t know how or where to cash. “The Bolsheviks used to tell us: ‘This costs so much, that costs so much.’ You ought to do the same yourselves. You ought to begin by telling us how much the lei is worth in relation to the rouble.” “Naturally there will be some uncertainty at first,” Malaparte replies, uselessly. The interregnal, like the interstitial, is not outside the state but alongside, in places where the state becomes vague, uncertain, and unreliable, like edge-of-grid power: subject to fluctuations, handoffs, and the occasional complete blackout.

“Who taught us how to cheat if not the state,” demands the terrifying discharged soldier in Stefan Zweig’s *The Post-Office Girl*, an account of the First World War’s aftermath in Austria. “[H]ow else would we know that money saved up by three generations could become worthless in a mere two weeks, that families could be swindled out of pastures, houses, and fields that had been theirs for a hundred years?” That “mere two weeks” and “a hundred years” is one of the temporal feelings of the interregnal, reflecting a sudden question as to the capability and authority of the state to declare what passes as money and maintain its value, as part of the practice of sovereignty. I would like to set aside the practical responses to such a situation – the *Flucht in die Sachwerte*, the “escape into real assets,” as people scramble to acquire paintings, wine, real estate, precious metals and
stones, and the rest of the contents of the oligarchic safe deposit box — and instead explore interregnal moneyness, alongside the interstitial, as a state of mind that is very productive of utopian coinage amidst the crises of confidence.

Elias Canetti underwent a strange nervous breakdown in 1925, compulsively writing “MONEY, MONEY, AND MONEY AGAIN” in capital letters on page after page of paper, scattering them on the floor around him — “I couldn’t stop writing.” Newspapers reported largely apocryphal (but culturally telling) cases of “zero stroke” as clerks and bookkeepers found themselves handling hyperinflationary transactions of endless billions and trillions (“Many of these persons,” as John Kenneth Galbraith quoted the New York Times, “are apparently normal, except for their desire to write endless rows of ciphers”). And pamphlets, tracts, and schemes poured out to transform money and its state relationship. These ranged across replacing the inflationary authority of central banks with currency pegged to land, food, a “market basket,” or a depreciation schedule so cash went out of date like a newspaper, rotting if unspent; they went so far as to argue for the elimination of currency entirely, as in broadsides like Berthold Otto’s 1924 The Abolition of Money, in which society operates through an austere statewide accountancy system for life’s essentials, and we settle into the sitting room after generating our “demand units” to read the day’s statistics of town-by-town production and consumption.

The interregnal puts money into a place where new currencies can be imagined against and alongside the existing issue, building on the value systems they advantage and proposing new ones. As an edge-of-state experience, the interregnal is sometimes a fact, sometimes a state of mind, and often both. We can see it in artifacts, like that issue of the Times with its bank bailout announcement encoded into Bitcoin’s genesis block, as Bill Maurer has described in this roundtable; we can see it in the very specific approach to monetary history at
work in the ideologies of early virtual currency, with a focus not on the quotidian, institutional business of banking and debt but on inflationary crises, asset seizures, currency debasement, and dire prediction, where interregnal space opens up.

This essay has been an attempt to situate the territory of virtual currencies in relation to the territory of the state and state monies as neither within nor without, but in a marginal mode I’ve been calling edge-of-state. These edge-of-state experiences, spatial and temporal, are characterized by looseness, flux, the presence of authorities with an absence of regulation or oversight, chronic uncertainty, a lack of confidence and a lack of clarity combined with existing systems to imagine oneself against, and lots of boundary work and explanatory neologisms. I would like to suggest that this edge-of-state mindset can explain some of the historical heritage of virtual currencies, and that it may have a little predictive power: we can look to zones of interstitial space and interregnal time in the world’s currencies and transactions to spot further evolutions of these utopian currency fantasies and experiments — the hothouses for more of these outrageous, sometimes successful, and occasionally poisonous blooms.

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Tenure of Office and the Treasury: The Constitution
The disputed scope of the President’s authority to remove subordinates in the executive branch, and to direct them in the performance of their functions, is one of the central issues of federal constitutional law. On the one hand, some argue that Article II gives the President such authority. By contrast, others claim that the Constitution allows Congress to regulate the tenure of office of executive branch officers by limiting the President’s removal power.

