52 MONDAYS

BY
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PYMNTS

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JUST ANOTHER 52 MANIC MONDAYS

"Monday." It comes from the Anglo-Saxon word Mōnandæg, meaning "the moon's day." And long before the Anglo-Saxons, the Babylonians believed the same.

Not much for moon-worshipping personally, my Monday ritual revolves around useful observations and a dash of prognostication — and was this ever the year that called for both.

Kicking things off in January, I laid out Ten Things Will Define the Digital Transformation in 2022, from a feeling of permanence around work from home, how luxury brands would weather the storm using payments choice, and a prediction that crypto was overhyped.

Was I in the ballpark? Let's look at the highlights. You decide.

Weeks later it was an analysis of the Fed's anticipated paper on central bank digital currencies (CBDCs). The upshot? We need more time. I called it "the right approach" then, and I still feel that way.

As the month closed out, I had a go at buy now, pay later (BNPL), with the simple observation that "consumers aren't currently using their banks much for installment payments — mostly because the BNPL options that banks offer right now aren't really that much of an innovation."

Was it a coincidence that within months, banks including Barclays and NatWest were offering BNPL programs of their own? Probably more of a market dynamics thing, but you never know.

By February, I moved on to Peloton's problems and the electricity in the air around Amazon as a possible buyer of the troubled stationary bike of which I happen to be a fan. I was right to say, "The personal fitness industry and retail have a lot in common: connected devices, the cloud and payments have disrupted the status quo." The bike still hasn't recovered, but don't cycle it out just yet.

Before the month ended came this meditation on the power of certainty in everything from curbside pickup to going to the pharmacy as society undergoes a top-down digital transformation. Potent force, certainty.

March came in like a lion for a romp through the possibilities of shoppable streaming, which unsurprisingly centered on Amazon Prime Video. I said at the time, "Embedding commerce inside of streaming platforms is one of the greatest untapped opportunities inherent in the digital transformation of the global economy." And it is.

Skipping forward to April, it was Apple's Project Breakout. The takeaway: "Apple's announcement of Project Breakout signals that Apple is fine with using partners today, but not for the long term. It could also expose a fatal flaw in its thinking, one that fast-tracks the strategies of every other player who works with Apple today to shift their focus to more open ecosystem pastures." Guess we'll find out.

By mid-May, I couldn't help myself as I poked fun at the dire outlooks on digital transformation as inflation began cutting into the business of restaurant aggregators, delivery platforms and many other trappings of the digital shift. I concluded thusly and have yet to be proven wrong: "Not only is the digital transformation not done and over — it has really only just begun"

Returning to the so-called "Tech Wreck" in June, I admonished naysayers, saying that "unlike the dotcom era startups, today's companies can and have leveraged existing technologies that work and are improving rapidly to bring great ideas to life. Their investments in building on top of that tech will help companies solve the important problems facing them over the next few years as the macro-economic headwinds create uncertainty for their business and their customers."

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By July, inflation was the official storyline of 2022, to which I offered context in the form of a look at the wealth effect. I felt duty-bound to remind panicky merchants and brands that "it's often the most challenging times that surface the most creative solutions. This one is tailor-made to help consumers make smart decisions about how to spend their money and navigate the difficult times ahead. Most consumers we studied think that retailers and payments players can do more to help them."

From the wealth effect in July we jumped to the network effect in August, and musings about Amazon's reasons for acquiring iRobot for $1.7 billion in an almost all-cash deal. "It's yet another example of Amazon's expansion into adjacencies that complement the behaviors of a large mass of consumers already on their platform," I wrote, adding that "For Amazon, iRobot is about strengthening and monetizing the cross-activity network effects of the consumers who have connected more than 300 million smart home devices."

A few paragraphs back, we were making fun of the demise of digital transformation. By September, I was at it again, noting that "At the end of Q2 2022, PYMNTS' study of 15,000 consumers in 11 countries, which comprise 50% of global GDP, finds that digital engagement is on the rise everywhere as more consumers use digital methods to engage in one of the 37 routine activities measured by the study."

In November, the topic was "Sam Bankman-Fried, FTX and the Demise of the Cool Kids" and a much-deserved takedown of the FOMO crowd who pumps up such frauds. Will we never learn?

That brings us to the last Monday Conversation of 2022 and a cautionary note. Government predictions were off on COVID, and they're not doing much better with inflation, leading me to summarize as follows: "Our 20 months of data, collected monthly during the pandemic, shows how accurate consumers are when predicting the duration of once-in-a-generation events."

The wisdom of the crowd — or the consumer if you like. Here's to a better 2023.

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10 THINGS WILL DEFINE THE DIGITAL TRANSFORMATION IN 2022

Just about everyone has their own prediction for what three, four, five or ten things will happen each time the calendar turns its page to a new year. So many of those views are fluffed-up restatements of the obvious, which sort of wastes the opportunity to take a few calculated risks when predicting how the landscape might evolve.

In January 2021, I published six trendlines for the year we just ended. I took some risks, but I was pretty much on the money. My framework, then and now, is the connected economy and its pillars, which I introduced two years ago. It is not only alive and well, but at the core of the digital transformation we have witnessed in the two years since.

With that in mind, here's my take on the ten trendlines that I believe will chart the connected economy's course in 2022.

Spoiler alert: Some of these are not without controversy – but you only live once, so once again I'll take some risks.

Second spoiler alert: It's long. Grab a big cup of coffee, maybe two.

PROXIMITY WILL NO LONGER BE A BARRIER OR A COMPETITIVE BUSINESS ADVANTAGE.

Picking a place to shop used to be based on how convenient it was from the home or the office. Not so much anymore. Consumers are shopping more online for retail products – some 30 percent of them, according to the latest PYMNTS study.

Picking a place to get carryout was once about how long it took to drive and get it. Aggregators and restaurant delivery services eliminate that concern. More consumers are ordering more takeout from restaurants for delivery at home – some 74 percent of them, up from 66 percent since June 2021.

Consumers don't have to always drive to the theatre to see first-run movie releases or to a venue to watch a concert. Pixar's announcement that it will release Turning Red directly to streaming on March 11 instead of the theatre is further proof

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that studios, particularly now as Omi ravages the country, recognize that many consumers increasingly trade the in-person movie experience to pay to watch a first-run movie in the comfort and safety of their own home.

Consumers are using Instacart to buy groceries from grocery stores they never before shopped because they were too far away – millennials do it the most. Subscriptions are also taking a bite of retail store and grocery store CPG spend as consumers enjoy the ease and convenience of having staples and the high-quality products they like from brands they can't find in a store most convenient to them just show up as directed.

People used to decide where they wanted to work based on the length of their commute, and select a fitness instructor the very same way.

No more.

The reality of the digital shift is that consumers are no longer constrained by how far away something is: the item they want to buy, the service provider they want to engage, the employer they want to work for, the trainer they want to buff them up, or the concert or movie they want to watch. Or just about anything else they want to do.

Technology is making once-physical interactions immersive digital experiences – sometimes complementing the physical world, and sometimes replacing the activities once done there.

For businesses, this is both a threat and an opportunity – an undeniable dynamic driving the evolution of the connected economy. In retail. In grocery. In entertainment. In work. In banking. In just about everything — including many healthcare services.

Proximity is no longer a barrier, and those who wish to make it a competitive advantage now have to one-up the digital alternatives that consumers find easier, more convenient and less wasteful of their precious time.

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LOGISTICS WILL BECOME THE CORE COMPETENCY OF THE CONNECTED ECONOMY WINNERS.

Logistics dominates the news cycle today as supply chain challenges lay bare the economic importance of efficiently moving goods between endpoints domestically and cross-border. In a connected economy where the digital transformation of industry sectors is as much as the transformation inside of those sectors as it across them, logistics is about something different. It is about efficiently enabling the movement of money, information, products and services between endpoints, and it will become a core capability of connected economy winners, whether they provide it in-house or assemble it from outside. Logistics and mobility will become the linga franca of how enablers help to streamline, perfect and manage those flows.

Here's why.

The world according to the digital-first consumer is now divided into two parallel streams: what they need right now and what they can wait to get. In payments, it's reliably and securely moving money in and out of consumer or business accounts from and to any given endpoint at any given speed – with any given payment modality – and monetizing those choices. In banking, it's delivering services once only done in person in a digital-first way. In healthcare, logistics is about integrating data and diagnostic connected devices into the online experience to make the digital visit as informative as the physical one. For retail, it goes beyond mastering the logistics of delivering goods to eliminating the line between the physical and digital channels.

The internet gives consumers access to almost perfect information about what retailer or service provider has what available and when – and digital gives consumers more choices for who gets their business. Their decisions will be based on how long they're willing to wait to be serviced, how much they are willing to pay for on-demand access and who can make either

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of those options easy, friction-free and secure.

To consumers it is irrelevant how it happens or how much work is required to make it so. But meeting their needs will require a single infrastructure that allows companies and ecosystems to move at the speed of the consumer – fast, slow or somewhere in between – and orchestrates those experiences in a way that improves the lifetime value of the customers they serve and the economics of the businesses they operate.

LUXURY BRANDS WILL REINVENT RECOMMERCE AND USE BNPL AND SUBSCRIPTION PLANS TO DO IT.

According to The RealReal's Q3 2021 earnings, 772,000 consumers spent an average of $486 buying used luxury designer clothes, handbags and shoes for the preceding trailing twelve months, an increase of 25 percent and 10 percent respectively from the prior period. They also reported that 84 percent of those shoppers were repeat buyers – shoppers lured by the opportunity to buy someone else's gently used Chanel, Dior, Hermes, Givenchy or Christian Louboutin's from what they describe as the world's largest authenticated luxury resale marketplace.

2022 will be the year that luxury brands strike back and use payments to help them reinvent the reCommerce experience.

Consumers thirst for luxury, and holiday sales show just how much of a penchant that has become. Luxury sales exploded in the 2021 holiday season, according to Mastercard Spending Pulse. Globally, luxury goods hit $309B and are expected to climb to roughly $383B in 2025. A Bain & Company report on luxury retail released in November of 2021 estimated luxury resale to be roughly $3.3B, a little more than 10 percent of overall luxury sales. Demand for both is driven by Gen Z and millennials.

Luxury brands have historically traded on exclusivity and limited accessibility – that was before secondhand marketplaces gave anyone with an extra $486 the chance to buy a luxury item and snap a picture wearing or holding it on Instagram. The smart luxury retailers will set aside their disdain for the democratizing of their luxury brand and use it as an entry point to build the next generation of brand loyalists – on their terms.

I think they'll do that by creating their own closed-loop marketplaces for those goods and use payments as the engine to do it. In the process, they'll also change the shopping dynamic and frequency for how people buy couture clothes.

Buying pricey couture clothes in their stores could be done using a one-time payment plus installment plan where they get a one-time credit towards the purchase of the next pricey couture jacket at the end a year or even two. The trade-in jacket is sold on their own resale marketplace only once or twice, creating a higher quality resale marketplace where fashionistas flock to buy items that aren't six or seven seasons old but one, two or three. BNPL providers power those installment payments, and subscription providers support the design of special privileges and perks for top-tier customers.

As more brands reclaim their luxury status in this way, someone will reinvent the entire experience and aggregate all of them into a single marketplace of luxury brands, with the distinction that these products are in great condition and new. Today's reCommerce marketplaces will, over time, become more like discount sites than luxury resale as the high-quality goods move to these designer-owned and branded marketplaces.

Payments providers will compete for the consumers and luxury brands as they court and cultivate the next generation of luxury buyers with brand affinity.

REAL-TIME PAYMENTS MOMENTUM WILL START TO CREATE A CREDIBLE THREAT TO DEBIT TRANSACTIONS.

The US has been heavily criticized for being late to the real-time payments party. It's

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a criticism that ignores the complexity of having something like 11,000 FIs in the country, and the challenge of enabling a new payment modality across every single account at every single one of them.

The pandemic has changed things. So has growing access to the RTP rails by banks and FinTechs and use cases that leverage those rails and consumer demand for instant payments. Consumers are now more aware of real-time payments and want to receive more of their payments that way, and senders have obviously gotten the memo. PYMNTS' latest study of consumer disbursements shows that three times as many consumers received instant payments in 2021 as they did in 2020 – and that a third of consumers who receive disbursements want more instant payments directly to their bank accounts, and are willing to pay to receive money that way.

Over time, RTP rails will become the single set of rails capable of moving money between bank accounts instantly – subject, of course, to the terms the sender and receiver agree on. This shift will likely include a business model that monetizes that choice and speed.

As RTP use and adoption grows by consumers and businesses, innovators will build more use cases on top of those rails. RTP's account-to-account instant payments capability will become a plausible alternative to debit-card rails – the interoperable account-to-account network powered by RTP rails and the banks for making payments to billers, other businesses and even merchants. Banks, of course, are in the catbird's seat to do this because they don't have to ask consumers for bank account details – they already have them.

What's missing that could potentially ignite this faster and further is the important feature that debit cards have – the alias that sits between the sender and the receiver and guarantees consumers against fraud and disputes, which debit cards provide today. Banks will create something that's bank-branded in 2022 to accomplish that.

CRYPTO STRATEGY WILL SHIFT FROM FOMO TO FOCUSED.

Watching four- and five-year-old kids play soccer is very much like watching how the world has been playing around with crypto: swarms of people chasing something fascinating all over the playing field, having lost sight of where the goal line is. The risk, just like those little kids playing soccer, is not only missing the chance to score, but lacking the basics to know how to score, play and win the game. And having regulators make rules for the game that determine who gets to take the field and how many goals they get to score.

You saw evidence of this in the last two years as never-ending news accounts of companies using crypto to make what they do seem more relevant. It doesn't help that innovators create alt coins out of thin air just because they can, lacking any real purpose other than to keep the bubble of speculation alive and legions of PR people busy. It also doesn't help that people use the term cryptocurrency to describe everything from Shiba Inu to Central Bank Digital Currencies to stablecoins and everything in between.

The hype is starting to fall on deaf ears because so much of now it lacks any serious context related to its relevance to payments and financial services – or a way to evaluate whether what we are observing is a fad or something with great potential. Even with all of the talk of crypto's growth, it remains a speck on a pebble in an ocean of financial transactions today. Its use case today is largely for making speculative investments, just as it has been for more than a decade.

That's not to say that the blockchain and stablecoins aren't important technologies with the potential to solve real problems in payments and financial services – in fact, they likely will be.

We see evidence already. FIs are starting to use blockchain in trade finance to reduce fraud related to duplicate invoicing. FIs and corporates are using cross-border payments over private

blockchain rails and settlement tokens to enable faster, cheaper payments between bank accounts. There are experiments using smart contracts to enable payout when specific milestones are validated. Consumers are sending cross-border remittances over public blockchains using stablecoins so that senders and receivers get their money faster and cheaper. Cross-border payroll for 1099 workers using blockchain and crypto is helping receivers get the same benefit.

2022 will be the year that businesses use a framework for separating activities spurred by a fear of missing the wave to a focused examination of the technology and its relevance in solving the pressing payments and financial services problems people and businesses have today. The business risk if they don't is the distraction that comes from chasing FOMO.

As everyone in payments already knows, igniting any new payments network is hard, and building one from scratch is even harder. And new isn't any more a value proposition than crypto for the sake of crypto.

CURRENT PROPOSALS TO REGULATE BIG TECH WILL LARGELY FAIL TO SHRINK THEIR POWERS.

The regulatory wagons are circling around BigTech everywhere in the world and on a variety of fronts. Whether it is an effort to regulate data, algorithms or other business practices, the intent is clear: do as much as humanly possible to make Big Tech a lot smaller.

What we've seen so far is how little these efforts have done to shrink or hobble the behemoths. Consumers in the EU almost always use Google to search, even after the search engine was fined billions and forced to change how it displays results. Even regulators can't make consumers like Bing.

You might think that one exception is Facebook, where 2021 is expected to show a growth of less than 1 percent year over year. But that's mainly because the coveted teen audiences are moving

to other channels like Snap and TikTok. Analysts report that Facebook's teen audience dropped 13 percent since 2019 and is expected to decrease 45 percent by the end of 2023. The slowdown isn't so much because of what regulators are doing, but what consumers are doing themselves. That may be the undoing of Facebook – not the regulators.

One of the most popular proposals gaining favor by lawmakers here in the U.S. and in other jurisdictions is one that would prohibit Big Tech companies from buying any company without proving it won't hurt their competitors if they do. I'll spare you the lecture on how complicated it is now to define the competition these days when Amazon and Google both compete with Facebook for ad dollars and Google and Amazon both face competition from other marketplaces over where consumers start their search for what to buy.

But it's real, and we see it unfolding in real life in the case of the U.K.'s recent challenge to Facebook's $400 million acquisition of Giphy. Giphy is a platform that makes it easier for consumers to find and share animated videos. How this could be anticompetitive is a head scratcher – perhaps the regulators basically don't want any Big Tech company to buy them.

That aside, if regulators and lawmakers have their way, the likely outcome is that nothing will change. Big Tech will stay big since they will all be forced to operate under the same set of regulations and probably won't try to buy anyone. Instead, they'll use the money they'd spend on companies and lawyers to create their own incubators and accelerators, attracting innovators to build rather than buy. The biggest losers will be the Giphys and others like them that could end up being much smaller without platforms that give themselves and their investors a viable exit to grow and get bigger.

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TRADITIONAL BANKS WILL LOSE THEIR GRIP ON SMALL BUSINESSES TO FINTECHS.

For decades, small businesses have been served by the traditional retail bank with products that look a lot like those sold to consumers: a checking account, a debit card and maybe a corporate card. Getting a line of credit or loan is by no means a given, though it's more likely if the SMB has a balance sheet that proves it doesn't really need the funding, is willing to pledge its home and first born as collateral anyway, and is able to wait weeks for an answer one way or the other.

The SMB owner or bookkeeper has become the systems integrator for all of the services and apps necessary to run the business, get paid and pay others – keeping track of and integrating that business checking account into the accounting software, payroll provider, merchant services provider and any other business applications necessary to manage flows in and out. And doing it all mostly from their desktop.

SMBs do that because there haven't been any other great alternatives. And doing something different meant more work with time they didn't have.

That's starting to change as FinTechs enable a digital, mobile-first experience that simplifies access to the business banking services needed for these SMBs to run their businesses. And importantly, they're using data and technology to give SMBs access to the one thing they really want: working capital when they need it. These FinTechs bundle business applications into a single platform, making it easy for them to turn features on an off as needed. These platforms are raising the expectations of what SMBs now expect from their business banking relationship.

There are 31 million SMBs in the U.S. and a lot of new ones that have been birthed over the last two years. Most of them bank with traditional banks – but maybe not for long. Unless, of course, the big banks buy one of them to deliver what they can't easily enable today.

CHECKING OUT IN THE STORE WILL MOVE TO THE CLOUD AND CREATE NEW COMPETITION FOR TRADITIONAL PAYMENT METHODS.

Merchants have spent billions over the last decade to make the digital payments experience better, slicker, even invisible to consumers. After almost two years of consumers being in control of those slick digital checkout experiences, just about the worst thing now is going back to the store and waiting in line to check out. Of course, contactless and touchless payments make the experience faster and safer. But the act of checkout in the store is the same in 2021 as it was in 2019 as it was in 2010 as it was in 2000 as it was in 1985 – queuing in line before walking up to a register to check out.

Consumers want better, and merchants will respond by moving to cloud-based POS experiences that outsource checkout to the consumer.

Merchants might even be more motivated in 2022 to accelerate those plans as labor shortages and wage increases give them a reason to think more creatively about staffing the in-store experience. And as consumer interest in using mobile devices and store apps to enable that experience grows.

Cloud-based POS systems also give merchants more of an opportunity to introduce new payments methods at checkout, whether it be their own branded payments methods or those provided by third party apps wallets. Either or both is made possible via a virtual card provisioned to their mobile wallet instantly.

Moving instore checkout to the cloud will sharply increase the growth of online commerce overall. If online commerce is 20 percent now, it is conceivable that by 2025, it will be 30 to 35 percent and by 2030, 50 percent or even slightly more as more consumers use apps or wallets used to pay for something they buy from a store when standing inside of it.

THE INTEGRATION OF PHYSICAL INTO THE DIGITAL EXPERIENCE WILL BECOME THE CORNERSTONE FOR HOW THE METAVERSE EVOLVES.

It's hard today to get a clear definition of the metaverse. The PYMNTS series on the Metaverse does a good job of trying to create the baseline understanding of what it is now – basically a blank virtual canvas – and how it may evolve over time. The gaming platforms have long paved that path by moving beyond gaming to real-world experiences – for example, giving real world musical performers a virtual stage to perform and monetize their brands. They've also created immersive digital experiences indistinguishable from physical reality. More entertainment than real life, people today spend their leisure time in a virtual world where brands see an opportunity to monetize.

Unfortunately, like crypto, the hype and the frivolity of some new incarnations of the metaverse understate its potential to create the virtual experiences that mimic the real world in meaningful ways. The meta and Meta platforms that are emerging look more like modern-day, new tech versions of the Sim City in 2013 – where real people live different digital lives in a world that only exists in cyberspace.

But if the great potential of the metaverse is its ability to fuse the virtual and digital worlds to fully mimic what happens in the real world, then we're likely to see these virtual canvases improve what is done today in the physical world.

Shopping at Selfridges in London will be done sitting in my living room in Boston, and the experience will be just like I was there in person. A patient in Africa will be treated by the best specialist in the world who happens to be in Germany without flying there. Test driving a car located in San Antonio will be done by a buyer in Boise without leaving her front porch. Businesses will meet and collaborate just as meaningfully in a virtual setting as if they were sitting around the same conference room table.

And so on.

This melding of the physical and online world is possible, and will solve many real-world problems and create new products and services. It is vital for thinking about the world ahead. We have technology to do this, particularly as 5G infrastructure rapidly diffuses through every nook and cranny of the world.

But that serious and doable vision is different from the virtual space where we wake up in the morning, put on our specs and go about our day – a vision decades in the offing, if ever.

CONNECTED ECOSYSTEMS WILL FIND THEIR FOOTING AS EMBEDDED COMMERCE PROLIFERATES.

Consumers want to live in a connected economy, as the PYMNTS studies of roughly sixty thousand consumers over the last 22 months consistently finds. The digital transformation of nearly every aspect of their everyday lives has made them more, not less, comfortable transacting digitally as they go about their day-to-day – how they shop, how they pay, where and how they buy and eat their food, how they live and work, how they communicate with others, what they do to have fun and stay healthy.

Increasingly, the digital endpoints that have become the consumer's go-to for those activities have given them more options, more things to buy, more services to consider, more options for how to pay and how to access what they just bought. Products are becoming platforms. Platforms are becoming robust ecosystems. Ecosystems are connecting with products and platforms to capture more of the consumers' attention and spend. Payments is the connective tissue that turns engagement into a commerce experience. A host of third-party enablers remove the logistics and mobility constraints to keep those interactions fluid and dynamic for ecosystem stakeholders.

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In 2021, we observed the beginnings of how consumers want to live in this truly connected economy – what services and capabilities they want, how they see it evolving. We see a small but growing group of consumers who want it all – many of whom also own a dozen connected devices to provide a seamless transition across all of the places and channels where they wish to access that ecosystem. We also see consumers who want ecosystems to aggregate the information they need to make decisions, get deals, hire contractors and go out to eat. We see those who long for a simple place to store and manage their money, pay their bills and save.

Regardless of how these consumer groups see the value of a connected ecosystem, each is motivated by the simplicity of a single place that makes it easy – and, in their mind, secure – to manage what were once a multitude of separate apps. Their desire creates a foundation for connected ecosystems to go well beyond integrating payments into these interactions, instead embedding commerce into them.

Who does the consumer trust to do that? That is one of the very important details that we will see emerge in 2022.

WHAT'S NEXT

A colleague last week wished me a Happy 2020 II – a cynical nod to how the year has begun. Admittedly, it was a week with its 2020-esque challenges. COVID patients overloaded hospitals. Businesses that need people to perform a service – airlines, healthcare providers, restaurants, retail shops – were forced to cut back or cancel services because about five million people were sick with COVID. Businesses pulled out of physical events and relaxed return-to-work edicts. Schools wrestled with whether to open or revert to remote learning. Many executives are on corporate-wide or self-imposed travel lockdowns.

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Yes, this second week of the new year has the world still in the throes of dealing with the global pandemic. The digital shift that we saw ignite in 2020 remains alive and well and is moving even faster. What's different, though, is that the routines that we once hoped we'd return to in a few short months in March of 2020 are now part of our history – to be learned from, but not necessarily repeated. Not because we can't, but because we don't want to.

This year, 2022, we stand as a world in awe of the resilience of the innovators across the connected economy who saw the silver linings inside the darkness of 2020 and worked tirelessly to make how we live our day-to-day lives better, safer and easier to navigate. They made it possible for everyone to experience their own digital transformation – from the Mom and Pops to the multinationals.

Many of the trends that I have presented are bold, not without controversy, even a little hard to digest. They were inspired by the hundreds of conversations I've had with businesses on the front lines of making the connected economy more than a vision over the last year, as well as the insights drawn from the tens of thousands of consumers and businesses who have responded to PYMNTS surveys over the last two years. My thanks to all of you for those sharp insights and the conversations they inspired.

Now, let's see what happens over the next 11 months and three weeks!

And Happy 2022!

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JANUARY 24, 2022

THE THREE MOST IMPORTANT QUESTIONS FOR THE FED ON ITS CBDC PLANS

The Fed released its long-awaited paper on Central Bank Digital Currencies last week. After reading it, I don't get the feeling that even the authors themselves are convinced that a CBDC is the right course of action for the U.S. central bank to take — at least, not as they describe it today.

The report comes at a time when there are many other separate but related conversations about digital payments innovations, cryptocurrencies, the innovators bringing them to market and the ecosystems they are creating and powering. There are a host of issues being discussed with respect to digital currencies specifically: the taxonomy of crypto, what problems it solves, the business models that support cryptocurrencies and whether existing regulation is enough, too much or too little.

The call for comments in the report identified twenty-two questions ranging from the tactical — whether a CBDC should pay interest — to the theoretical — ways a CBDC could impact the Fed's ability to control the monetary supply. These questions point to the sensitive interdependencies among all stakeholders that must be reconciled if the U.S. or any central bank would introduce a new digital payment tender.

Here are three that I'd like to move to the top of that list.

The U.S. economy is largely cashless today. So, what problem does a digital central bank currency solve?

Probably like many of you, I've had the same couple of bucks collecting dust in my physical wallet for the last two years. I just don't use cash anymore, even in the places I once did.

Neither, apparently, do many other people living in the U.S.

The Fed paper reports that consumers used cash for only 6 percent of the value of transactions (19 percent by number, which means they used

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cash for small-value payments) in 2021. People have been shifting from cash to cards for many years.

More recently, mobile phones and a variety of connected devices and apps have shifted cash payments digitally, including the low-dollar transactions that were once exclusively done using cash. Peer-to-peer transactions, tipping, parking, taxi, train and bus rides were trending digital before COVID and have only accelerated since. Cash use is small and getting smaller.

That's just fine with consumers who seem to like living in a mostly cashless world — it's faster, more secure, less prone to friction — no waiting for change and then having to deal with it, no fumbling to find the right combination of bills at checkout. Businesses like cashless, too. Contrary to popular opinion, cash isn't free to accept — there's the cost of storing it securely, the cost of cash handling, the friction and risk of business operators running to the bank to deposit and withdraw it.

Even the small Mom and Pop businesses on Main Street USA are becoming cashless as the consumer demand for contactless and touchless forms of payment have forced those businesses to leave cash behind for more digital forms of payment: cards, cards on file or mobile wallets.

From the consumer's perspective, their "cash" is already digital and has been for a long time.

The "cash" that's sitting in their checking account — digital. The "cash" in those accounts they use to pay their bills — digital. The digital splitting of the dinner check — just like digital cash using Zelle or Venmo. Their paychecks — digital cash. Their tax refunds from the government — digital cash. Their unemployment checks, stimulus checks, social security checks, government assistance payments — digital cash. On demand payroll — digital cash.

All deposited into the bank account of their choice and able to move digitally between accounts — me to me, me to

thee, me to any business, me to the government.

Or withdraw in cash, mainly at the ATM — but that's something consumers increasingly don't want to do either.

So, if almost all cash is digital, what's the need for a CBDC?

In describing the distribution of a CBDC, the Fed paper proposes an intermediated system that would involve consumers establishing accounts at an institution to receive those CBDC payments.

In practical terms, what does that mean?

Will it require that anyone getting a benefit payment from the government now set up a new account to receive those payments via the Fed's digital dollar?

What would motivate a consumer to do that?

Are those digital dollars accepted at the places the consumers transact digitally today? Unless the CBDC account would allow consumers to spend those Fed digital dollars or pay bills with it just as they do today, those dollars would have to be transferred immediately to an existing bank account that does.

The card networks say they will work to enable CBDCs to be accepted at the merchant point of sale just as they are doing with other digital currencies. But that sounds like a lot of make-work simply to enable a CBDC that a consumer may or may not want to use as a payment tender at a merchant that already accepts the digital payments that consumers currently have, like and use.

Then there is the financial inclusion argument, which curries political favor but seems to lack factual depth.

As the Fed Paper points out, there are only 7 million unbanked people in the U.S. who, for whatever reason, do not have a bank account. Why they don't is not well researched. Some simply don't have any money for a bank account — that's a social problem to be solved, but not for a CBDC.

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Others have reasons not to want to leave digital breadcrumbs of themselves—a CBDC would be a risk for them.

These 7 million consumers have also shunned the many challenger banks that offer a no-frills, no-fee bank-like alternative for storing and using their money. These are the same challenger banks that say they've seen an influx of new accountholders eager for a digital way to receive government stimulus payments but lack bank account information on file with the Treasury.

How would a CBDC and a special CBDC account pull these 7 million in?

That's not to say that there aren't real use cases for a CBDC. For example, banks and central banks are testing interbank settlements using CBDCs, attempting to solve the very real cross-border settlement speed, cost and transparency issues that exist today.

But finding those real problems and determining whether a CBDC is the best solution for solving them — in the face of other digital payments innovations — is the most important first step.

The Fed paper begins with an overview of the payments systems that it has introduced over the last several decades: the paper check clearing system, then the ACH network for clearing and settling electronic bank-to-bank payments in the 1970s.

The payments innovations that have transformed the digital economy over the last decade have come from private industry. Can the Fed really innovate digital payments and engage in the continual innovation that consumers and businesses have come to expect of those payments?

Cash, the heart of the CBDC debate and the payment system that the Fed does control, remains an analog payments form factor that moves between businesses, ATMs, cash processing centers and the Fed in cloth sacks transported by armored cars with armed guards.

Aside from the 2019 announcement of its plans to introduce its own real-time payments rails, FedNow, in 2023, there's not been much else. That announcement came four years after The Clearing House and its network of banks announced it was creating its RTP® rails. The last major innovation in ACH — Same-Day ACH — debuted in 2016. But it was created and pushed by the banks, not by the Fed.

Compare that to the raft of payments innovation from within the private sector that happened in the last 15 years as the world shifted to digital and mobile. Those innovations that have moved cash to cashless in the U.S. and around the world are the result of innovators seeing the inefficiencies of analog payments and creating new digital and digital-first alternatives.

They've leveraged advances from the private sector — connected devices, payments networks, security, identity and fraud solutions, AI, GPS, APIs and a slew of enabling tech powering a digital transformation that has only accelerated over the last two years.

The move to cashless, and the satisfaction of consumers and businesses with those digital alternatives, rests largely at the feet of private-sector innovators. These new players are continuing to improve digital payments platforms, embed digital payments into existing apps and ecosystems and innovate the customer-facing experience and back-end payments infrastructure.

This isn't intended as a slap at the Fed, which does so many vital things to preserve the safety, soundness and integrity of our financial system. It importantly and critically controls the country's monetary policy. It operates the real-time gross settlement system, Fedwire, that is the foundation for how our country's financial system operates.

The Fed just hasn't ever been regarded as operating at the forefront of digital payments

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innovations. Perhaps that's not even how it's wired to operate.

It may also not be what the payments ecosystem wants the role of the Fed to be. Highly efficient, yes. Safe and sound, absolutely. At the forefront of digital payments innovation? Maybe not so much.

The innovation that the payments and financial services ecosystem *does* want from the Fed has more to do with expanding access to Fedwire and providing a choice in the rails used to move money between already-established digital accounts in real time. The Fed should continue to innovate the part of the digital payments iceberg that consumers and businesses never see, the part that preserves the resilience and efficiency of how money clears and settles between those bank accounts.

Growing up, I can remember Mom telling me to always to have a five- or ten-dollar bill with me, "just in case." It was sound advice when digital methods were anything but ubiquitous, and even when available, were not always reliable. Cash was accepted anywhere and everywhere, and still is.

But today, that $10 or $20 bill is now a plastic card tucked in a pocket for transactions in a physical setting, and cards on file or mobile wallets when transacting online.

In a cashless world, being connected is critical to the conduct of commerce. What is the Fed's role in protecting digital payments from going offline?

Which works just great — until it doesn't.

The AWS outage in December of 2021 was a recent reminder of the havoc that comes when people can't go online to access their money, when merchants can't make online sales or process payments, when streaming services can't stream, when websites won't load. People and businesses freaked as their literal lifeline to the digital world and digital commerce was unavailable to them for a few hours. A software glitch and overloaded networks was to blame, AWS spokespeople later said.

When New England has its big Nor'easters and power is knocked out for a few hours or a day, life literally comes to a standstill. People can put on sweaters, coats and hats to keep warm and light candles and use flashlights to see, but once the laptop and mobile phone battery runs out, it's all over until the power snaps back. Not even a plastic card tucked into a pocket will work if stores don't have any power to operate their POS terminals.

Being connected — to the internet and to electricity — is critical in a world where digital payments rule.

Enabling offline transactions is a risk that the Fed paper also acknowledges, but one that goes beyond enabling a face-to-face transaction in a remote area that lacks internet connectivity, as central banks are testing in emerging economies where that is a real issue.

It's what happens when the world goes offline.

Cybersecurity experts say the biggest risk to the financial and payments systems is an attack on the electric power grid — potentially putting the biggest financial institutions and payments networks at risk of a large-scale attack by bad actors. I still remember a PYMNTS Innovation Project session in 2016 in which Admiral James Stravidis outlined this risk, citing a scenario as stark and terrifying as it was believable.

The Fed has a role to play in protecting the country's financial systems from that risk, as do all branches of government, along with the private sector. It's an issue that goes well beyond any one digital payments method to protecting consumers and businesses from that potentially catastrophic systemic risk.

WHAT'S NEXT?

As I read it, the Fed report came across as one that had to be written — it was promised in July 2021 and, by its own timeline, was already about six

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months late. Over the last two years, roughly 100 countries have either piloted or announced intentions to create a CBDC pilot. The world was waiting for the U.S. to take a position on the role of central banks and CBDCs, particularly as it relates to the collective central bank concern over stablecoins and how CBDCs may or may not coexist with them.

But unlike the President's Working Group on Financial Markets report on stablecoins released in November of 2021, the Fed's report on CBDCs doesn't advocate for a specific course of action. Instead, it provides an overview of the pros and cons — and invites stakeholders to share their thoughts on a series of questions the Fed says will shape its thinking, provoke public debate and ultimately inform its recommendations.

In doing so, the Fed bought more time — at least a year, probably longer.

It is the right approach at the right time.

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JANUARY 31, 2022

THE BNPL INNOVATION THAT PURE PLAYS UNLOCKED AND BANKS ARE MISSING

When general-purpose credit cards were introduced in the late 50s and early 60s, they were advertised as a way for consumers to buy something they wanted or needed but didn’t have the funds on hand to pay for in full at that moment.

Payment flexibility — and the convenience of a single card to shop many merchants — was the appeal of that card. Consumers could pay their balances in full at the end of the month, or they could pay whatever they were able to afford that month and chip away at what they owed.

(For a walk down the credit card’s memory lane, it’s worth watching this 1960 Barclaycard documentary video explaining how credit cards work to an audience of general consumer credit newbies.)

Fast forward now about 60 years.

One card to rule them all.

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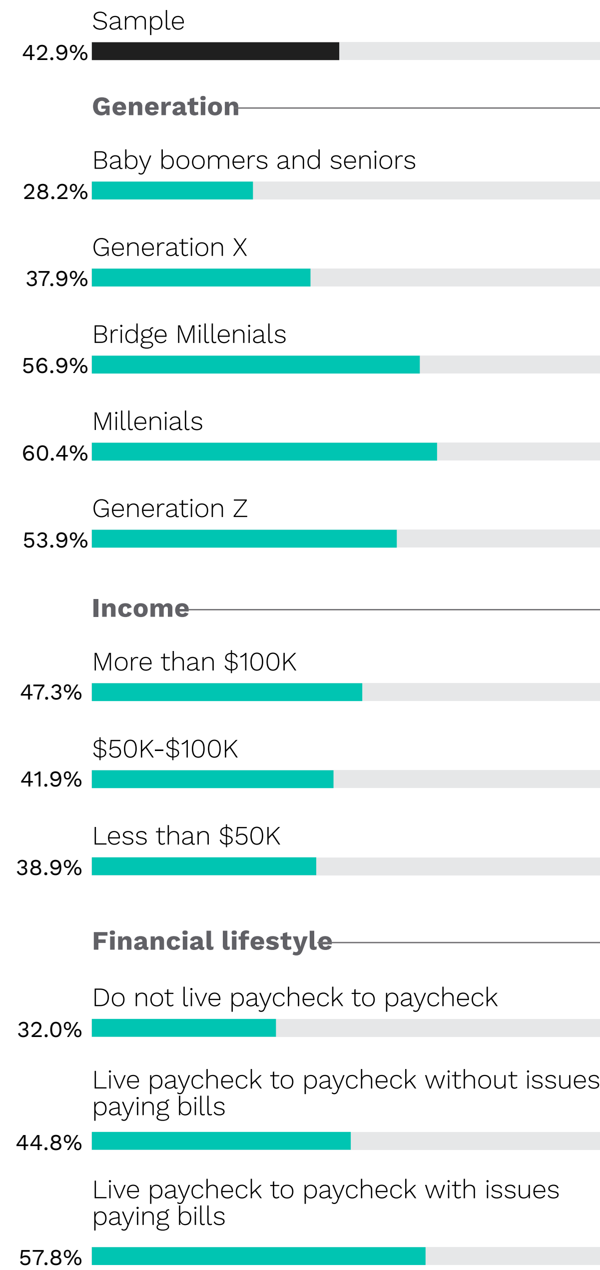

Or more accurately, one payment method that offers different repayment options for how consumers pay all the merchants they shop.

That's what 45 percent of the adult population in the U.S. told PYMNTS they'd like their bank to provide in a study that was conducted November 5-10, 2021, based on a national representative sample of 2,237 qualified respondents.

It probably isn't lost on banks that what consumers say they want sounds very much like the value proposition that they've have been promoting to their cardholders for about the last six decades.

Or that it is the same value proposition that the pure-play Buy Now, Pay Later providers have co-opted over the last two years with such great intensity. They are now using that value proposition to their advantage to capture consumer affinity, market share and merchant interest by themselves issuing the one "card" to rule them all: Pay now, in three or four installments, or every month for a finite period of time.

Or that this finding implies that 55 percent of consumers might consider such an option from another credit provider they trust.

Pure-play BNPL critics say they're one economic downturn and/or one CFPB rulemaking away from being hobbled.

Traditional credit card advocates say that banks, who know how to underwrite and price credit, will ultimately prevail due to that expertise — as well as their consumer trust and massive installed base of credit card customers.

Just give it time. And a little help from bank-friendly FinTechs.

They emphasize that some issuers already give consumers the option to break up purchases into installment payments once they get their monthly statements, or when emails post-purchase invite consumers to break that purchase into installment increments.

And that findings like the ones from PYMNTS' research are tangible proof-points that consumers want BNPL innovations to come from their bank.

That may be. But consumers aren't currently using their banks much for installment payments — mostly because the BNPL options that banks offer right now aren't really that much of an innovation.

THE BIG BNPL INNOVATION ISN'T INSTALLMENT PAYMENTS

According to PYMNTS research, roughly 50 million consumers in the U.S. have used BNPL to pay for at least one purchase over the last 12 months, 19.7 percent of the US adult population. The most popular providers of those services aren't banks but pure plays: Afterpay and PayPal are the most frequently used. Affirm, Klarna, Sezzle and Zip are also on the consumer's list of favorites.

Two-thirds of U.S. consumers tell PYMNTS that they've increased the frequency of BNPL use over the last twelve months,

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and 70 percent of those who have used it over that period report that they plan to use it more in the next year.

We also know from data that PYMNTS will release soon that BNPL isn't cannibalizing store cards, as some merchants may fear.

Instead, it is taking share from credit cards — perhaps most importantly from the affluent consumers who have them and are using zero-interest BNPL to buy big ticket items. For those consumers, free money repaid over time appears to be a bigger draw than rewards or cash back on those purchases.

Affluent consumers are not the only ones making the switch. Pure-play BNPL players are also moving cash or debit card sales to merchants from consumers for whom BNPL is a welcome credit alternative they can't get from their bank. Merchants enjoy getting incremental sales and higher basket sizes without taking on that credit risk.

At 19.7 percent of the adult U.S. population, BNPL is beginning to sound like a big threat to the traditional credit card issuers.

Like every other disruptive force in FinTech, BNPL innovators have gathered momentum quickly and built a loyal user base that's growing in numbers. More consumers are using their favorite BNPL providers to make purchases in categories beyond clothes and beauty — and for purchases that bring a bigger ticket along for the ride.

BNPL players have shifted the conversation away giving consumers the option to finance later, focusing instead on the certainty of how and when they will pay for what they want to buy.

THE CREDIT CARD ISSUER CONUNDRUM

Over the years, credit card issuers have used acceptance as their competitive calling card. Acceptance provides the certainty that a card can be used to make a purchase of just about any product at just about any merchant, anywhere in the world.

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Credit lines give consumers the guardrails for how much they can spend in the aggregate; monthly statements give consumers information about what they bought over the course of the month, the balance due and the minimum payment acceptable to keep the card in good standing.

Today about half of cardholders pay those balances in full — the rest revolve those balances over some period of time. Rewards and cash back provide the incentives to keep consumers loyal to those cards and make more purchases using them.

The BNPL innovators create certainty in a different way: predictable repayment.

BNPL players start the credit conversation at the beginning of the consumer's shopping journey, not at checkout or as part of the end-of-the-month bill payment experience, long after purchases and purchase decisions have been made.

Consumers can see on a product page what a $150 or $7500 item might cost if paid over 3 or 4 or 12 or more equal monthly payments — before they checkout, before they get their statement twenty or thirty days later, or before they abandon a purchase because they don't want to buy something without knowing first whether they'll get themselves into financial trouble.

That's what consumers say is the BNPL appeal.

Regardless of the financial profile of the BNPL customer, PYMNTS research over the last two years reports that BNPL users like the certainty of a payoff in full at the end of the term — and they like knowing that before committing to a purchase.

For consumers with thin credit files or limited traditional credit options, BNPL turns funds in their checking account into installment loans with financial guardrails. For those with access to credit cards, BNPL is a convenient, sometimes zero-interest option to pay for an expensive purchase like jewelry, electronics, home goods or vacations, leaving their credit lines available as a cash cushion for other purchases.

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Merchants like BNPL because it improves conversions, which is the name of their game.

A recent conversation with two well-established merchants over the last week emphasized that point. One merchant remarked that 30 percent of their sales are now made via BNPL pure plays — the other said it was 50 percent. Both said those numbers are increasing rapidly. They say that these BNPL purchases were made by consumers with credit card alternatives. Each of those merchants sell products that can cost as much as two, three to five thousand dollars for a single purchase.

One of those merchants also offers multiple BNPL logos on their checkout page to accommodate the brand affinity that users have to those providers, something more merchants also seem to be doing.

Their experiences are echoed by many other merchants I've spoken with over the last year about their adoption of BNPL and the momentum they see from consumers who like using it.

THE ONE QUESTION

In many ways, BNPL innovators have taken a page from the card issuers' playbook. They're issuing plastic or virtual cards that can be used anywhere a consumer wants to shop and buy any product that a consumer wants to buy. Acceptance, they rightfully concede, is critical to expand their addressable market of merchants and consumers — and ultimately, their payments volume and economic model.

They're also creating their own shopping ecosystems of merchants that offer the payment method they like, want and know how to use. These innovators are birthing or expanding "super apps" that offer a broad array of financial services — including savings and direct deposit options — using their new credit narrative as the cornerstone for an acceptance network built on how to repay, not only how to finance what they buy.

They're doing that by using technology and real-time data to help consumers make those choices, including pre-approvals that offer clarity about what they can spend before they shop online or instore. Consumers get payments choice from a single provider with whom they are building trust and a different type of payment relationship.

These innovations are irrelevant to merchants, who just see higher conversions and sales from consumers with multiple options for how to pay off purchases. For now, at least, they don't complain about the haircut they take from the BNPL providers for that option. That will likely change — reports suggest, in fact, that fees are already coming under competitive pressure.

For example: Klarna CEO Says BNPL Competition Is Driving Down the Fees Paid by Retailers

At the same time, card networks and FinTechs are working with issuers to improve their BNPL experience today, leveraging existing credit lines to manage their risk and improve the user experience. For them, it's the BNPL pure-pay user experience that they have to beat.

A final thought:

We've heard a lot over the last few years about FinTechs taking on the banks. There's been a lot of innovation by FinTechs, for sure, but a mixed bag of uptake — particularly when it comes to those who are trying to beat the banks with little more than a mobile prepaid card.

But then came BNPL, which has turned out to be the biggest challenge yet to the credit and interchange revenue streams retail banks get from credit cards. How big, and how much of a threat potentially, I've written about before.

So far, banks have been slow to meet the challenge. How they do may tell us a lot about a how big a threat these FinTechs really are to traditional banks.

FEBRUARY 7, 2022

PELOTON AND THE AMAZON EFFECT ON FITNESS

Last Friday's news that Amazon could be one of the suitors interested in buying Peloton caused that stock to jump 30 percent in after-hours trading. The collective pressures of the economy's reopening, a leaked report last month that it was slashing production of its bikes and treadmills due to a lack of demand and the unfortunate series of PR issues arising from the *Sex and the City* sequel have battered investor confidence in Peloton's management and the value of the brand over the last year.

At $8 billion, give or take, Peloton's market cap today is roughly what it was when it went public in 2019. That makes it a relative bargain for Amazon, whose own stock market performance on the heels of its Q4 2021 earnings broke the record for largest single-day gain in market cap ($190 billion) last Friday.

Media reports focus on the possible synergies from Amazon's healthcare ambitions and the access to Peloton's user base, largely affluent consumers with a couple thousand bucks to drop on a connected bike or treadmill and the monthly connected fitness subscription fee to access on-demand and livestreamed classes.

I think it's the other way around.

According to financials that Peloton CEO John Foley released in late January, connected fitness subscribers stand at 2.77 million, up from 2.4 million the quarter before. He reports attrition at less than a percent (0.79 percent, to be precise).

Peloton doesn't seem to have a user engagement problem. It has a scale and a diversity of revenue problem.

Those are two problems that a commerce engine like Amazon — with its own highly-engaged user base of 200 million Prime consumers — may be uniquely suited to fix.

Especially since most of those Peloton users are almost certainly already Prime members.

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THE CONSUMER'S DIGITAL SHIFT TO FITNESS

The personal fitness industry and retail have a lot in common: connected devices, the cloud and payments have disrupted the status quo.

A couple of years ago, working out was largely done in a designated physical location — a gym or a fitness studio — and workouts were often synched with the consumer's work/commuting routine. Consumers might have had stationary bikes or treadmills or free weights at home, but going to the gym or a studio was how many consumers worked out, and they organized their schedules accordingly.

For many, going to the gym was part working out, part social — and importantly, an opportunity to introduce variety into their daily, weekly or otherwise occasional fitness routines. Fifty bucks a month was what most people spent on those memberships.

It was also a routine that a lot of consumers found easy to break, even before COVID.

Sources that track gym memberships report that only 18 percent of gym members use the gym regularly (more than once a week). Gym membership churn rates average anywhere between 30 and 50 percent every year, depending on the source. Gyms build their business models, in part, on counting that most people won't show up, so they don't really need much space or help.