In the context of this debate, some have argued that financial institutions—the components of the “treasury”—were historically insulated from presidential control. They rely on early Congresses’ creation of several commissions with the Chief Justice as a member, establishment of the First and Second Banks of the United States, and use of distinct language to establish the Department of the Treasury and some of its officers. This Article shows that these claims are incorrect. Drawing on congressional and executive sources, case law, and contemporaneous treatises, this Article demonstrates that the prevailing view in the years between the Constitution’s adoption and the impeachment trial of Andrew Johnson was that financial government institutions were no different from other parts of the federal government for purposes of presidential control. The President had the constitutional authority to remove officials within the Department of the Treasury. The institutions over which
presidential control was conspicuously lacking—the First and Second Banks of the United States—were generally understood to be private, rather than arms of the government, and to perform non-sovereign functions. But to the extent the Bank was understood to perform sovereign functions, its opponents argued that it did so impermissibly, using a variation of the modern argument that Congress may not delegate such functions to private entities. This Article’s exploration of these issues both bears on contemporary debates about the scope of the President’s removal power and shows how early expositors of the Constitution understood the allocation of federal government control over national financial policy.


B. Geva, Payment in Virtual Currency

April 22, 2020

Benjamin Geva, Osgoode Hall Law School of York University[1]

By reference to an analysis of the operation of payment in
traditional forms of money, this essay explores the meaning of ‘virtual currency’[2] and the mechanism for payment in it. Endeavoring to identify directions in which events will unfold, the essay sets the stage for a future detailed analysis of pertaining legal aspects.

Payment of money has traditionally been made in either currency or account balance. Payment in currency is by physical delivery from one person (payer) to another (payee) of banknotes and coins. Typically, this is a face-to-face process which does not require intermediaries. More specifically, ‘payment’ is “a bilateral act which requires the [payee] to accept the [payer]’s act of tender”;[3] and is completed on the passage of possession in the money when the payee takes delivery, thereby manifesting the acceptance of the tender. Typically, banknotes and coins are denominated in the unit of account of a national currency and are legal tender in the country of issue.

Payment in account balance requires intermediation. It is carried out by having the payer’s account debited and the payee’s account credited. Typically, both accounts are held at regulated financial institutions, broadly speaking, banks. Both accounts are typically denominated in the unit of account of a national currency. Payment is performed by means of either the extinction or reduction of the debt owed to the payer by the payer’s account-holding bank and either the creation or increase in the debt owed to the payee by the payee’s account-holding bank. Where payer and payee hold their respective accounts at two banks that are correspondents, payment in account balance requires the debiting the account of the payer’s bank by the payee’s bank or crediting the account of the payee’s bank by the payer’s bank. In a domestic payment system, at least all major banks hold their accounts with the central bank so that the interbank component of payment between two such banks is carried out as part of the
multilateral interbank settlement on the books of the central bank. Otherwise, payment in account balance requires a chain of settlements on correspondent accounts, with or without settlement on the books of the central bank, or alternatively, one settlement between correspondent banks followed by another settlement on the books of a central bank.

The architecture of the interbank payment system is centralized. Thereunder, a bank maintains accounts for customers. For its part, a large bank may also maintain accounts for correspondent banks. Finally, the central bank maintains settlement accounts at least for large banks. As a whole, the system can be visualized as a pyramid at whose head or apex stands the central bank with which at least large banks hold accounts, and possibly with small banks holding accounts with large banks. Individual and corporate customers are at the bottom or base of the pyramid holding their accounts in banks (whether large or small). Money denominated in the domestic fiat currency and held in bank accounts is redeemable in banknotes and coins which usually constitute ‘legal tender’.

With the advent of electronic banking, it became possible to initiate, transfer and process payment instructions electronically. Payment in account balance so performed is known as an electronic funds transfer. It became also possible to ‘load’ monetary value (that is, value denominated in an official or, in fact, any unit of account) on a tamper-resistant stored-value device such as a card or personal computer.

In such a case, the value became known as ‘electronic money’ or ‘e-money’. Most e-money schemes have involved “balance-based” products. In such products, devices store and manipulate a numeric ledger, with transactions performed as debits or credits to a balance. Accordingly, this type of e-money is a monetary balance or value recorded electronically on and is available from a stored-value product (SVP), such as
a chips card, or a hard drive in a personal computer, or a server. Such a record, accessible from the device without resort to the bank’s computer system, can be viewed as a decentralized bank account. E-money is said to “differ … from so-called access products, which are products that allow [customers] to use electronic means of communication to access otherwise conventional payment services” in and out bank accounts.” Alternatively, with a ‘pre-paid product’ variant, monetary value is available from a master account, belonging to the issuer or someone acting on the issuer’s behalf.

A minority of e-money products may still operate on devices that store electronic “notes” (sometimes called coins or tokens) that are uniquely identified by a serial number and are associated with a fixed, unchangeable denomination. In such a “note-based” model, transactions are performed by transferring notes from one device to another, and the balance of funds stored on a device is thus the sum of the denominations of all notes on the device. However, as in the “balance-based” products, transferability is typically restricted, and cardholders may usually make payments only to merchants who may clear these payments or deposit the accumulated balances exclusively through their acquiring banks.