The pandemic forced a change in how consumers worked out when gyms and studios shut down in March of 2020. In the early days of the lockdowns, diehard fitness enthusiasts invested in bringing a connected fitness experience into their own homes to keep their workout routine intact. Those whose workout routines were connected to their commuting routine pivoted to at-home alternatives, too. Many people whose daily commutes previously made it hard to find time to work out found that they could now fit in a workout and followed suit.

Peloton was a big winner. The company sold its first bike in 2014, but saw demand soar in 2020 when waitlists for them extend into months in the early days of the pandemic.

Other connected fitness players also benefitted from those tailwinds. Peloton competitors — along with connected devices like Tonal, Mirror, Liteboxer and Hydrow — used the power of connected devices, software and instructors to attract users and keep them engaged. Apps with a variety of on-demand and livestreamed classes proliferated in Apple and Google's app stores.

The pandemic pushed fitness into a digital shift. Consumers didn't stop working out in March and April of 2020 — they just changed where they did it (at home) and how they did it (with connected devices and apps). They used both to establish a whole new fitness routine — one independent from being at a desk in an office at 8:30 AM or having to be home at 5:30 or 6 to feed the kids and do homework.

As we start 2022, that routine hasn't changed that much for many consumers. Working from home, at least some of the time, is now part of the daily routine for many. Consumers are going into their third year of integrating their workouts with this new routine, but now they have connected fitness options that are better and more diverse: more livestreamed choices, more on-demand options, better playlists.

I am one of those people. Maybe you are too.

Every day that I was in town, I organized my morning routine around running to a fitness studio to do a workout, then running back. I liked the studio, the workout, the instructors and the friends who also made a 6AM workout part of their daily routine.

That all changed in mid-March 2020 when Boston shut down. I lucked out and ordered a Peloton bike when there was only a two-week wait, so I had one in my home before the end of March. I now have a new morning routine and a workout regime to match: a variety of on-demand workouts, classes on the bike and runs on the treadmill.

My favorite fitness studio has reopened. But I haven't been

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back, even though I live in Boston and could go. The friends who used to work out with me at 6AM no longer go to an office downtown, so they don't make the trip in. Without them, running over and back isn't worth the time — I can get as good a livestreamed and/or on-demand workout at home at a time that works best for me.

Going back to those 2019 habits is now a friction for me and probably many like me. It's not because I didn't like that routine, but because it doesn't fit my schedule anymore. Connected fitness experiences mean that consumers don't have to sacrifice convenience, or even the diversity of a workout experience, to get a great workout, stay fit and satisfy their health and fitness goals.

IT'S NOW JUST FITNESS

The American College of Sports Medicine has done a study annually for the last 16 years about fitness trends. The study is fielded to a cross-section of professionals in and around the fitness space: personal trainers, fitness club owners and operators, sports medicine specialists, physicians, corporate wellness directors and insurance executives.

More than 4,500 respondents this year rank-ordered more than 43 different trends. This year as last, wearables top the list as more consumers seek real-time data about their physical fitness — and a variety of connected devices at different price points have come to market to meet that demand.

Analysts estimate that the global market for health and fitness wearables will reach nearly $10 billion by 2027, with the U.S. leading that consumption. Advances in 5G will only accelerate the growth of this category and the types of connected devices that consumers will own.

The second-ranked trend is the rise of the at-home gym — the first time, the study sponsors say, the trend has appeared on their list. They cite concerns over COVID, along with the vast array of options now available for consumers to buy, as forces driving that trend. Key to this expansion, they report, are manufacturers that give consumers a choice about what to buy and how much to spend. And, no doubt, the fact that consumers have a new work/life routine that delivers a suitable ROI on an at-home gym investment.

Trends three through eight are variations on the types of workouts that fitness professionals say consumers want, including more organized outdoor routines. Ninth on the list is livestreamed, on-demand fitness platforms, a trend that reflects the way that many consumers want their fitness experiences delivered.

When the news broke last Friday about suitors reportedly lining up for Peloton, there were others named and unnamed in the mix. Nike, for one, was named publicly — the purchase would constitute a rather big strategic shift, even though they could likely make the numbers work.

There's Google, whose Fitbit acquisition signals its interest in the connected fitness/health space. And Apple, whose launch of Fitness+ is said to rival Peloton's connected fitness offer. If those companies have any interest in the acquisition, neither have made it public.

For any of them, and probably others I've not named, the acquisition of Peloton would be just that — an acquisition of hardware, software and 2.7 million active fitness enthusiasts. In each case, consumers probably won't view the purchase as an important step forward to a connected fitness experience and cornerstone to a richer and more expansive connected health and wellness ecosystem. At least, no more than they viewed Google's acquisition of Fitbit that way, or Apple's Fitness+ and Watch as anything more than a feature (app) that they can stream on their phone or iPad and track results on their wrist.

An Amazon acquisition could mean more, potentially delivering the "Amazon Effect" to fitness. It could fully integrate the digital experience with the physical fitness experience for its 200 Prime million customers. It could use its commerce engine as the

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core to igniting a new connected health and wellness ecosystem that positions the bike and the treadmill as just another connected device consumers get to use as part of that experience. It could use its Prime membership as the platform to engage consumers beyond the transactional utility of just buying stuff.

If successful, a Peloton acquisition by Amazon could check the obvious boxes.

It could add, even subsidize, a connected fitness subscription as part of the content available on Amazon Prime, integrating it even more fully than it is today into Fire TVs and Alexa devices.

It could sell its bikes and treadmills and gear on the Amazon marketplace.

It could integrate workouts with the Halo fitness bands, boosting those sales and creating more of an incentive for users to track their workouts, even enabling a permission-based sharing of that information with medical professionals to monitor a consumer's health — and with insurance companies to offer data-driven incentives to reduce healthcare premiums.

But it could do much more.

Amazon's health and wellness ecosystem could recommend pairings of workout gear or food choices and menu recommendations for consumers to stay healthy. It could do that by integrating Whole Foods and Amazon Fresh into the experience and opening up new categories for third-party sellers to introduce new products and reach those consumers.

Amazon could use the opt-in data provided by the consumer to recommend integrated personalized workouts, including the variety of workout formats that consumers now say they want. Different from the weekly emails that recommend classes to take with favorite instructors, Peloton instructors could become digital "fitness partners" for consumers, creating weekly workout programs that provide diversity and keep users engaged. Doing that would leverage one of Peloton's greatest assets: instructors who've become a different type of influencer and who play a big part in driving user affinity with the Peloton brand.

Peloton instructors could become their own platforms for merchandising and selling content on the Amazon Prime platform and through the marketplace before during and after the workout.

Like what that instructor is wearing? Tell Alexa to put in the cart and ship it to you.

Want the recipe for salsa that the instructor just said they loved to make and eat? Tell Alexa to send it to your email.

Want to sign up for a three-day fitness retreat with your favorite instructor? Just tell Alexa to make the reservation.

WHAT'S NEXT

Just like many other aspects of the digital transformation, consumer convenience will be the key driver of decisions about how and where to work out and where a connected health, wellness and fitness experience fits. And just like the digital transformation of retail, "working out" will be an experience in which digital becomes a big part of the consumer's physical experience and where a more connected ecosystem of products, services and activities is valuable.

And just like the digital transformation of retail, it will likely be a player outside of the traditional fitness sector that will be successful.

Will it be Amazon? Time — and probably the regulators — will tell. Remember, these are the same regulators who gave Google such a hard time with the tiny teeny acquisition of Fitbit but finally relented. So, who's to know how an Amazon bid for Peloton might go? There's been recent bipartisan support to make Big Tech smaller — in this case that could shrink a connected fitness player that's already getting smaller.

Or Peloton, sometime soon. At least right now, they're expected to report earnings tomorrow after the market close.

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FEBRUARY 28, 2022

THE VALUE OF CONSUMER CERTAINTY IN DRIVING DIGITAL TRANSFORMATION

There has been so much written over the last two years about the consumer's great shift to digital – and PYMNTS has contributed our fair share to that subject. Many of those storylines have documented the *what* and the *how* of that shift: how many people are shopping online or ordering from aggregators or working from home or using telehealth services, what devices they are using to engage with these digital touchpoints, how the reopening of the physical economy is affecting their digital behaviors or not.

Most of that reporting points to the convenience of digital — the ease with which consumers can engage with their favorite brands leads to the acceleration of that inevitable move to more digital, less physical. Once consumers get hooked on how easy it is to order pantry staples from Amazon Subscribe & Save or coffee on subscription from their favorite direct to consumer brand or dinner from a delivery aggregator or anything retail from any brand online, those online habits will stick.

That's all true.

Eight (8) percent of the U.S. adult population uses Amazon Subscribe & Save to order CPG products, and 20.3 percent of all consumers now have some kind of retail subscription. The average number of retail subscriptions per consumer is five, a 100 percent increase year over year. Forty (40) percent of consumers still order food online from aggregators, even as they return to dine-in at restaurants, and 31 percent of consumers buy at least some of their grocery products online. When it comes to retail products, 45 percent of consumers make purchases online, even as COVID recedes and consumers go back into stores.

More important than the *what* and the *how*, though, is the *why*.

The nearly 40 studies across 11 countries that PYMNTS has done over the last 24 months, touching a national sample of nearly 100,000 consumers, shows the *why* of the consumer's digital

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transformation: it's the certainty of their experiences with businesses and brands when digital is embedded into the consumer's daily life.

WHY BEFORE WHAT

After two years of living with uncertainty as a consequence of managing life in a global pandemic, consumers are using mobile and digital to create certainty across each of the ten connected economy pillars that represent their day-to-day experience.

It's why consumers want the certainty of curbside pickup for the things that they need right away, and are also perfectly fine with two-day delivery for the things that can wait.

Auto-refill subscriptions for center-of-the-store grocery items create the certainty that essential pantry items will show up the fifth of every month without fail — and eliminate the risk that consumers will run out. Certainty is also why 82% of consumers still walk into grocery stores today to inspect the grocery products they're uncomfortable having anyone but themselves pick out.

The certainty of knowing whether a desired item is in stock in a store is why consumers consistently rate inventory availability as a critical merchant feature. Better to know that an item is out of stock than to risk an uncertain trip to the store.

Certainty is also why consumers with restaurant subscriptions are more loyal to those brands and spend more money with them. The predictability of the experience reduces the risk of a disappointing outcome.

Certainty is one of the reasons why so many consumers still go to the pharmacy to pick up their prescriptions even though delivery and online options are available for a fee. The ability to ask questions of the pharmacist is an important part of making consumers feel more comfortable taking the medications their doctors prescribed.

Patients still want the certainty of a diagnosis delivered face to face with their healthcare

provider, even though telehealth use has surged since March of 2020 — and even though patients prefer digital channels to make appointments, get test results and pay their bills.

The 2022 Global Digital Shopping Index, the second annual PYMNTS study of the global digital shopping behaviors of consumers and merchants in Australia, Brazil, Mexico, UAE, U.K. and the U.S. — done with the support of Cybersource — finds that more than a third of consumers — 34 percent — across six countries now take their mobile phones into the physical store to shop.

Why?

Consumers use their mobile phones in the store to get product information and reviews, access coupons and discounts and compare prices. Their phone in the store creates the certainty, in real time, that they're buying the right products for the right prices for themselves and their families.

PAYMENTS AS CERTAINTY

One of the more fascinating findings of that study is the relationship between payments choice and preferred merchant status with a consumer. Surprisingly, perhaps (and happily for all of us payments peeps), across all six geographies that we studied, the ability to use their preferred payment method at checkout was the number one reason consumers said a merchant was their go-to.

It wasn't just what they said.

Based on a statistical analysis of their recent shopping transactions, we found that consumers were 63 percent more likely to do business with a merchant that offered their preferred way to pay than those that did not. Certainty and predictability of the payments experience at checkout increased conversion for those merchants.

We also see strong evidence of the relationship between payments and the predictability of the consumer shopping experience in the rising

popularity of BNPL solutions — across all income and demographic groups. Whether consumers are using BNPL to build credit or as an addition to the credit products already available to them, consumers say they like the certainty of knowing that a purchase will be paid in full after making a series of equal installment payments. For many consumers, BNPL has shifted their mindset away from credit as a way to finance a purchase after it's been made and toward the certainty of knowing how long it will take, and how much in total, to pay for something before hitting "buy."

We also observe the importance of certainty for the majority of consumers who use lease-to-own payment methods for making a purchase but never turn the products back in. Consumers who have limited financing options and need to make a durable goods purchase — an appliance, a laptop for their child, tires for their car — appreciate knowing that they can return the product and forgo further payments if necessary. That escape clause gives consumers the peace of mind to buy what's needed regardless of their credit history.

According to the 2021 PYMNTS Disbursements Study, U.S. consumers are willing to pay a fee to receive disbursements instantly. Whether or not the consumer actually needs the money instantly is irrelevant — consumers want the certainty that the money owed is available for them to use when they want those funds.

On the B2B payments side, the lack of certainty over when payments are received is a key accelerant to digital shift of business payments. According to a PYMNTS study, 60 percent of CFOs say that digitizing payments is critical to improving the health of their balance sheets and creating the cash flow certainty necessary to run their businesses.

TRUST AND CERTAINTY

I had a chance to preview survey findings from a study we are doing with a client interested in better understanding what builds consumer/merchant trust in an online environment. The first readout of those findings is pretty fascinating. We see that consumers who trust their online merchants deliver a better lifetime value as measured by a number of different dimensions — and significantly so. For the details, I'll leave you in suspense until the report publishes a few weeks from now.

Just as interesting is quantifying what trust means to consumers when shopping online. It's largely been a bit of a black box, mostly couched in general terms such as "delivering a great experience" or "making it easy, convenient and safe" for consumers to do business with an online brand.

Digging further, it's much more nuanced.

Building trust with a consumer is linked to how well merchants deliver the features that create certainty for that consumer — and doing so in a way that makes it easy for consumers to find and take action. Building consumer trust goes beyond keeping their data private and secure — that security is no longer a source of differentiation, but the consumer's expectation.

THE F.I.T. FRAMEWORK

About 18 months ago, I introduced the concept of the F.I.T. framework as a methodology for examining the hot spots for the digital shift that was unfolding in real time. The framework considered the interdependencies of **F**riction, **I**nertia and **T**ime as a way for companies to evaluate the potential success of their digital strategies. Strategies that eliminated frictions and could save consumers or businesses time, would have a positive impact on their willingness to change — reducing the inertia that often stands in the way of change.

COVID was obviously a huge incentive for consumers and businesses to shift digital at the same time and for the same reasons. The frictions of engaging in the physical world for any reason — shopping, eating out, seeing a doctor, going to a movie or an amusement park, to the office, traveling — were too high. Digital was how consumers and businesses made it through those very dark and uncertain times.

After two years of living in a digital-first world, consumers now expect physical to be part of their digital experience, rather than just another channel for engaging with a brand. With information at their fingertips, consumers can reduce the risk of an unsatisfactory outcome or a bad experience that wastes time. Digital gives consumers a more efficient way to assess the tradeoffs of where to spend their time and money — and in real time.

In 2022, the friction for consumers is now the physical world experience. Time is the consumer's most precious commodity — and in the aftermath of COVID, consumers use it differently. As eager as consumers are to reengage in the physical world, they may be held back by the uncertainty of the experiences they'll find when they do, thereby creating inertia.

At the same time, the digital transformation of every pillar of our connected economy is in full swing, and innovators are using technology and payments and data to lay new digital tracks to transform how consumers work, shop, eat, stay well, connect with others, pay, bank, have fun and live in their homes.

In most of these cases, consumers are latching onto experiences that give them certainty — or will over time as the digital transformation of solidly physical-first experiences such as healthcare improve. They want certainty that they won't face frictions, that they'll save some time and get a better outcome. Then they'll shake free from their bonds to the old physical ways of doing things.

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MARCH 21, 2022

WILL AMAZON MAKE STREAMING SHOPPABLE?

The Netflix series "Emily in Paris," which debuted in May of 2021, didn't exactly start off on the right foot. Panned by critics and viewers, its Rotten Tomatoes average audience score of 47 seemed to reflect the social media banter over the "infuriating" naivete of the main character and uninspiring plot.

Nevertheless, the show was nominated for two Emmys and two Golden Globe awards. Netflix picked it up for a second season. Apparently, "Emily in Paris" is ***that*** show 58 million U.S. households love to hate — they faithfully tune in every week to gossip about how much more annoying this American [Millennial] in Paris has become.

Something that apparently isn't grating on the show's viewers, however, is Emily's wardrobe.

Many viewers obsess over what she and her friends wear. And anyone who wants to channel a little Emily-living-in-Paris-wearing-French-girl-clothes can visit wornontv.com and buy what they see in any given episode. This on-trend Blu Caban Jacket Roberta by Rianna + Nina, as worn by Emily in the French Revolution episode, can be had for €1,960 right here. One can also buy the rest of the ensemble — her handbag and shoes — from retailers listed on that same page.

Viewers have to be pretty committed to do that, though.

A would-be shopper has to remember what Emily and/or her costars wore, then go to a separate site to discover whether that item can be purchased — assuming she knows there even is a site. Once there, she has to click on the page with all of the "Emily in Paris" wardrobe stuff, then scroll to find what caught her eye. If she is successful, it's another click to the merchant page to buy the item, provided it's available in the size needed.

Talk about friction.

In an eCommerce world that's all about conversion, the steppingstones of multiple sites and clicks mean plenty of opportunity for cart abandonment — if consumers even get that far.

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One might argue that it's all incremental anyway — the show is about the show, not the merch that can be sold as a result of the show. The flip side of that argument: why can't it be about both? FinTechs are orchestrating new payments and commerce opportunities that allow brands to be present in the digital channels where consumers are already spending time — and where they may be open to spending money as well, provided they don't have to stop what they're doing or go to another site.

It's certainly a possibility made more real when a streaming platform with all of those eyeballs and viewer engagement happens to be connected to a commerce engine with all of those SKUs and a one-click-to-buy experience.

It might even be part of the longer-term strategy behind Amazon's $8.5 billion purchase of MGM studios.

Amazon called "time's up" on the FTC last week (which had dithered past the normal deadline for saying yay or nay) and moved full steam ahead with the $8.5 billion acquisition of MGM studios. MGM has a vast content catalog that includes the James Bond film franchise and classic movies such as "Silence of the Lambs," "Gone with the Wind," and the "Wizard of Oz."

The original decision to acquire MGM was made while Jeff Bezos was still CEO. Then, he described it as giving Amazon ownership of content IP that's ready for its 21st century makeover. By that, he meant new TV shows, series and other content spinoffs.

Without question, further monetizing that IP by connecting streaming content to its massive commerce engine and 174 million payments-enabled Prime Video subscribers is the topic of some Amazonian's 6-Pager somewhere. (If not, use this piece — it's under the Bezos page limit.) The famous "why" of that memo seems straightforward — a new commerce flywheel that gives consumers and brands novel ways to discover products and buy them.

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Positioned right where they have the undivided attention of that consumer.

Just think of all those martini shakers, tuxedos, Omega watches and Aston Martin sales waiting to be made.

EMBEDDED COMMERCE

Embedding commerce inside of streaming platforms is one of the greatest untapped opportunities inherent in the digital transformation of the global economy. It's also one of the six trendlines that we observed from the first-of-its-kind benchmark study measuring the pace of the world's digital transformation that PYMNTS will release on March 31.

Nearly everyone everywhere in the world streams video and music. Access to smartphones and fast mobile bandwidth, even in developing economies, has democratized access to the content that streaming platforms offer.

After examining the behaviors of more than 15,000 consumers in 11 countries that represent 50% of the global GDP, we find that streaming video and music is the most popular activity of the 40 we tracked across the ten pillars of the connected economy across all of the countries in our study. In the U.S. alone, Nielson reported that more than 180 billion minutes of streaming content, on average, were viewed each week in January of 2022. Streaming platforms like Netflix, YouTube and Prime Video captured 6.6%, 5.7% and 2.4% of those streaming eyeballs respectively.

Streaming is also a high-engagement activity for which there is currently low commerce penetration, outside of subscription fees, but a huge potential for expanding the GDP of the world's digital transformation. Making the brands inside of the shows on those platforms shoppable — in the moment — creates new revenue streams for streaming platforms, show stars and brands that want those impulse buys.

There's some precedence for this theory.

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Spotify opened its platform in 2020 to merchandise so that artists could monetize sales of tee shirts and other branded swag alongside their music. A study of artist sales shows that, on average, artists make 16 times more income selling merchandise in a year than they do on the royalties from their music. Consumers who come for the music seem to stay for the merch.

Amazon, of course, can turn on that commerce tap at scale — and shape the design of the business models for monetizing streaming services. Instead of reducing monthly subscription fees by forcing consumers to watch ads, like Disney+ is testing, embedding commerce inside of its programing can drive the sales that can subsidize those monthly fees.

Brands that never considered selling on Amazon's website might find its streaming content a place where they can allow consumers to buy in context, especially in clothing and apparel categories where PYMNTS research finds that Amazon maintains a 47% share of online sales. Imagine the reCommerce sales for the vintage and antique shops that supply the clothes and accessories for the show. Or tickets to visit the cities in which the shows take place. Or, or, or. Registered payments credentials and shipping options, including BNPL, make it one-click easy for consumers and brands to shop in a new digital experience.

Entirely new shopping opportunities could be established, all built around the core proposition of shopping while watching movies or TV shows.

After all, actors and musicians are the ultimate influencers, said to increase sales by 4% on average, according to a study done by Barclays Capital and Harvard Business School professor Anita Elberse.

I can't wait for the next Sotheby's auction of an Aston Martin DB5 to be promoted in the James Bond spinoff featuring him behind the wheel.

Apologies for the obvious James Bond obsession.

PAYING ATTENTION AND MAKING ATTENTION PAY

Buying things from a video is not new. YouTube announced a new program to make its videos shoppable last summer that leverages Google's commerce platform and GPay. Before that, it was possible to watch a video and punch out to make a purchase.

Social media channels like TikTok are integrating commerce into their video formats. So is Meta. Livestreaming, another form of shoppable videos and a throwback to the days of the Home Shopping Network on TV, are emerging as eComm's next big thing. eMarketer estimates that livestreamed shopping in China will be a $623 billion business by 2023, accounting for roughly 20% of retail eCommerce sales there. In the U.S., livestreaming is still very much in its infancy — analysts project roughly $35 billion in sales in 2024, after roughly $11 billion in 2021. Not surprisingly, apparel and beauty products are expected to lead the way.

But these formats are different than what Spotify offers now and what Amazon could in the future.

The average consumer attention span on video formats inside of social media platforms is a whole 1.7 seconds, according to Facebook in a post that seems to almost apologizing for that statistic. Overall, it's been said, the attention span of consumers online isn't much better, at something like 8 seconds — a whole second less that than of a goldfish, for those keeping score.

That's because there's so much competition for attention on those platforms — so many other distractions happening in and outside of them when looking at content, along with the multitasking that is a defacto part of the experience.

Think about yourself. When you're checking out Insta or TikTok or a video on YouTube, you're probably also talking to your kids, walking the dog, at your kid's baseball or swimming practice, talking or messaging

with a friend, commuting, or supposedly paying attention on a Zoom call where the cameras are off.

Consumers are in a different mindset when they sit down to watch a TV show or movie. They are literally tuned into the program with the intention to watch it from beginning to end. Without commercial breaks, the streaming platforms have the consumer's undivided attention. And since the programming is on demand, consumers are also watching it when they have made the time to be present — to pay attention.

For a brand, the 58 million household eyeballs trained on a single episode of "Emily in Paris" are really different — and much more attractive — than the 5,000 or even 650,000 eyeballs sorta-kinda paying attention to a one-minute video that someone might like before moving to the next one 1.7 seconds later.

WHAT'S NEXT

Much of the conversation about the digital transformation of the global economy is about the activities that are already transactional in some sense, already tied to payments and to making a sale online. That's where we have seen consumers and brands make the obvious digital shift because buying things had to move digitally during pandemic-related lockdowns, and some consumers were willing to stay there.

The recently published 2022 PYMNTS Global Digital Shopping Index, a collaboration with Visa Cybersource, is a benchmarking of the digital transformation of shopping in six countries. The second annual study shows how much of an impact mobile and digital has had on consumer expectations of their shopping experience — and merchant investments to meet them in their digital-first mindset.

Even more transformational is the opportunity to enable commerce inside of the environments where consumers already spend time and are fully engaged but not buying anything. In many ways, the digital transformation of the world's economy will hinge on our ability to do that — and to simplify the process and payments efficiencies needed to deliver a seamless experience across the financial supply chain.

In the meantime, brands and platforms and payments players and technology enablers will continue to create new ways for commerce to come to the consumer — wherever and whenever she happens to be. They will also explore new acquisition strategies that could give them a competitive edge. Who knows — maybe Netflix will buy Shopify, or Walmart will buy Disney.

Never say never. Because in the immortal words of Vivian Leigh, as Scarlett O'Hara in "Gone with the Wind," "After all, tomorrow is another day."

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APRIL 4, 2022

THE ONE BIG THING APPLE'S PROJECT BREAKOUT NEEDS BUT DOESN'T HAVE

Project Breakout is said to be Apple's now-not-so-secret plan to turn itself into a full-fledged payments and financial services company by building its own acquiring, payments processing, risk management, fraud and credit underwriting capabilities. As reported last week by Bloomberg, this move is intended to reduce Apple's reliance on FinTechs and other third parties — card networks, acquirers and banks, to name but a few — and bring all of those capabilities in-house.

It was reported that the stock prices of Apple partners, including Apple's bank partner Goldman Sachs, dropped on the news. That said, I'm pretty sure that everyone whose core business is payments and financial services had a good chuckle when they heard it. Payments only looks easy — Apple should know this better than most, given its disappointing performance with Apple Pay in the seven years since its launch. Particularly considering Apple Pay has achieved its modest gains with a lot of help from many of the players Apple would reportedly like to disintermediate.

That said, Apple's Project Breakout ambitions should hardly come as a surprise. Apple is under pressure now to find the next big revenue opportunity.

Its business model is selling hardware — iPhones, iPads and MacBooks — and taking a 30 percent cut of what App Store digital apps charge. Both of those revenue streams are threatened everywhere in the world — and for different reasons.

Apple's made a big push into Services, which includes Apple Pay and all of its subscription offerings, but those sales account for only about 16 percent of Apple's overall revenue, according to Apple's reported Q1 2022 earnings. And given Apple's penchant for opacity when reporting results, we don't really know what's driving the growth inside of that business unit.

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Enter payments and financial services, which apparently look like that next big thing to Apple's top brass. Maybe it's even a sign that Apple is getting sick of all of the prevailing Big-Tech-must-be-Bad-Tech bashing and interested in pivoting instead to a kinder, gentler, less regulator-antagonistic FinTech persona.

Forget BigTech Apple. Meet FinTech Apple, which simply enables embedded payments and credit options for all transactions happening inside apps that iPhone users download from the App Store – the ~~technology~~ FinTech platform that also happens to sell some phones and computers and subscription services, too, inside of its consumer-driven, privacy-first financial services ecosystem.

Apple, the consumer-driven, privacy-first financial services ecosystem, which will protect consumers' interests inside of its ecosystem by establishing new ground rules for how stakeholders engage and how that engagement is monetized. That could even mean a different business model than the one stakeholders know today.

There are only two problems with this thinking.

First, Apple's track record in payments hasn't been all that great so far.

Seven years after the launch of Apple Pay, PYMNTS analysis shows that 94 percent of U.S. consumers who could use Apple Pay to check out in the physical store still don't, and that statistic has held steady since its launch. According to our analysis, Apple Pay accounts for roughly 2% of overall retail sales in the U.S., even though there are more people than ever with iPhones capable of using Apple Pay and more stores than ever that accept it.

Second, and most important, the App Store isn't a commerce ecosystem and Apple isn't thought of by consumers as a commerce network.

The App Store is simply that: a place that consumers go to search for and download apps. Developers use the App Store as a distribution channel and not a place where consumers go shopping for products. Those apps sit on the home screen of the consumer's iPhone. It is inside of those apps that consumers engage in commerce – searching for and then buying things, then deciding how they want to take possession of them.

Not only does Apple have a ton of work to do to change the consumer's perception of the App Store from a place they go to download an app to a commerce ecosystem, but it will also take a lot of real work to turn Apple Pay into a platform that brings consumers and merchants together to engage and transact. At the moment, it is simply a payment option that consumers don't really use much today to buy many things.

At the same time that Apple undertakes a massive effort to build a payments and financial services business from scratch.

Connecting the many Apple FinTech dots

Apple's FinTech ambitions are not a big secret. They've been dropping a number of clues over the last couple of years suggesting that adding more Apple-native payments and financial services is part of a larger strategy, one that could lay the groundwork for Apple as a commerce ecosystem.

There's the introduction of Apple-as-a-Service, Apple Installments.

Apple's infamous Apple fan-boys will camp outside of the Apple Store days before a product release to be among the first to get one. That's different, though, from having consumers feel a connection to Apple in the same way that Amazon Prime customers feel a connection to Amazon when they buy from them.

Apple's Installment program announcement could be a first step to changing that mindset, perhaps even a V.1 for introducing Apple's version of Amazon Prime. Introducing a bundle of hardware and software services provided by Apple for a set monthly fee creates a different relationship between Apple and its customers — and a platform

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for building on those bundles to keep users loyal to Apple and its ecosystem. This Apple-as-a-Service initiative could turn buyers of its devices and users of its à la carte subscription services into "members" of an expanding Apple ecosystem.

Then, there's Apple's move to use advertising to keep app developers sticky.

Apple's decision in January of 2020 to force app developers to allow consumers to opt out of tracking put a big dent in their ability to target and track users. It also ignited Apple's App Store advertising business.

As consumers opted out of tracking, brands opted out of putting their ad dollars into Facebook and Google and opted in to buying Apple's Search Ads to drive downloads and conversions. It has been reported that the number of app downloads attributed to those ads increased nearly four-fold year over year. Mobile analytics platform Branch reported that 58 percent of Apple's App Store downloads in 2021 were the result of Apple's App Store ads, compared to 17 percent the year prior.

Those are the same developers who could potentially become another revenue stream for Apple if Apple becomes a payments processor, including the opportunity for Apple to further monetize transactions beyond processing fees.

Apple commissioned an economic study in 2019 to show the App Store breakdown of commissionable app sales (digital goods) and non-commissionable app sales (general retail, travel and ride hailing). That report shows that of the $519 billion in total 2019 App Store sales, $413 billion was related to non-commissionable apps. General retail accounted for $268 billion of those sales, ride hailing for $40 billion and travel apps for $57 billion. The intended takeaway of that report was that the vast majority of revenue coming from the App Store is from apps for which Apple does not take a cut of transactions.

Maybe not forever.

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As Apple looks to diversify its revenue streams and create a commerce network, it might explore creating a new business model to monetize the non-commissionable apps that provide physical goods or services. Bringing payments and financial services in-house could be part of such a strategy.

Apple put a toe into the Open Banking waters by buying Credit Kudos.

Apple Pay Later, Apple's BNPL product, is already pretty late. News of this BNPL product was announced (leaked?) in July of 2021. Eight months later, we still don't really know what that program will look like. It is reported that it will more or less follow the typical BNPL playbook: pay in four installments every two weeks without interest for smaller-dollar purchases; pay in monthly installments over a longer period of time with interest for larger purchases.

As I wrote in July when the news broke, Apple Pay Later is in a bit of a conundrum about how it will go to market, since its model is reportedly to leverage existing lines of credit on bank-issued cards. That also happens to be the model that banks and FinTechs working with banks and acquirers are also using.

When Apple announced the acquisition of U.K.-based Credit Kudos for $150 million on March 23, it was described as a way to help Apple underwrite and manage the risk for small-dollar purchases. It could be the steppingstone to something more.

Credit Kudos describes itself as an Open Banking tech platform, regulated by the U.K.'s FCA. Provided that the deal closes, it will provide Apple with access to the bank account details of any potential borrower — Apple's or anyone's — who has granted Credit Kudos permission. The U.K. is also a market where Apple Pay has roughly 3.5 times more usage than other markets. It could be that the Credit Kudos platform is used to support an account-to-account BNPL service over open banking rails, first in the U.K. and then the U.S.

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There's the Apple Card, which set the bar for credit card provisioning.

In partnership with Goldman, Apple innovated credits with its Apple Card. Everything — from the application process to the activation process, from the user experience when purchasing to the user experience when managing transactions and payments inside of the Apple Wallet — is different, innovative, seamless and really terrific. The Apple Card was a wake-up call to traditional credit card issuers about what a mobile "card app" experience should be for consumers.

It's hard to know how well the Apple Card is performing, though — no one says much about it. Even on Goldman's Q4 2021 earnings call, there was only one mention of the Apple Card — in reference to Goldman's $344 million credit loss provision that quarter. Goldman's CFO said the loss provision was the result of the firm's consumer business expansion for that quarter, and attributed primarily to the Apple Card.

The operative word, however, for the Apple Card is *partnership* — Apple doing what it does best, Goldman doing what it does best and Mastercard doing what it does best by enabling acceptance everywhere Mastercard is accepted. This model, if Project Breakout reports are to be believed, is what Apple would like to dismantle over the next couple of years.

What's Next

With roughly $93 billion in free cash flow for the quarter ending December 31, 2021, Apple has the money to do anything it wants — including building out its own financial services and payments business, and taking its time to do it.

I also wonder why Apple now wants to be a payments company.

Apple has done two things really well: produce the iPhone and an app store that revved up the digital economy. Both were remarkable innovations. Yet every other innovation that followed has been me-too, late to market and largely uninspired or uninspiring: Apple Books, Apple Music, Apple TV, HomePod.

Even Apple Pay.

Although Apple Pay represents about half of mobile wallet checkouts in the physical store, mobile wallets usage at the point of sale more generally is still quite small.

According to a PYMNTS March 2022 consumer digital payments study, 1.1% of consumers used Apple Pay in store to buy retail and grocery products and food from restaurants/aggregators, and 3% used Apple Pay online to make their last purchase in those same categories. That's compared to debit cards at 39% and 34% instore/online, credit cards at 31% and 38%, and PayPal at 1.9% and 10% respectively. It seems that Apple has yet to crack the "it's better and more than a card at the point of sale" code.

Apple's strategy has long been to keep people inside of its own ecosystem, using their hardware to access apps and services. It explains why Apple might think that building its own payments and financial services platform is how it will scale and grow. Others with ecosystem ambitions have taken a platform, device-agnostic approach to growth and scale.

Apple's announcement of Project Breakout signals that Apple is fine with using partners today, but not for the long term. It could also expose a fatal flaw in its thinking, one that fast-tracks the strategies of every other player who works with Apple today to shift their focus to more open ecosystem pastures.

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APRIL 25, 2022

IT'S TIME FOR NETFLIX TO STAGE ITS NEXT BLOCKBUSTER PIVOT

When Netflix CEO Reed Hastings and INSEAD Professor Erin Meyer released their business book bestseller No Rules Rules in September 2020, they wrote that it was the video company's unconventional management ethos that drove Netflix's success over the years.

At the time of the book's launch, Netflix stock was trading at roughly $516 a share.

Hastings describes the journey from the company's roots as an online DVD rental business in 1997 to its launch of a video streaming service in 2007, explaining that a culture valuing innovation over efficiency, context over controls and people over process has been critical to Netflix's outsized performance over the years.

The most infamous pivot is a well-recounted piece of business folklore. That's when the now-defunct Blockbuster video rental chain turned down Hastings' $50 million offer to sell Netflix in 2000. At the time, Netflix was heaving under $57 million in debt and a piddly 300,000-subscriber base. Hastings credits that rejection with driving a new focus and intensity — one that, by the time Blockbuster went bankrupt in 2010, had propelled Netflix to become one of the most valuable media companies in the world.

It may be time for Netflix to stage its next Blockbuster pivot — but it must do more than just follow the pack and bring ads into the mix. Or simply add content about the content it already has on the platform as some suggest, to build upon and expand its core.

Both strategies take the view that the Netflix's content is its primary asset.

It's really not. Its primary asset is not even its subscribers — it's the **attention of its users**. Naturally, that's all inextricably linked to the content it has on the platform. But to move the needle, Netflix has to monetize the attention of its users in creative and impactful ways.

Yes, ads are one way to monetize attention — but that centuries-old method is

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hardly innovative, nor does it take advantage of the new opportunities that digital creates.

The first instinct of most users is **not** to pay attention to ads, to fast forward through them if they can or to press "skip" at the first possible moment. Ads also create churn. Users accustomed to not seeing ads on streaming could find it jolting and may bolt.

As I've written before, embedding commerce into streaming platforms like Netflix, making buying a part of the contextual experience of watching a show, is the big opportunity — and how Netflix can boost revenue and drive profitable growth.

Or it can wait to be acquired by a platform that can and will.

Like maybe Walmart.

THE BIRTH OF A NEW VIDEO MODEL

They say a picture is worth a thousand words.

This picture, courtesy of Google Finance, tells the story of Netflix in the five days since it released its Q1 2021 earnings on April 20, 2022.

It's a long way from September 2020.

Based on the share price yesterday, April 24, 2022, the stock is trading about where it was in January of 2018.

It wasn't the loss of 200,000 subscribers that spooked investors — Netflix, like other streaming services, has seen its existing subscriber numbers move up and down before.

But Q1 was the first time since 2011 that the loss hasn't been more than offset by new subscriber growth. Worse yet, Netflix's Q2 guidance is that it expects to lose 2.2 million more subs on top of that.

Many analysts and investors are now writing Netflix off — its best days are behind it, they say. Hedge fund investor Bill Ackman took a $400 million loss after liquidating his entire Netflix stake within 24 hours of the earnings release. This happened only a few months after adding 3.1 million shares to his portfolio.

Perhaps anticipating the earnings call drubbing, Hastings said he was contemplating an ad-supported option to attract a more price-sensitive consumer. This from a CEO who was previously emphatic about remaining true to the ad-free streaming model he pioneered in 2007 to the great joy of cable TV subscribers who cut the cord, then and now. Ads, Hastings always said, degrade the experience, and are why consumers opt for streaming platforms over ad-dominated cable options. He now says consumer choice now is just as important.

One might argue, as many have, that the no-ad, subscription-only video streaming model Netflix pioneered in 2007 is a relic, an outlier that was never really destined for long-term success for Netflix or any streaming service that adopted a model like it.

In fact, Netflix's business model does run counter to how most platforms monetize content — and have for hundreds of years. Starting with newspapers in the 18th century and now with digital media, content platforms usually monetize both sides of their platform. Advertisers pay a lot to catch the attention of users in the hopes of making a sale; those ad dollars subsidize the cost of access for platform users who pay a more modest fee to consume the content they find there.

But advertising alone may not right the ship at Netflix, or in a time frame that's relevant to its subscriber growth and attrition goals.

Introducing ads is not a short-term silver bullet nor an easy one; even Hastings signaled that it would take a couple of years to implement such a program. Netflix lacks the infrastructure needed to power an ad-supported model, so it will have to buy or build. Both options will take time — if buying is even an option given the anti-big business M&A rhetoric that now permeates D.C.

Maybe in light of their recent stock market performance,

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pundits, lawmakers, and regulators might be persuaded that the "N" in FAANG has lost a bit of its bite.

MONETIZING THE MERCH

Commerce-enabling the attention of its 220 million subscribers could be a revenue and profit-making gamechanger. Not only is this where the biggest streaming competitors also see an opportunity, it's where consumers are already highly engaged and starting to buy things they see and like from streamed content.

Here's why.

PYMNTS released a landmark 11-country study last week benchmarking the digital transformation of the global economy. This proprietary methodology uses the results of a 15,000+ consumer study across the countries accounting for 50% of global GDP to examine how and how much consumers engage digitally with 40 different activities related to how they shop, eat, bank, work, live, have fun, stay healthy, move, pay and are paid.

These 11 countries collectively are a little more than quarter of the way to full digital transformation. Singapore and Spain lead, Japan lags, and the U.S. is nearly tied with U.K. for third place on the list.

The big collective "aha" is that there is tremendous potential for business leaders, entrepreneurs and investors to build on the digital infrastructure that exists — and to lay new tracks to introduce payments and commerce into environments where consumers already hang out, are highly engaged and open to new contextual commerce experiences.

Like video streaming.

It won't come as a surprise that we found consumers everywhere in the world are highly engaged in activities that are more social or more for fun — and they engage more frequently with those activities.

One such activity is video streaming, the top ranked activity across all 40 that we studied and across each of the 11 countries.

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Sixty-one percent of the consumers we studied engage in video streaming, and nearly a third do so on a daily basis. Seven times more consumers engage daily in watching videos than shopping on a marketplace.

Consumers have had many years to hone their streaming platform behaviors. Many Millennials didn't have to cut the cord. They never had one: their digital media streaming habits were shaped by Netflix and others, including social platforms like Facebook, where many users consume most of their news. Streaming videos is also a highly social activity, which is a big part of why its users remain sticky and highly engaged.

Making streaming transactional will become a new sales channel for brands and for the content platforms that enable it. Imagine this. You're watching your favorite show, and a little hover appears on the screen next to a product, a piece of clothing, a car, a watch, dishes or a lamp — whatever. That prompt signals that the particular item can be purchased. Swiping or clicking yes allows you to buy it without leaving the show — or put it on your streaming video watchlist to purchase once the program ends.

It's a possibility made more real when streaming platforms with all of their eyeballs and viewer engagement are also connected to a commerce engine and purchases enabled via a one-click-to-buy experience.

Once that happens, more content producers will adapt programming to those commerce opportunities in order to convert highly engaged eyeballs into a new revenue opportunity.

BREAKING THE AD-SUPPORTED MOLD

In 2007, Netflix was the streaming video leader, and many who entered the space since have adopted its no-ad, subscription model strategy. Those players are now pivoting to the more conventional ad-supported content model. Disney+ says it plans to introduce a lower tier ad-supported option later this year. Hulu has introduced an ad-

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supported option, and reports good results so far. Why not, I guess — might as well grab money from wherever you can get it.

But it takes an enormous number of eyeballs to make advertising a big bottom-line contributor. You Tube generated more than $28 billion in ad revenue in 2021. But YouTube also had roughly 2 billion users also show up every day to view its content. Ads are also very much a part of the YouTube TV experience, since many of its 85 channels are live TV shows. Their 3 million subscribers also pay a $65/year annual membership fee.

Spotify launched in 2008 with a free ad-supported content model in addition to premium content. Fourteen years later, Spotify reports that its ad-supported music content drives 12% of revenue, and is growing at a faster clip than its premium content package subscribers. Although those ad-supported users drive eyeballs, they don't drive profits — at least, not yet. Ninety-five percent of Spotify's profits come from its premium subscribers.

Looking ahead, the business model pioneers in the video streaming space will be those that have commerce as part of their core or could get there quickly: Amazon and Google. Each has the payments and commerce infrastructure needed to make the brands inside of the shows on those platforms shoppable in the moment, creating new revenue streams for streaming platforms, show stars, and that brands that want those impulse buys. Amazon has more than a running head start, since it has payments, commerce and video inside the same ecosystem and can turn on that commerce tap at scale. Its move into sports programming creates a whole new set of contextual commerce possibilities, too.

Google has the pieces, but hasn't integrated them yet. Its streaming commerce playbook has almost certainly already been written and is very likely being tested.

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Then there's Apple, which can bundle its steaming services into a membership offer, like Amazon does with Prime, but lacks a commerce engine to deliver an embedded commerce experience.

So, where does that leave Netflix?

Their short, short-term opportunity is to do the basic blocking and tackling of any other content platform: more and better content, with ratings and relevant recommendations. And a big rethink of the sharing password surcharge, particularly in light of the increase in monthly subscription fee which is rubbing many of its loyal subscribers the wrong way. Netflix also seems focused on building out its gaming platform and creating content/gaming mashups that appear promising.

But to remain relevant three years from now, the reframing of the conversation at HQ must really walk the No Rules Rules talk. The real competition isn't Disney+ or Hulu — and an ad-supported model will do little more than bring it to parity with its core streaming competitors. That me-too approach doesn't seem to be in keeping with the No Rules Rule playbook.

The real competition is Amazon and Google, or any player that can and will commerce-enable the attention of its users. Or a new entrant who will figure out how to monetize attention without reverting to the same model that newspapers here in Boston used four centuries ago to monetize theirs.

Or Netflix, which could use April 20, 2022 as the day it staged its next Blockbuster pivot.

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JUNE 13, 2022

IS APPLE PAY LATER REALLY A THREAT TO AFFIRM AND OTHER BNPL PROVIDERS?

Apple's Project Breakout finally broke out a week ago today at Apple's WWDC. It was then that Apple confirmed what was probably one of the worst kept secrets in payments: it would enter the buy now, pay later (BNPL) space with its own product, Apple Pay Later.

It didn't take long for the media to spin into a Pay Later frenzy, with headlines suggesting that the FinTechs in the space — namely Affirm, Afterpay and Klarna — are more or less toast, that Pay Later is (Afterpay owner) Block's and Affirm's biggest nightmare.

Somehow even Amazon got clumped into the category of biggest losers as a result of Pay Later. So did PayPal, which of course has had its own BNPL product since the acquisition of BillMeLater in October 2008. Its stock dropped nearly 10% last week.

I'm not sure that any of them have much to worry about from this latest entry into the BNPL space.

In fact, the so-called 'nightmare' may end up being Apple's.

THE PAY LATER PARTICULARS

Apple, with Pay Later, has the distinction of being about the 80th such player, globally, to vie for a piece of the very hot Buy Now, Pay Later space, not counting what the card networks and FinTechs are doing to activate issuer BNPL options at the online and physical POS.

I'm not exaggerating about being the 80th new entrant — this time last year we were at 67 and counting. Even with consolidation, the number of BNPL schemes globally has skyrocketed over the last two years, including a number of EU BNPL FinTechs that have moved recently into the U.S. market. Add to that the many use-case-specific schemes — for healthcare, travel, home repair, even veterinary services — and installment payments has become the hottest thing in payments since cash-back rewards.

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Pay Later will be broadly available to iPhone users in September as an automatic part of the iOS 16 upgrade, accessible to those who satisfy its underwriting requirements and want to use it and Apple Pay to make purchases online or in-app.

Like many FinTech BNPL offerings, Pay Later loans will have a $1000 cap to start, payable in four zero-interest installment payments over six weeks. Goldman Sachs is enabling the issuance of the virtual cards used to pay the merchants which will ride Mastercard's debit rails. Loan repayment is in the form of automatic withdrawals from a Pay Later accountholder's checking account via their registered debit card credentials.

Apple plans to lend from its own balance sheet through a separate company, Apple Financial Services. It has a pretty healthy balance sheet from which to lend, which makes the economics of its BNPL proposition attractive, at least in theory. Reportedly at $73 billion last quarter, one could say that its Pay Later "credit facility" is more than 1.5 times the market cap of Block (which owns Afterpay) and 15 times that of Affirm.

Underwriting those Pay Later loans will leverage all of the Apple ID datapoints Apple has amassed from most iPhone users and has access to — analytics related to the behaviors of the billion or so Apple ID users, including their registered payments credentials.

Hold that thought.

The acquisition of U.K.'s Credit Kudos in March of 2022 will also give Apple's risk teams access to bank data on customer payments flows to further assess creditworthiness in real time. Pay Later loan amounts will be based on Apple's assessment of the borrower's credit risk.