E-money is ultimately a variant of ‘bank money’; thus, whether e-money is purchased in cash or by means of a debit to the purchaser’s bank account, the issuer has its own bank account credited with the amount sold to the purchaser. Where the e-money is purchased from a bank, the account credited is the reserve account of the selling bank. Payment in e-money is forwarded to the payee’s bank which credits the payee’s account with the amount of payment and forwards the e-money itself for redemption against the value previously credited to the seller’s account. In the final analysis, even where prepaid value or e-money is not issued by a bank, a scheme must facilitate the purchase and redemption through banks.
Particularly outside the banking system, a balance-based payment product need not necessarily be provided in an official unit of account. For example, a balance-based payment product may be denominated in weight units of gold. As well, a balance-based product may be redeemed by specific product, usually the one in which it is denominated. Furthermore, a balance-based product may be backed – in whole or in part – by a reserve made of the product itself. In fact, any proposed ‘full reserve banking’ scheme will provide a balance-based bank product fully backed by central bank money.

For its part, digital currency consists of digital coins, and is a completely stand-alone category distinguished from both currency (cash) and balance-based (including e-money) products. A digital coin is a distinct entity consisting of data expressed in a unique string of bits which represent value.\(^5\) Like physical coins and banknotes, digital coins are not paid out of bank accounts so that their payment does not appear to require intermediation by banks. And yet, exactly as the electronic funds transfers, they are paid over the cyber space. A privately issued digital currency is known as ‘virtual currency’ and may have its own unit of account, fluctuating by reference to the value of an official unit of account, in which case it is self-anchored. Alternatively, it may be a ‘claim check’ or stablecoin, either in a unit of account of an official currency, or in the value of a specific commodity, whether or not it is fully (or even partially) backed by a reserve of such currency or commodity. Each coin may be in the form of a total unspent amount in a wallet or a representation of what otherwise would be a physical banknote.

Virtual currency is frequently treated as a digitally-traded or transferrable digital representation of value.\(^6\) In my view, a definition along such lines is too broad. It encompasses account balance represented and transferred digitally and entirely misses the fundamental feature of the separate
identity of each digital currency coin, facilitating holding and transferring without an account.

An account as well as an undivided share in a stock of digital coins may however be held with an exchange or other depositary or virtual bailee. Controlling them, the latter may thus occupy a position analogous, or at least similar, to that of a bank in relation to the deposit of funds.

Unlike payment in account balance, payment in digital currency need not be recorded on a centralized ledger. However, in a given scheme, coins may be issued, transferred and redeemed under centralized protocol in which case the scheme is said to be centralized. Conversely, a scheme under which a digital currency is issued, transferred, and redeemed over a distributed ledger is decentralized. Finally, a digital currency transferable under a decentralized protocol – such as over a distributed ledger and yet issued by a centralized operator – is hybrid.

Centralized protocol does not require the intermediation of bank accounts and is thus entirely different from a centralized architecture in account-balance payment systems. At the same time, payment in digital currency, while being made from one digital device to another, requires the intermediation of an electronic network. Depending on its format, it may further require the intermediation of a custodian acting as a virtual storer or warehouse person for the coins.

The distributed ledger underlying decentralization is an asset database that can be shared across a network of multiple sites, geographies or institutions. Blockchain is an underlying technology, requiring the Internet to support and maintain its peer-to-peer network, that enables digital implementation of a distributed ledger. Being a computerized ledger on a distributed network, it generates a single version
of the record on each computer. Its essence is:

A type of a database that takes a number of records and puts them in a block ... Each block is then ‘chained’ to the next block, using a cryptographic signature. This allows block chains to be used like a ledger, which can be shared and corroborated by anyone with the appropriate permissions.

Accuracy of the ledger is corroborated under a method determined under rules adhered to by participants. Record security and visibility to authorized users is ensured by cryptography.

A “cryptocurrency” denotes a digital currency in which encryption techniques are used to regulate the generation of units of currency and verify the execution of payment transactions on a decentralized network. Cryptography is thus used in cryptocurrencies to express and protect the value of the coins (the sequence of the bits), to prevent counterfeiting and fraudulent transactions, as well as to perform validation, execution and recording. These functions are carried out on a distributed ledger, such as a blockchain. Thereon, each block contains a cryptographic hash or algorithm that links it to the previous block along with a timestamp for the transactions from that block. The network allows online payments to be sent directly from one party to another without going through a bank or any other account holding centralized counterparty.

The mechanics of payment in a digital coin depends on the specific design of the coin and its underlying scheme. As stated, the mechanism requires the use of a telecommunication network. But to avoid double use of the same digital coin, it also requires some validating intermediary. Several options are available:

1. Being in control of a digital coin ‘affixed’ to a single
internet domain, for which it attorns to the payer, a ‘baliee’ complies with the payer’s instructions and executes them by attorning to the payee, thereby causing ‘possession’ in the coin to be transferred from the payer to the payee.