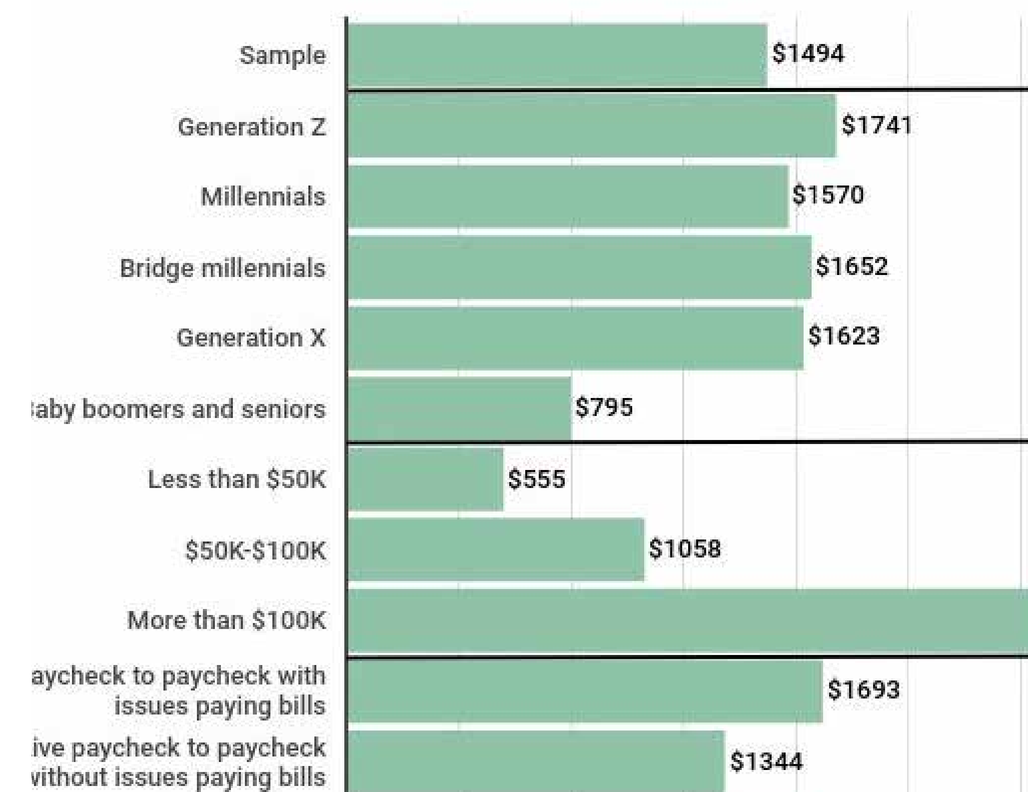
Apple may have a big cash cushion to lend from — but my guess is that it's probably not enthusiastic about losing a pile of money to the Pay Later experiment, so it will likely proceed with caution. It's where the decision to go it alone could get a little tricky, especially as the market for credit tightens and consumers feel the inflationary pinch even more — and turn to credit to alleviate those pressure points.

We already see that happening.

The number of credit card revolvers is reportedly back to 2019 levels as consumers spend down their savings and put more of their expenses on cards than they are able to repay with their monthly cash flow.

Of particular concern to Apple might be Pay Later's $1000 spending cap — it could turn off iPhone users who are generally a good credit risk and might be willing to give Apple Pay Later a try. It could also attract those who might not be on such solid financial footing, and for which Apple has little experience underwriting.

Average BNPL purchase ticket, by demographics



Source: PYMNTS.com. Average amount spent in the most recent retail purchase using BNPL, by demographics Location: United States. 1,353 respondents Referenced Timeframe: 2022-05

According to PYMNTS May 2022 BNPL research, roughly 8% of all online BNPL users earn more than $100,000 a year and use installments as a way to manage payments for higher-end purchases that average $2,460.

chart, BNPL

Nearly 16% of online Apple Pay users earn more than $100,000 a year — the initial Pay Later proposition isn't relevant for their high-end purchases.

The BNPL users who fall within the current Pay Later lending limits and who have also used Apple Pay online fall into a different camp. They are largely lower income (earning less than $50,000) Gen Zs and middle- to upper-middle-income millennials ($50,000 to $100,000 a year) who also say they live paycheck to paycheck. Their online retail BNPL purchases average $555 and $1,064, respectively.

THE PAY LATER POINT-OF-SALE PIVOT

At launch, Apple Pay Later is unavailable for use at the physical point of sale, where most retail purchases are still made. This is probably for two good reasons.

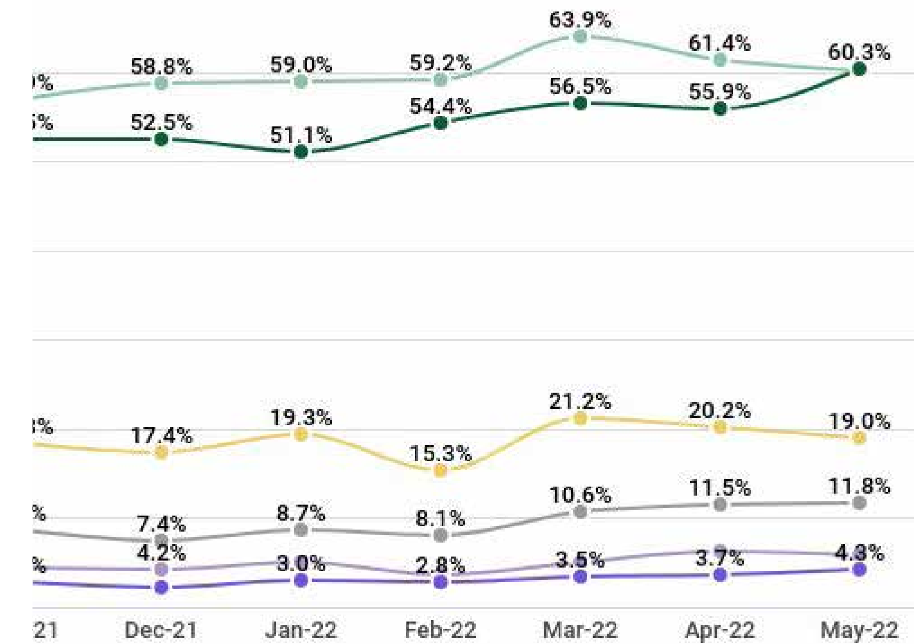
The first is that Apple Pay, overall, has been a real bust in-store.

Pay Later's September 2022 launch date coincides with the eighth anniversary of the launch of the "groundbreaking" payment alternative to plastic cards Apple execs said Apple Pay would become in-store.

PYMNTS has been tracking Apple Pay adoption and usage in store consistently and methodically since it launched in 2014. Nearly eight years later, the best thing anyone can say is that Apple Pay's growth in-store is stagnant.

Ninety-four percent of Apple Pay users who could use Apple Pay to make a purchase — meaning they have an iPhone and are in a store that accepts it — don't.

According to PYMNTS' May 2022 Consumer Digital Payments Study, 37 times more consumers used debit cards, 29 times more consumers used credit cards and about twice as many consumers used PayPal instead of Apple Pay **to make a retail purchase in the store in the last 30 days.**



Source: PYMNTS.com. Share of consumers citing to have used select payment method for in-store purchases on the last 30 days Location: United States. 2,200 respondents monthly Referenced Timeframe: 2021-11 to 2022-05

chart, payment methods

Source: PYMNTS.com. Share of consumers citing to have used select payment method for in-store purchases on the last 30 days Location: United States. 2,200 respondents monthly Referenced Timeframe: 2021-11 to 2022-05

The second likely reason is the current kerfuffle over Apple's refusal to open their NFC chip to rivals, in particular PayPal. Activating Pay Later at the point of sale would likely throw gasoline on that regulatory fire, since PayPal's inability to use the NFC chip on iPhones for in-store purchases would now include its own competitive BNPL products.

Giving up in-store for Pay Later isn't really giving up that much, all things considered.

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Apple is placing its Pay Later bets online and in-app, hoping that it will give Apple Pay the spark it was never able to get in-store.

It's not entirely clear that will work.

THE PAY LATER MARKET

To start, Apple Pay's total addressable market is the 51% of U.S. consumers with iPhones who use them to make retail purchases online and in-app. That then gets divided by the fraction of sites that accept Apple Pay for payment and the fraction of iPhone users who use (or want to use) Apple Pay to checkout.

That makes Pay Later's addressable market **the credit-worthy fraction of the fraction** (iPhone users) of **the fraction** (who want to use Apple Pay to make a purchase) **of the fraction** (where Apple Pay is available for iPhone users who want to use Apple Pay) of **consumers eligible to use Pay Later** as a payment option.

Minus the big fraction of consumers who shop at Amazon and Walmart/Sam's Club, where Apple Pay isn't accepted.

According to the latest PYMNTS Amazon/Walmart retail and consumer spending data, Amazon now captures 3.4 percent of all consumer spend in the U.S., and just about half of online sales. Walmart has 2.8 percent of consumer spend.

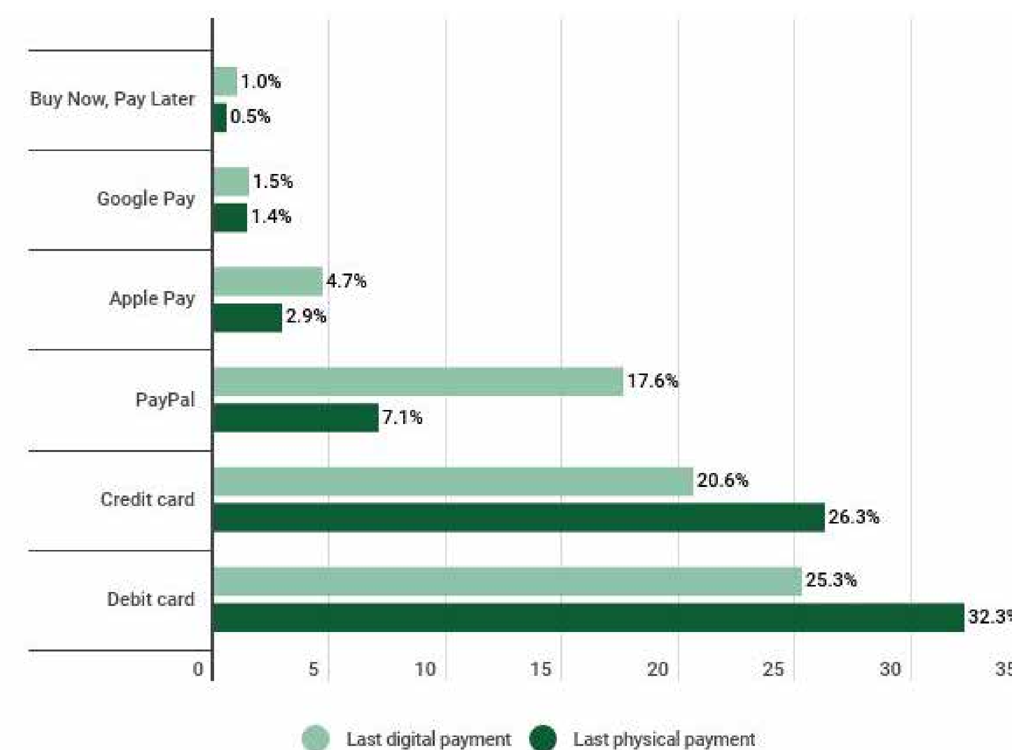
According to PYMNTS' May monthly Digital Payments study, 1.1 percent of consumers used Apple Pay to make their **last online retail** purchase, compared to 26.8% who used debit cards, 42.8% who used credit cards, and 12.2% who used PayPal. According to PYMNTS data, more consumers used BNPL options (1.9%) than Apple Pay to make an online retail purchase in May.

chart, payments

See the study: 19M More Consumers Went Online to Bank, Buy and Pay Bills in May 2022

Then there's the in-app opportunity.

Share of transactions, by payment method



Source: PYMNTS.com.
Share of consumers citing to have used select payment method in their last purchase
Location: United States. 2,659 respondents
Referenced Timeframe: 2022-05

Similarweb ranks Shein, Amazon and Walmart as the three most downloaded shopping apps. Only Shein enables Apple Pay — in addition to PayPal, Klarna, Afterpay and Zip, and not in that order on the checkout page.

Both Amazon and Walmart enable BNPL through their partnerships with Affirm, Amazon exclusively with Affirm. Walmart enables PayPal online and in-app (and with it Pay in 4). Amazon is currently working with PayPal to enable Venmo cards as a registered credential in the Amazon Pay wallet.

That's a pretty big chunk of the online and in-app retail market for which Pay Later isn't even an option.

In other words, Apple Pay Later can't be used at any

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of the physical places where people can now use other BNPL alternatives, and it can't be used at a big swath of of the online and in-app places that drive retail spend **and** where people can now use other BNPL alternatives. Where it can be used, it may be one of many installment payment choices, and those other choices may be more familiar to customers who have encountered and used them at most of the other places they shop.

This begs the obvious question: Why would someone who likes using BNPL opt to use Apple Pay Later rather than one of the BNPL options that has wider acceptance and they've probably already tried and used?

That makes Apple's current challenge quite similar to what it faced in-store eight years ago: convince iPhone users, who don't use Apple Pay very much today, that Pay Later is a better alternative than what they're using now at the places that accept Apple Pay today.

That may not be easy.

A not-yet-released PYMNTS study conducted in May 2022 of 1353 U.S. BNPL users finds that 79% of current BNPL consumers plan to continue using a BNPL option for retail purchases in the next 90 days, and 40% of them say they will plan their shopping around their ability to use BNPL to pay.

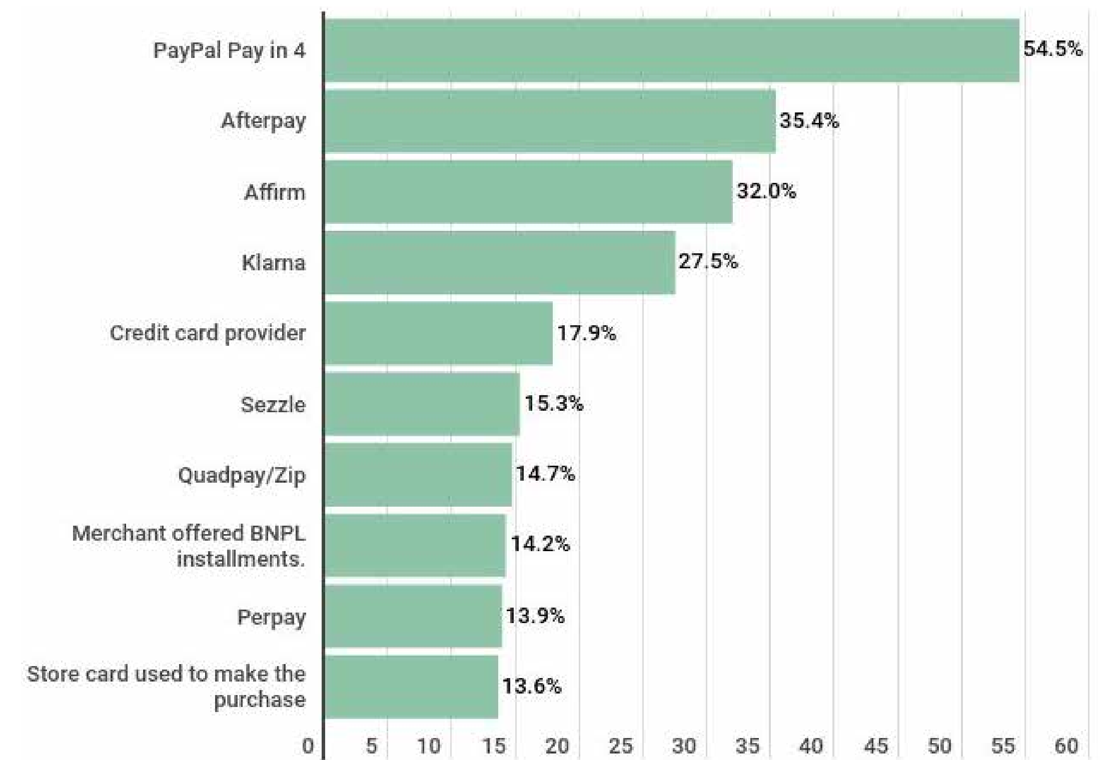
According to this same study, PayPal (at 55%), Afterpay (at 35%), Affirm (at 32%) and Klarna (at 28%) and bank-issued credit cards (at 18%) were the providers cited by BNPL users as those they use to make online retail purchases.

chart, payment methods

Could Apple, with Pay Later, find its edge in-app, a channel that is increasing in importance and usage? In May of 2022, PYMNTS finds that almost as many consumers made their last retail purchase using websites (15.4%) as in-app (14.7%)

Apple ID is the credential used by iPhone users to access all of Apple's services, including the apps in its App Store. My experience is that the apps that

Most popular BNPL providers for online purchases



Source: PYMNTS.com.
Share of BNPL users citing to have used select providers to make a BNPL purchase in the last 3 months
Location: United States. 624 respondents
Referenced Timeframe: 2022-05

use Apple ID facial scan to open present two checkout options: Apple Pay and the generic checkout button. As more apps enable that option for the convenience of the consumer, it could create more of an in-your-face incentive for in-app users to give it a try.

That could also raise a few eyebrows.

Which brings me to the Pay Later Pandora's box that Apple may have just opened.

THE BIG QUESTIONS

The Pay Later announcement, at best, suggests it's little more than an experiment for Apple to dip its toe in the very popular BNPL waters.

As it does, it could alienate all of the issuers whose cards are

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provisioned in their wallet today — who never really liked having to pay the Apple Pay tax in the first place — all of whom have their own BNPL plans.

It will also do little to endear themselves to the FinTechs, including Afterpay and Affirm, whose virtual cards are and can be added to the Apple Pay wallet for payment online, in-app and in-store.

Diving into BNPL also means getting access to the invitation-only CFPB's BNPL club as they aggressively dig into the area. It will be interesting to see their reaction to Apple Pay's BNPL entrance, especially given that it's Big Tech's first foray into the consumer lending space.

Related: CFPB's New Rules for BNPL Could Come by Year's End

This is the same CFPB that is also concerned about how Big Tech uses consumer data. It's possible they will have more questions about how Pay Later will use the Apple ID data to provide services to Apple Pay users

Another question is whether the same Big Tech "self-preferencing" prohibitions in the EU, which are also present in Sen. Klobuchar's proposed antitrust legislation, could extend to financial services products, including Pay Later. Regardless, that could limit how Apple decides to incent iPhone users to try Pay Later, and how Pay Later presents itself inside of the apps in the App Store.

Pay Later is also launching at exactly the point in time that the market is literally eviscerating BNPL FinTechs over concerns that their business models weren't engineered for an economic downturn and high interest rates: a reasonable concern. That's even as BNPL FinTechs have years — some more than a decade — of experience lending to their millions of customers. Apple has the balance sheet to buffer losses and few concerns over whether it can access capital to lend, but it will have to balance its tolerance for risk with the potential to to alienate good customers who can't use the service or are denied loans as

it gets its credit risk sea legs under them.

THE LAST WORD

I wrote in April that Apple's Project Breakout likely launched many Project Breakouts across the payments and consumer lending landscape. It's probably not a coincidence that we've seen the pace of issuer-centric BNPL innovations accelerate over the last several months.

See also: The One Big Thing Apple's Project Breakout Needs but Doesn't Have

Apple may believe that Pay Later could ignite Apple Pay — the same way that it appeared to believe that a slick iPhone app was enough to ignite Apple Pay in 2014 at the point of sale.

Then as now, it's facing the same headwinds that even Apple can't control: A red ocean of other installment payment alternatives that people can use in lots of places and no compelling reason why people should use a new one that they can't.

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JUNE 27, 2022

WHY 2022'S TECH WRECK DOESN'T HAVE TO MEAN A DOTCOM CRASH LANDING

Spanish-born, Harvard educated professor and philosopher George Santayana was a prolific writer, known best for his many aphorisms. Perhaps one of his best-known soundbites is also one of his most frequently misquoted.

"Those who cannot remember the past are condemned to repeat it," wrote Santayana in 1905 as part of his five-volume Life of Reason essay series.

It is fitting as we watch tech and FinTech stock market values plummet, capital dry up and a spate of full-on startup austerity programs rev up, the likes of which we haven't seen in more than two decades.

I'm not the first person to write about the obvious comparison of the 2000 dot com crash to the great "Tech Wreck" of 2022.

But I am among the first to offer an analytical framework for explaining why so many startups — new and existing — might have more reasons to be optimistic than pessimistic about their futures.

THE PAST IS REALLY PROLOGUE

The year is 1996.

Fed Chair Alan Greenspan, in a speech to the American Enterprise Institute on December 5 that year, coined the term irrational exuberance. He used it to describe the economic risk of stock market valuations being so vastly distorted from business fundamentals. He posited that a market correction brought about by macroeconomic changes would force that alignment — and be sharp, severe and potentially long in duration.

At the time, it seemed like the usual gloom and doom from the Chief Dismal Scientist at the Fed.

After all, the U.S. startup scene was robust and booming on the back of the opportunity to commercialize the internet. The notion of entrepreneurship and starting a business was going gangbusters, and VCs had gobs of cash — thanks to low levels of inflation and easy access to cheap capital — to fund those aspirations. About any startup with a catchy name and a pitch about the internet got cash.

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Ninety percent of those dollars went to chase eyeballs, to grow share. Making money would, in theory, take care of itself down the road. A profitable company was considered a sign that a startup wasn't doing enough to grow fast — a risk that entrepreneurs also chasing the high multiples of an internet company didn't want to take.

Sound familiar?

Between 1998 and 1999 457 internet startups went public.

In 1999, Morgan Stanley's Mary Meeker revealed in her much anticipated internet annual report that the collective value of those internet stocks was $450 billion; their collective sales were $21 billion and their collective losses totaled $6.2 billion.

A year later, in March of 2020, Greenspan's irrational exuberance chickens would come home to roost.

Between March of 2000 and October of 2002, the Nasdaq Composite stock index lost 78% of its value, and investors reportedly lost, on paper, some $5 trillion dollars. Half of the firms born in the dotcom era more or less immediately went up in flames. The rest had to refocus, shrink, figure out how to make money. Most never did and withered away or were bought for chump change by larger rivals.

Among those that survived the crash and the many economic cycles since are familiar names — Amazon, eBay/PayPal (remember, eBay acquired PayPal in 2002), Google, Microsoft, Qualcomm, Open Table and Priceline (both of which are now part of Bookings.com).

In 2001, only 76 startups went public.

Falling for the trap of "customers at any cost and profits at some date TBD" is what hobbled the startups that didn't make it — or couldn't get enough capital later to keep the lights on.

Another fatal error was building businesses on top of infrastructure that was nascent and unproven for both businesses and the consumers they were hoping to acquire as customers — as unproven as the business models in their pitch decks and IPO prospectuses.

(BTW, for a really interesting account of the dotcom crash and the evolution of Silicon Valley, I'd recommend Piero Scariffi's The History of Silicon Valley.)

INFRASTRUCTURE'S BRICK WALL

What's so wrong with ordering pet food online?

Absolutely nothing, if you ask Chewy executives, investors and customers today. Its 20 million customers order pet food, treats, pet meds and toys online and connect with a vet when needed using Chewy's digital channels. The online brand that sold to PetSmart in 2017 for $3.35 billion saw its sales increase from $2.1 billion in 2017 to $3.5 billion in 2018, spun out and went public in 2019. Today, analysts say that its stock is undervalued.

Absolutely everything, if you asked Pets.com executives in 2000, two years after it first opened its online storefront.

Pets.com cratered that year — not because ordering pet food online and shipping it to people's houses was a bad idea, but because the infrastructure needed to support online ordering didn't exist at scale for consumers.

In 1998, only 9 percent of U.S. households had internet access at home. Those who did could access online content at the blistering speed of 800kbps.

The logistics infrastructure necessary to deliver the product efficiently and cost effectively for the business didn't exist at scale either.

Distribution inefficiencies at the first and last mile meant consumers had to wait too long to get Fido's dog food and pet treats. Consumers found it cheaper, faster and easier to buy food and supplies for their pets by driving to their local pet store.

It's a similar story for Webvan and its online grocery ambitions in 2001.

Webvan was founded in 1996 by Louis Borders with ambitions to be the largest online grocery delivery operation in the U.S. Three years later when Webvan made its first delivery to consumers living in San Francisco it had raised roughly $400

million from investors to build out warehouses, buy trucks and fine-tune its intelligent ordering technology.

See my interview with Louis Borders: Brands and Mass Market Retailers Are in a '100 Year War' That Could Unseat the Reigning Titans

It was big news in 1999 when George Shaheen left his $4-million-a-year post as CEO of Anderson Consulting to become the CEO of Webvan and take it public. In November that year Webvan's IPO was priced at $15/share, valuing it at $4.8 billion. That year, Webvan reported sales of $395,000 (and no, that is not a typo) and losses of $50 million, according to SEC filings. At the close of business its first day of trading, Webvan was valued at more than $7 billion.

Two years later, Webvan would shut down. Between 1999 and 2002, it would lose $800 million of investor capital. Many blamed Webvan's crash and burn on a lack of supermarket experience by the executive team, a bad business model (being a grocery store with too many fixed capital costs) and rapid expansion into new product categories and new markets chasing market share.

But like Pets.com, Webvan's consumers lacked access to critical internet infrastructure at home that would deliver demand, at the same time that the company was shackled by a distribution, product strategy and infrastructure too costly to build and support.

Fast forward a few years to 2012 and the launch of Instacart, which innovated online grocery ordering using the grocery stores as their customers. The Instacart model matches grocery stores with consumers who want to shop them, including those consumers who shop at stores online that are too inconvenient to drive to in the physical world. The grocery store gets the sale, the consumer gets the convenience and Instacart leverages its investments in payments, commerce and logistics to build share.

With the benefit of 2020 hindsight, one of the things that Pets.com and Webvan could have used was the gig economy model to solve their last mile problem. But even if they had been smart enough to invent the idea of drivers with spare time to create a dense network of local delivery people, the technology wasn't there either. That model required drivers with smartphones and a fast internet connection and GPS tracking. In 1998 mobile phones weren't smart or connected to the internet.

THE LESSONS OF THE STARTUP CLASS OF 2008-2010

Fast forward a few years to 2007, 2008, 2009 and 2010.

In the midst of a challenging economic environment called the Great Recession, a whole new crop of startups emerged. Each saw the opportunity to leverage mobile, data and the cloud to build new businesses and business models on top of new technology introduced right around that same time.

The launch of the iPhone and the iOS operating system in 2007, and its App Store in 2008 — and Google with the Android operating system and its Play Store in 2009 — set in motion a wave of innovation that would make phones smart by connecting them to the internet. For the first time, apps began to blur the lines between the physical and digital worlds.

It would take about two years, until about 2010, for enough consumers with smartphones to reach critical mass and ignite as more app developers built more apps for the many more consumers who bought and used those phones to access the internet.

Startups like Braintree (2007) and Stripe (2010) created the infrastructure necessary for app developers to easily build mobile apps and process payments.

Square's innovation in 2009 and iZettle' s innovation in 2010 weren't as much the dongles and devices that turned smartphones into POS terminals as the business models that upended traditional merchant acquiring models and allowed taxi drivers and independent businesses to accept card payments.

Uber's innovation in 2009 was as much about the magic of ordering a car service and

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making payments invisible via their app at the end of the ride as it was mastering the logistics and payments infrastructure necessary to power (and later leverage) a gig network at scale.

Airbnb, in 2008, innovated in much the same way for homeowners eager to monetize that spare bedroom in their house and to launch the concept of the sharing economy at scale.

Other businesses would see the opportunity to innovate at the intersection of online commerce, payments and logistics in an effort to make the mobile experience better for the consumer — and to make the unit economics of distribution for the sales made from that experience more sustainable for the businesses delivering it. This remains one of the most promising opportunities for entrepreneurs today.

THE 2022 WAKE UP CALL

It's easy to see why so many believe the so-called 2022 Tech Wreck bears more than a passing resemblance to the dotcom crash of twenty-two years ago.

Like then, over the last couple of years, too much capital chased too many startups into areas where the barriers to entry were very low and the great race to capture eyeballs drove the cost of customer acquisition to unsustainable levels for everyone — including established businesses competing for eyeballs against well-funded startups.

Like then, business models are shaky, and sustainable only as long as VC checkbooks plow money into their bank accounts to build share — and until recently, with very little pressure to find a path to profitability in a timeframe relevant for investors.

Like then, startups with pitches about "the next big thing" of web3, crypto, NFTs and the metaverse got the dollars and the hype. And just like then, the challenge facing this crop of innovators is building all sides of a platform from scratch — the regulatory compliance and emerging technology and payments infrastructure, the use cases, the business model, the consumer and business base, and the value proposition

to capture the critical mass needed to ignite and scale their businesses at a profit. That takes time, and most platform businesses fail to ignite in a timeframe that is relevant for the business or their stakeholders.

Like then, VCs are tightening their purse strings and shifting focus to profits and away from growth at all costs, abruptly leaving founders and CEOs figuring out how to do more with less. They aren't the only ones.

CIOs are said now to prioritize projects with proven business cases, according to an article published in the June 26 issue of the Wall Street Journal. The article suggests that proof-of-concept projects will be backburned in favor of those with a more immediate here-and-now return.

That sounds like nothing but bad news for the many startups hoping to get distribution and traction from the companies who once took their calls and were willing to throw a few bucks their way to play around with emerging tech that doesn't have a recognizable path to profit and scale for their business. That could dampen their enthusiasm for spending time, money and resources on projects related to web3, metaverse, crypto and even the blockchain — the science experiments many traditional companies have been keeping an eye on — which might soon find their way to the chopping block.

2022'S GREEN SHOOTS

It's not all doom and gloom. From an innovators' perspective, 2022 may have much more in common with the 2008 Great Financial Crisis than the crash and burn days of 2000.

That's because unlike the dotcom era startups, today's companies can and have leveraged existing technologies that work and are improving rapidly to bring great ideas to life. Their investments in building on top of that tech will help companies solve the important problems facing them over the next few years as the macro-economic headwinds create uncertainty for their business and their customers.

For most businesses, that means doubling down on the investments made over the last several years in the digital economy.

Today, according to PYMNTS' research involving more than 15,000 consumers in 11 countries, only 27 percent of consumers' day-to-day transactions are powered by or enhanced with an internet connection — even though it's inevitable that every encounter that a consumer has in the physical world will, in some way, be enabled by software and a device which connects to the internet. There's a lot of work just to get more people online doing something — and to make the experiences online better by embedding payments into those flows and interactions seamlessly across channels.

Read the research: New 11-Country Study Shows Digital Transformation Has Reached Only 27% of Full Potential

Businesses will recognize that bringing the digital and physical worlds together doesn't require abandoning the physical world and living in the metaverse.

That integration of the digital and physical is happening today as innovators make it possible for doctors to use robotics and connected devices and 5G to perform telesurgeries thousands of miles away. The diffusion of 5G will spawn even more use cases across many industrial sectors.

For startups, this means assessing how their business solves a problem that businesses or consumers face now — or could.

THE GLASS HALF FULL

Like 2000, many startups with undifferentiated products or services and shaky business models will fail. The curse of cheap capital is often the formation of many "me too" businesses that compete for customers with lavish incentives but don't create a better alternative that keeps them sticky. We will see the thinning of that herd accelerate.

There are still many reasons to remain optimistic. 2022 and 2000 are different, and for two big reasons that should give any innovator cause for optimism.

(And who doesn't need a dose of that these days?)

With a very few exceptions, in 2000, the business frameworks for measuring success (based on grabbing share) were ill-designed and badly thought-through.

In 2022, the platform business model, ignition strategies and optimal pricing are well-developed and backed by empirical evidence. They are the foundation for the FIT framework that analytically measures the impact of friction, time and inertia on any new market opportunity.

See also: Using FIT Framework to Drive Success in a Digital 3.0 World

In 2000, there was a mismatch between the good ideas that entrepreneurs had and the technology, infrastructure and readiness to support the ideas, along with the assumptions about how quickly those ideas would get traction.

In 2022, there's an enormous array of real-world problems that entrepreneurs are, or could, tackle with technology that exists and is improving rapidly — along with all of the new opportunities to add value to existing digital experiences.

And of course, in 2000, there was no PYMNTS, and none of my advice. :)

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JULY 5, 2022

AMAZON'S FIGHT FOR A SEAT AT THE DINNER TABLE

Turns out that not many people order burgers at a restaurant that sells pasta and pizza, even though they're a menu option. But many did from MrBeast Burger, a delivery-only brand that debuted in December of 2020, made by chefs in an Italian restaurant.

Named after YouTube personality MrBeast, Virtual Dining Concepts licensed the MrBeast Burger recipe to Bertucci's (and others) as a virtual brand for delivery only. That gave them the chance to recoup dollars lost to COVID shutdowns by monetizing idle chef and kitchen capacity with another product. After less than two years, MrBeast Burger is now available in 1000 restaurant locations, with annual revenues that some have estimated at $32 million. Licensees are said to average $500 in profit a day.

Pasqually's Pizza & Wings launched as a new delivery-only premium pizza brand on Grubhub in May of 2020. Consumers looking for variety in the midst of the COVID-

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lockdowns were enticed by its mouth-watering pictures of pizza, spicy wings and garlic bread and gave it a go. It wouldn't take long before consumers discovered that Pasqually's was a virtual brand created by Chuck E. Cheese and named after a musician in the Munch Make Believe Band. Chuck E. Cheese chefs prepared pizza and wings in their kitchens using the same sauces and ingredients in foods served in the restaurant. Like Bertucci's, CEC was able to monetize the idle capacity of their chefs and kitchens during the dark days of COVID. Today, Pasqually's is available for delivery from more than 400 Chuck E. Cheese locations in the U.S.

There's another player hiding in plain sight in the restaurant space — a platform operating successfully in the food and food services segment with capabilities that can be leveraged at scale.

Amazon — with Whole Foods, Amazon Fresh, high-spending Prime Members, embedded one-click payments, last-mile logistics capabilities and a fast-growing prepared foods business that uses its own kitchens — is hiding in plain sight, capable of disrupting how and where consumers find, buy, pay for, and eat their food.

And like every other sector in which Amazon has leveraged its platform assets to enter, it could trigger the reinvention of the grocery and restaurant sectors when it does.

PLATFORMS HIDING IN PLAIN SIGHT

The idea of hiding in plain sight can be traced back to the mid-18th century and the use of camouflage to keep soldiers from being less conspicuous in battle. The French are credited with further commercializing camouflage and the art of military deception in 1915 by giving soldiers uniforms that blended into the scenery of the battlefields. Today, advances in technology offer military strategists new ways to use the element of surprise to their advantage.

The perfect storm of the pandemic, technology and connected devices over the last two years gave many businesses hiding in plain sight a way to disrupt traditional businesses that never saw them coming.

Zoom and Microsoft Teams have disrupted business travel as well as the commercial real estate sector as more businesses now want to reduce or eliminate their office footprints. At the same time that COVID gave employers an opportunity to experience a productive and connected remote workforce in action, business executives and their CFOs were given a cost-effective substitute to hopping on a plane or paying for more office space than they needed.

Ironically, perhaps, the same video conferencing technology that made nary a dent in business travel or office space in the 1980s and 1990s is now cloud-based and accessible to anyone using any connected device — and it's making a huge dent in their respective universes.

The U.S. Travel Association predicts that it will take until 2024 for business travel to reset to 76% of its 2019 levels; some believe that 2019 was the business travel high-water mark. The National Association of Realtors reports that with 110 million square feet of unoccupied commercial office space in mid-2022, it will take at least 11 quarters for that space to become fully occupied. The current economic headwinds, and ongoing improvements in workforce productivity technology, will further pressure the outlook for both.

Hiding in plain sight is also a strategy that successful

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platforms use as they expand their reach and create new opportunities to monetize their assets and capabilities.

Uber founder Travis Kalanick described Uber's mission in 2009 as making it possible for goods and services to be ordered and delivered from the touch of a single button, emphasizing the value of Uber's drivers to execute that vision. More than going head-to-head with the taxi industry, Uber's innovation was creating a logistics platform capable of organizing the idle capacity of black car drivers and giving birth to the gig economy as we know it today. The platform was hiding in plain sight, capable of scaling Uber's business well beyond its core.

At launch, Uber's first use case was ride-hailing; then came food delivery in 2014 with Uber Eats using the same supply of drivers. Uber's riders are now customers of that aggregator service that has expanded to include ordering sundries at convenience stores and items at selected retailers. With Uber Explore, those ordering options now include booking tickets to events and reservations at dining establishments as part of providing an integrated travel experience for its users — and more revenue opportunities for its drivers.

NOT AMAZON'S FIRST RESTAURANT RODEO

Amazon launched Amazon Restaurants in Seattle in 2015. It shut it down in June of 2019.

In its heyday, Amazon Restaurants operated in 20 US cities and London. In Baltimore, consumers were offered 59 different restaurants to order from and promised a one-hour delivery window [one hour!], but not a full option of menu choices from those establishments. It was a friction-filled experience for a platform that had built its reputation on choice, eliminating friction when ordering online and fast and reliable delivery.

Competition from food aggregators and the logistical challenges of entering an entirely new on-demand, same-hour delivery business

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are said to have hastened Amazon Restaurants' demise. A contributing factor was also said to be the effort on the part of the Amazon management team to fully integrate its 2017 Whole Foods acquisition into the business.

AMAZON'S FOOD CORNERSTONE

Buying Whole Foods in 2017 gave Amazon access to more than 460 physical stores, and a way to diversify the selection of foods purchased from this organic grocery purveyor. Consumers who wanted to buy organic milk at Whole Foods but dunk the Oreo cookies they bought from Amazon Subscribe & Save could have the best of both organic and CPG-branded products within a single platform — and delivered to their doorstep if desired. PYMNTS research shows that 8% of U.S. consumers order products using Amazon's subscription service, which is the largest retail subscription service in the US.

Buying Whole Foods also gave Amazon the chance to make Prime Member benefits cross-channel. Prime Members got discounts on selected items when shopping at Whole Foods. Over time, Prime shoppers could use their Amazon credentials to pay at checkout in certain locations. Amazon says it will be in more locations this year. Amazon Prime Day this year will feature 20% off groceries purchased at Amazon Fresh, which promises a two-hour delivery. Even Amazon Prime critics expect a robust turnout as consumers use Prime Days to stock up on grocery items that are on sale.

In addition to its curated selection of organic brands and locally-sourced products, the Whole Foods prepared foods section quickly became one of the brand's most popular consumer draws, particularly for millennials. A 2019 study conducted by Whole Foods found that millennials would (and did) pay extra for responsibly-sourced foods, and more than half spent more on

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food that year than they did on travel. Whole Foods' prepared foods section provided a healthy and convenient alternative to fast food options, even though paying for it contributed to its "Whole Paycheck" moniker. And just like those fast-food alternatives, Whole Foods added an order ahead for takeout option to the app so that customers could avoid waiting in long lines at the store to place an order.

GROCERY STORES AND RESTAURANTS HAVE GOTTEN THE MEMO

Whole Foods isn't the only grocery store to have grabbed onto the idea of grocery store as one-stop shop for all things food, including prepared foods. Kroger bought HomeChef in 2018 for $200 million and, in October of 2021, reported that the prepared food brand had surpassed $1 billion in annual sales as consumers sought a more cost-effective option to ordering food from aggregators. Kroger has also entered into two ghost kitchen partnerships, the

first of which launched in LA in January of this year. Analysts report that adding HomeChef and their ghost kitchen partnerships has taken foot traffic from both fast food and grocery competitors.

In September of 2021,Walmart reinvented the idea of the mall food court by bringing nearly 30 popular fast-food brands under one Walmart roof in selected stores in the U.S. Walmart's captive food court is the latest tactic used to keep consumers loyal to the category that accounts for 54% of its sales.

Inspired by its success in its Canadian stores with Ghost Kitchens, Walmart U.S. provides space to the Ghost Kitchens team, which provides the setup

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and a small team of chefs to prepare food according to recipes licensed from the fast food operators. Walmart customers are able to order ahead for pickup to go as they shop the store.

This food scope creep isn't lost on restaurants, the early innovators of putting idle capacity to use with virtual brands and ghost kitchens. Although most restaurants have increased menu prices recently by an average of 20% to boost revenues, their costs have risen by an average of 30%, denting profits. Many restaurant operators have beefed up their loyalty programs and added subscription offerings in an effort to retain consumer spending. At the same time, they've explored ways to reduce costs by outsourcing logistics to the consumer using incentives to pick up rather than deliver.

Grubhub claims that 41% of independent restaurants operate virtual brands, and there are a growing number of ResTech players that simplify the process for restaurants. Fourth-generation restauranteur and Nextbite CEO Alex Canter explains that local restaurants can create menus around delivery-friendly crowd pleasers to open new revenue streams for restaurants that may have one or two key signature dishes and the capacity to make and deliver them. Nextbite is also creating unique product bundles like the Cody Ko Dessert Club, which gives local operators the recipes and branding needed to provide those selections.

THE WHOLE FOODS – AND FOOD – OPPORTUNITY

Whole Foods operates more than 483 stores in urban and suburban locations where the population demographics skew towards those who value the health benefits of organic foods and are willing to spend more to get them. Just like every other grocery store, its suburban locations are strategically placed within a 15 minute drive for most living in the surrounding areas.

Many of its suburban locations have coffee bars and other restaurant-like amenities. The Whole Foods Bryant Park store in New York has a couple of restaurants, a coffee shop and a separate dining place to eat prepared foods for lunch or dinner. Its physical footprint is designed to offer utility beyond a place to buy groceries.

Today, industry research shows the sales of prepared foods on the rise as busy consumers opt for convenience and eating at home without having to cook a meal from scratch. It also appears that the ripple effect of increases in restaurant food prices is not only causing consumers to trade down their choice of restaurant, but to swap restaurants entirely for eating prepared meals bought at the grocery store at home. Obviously the severity of the macro headwinds of inflation could impact all of the above.

Like every other platform today, Amazon and Whole Foods seek ways to monetize idle capacity and maximize profits. For Whole Foods, that's using the popularity of its prepared foods business, its kitchens and chefs to launch virtual brands — or license recipes from others who pass their organic vetting to expand their prepared food options. It also means leveraging third-party online ordering infrastructure and/or their last mile logistics to get products delivered to the homes of the customers living 15 minutes away — or incenting consumers to pick up their orders curbside. Amazon Lockers at Whole Foods give consumers a reason to stop by — and an incentive to stay for lunch or dinner or a coffee gets consumers inside the store to buy other things. All these purchase opportunities are eventually linked to their Amazon accounts, and a simple way to pay.

Amazon and Whole Foods won't replace restaurants — but they could put a dent in traditional fast-food sales, and the takeout or delivery business of independent restaurants and the sales they represent for

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aggregators and operators. It could even challenge Starbucks for the position of its "third space" as more people look for great places outside of the house to meet people over a cup of coffee or a quick bite to eat.

Amazon and Whole Foods also represent the connected economy that I have been writing about since 2019 in action.

One of the most dynamic and lucrative ecosystems is that which integrates how consumers find, pay for and eat their food. The bright lines that once separated grocery and restaurant are blurring rapidly as grocery stores offer prepared foods and restaurants perfect delivery and expand takeout. Amazon and Whole Foods have the potential to erase those lines completely as consumers simply think about eating — and use their "eat" platform to find many different options for how to do that.

Hiding in plain sight all the time.

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JULY 6, 2022

AMAZON AND GRUBHUB CREATE NEW GHOST KITCHEN JUGGERNAUT

Timing is everything, as it turns out.

Yesterday, I wrote a piece that posited that one of Amazon's untapped areas of expansion would be to leverage Whole Foods, its prepared foods business and kitchen capacity, its Prime Membership base, its logistics capabilities to create virtual brands that would move them more directly into the "food" category. It seemed to make sense given Amazon's success historically in leveraging its platform assets to disrupt and redefine adjacent sectors. Grocery, the one area in which Amazon lacks critical mass, and restaurants, an experiment that never gained traction, seemed perfect for disruption, and the Amazon way.

Today, with Amazon's announcement of its partnership with Grubhub, the Prime benefit that it will offer and the stake in the business Amazon will get as a result, seems a clear indication to me that this is the direction they intend to pursue.

Grubhub is a distressed asset in need of a second life, and Amazon a platform in need of new ways to capture more of the consumers "share of stomach." As I wrote yesterday, one of the most dynamic and lucrative ecosystems is that which integrates how consumers find, pay for and eat their food. The bright lines that once separated grocery and restaurant are blurring rapidly as grocery stores offer prepared foods and restaurants perfect delivery and expand takeout. Amazon and Whole Foods have the potential to erase those lines completely as consumers simply think about eating — and use their "eat" platform to find many different options for how to do that.

Giving Prime Members free Grubhub membership for a year eliminates one friction to using it for delivery — anytime. We'll see if the launch of virtual brands on the platform, and the interest on the part of Amazon and Whole Foods to expand their ghost kitchen model to complementary brands, gives them enough of an incentive to use it.

The business case for why I thought it made enough sense to write about it yesterday can be found here.

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JULY 25, 2022

WHY RETAILERS SHOULD WORRY ABOUT INFLATION BUT DREAD THE WEALTH EFFECT OR ULTIMATUM?

A new survey of U.S. consumers, hot off the presses at PYMNTS, tells a lot about how they're handling the current economic turmoil and when they think it will end. It's important information for any business or policymaker trying to navigate through the next couple of years.

Let me begin by playing armchair economist to put the findings in perspective before I spill the beans.

Economists have long studied the impact of macroeconomic news on consumer spending, and most agree there is one. Even marginal positive news about unemployment rates can boost consumer spending — with visible, long-lasting effects. Conversely, bad news about unemployment rates has been found to reduce consumer spending by 1.5% — including by consumers who have jobs and are unaffected directly by the news.

In 2022, the economic news impacting all consumers today isn't unemployment rates, which are at historic lows, but the impact of historically high inflation rates — and the continued stock market and housing market volatility — on their real and perceived financial well-being.

Inflation robs all consumers of their purchasing power, unless their wages have kept pace, and influences decisions and tradeoffs about what they'll buy and from whom. The majority of consumers have lost a lot of purchasing power over the last year. Unfortunately, those least equipped to handle it — lower income and paycheck to paycheck consumers — have been hit hardest of all.

But it's the wealth effect that is the more important determinant of whether consumers with money to spend will actually open their digital wallets and spend it.

That's particularly true for high earners — they have probably had the greatest proportion of

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wealth destroyed, in part by the massive drop in stock prices, and they could be hit more if the continued decrease in housing demand sends housing prices south.

Because high earners account for so much of the retail economy, their pull-back in spending could be the most damaging to it.

NOT FEELING THAT FLUSH

Studies show that consumer spending increases 2.8 cents for every dollar of increased stock market wealth.

A March 2006 speech given by then Fed Vice Chair Roger Ferguson reported Fed data showing a 3.5-cent loss in spending power for every dollar of wealth destruction felt by consumers, with half of that spending pull-back felt in the short term.

The downside impact to the economy is more severe when consumers feel shaky about their financial situation than the upside when they are feeling flush. Consumers don't feel comfortable spending money until they have confidence that they can replenish what's been lost. The longer that takes, the more constrained consumers may feel about spending money.