2. A ‘coin’ in the form of an unspent transaction output (UTXO)\(^8\) in the payer’s wallet, reflecting earlier transactions, is transformed into a new UTXO in the payee’s wallet. Where the payer does not use up the entire UXTO, payment is carried out by splitting the payer’s UXTO into two UTXO’s: one in the sum of payment going to the payee’s wallet, and the second, in the amount of the balance of the UXTO, remaining in the payer’s wallet.

3. The payer sends from his or her digital device to the payee’s device a ‘coin’ or any split of it. The payee may (but is not required to) validate the coin authenticity with the ‘mint.’

Respectively, these are the methods of payment in WingCash, Bitcoin and BitMint. Among these three, only Bitcoin requires a blockchain and is a cryptocurrency. Neither WingCash nor BitMint are cryptocurrencies. No blockchain is required in BitMints or even exists in WingCash.\(^9\)

Arguably, payment in digital coins is completed when the coins get under the full control of the payee. From this perspective, completion of payment in digital coins and the discharge of the debt paid by them are governed by rules that are fundamentally similar to those governing payment in cash as well as in account balance. This, however, does not resolve the question of loss allocation where something goes wrong by the intermediary, namely the blockchain, ‘mint’ or switch. In principle, between the payer and the payee, loss is to be allocated as agreed between them, except that the law should establish a preemption, one way or another.
Predicting the impact of digital currencies is beyond the scope of this essay. I will however conclude by pointing at two directions to watch for.

First, payment in a digital currency bypasses account intermediation which is at the heart of payment in account balance. In the struggle for market share, efficiency thus appears to side with digital currencies. However, use of the latter raises its own risks, relating to trust, financial stability and misuse. Certainly, to meet such risks, oversight and regulation are required. The challenge is to ensure such oversight and regulation will put both methods of payment on an equal footing.

A second perspective to be watched is the competition between ‘self-anchored’ and ‘claim check’ virtual currencies, or more specifically, those denominated in an official currency. At the heart of this competition is the old controversy as to the concept of money, i.e. whether its value is based on the salability of the material from which it is made or on the power of its issuing authority. Having historically identified gold as the optimal material on the basis of its low stock-to-flow ratio, the former is known as the metalist approach. The latter is known as chartalist. Not surprisingly, metalists anticipate the triumph of ‘self-anchored’ currencies with low stock-to-flow ratio, such as Bitcoin, which may thus be characterized as ‘digital gold.’ For their part, chartalists are likely to anticipate the triumph of ‘claim check’ currencies denominated in an official currency unit.

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1. This essay draws on and yet builds on Benjamin Geva, “Cryptocurrencies and the Evolution of Banking, Money and Payments,” in Chris Brummer (ed.) Cryptoassets – Legal, Regulatory and Monetary Perspective (Oxford


4. CPSS, Implications for Central Banks of the development of electronic Money (Basle, October 1996) at 1, emphasis in the original; online: https://www.bis.org/publ/bisp01.pdf, visited January 17, 2020. ↑

5. According to Gideon Samid, Tethered Money: Managing Digital Currency Transactions (Elsevier Academic Press, 2015) at 105-106, the unique string of bits should better express both identity and value. ↑

6. See e.g. Section 102(23) Uniform Regulation of the Virtual-Currency Business Act, Drafted by the National Conference of Commissioners on Uniform State Law (NCCUSL) and approved and recommended by it for enactment in all the states in the United States at its Annual Conference Meeting in its 126th year in San Diego, California on July 14-20, 2017. So far it has been enacted in Rhode Island and introduced in California, Oklahoma and Hawaii. It is available online with Prefatory Note and Comments (and more information) at: https://www.uniformlaws.org/committees/community-home?communitykey=e104aaa8-c10f-45a7-a34a-0423c2106778&tab=groupdetails visited January 17, 2020. See also FATF, Guidance for a Risk-Based Approach to Virtual Assets and Virtual Asset Service Providers (Paris: FATS, 2019) at 13, online:

8. The term is explained e.g. in https://komodoplatform.com/whats-utxo/ , visited on January 16, 2020. ↑

9. These systems are set out in Geva, n.1 supra, where direct sources are cited. ↑

10. I assume that it is issued by a trusted, properly regulated entity so as to bear a similar risk to the officially issued currency. ↑

11. This is the relation between its existing supply and the extra production that will be made in the foreseeable future. A currency with a low ratio is ‘hard’ so as to maintain its value. ↑


13. For this theory see at length: L. Randall Wray, “From the State Theory of Money to Modern Money Theory: An Alternative to Economic Orthodoxy (Working Paper No. 72, March 2014, Levy Economic Institute of Bard College) ↑


15. For an analysis preferring the chartalist approach in general see: Charles A. E. Goodhart, “The two concepts of money: implications for the analysis of optimal