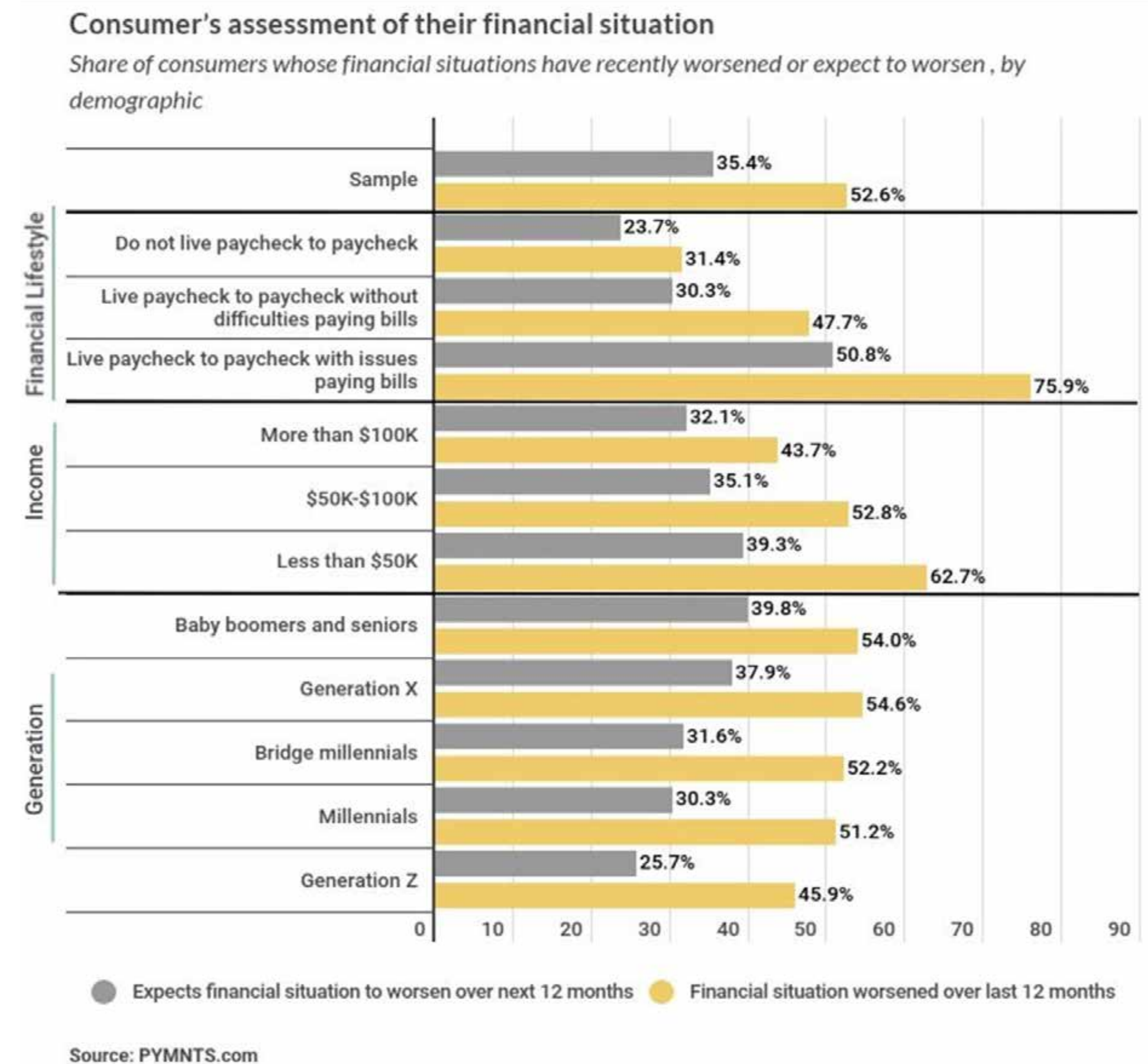
In July of 2022, the majority of U.S. consumers don't feel that flush.

That's despite a collective $33 trillion increase in their household net worth between 2019 and 2021 and the strongest consumer balance sheet in decades.

More than half (53%) of consumers say their financial condition is worse in 2022 than it was in 2021. Nearly a third believe it will deteriorate over the next 12 months.

That's according to a national online study of 3,783 consumers conducted by PYMNTS in July 2022 (July 1-7, July 17-20).

Nearly 8 in 10 of those living paycheck to paycheck with issues paying their bills say they've seen their financial situation worsen over the last year, and half expect it to erode further.



Forty-four (44%) percent of those earning more than $100k report they are worse off today than a year ago. A third of those high earners believe their financial situation will deteriorate in the year to come.

Inflation is part of what's driving that sentiment. Few will argue that inflation is clipping the

wings of consumer spending — now and for the foreseeable future. According to our data, half of all consumers report that high inflation has caused them to dip into savings to cover expenses that their paychecks once covered — millennials most of all. Pay may be rising, but not enough to cover the higher cost of living.

Also driving that sentiment is the sinking feeling that consumers get when they are brave enough to check their investment account balances — which many consumers now have, especially those with higher incomes.

In June of 2022, the St. Louis Fed reported the first decline in household net worth in two years. The collective $3 trillion decline in stock market value swamped the $1.7 trillion collective increase in the value of their homes.

Some dismal scientists worry that future stock market and housing market instability at the levels experienced in the first half of 2022 could further weaken those household balance sheets and dent GDP growth. Why? Because consumers may not spend — even those with money in their accounts who could spend — unless they feel confident that their financial situation is secure.

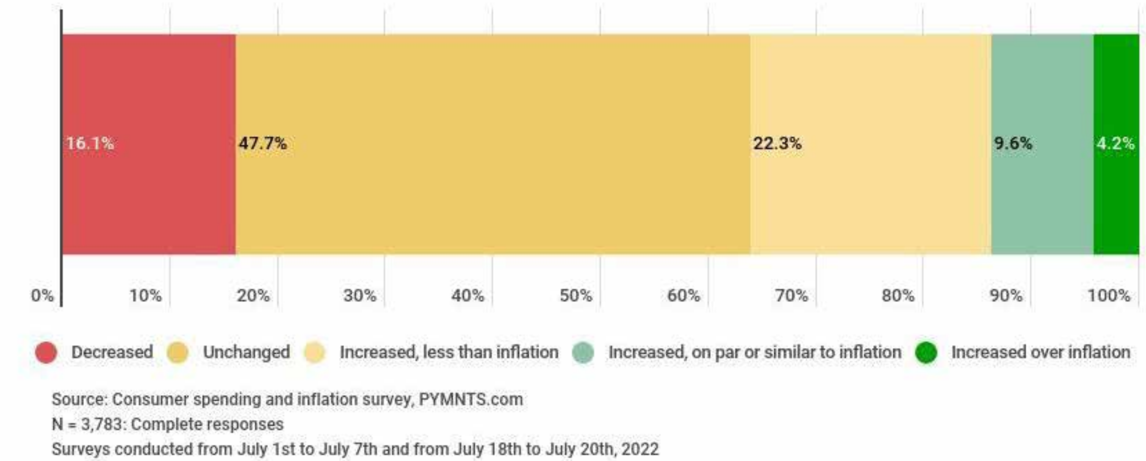
Boomers, with lots of money to spend, may pump the brakes the hardest. In fact, the June Fed data also finds consumer checking and savings account balances increasing as consumers appear to keep, not spend, the money they have.

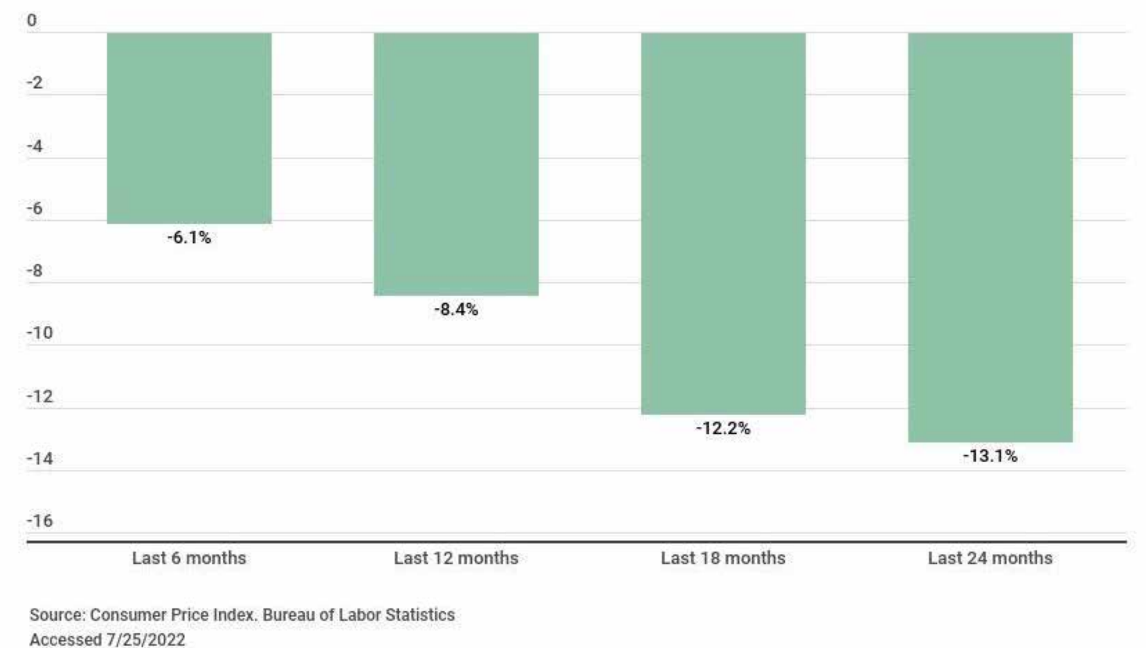
FEELING THE INFLATION HEAT

Of course, this news comes at the same time that inflation at levels not seen in 41 years is chipping away at the consumer's overall purchasing power.

The Bureau of Labor Statistics (BLS) reports inflation rates in June hovering at 9.1%, with average wages for U.S. workers increasing 4.9% over the last 12 months.

Inflation has robbed consumers of 8.4% of their spending power, on average, over the





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last year. This figure considers the variation in the purchasing power of the U.S. consumer across cities, as measured by BLS. It now takes about $109 now to buy the same basket of groceries consumers purchased for $100 last year.

For some people, that extra $8 or $9 may not be a big deal. But it comes on top of lots of other $8 or $9 increases — including what it now costs just to pay for the basics.

PYMNTS data shows that more than half (53%) of consumers say that interest rates on their credit card balances have increased, and 60% report spending more to pay their mortgage or rent and for household maintenance. Eight in ten consumers report higher utility and transportation costs (car payments, maintenance, public transportation). Nearly everyone (90.1%) has felt the pain at the pump.

All of that influences the consumer's perception of how much she actually spends at retail and grocery stores.

PYMNTS data finds that consumers **say they pay** 20% to 30% more for retail and grocery purchases and to eat at restaurants, even as **published BLS data reports** an increase of 5% to 15% in those same categories.

For the average consumer, reality is not shaped by how much the government tells them things cost, it's shaped by their personal reality when they go shopping and pay their bills.

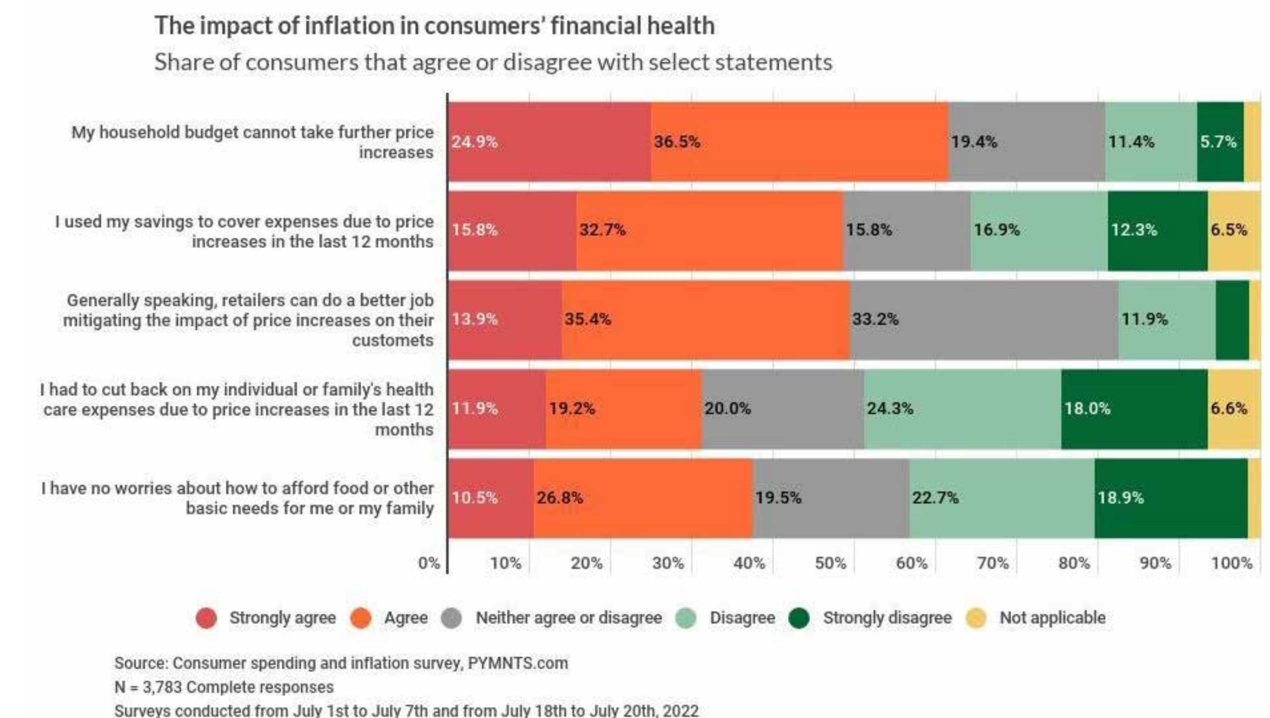
MAXING OUT

Unsurprisingly, nearly two thirds (62%) of Americans report maxing out their household budgets, including a fifth of high earners. Millennials are most negatively impacted. Nearly everyone — 80% to 90% of all consumers — reports taking at least one step to adjust their spending levels.

Seventy percent (70%) of retail shoppers say they're cutting back on purchases they don't consider essential, including 87% of consumers earning over $100,000. Few consumers say they'll compromise quality to save money — instead, they will reconsider whether a purchase is necessary at that time.

Seventy-one percent (71%) of consumers say they're eating at home more often. That includes two thirds of consumers earning over $100,000 and those not living paycheck to paycheck. These are two groups who presumably have discretionary money to spend, but they aren't spending it at restaurants right now the way they once did.

More than half of retail shoppers (52.6%) look at competitors to their favorite merchants to find cheaper prices on the items they want to buy, including one in five high earners. Forty-five percent (45%) of consumers say they'll shop other grocery stores for better prices on the things they want to buy, too, including nearly 20 percent of those with incomes over $100,000 per year.



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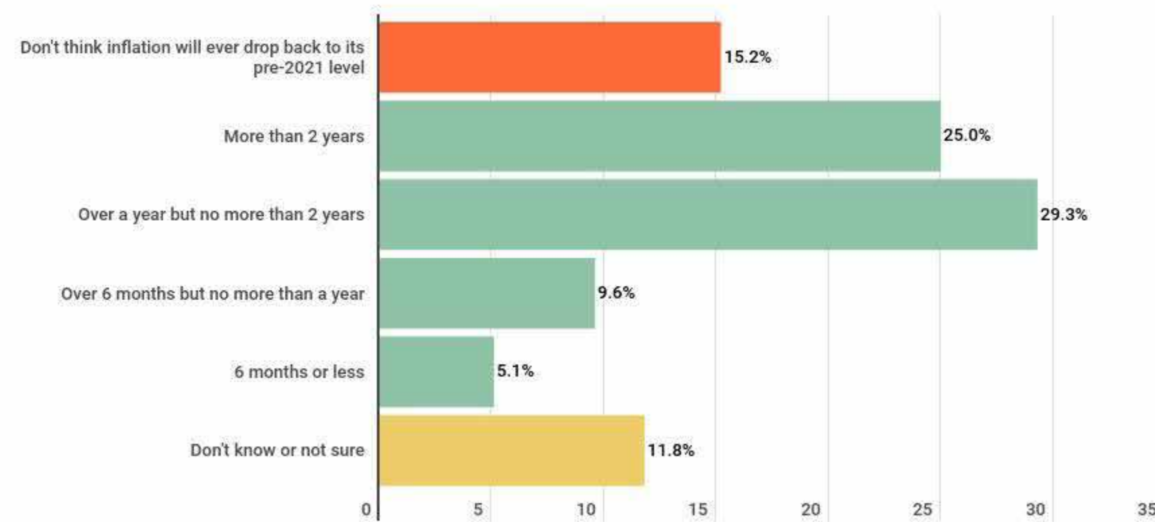

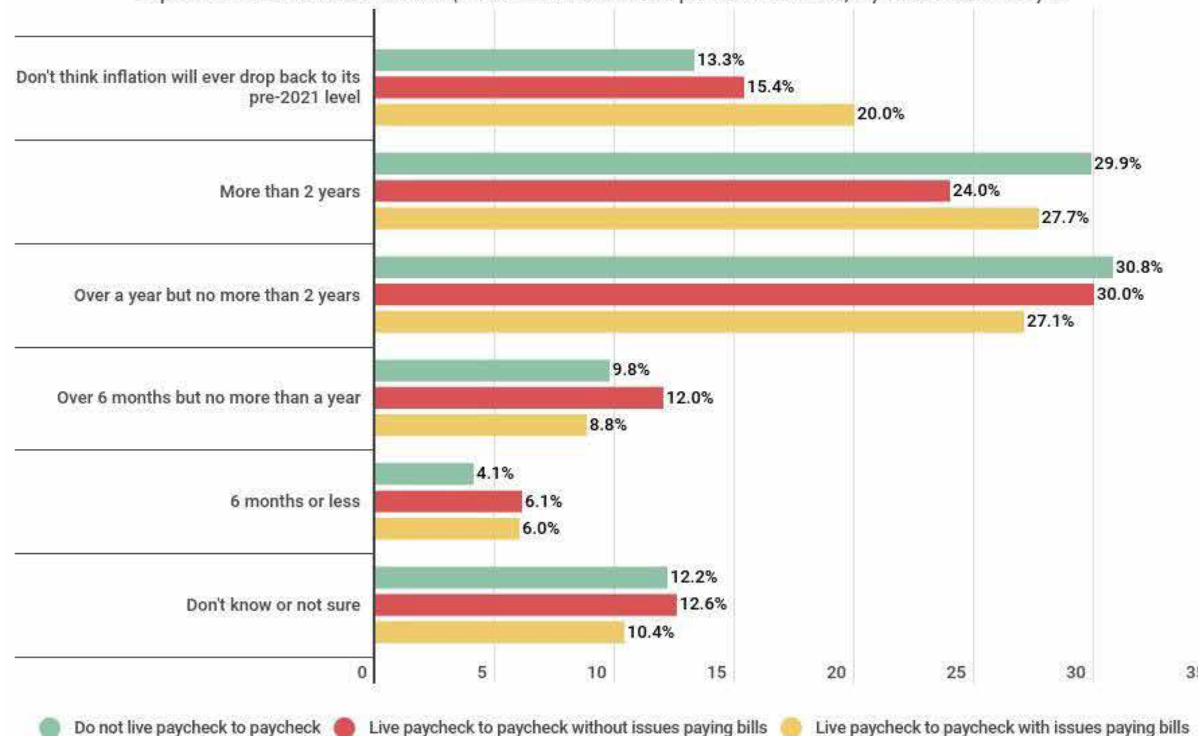

THE 653-DAY MARCH TO LOWER INFLATION

Consumers also think they'll be living with higher prices for a while. Specifically, they estimated 653 days longer from the day they responded to the survey.

Which means they'll likely continue to make their own adjustments for some time to come.

On average, consumers say it will take until Q2 2024 for inflation to return to the level it was in 2020, which averaged 2%. Higher earners expect high levels of inflation to persist until mid-April 2024.

PYMNTS research finds that the number of consumers who believe that it will take at least a year or more for inflation to return to that 2% is three times as high as the number who believe things will return to those levels by the end of the 2022.

WHAT'S NEXT

When I saw these data, three thoughts crossed my mind.

The first is how the current macroeconomic environment is becoming the great consumer spending equalizer.

The double hit of the decline in financial wealth from stock market volatility and the high levels of inflation are causing nearly all consumers, regardless of demographic group or income, to adjust their spending. It isn't only about whether consumers have money to spend, it's whether they will spend the money they have — and where. When high earners tighten their purse strings, the ripple effect across the economy will be felt.

The second is how remarkably accurate consumers were at predicting the duration of COVID, and whether the same will be true for their predictions about inflation's persistence.

On March 4th of 2020, PYMNTS fielded the first of our monthly COVID studies asking consumers a number of things about their

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physical and digital shopping behaviors. We also asked when they thought COVID would end. At that point, there were a very small number of COVID cases in the U.S., and we were still a few weeks away from a national lockdown.

Even then, consumers started ramping up their digital activities and throttling back their physical interactions. Consumers in our first study said it wouldn't be until the Fall of 2020 before things would return to normal; experts and the media predicted that a return lockdowns and reopening would take two months. Every month we fielded the study, consumers extended that deadline, giving predictions about the duration of COVID that turned out to be pretty accurate in retrospect.

If they are right on inflation, we won't be back to normal until more than a year from now — maybe two, given what they know now. Their spending behaviors will almost certainly mirror those views.

Finally, it's often the most challenging times that surface the most creative solutions. This one is tailor-made to help consumers make smart decisions about how to spend their money and navigate the difficult times ahead. Most consumers we studied think that retailers and payments players can do more to help them.

I guess that's as close to a call to action as you can get.

So, for everyone across the payments, retail and financial services ecosystems, now is your time to shine. Just as so many of you did during the pandemic to help consumers make it through to the other side, stronger, healthier and more digitally savvy.

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AUGUST 15, 2022

WHAT NEW DATA SHOWS ABOUT WHY AMAZON IS BUYING IROBOT

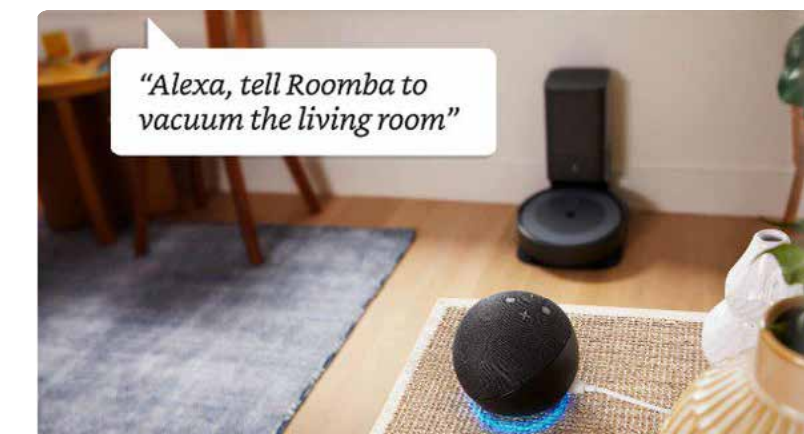
Joe Jones has become something of a household name in the last ten days because of an idea he had in 1989. Jones is the inventor of the robotic vacuum cleaner Roomba — and the company that funded its development and manufacturers it, iRobot, announced on August 5th that it would be acquired by Amazon for $1.7 billion in an almost all-cash deal.

It would take thirteen years to move Roomba from an idea in 1989 to the showroom floor in 2002 and another two years to sell one million units. As Jones tells the story, a marketing and sales turning point happened when Roomba stopped selling "robots" and started selling clean floors. In fact, the notion of a robot that would clean floors was inspired by Jones' own desire to have a clean apartment without taking any of his personal time and energy to sweep and vacuum.

Based on Roomba's reported sales figures, 42 million homes have much cleaner floors now as a result of his invention.

Far more important than Amazon's desire to capture more of the economics from people who want clean floors is the significance of the iRobot acquisition to the company's overall strategy. It's yet another example of Amazon's expansion into adjacencies that complement the behaviors of a large mass of consumers already on their platform.

We call this cross-activity network effects, and it has proven foundational to the growth of the digital economy worldwide — and the future of every business that operates within it.



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The foundation of these cross-activity network effects is measured by **the number of consumers** who engage in any single digital activity; the strength of their network effects comes from **the frequency** with which consumers engage in that activity and **the breadth of digital activities** in which those consumers participate. Understanding the multidimensional dynamics of these activities helps businesses predict the impact of these network effects on their business and make decisions about how to align resources accordingly.

It also helps identify how the flow of payments and data can make those cross-activity interactions seamless and secure — and where partnerships can strengthen those dynamics or create new competitive opportunities.

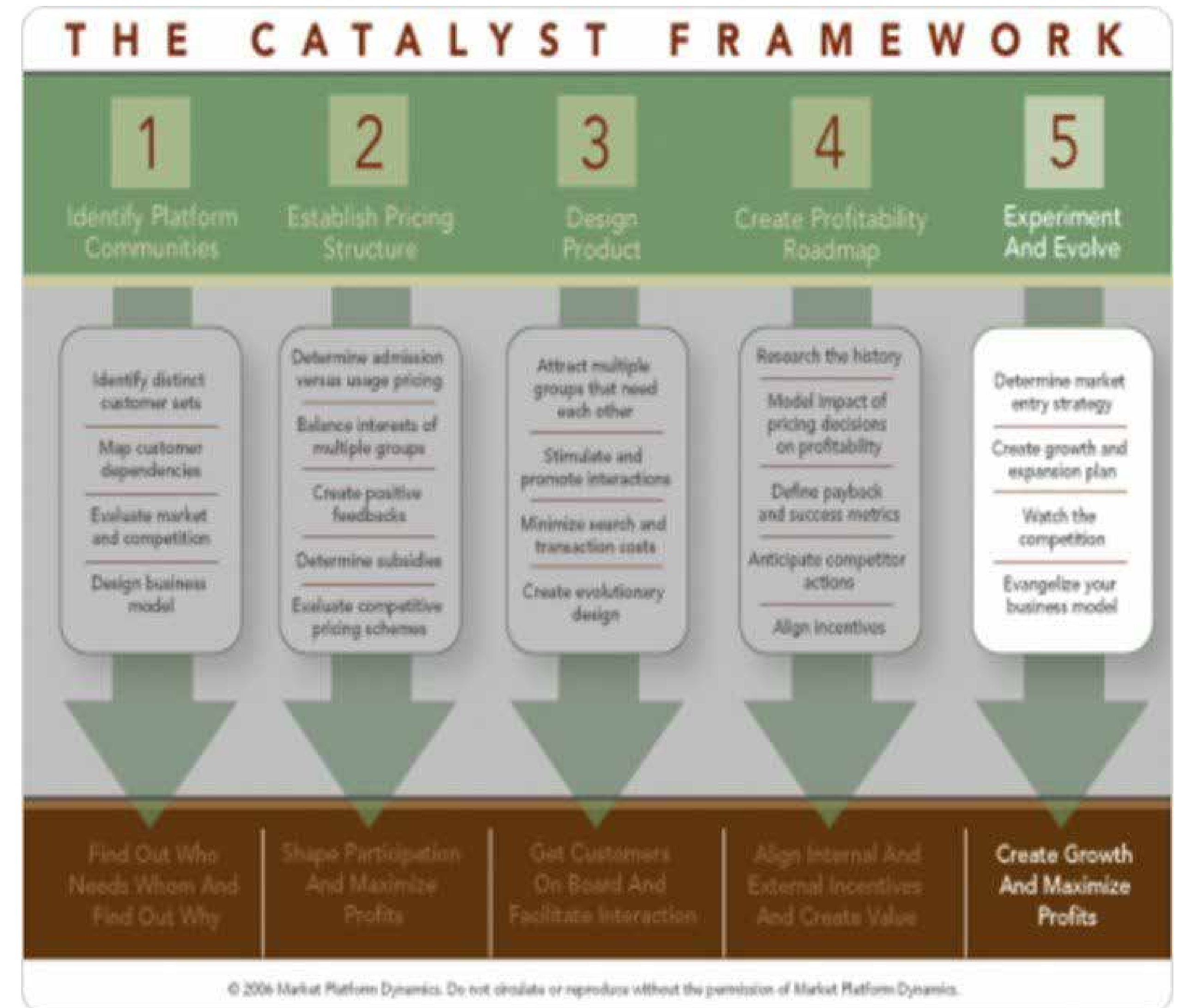
For Amazon, iRobot is about strengthening and monetizing the cross-activity network effects of the consumers who have connected more than 300 million smart home devices such as lights, curtains, thermostats and vacuums to Alexa and therefore already value the convenience of an AI-powered smart home.

THE RISING TIDE FLOATS A LOT OF DIGITAL BOATS

The power of network effects to create consumer value, and the platforms that can master them, is a well-trodden area of economic analysis. Successful platforms engage in a variety of strategies to engage their stakeholders and create network effects that scale their business, provide value to participants and generate profits for themselves.

In the digital economy, there's an interesting aspect of network effects that we see consistently in our ongoing research on consumers across the world.

Take the quarterly study PYMNTS is doing to examine the digital behaviors of 15,000 consumers across 11 countries that represent 50 percent of the global GDP. Our analysts measure the cross-activity network effects among the



40 different daily activities that PYMNTS tracks as part of this quarterly research using statistical methods and a proprietary model.

It is this model that provides new insights into consumer behavior and the set of activities that define their interdependencies. Its pillars form the Connected Economy.

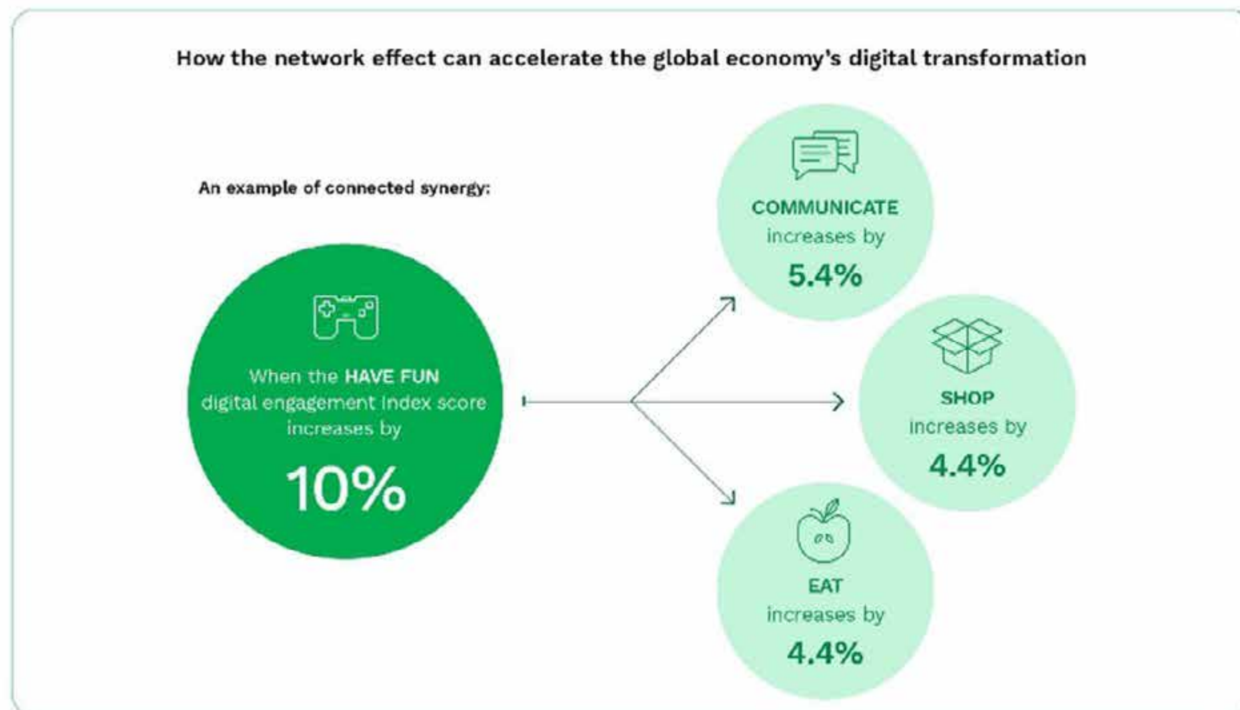
For example, in Q1 2022, the model shows that consumers who use digital methods to play games, stream music and videos, buy tickets to concerts

and sporting events **(Have Fun)** are more likely to use text messages to reach family and friends **(Communicate)**, buy retail products using digital methods **(Shop)** and order food or groceries using digital methods **(Eat)**.

Have Fun appears to be the digital cornerstone that drives specific cross-activity network effects when consumers increase their use of digital channels to engage in a variety of leisure activities that often include their friends and family.

IGNITING THE SMART HOME

The **Live** pillar — the intersection of connected devices, data and payments to make homes smarter — is one that only a small number of consumers across the world engage with in a meaningful way. That's because doing so requires an investment in AI-powered connected devices that provide those benefits. In some countries those devices are not available; in other countries where they are, most remain out of reach except to affluent tech-savvy consumers willing to prioritize and invest in having a smart home.



Benchmarking The World's Digital Transformation | PYMNTS.com | April 2022

Amazon's acquisition of iRobot seems more than a tacit acknowledgement that the smart home remains a global blue ocean with an installed base of consumers already bought in.

With a 70% share of the smart speaker market and its free app on Apple and Android smartphones, Amazon with Alexa has a large mass of consumers who like interacting with a virtual assistant — and many more who like the ease and convenience of having devices that make their home both interactive and smart.

The cross-channel network effects today are relatively nascent, given the unfamiliarity consumers have with using them to do more than a handful of basic tasks and the privacy and security concerns people may have when using them to do much more.

Amazon's bet is that the smart home, the set of digital activities we call **Live**, has the potential to be the cornerstone for many of the AI-powered conveniences

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of outsourcing basic household activities — playing music, turning the TV and lights on and off or the thermostat up or down — to an AI-powered device so that consumers can direct a virtual assistant to do them instead.

Over time, the hypothesis is that those network effects will strengthen as consumers use their voice and a variety of connected devices to engage with many of the activities that go beyond the day-to-day activities that are its digital cornerstone. The cross-channel network effects will be driven by the convenience of using the consumer's voice to complete any task that consumers really don't like doing but feel comfortable outsourcing to their smart home digital assistant instead. Businesses will develop skills and connected devices to expand the number of use cases and connected end points that give consumers more places and ways to do that.

SO WHAT?

One of the reasons that PYMNTS decided to study the digital behaviors of consumers all over the world was to create a multi-dimensional economic model to predict the set of activities that will systematically drive the growth of the digital economy. Absent such a framework, business leaders and entrepreneurs are left with anecdotes, or their own forecasts based only on what their data show, to guide their decisions and investments.

Since January of 2022, we have learned that cross-activity network effects are a relevant predictor of how digital engagement evolves over time. We see that it is different across countries, less tied to demographic trends than to the degree to which physical activities are better than their digital counterparts. We observe that some of the cross-network effects seem intuitively correlated, such as shopping online and also buying food online. Most are not, which is where we find our model can provide clarity.

More important, cross-activity network effects offer insights to how connected ecosystems are shaped, and what set of digital activities are or could be its cornerstone. This insight helps business leaders better position their product or service to fill that role, identify where they may be potentially vulnerable and then decide where and how best to play.

The interdependencies also offer important clues for where there may be red oceans, or blue ones, beyond what businesses can see across their own value and supply chains. We have seen in just these six short months the dynamic nature of these cross-activity network effects and how they are influenced by consumers, new entrants and macroeconomic forces.

All of which can change the performance of their business, literally overnight.

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SEPTEMBER 19, 2022

HOW TO CATCH THE NEXT WAVE OF DIGITAL TRANSFORMATION

Steve Ballmer's reaction to the release of the iPhone in 2007 is regarded as one of modern business history's most egregious faux paus. As the story goes, the then-president of Microsoft scoffed at the idea of a $499 phone that lacked a keyboard and, by extension, any appeal to the business crowd.

His strategic blunder was the failure to see the power of putting a personal computer — and a year later, an app store filled with apps — in the hands of every person on earth. This cost Microsoft and its Windows OS the opportunity to be a player in the rapidly growing and eventually massive smartphone market that defines our times.

Fifteen years later, the iOS and Android operating systems — and the smartphones they power — are at the heart of the digital transformation we see happening all over the world.

At the end of Q2 2022, PYMNTS' study of 15,000 consumers in 11 countries, which comprise 50% of global GDP, finds that digital engagement is on the rise everywhere as more consumers use digital methods to engage in one of the 37 routine activities measured by the study. Nearly 84% of the consumers in the study recently engaged in at least one of those 37 digital activities, even as they resumed their physical world activities.

Platforms that enable technologies and payments providers have made the digital experience better, more accessible and more efficient for consumers looking to allocate their time.

Expanded payments choice, including installment payments and BNPL options, have unlocked more digital buying experiences for more consumers, and merchants have benefitted from higher conversions. Logistics and more efficient business payments and trade finance have and will continue to improve delivery and distribution for the merchants and businesses that support the delivery of these digital products and services.

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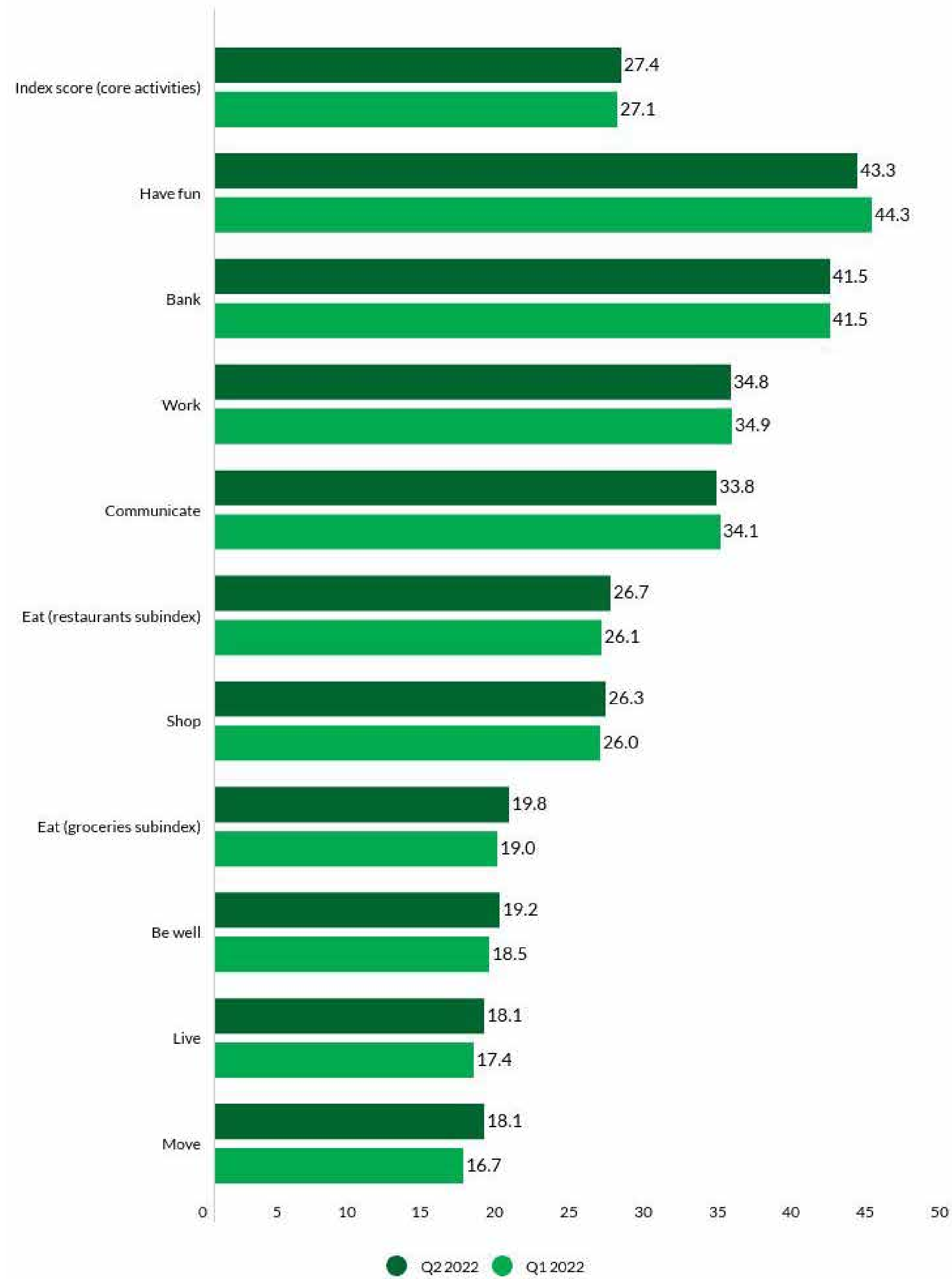
How use of digital tools grew across different activity groups

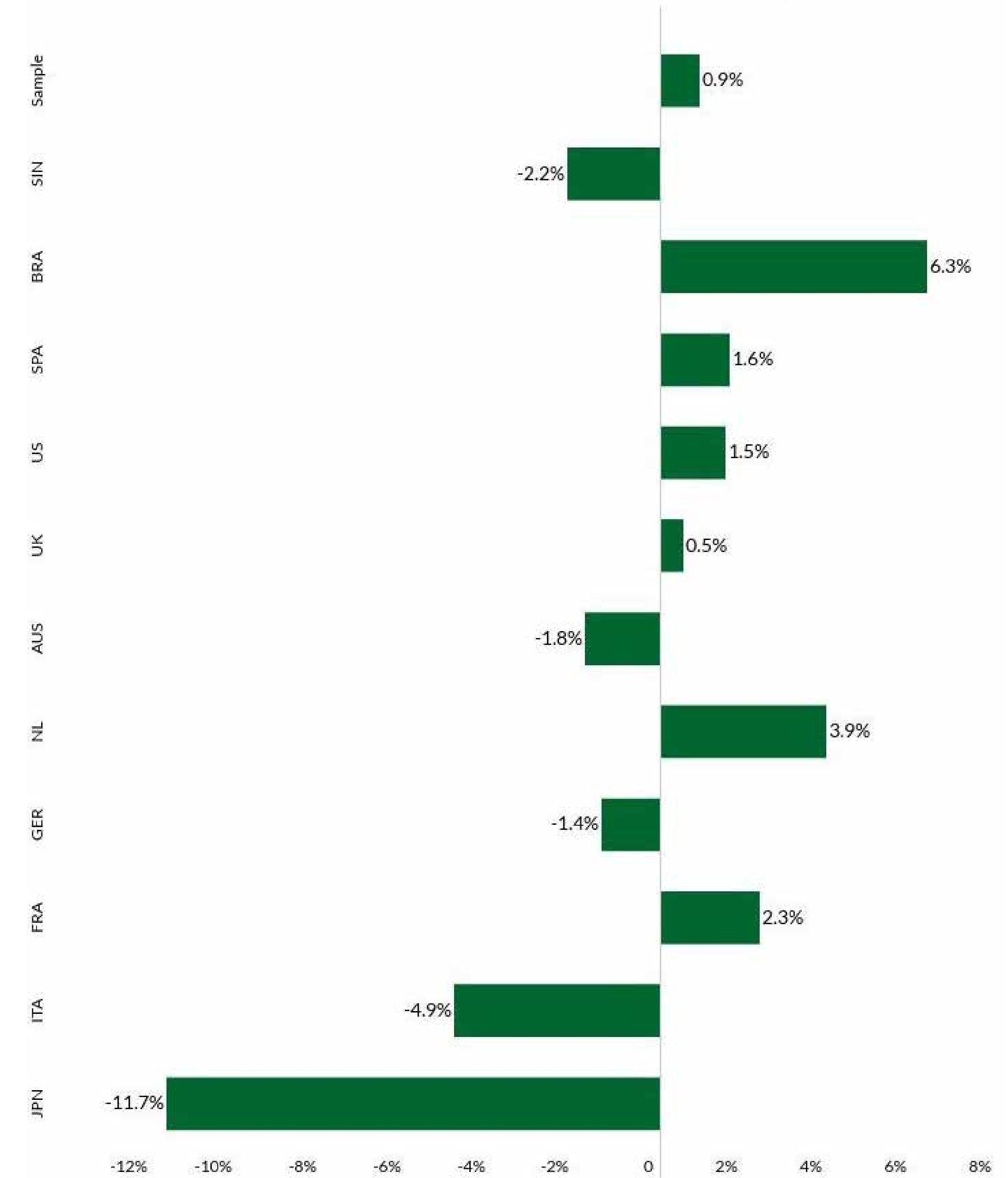
Average measure of the digital transformation, by Pillar



Source: PYMNTS.com
How the World Does Digital: Q2 2022: The Impact of Payments on Digital Transformation, September 2022 N = 15,599: Complete responses, fielded April 7, 2022 - May 9, 2022
Additional sources: World Development Indicators, UNdata

Digital transformation's progress among countries

A: Variation in transactional CE Index scores between Q1 and Q2, by country



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For that reason, *The ConnectedEconomy*™ Index, which measures digital transformation's progress based on the number of people engaging in digital activities and the frequency of their usage, increased 1.2% between Q1 and Q2 2022.

Despite that progress, we still have a long way to go before all consumers use connected devices, technology and payments in some way to access and/or complete the 37 routine activities we monitor.

For entrepreneurs and business leaders, that's great news.

In the six months and two global studies we have conducted this year, we see a roadmap emerging for bringing more consumers everywhere more fully into the digital economy.

That roadmap involves making the physical world an extension of consumers' digital experiences. I have been writing about this concept since 2019, as it became clear then that the decade of the apps and smartphones would begin the transition to ecosystems and connected experiences as the calendar turned to 2020.

MAKING THE PHYSICAL WORLD PART OF THE DIGITAL EXPERIENCE

The digital transformation of the world's economy was already well underway when the pandemic, starting in March 2020, created an overnight incentive for people everywhere to do more things online that they once did in the physical world.

By the end of 2019, digital had already hastened the decline of physical retail and mortally wounded the print media business and the advertising model that supported it. Digital had given birth to the gig economy business model that made it efficient for supply and demand to find each other in many business segments and had expanded access to music and video content via apps like Netflix and Spotify. Social networks connected billions of people all over the world with each other, and online marketplaces connected sellers with buyers and eliminated the need to be within driving distance of a store to buy something from it.

The discussion about the blurring of the lines between the physical and digital worlds certainly isn't new.

But digital transformation's next wave will go farther than blurring the lines between physical and digital channels — it will make them invisible. Over the next several years, the physical world will increasingly become more of the consumer's digital experience.

That will make the activities, not the channels consumers use to access them, the focus of successful innovators. They'll take as their guiding principle the reality that nearly every physical world experience will start in the digital world with a connected device of some kind: the search for a doctor, fitness studio with classes on Saturday mornings at 8 AM, closest hair or nail salon, coupons for products for items consumers want to buy, a store with winter blankets on sale and in stock, the best neighborhoods to buy a home in St. Louis.

Innovators make the related physical engagement more valuable and less friction-filled, and in the end, those experiences will complement and close a sale already far along in the process. Channels will have to adapt to the consumer's preferences and not the other way around, making the trip to the store, doctor, real estate agent's office or gym worth their time and their money.

Consider what savvy retailers are doing to make the consumers shopping experience better.

MatchesFashion, an online specialty department store with three stores in London, allows customers to add the items they see on the store's website or app to their wish list and arrange to have them waiting in a dressing room to inspect and try on when they arrive. Fitters and stylists are on

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standby to tailor items as they are being tried on — no better way to close a sale then to have clothing altered — and to style outfits. The store's total offering is a shopping experience that started online, maybe weeks before the shopper ever walked through the doors, and finished with a purchase in the fitting room.

Take grocery shopping as another example, where platforms and tech will force a similar shift in the $11 trillion global grocery market. The divide between digital and physical is eroding and may collapse completely in the next few years, even as 80+ percent of groceries are still purchased in the grocery store today.

Over the last two years, food has become, like every other purchase, something that consumers are more comfortable buying online. A digital shift created by the pandemic translated into habits that have stuck with the consumer. An increasingly hybrid work environment has shifted grocery shopping from a weekend chore in the store to a weekday order for delivery or curbside pickup. Subscription services such as Amazon Subscribe & Save and D2C specialty brands are whittling away the center aisle purchases from grocery stores — of course, at different paces with different merchants in different countries — and will for some time.

Delivery aggregators have increased grocery store competition by making the consumer's choice for where to buy their groceries independent of having to hop in the car to get there. Smart grocery store executives will shift their focus away from the channel a consumer shops to the activity the consumer is doing when shopping: buying food for their family wherever and whenever she finds it convenient.

Then there's the whole set of activities where digital engagement remains nascent.

Healthcare is one of those greenfields, poised for a similar global disruption as patients and doctors are challenged in different ways to make the physical experience of seeing a doctor a valuable or necessary extension of digital-first engagement.

In many markets, including emerging economies, telemedicine is the difference between having no access and having a digital lifeline to doctors who can diagnose and treat patients suffering from common ailments. The challenge for innovators to overcome is one of basic infrastructure — connectivity — and the logistics necessary to get medicines to consumers living in those remote areas.

In developed economies, telemedicine will languish unless it becomes a better use of the consumer's time and money.

When the pandemic made seeing the doctor difficult, access to a telemedicine specialist using a digital channel became almost as much a lifeline as it was in lesser-developed countries. Today, televisits have become an expensive stutter step to seeing a doctor, and a channel that consumers will likely skip after a few bad experiences.

Innovators that align telemedicine use cases with the technology and diagnostic devices that save the patient and doctor time will make the channel of delivery irrelevant, and the provision and payment of healthcare a better connected digital experience.

DIGITAL ENGAGEMENT BECOMES CONTAGIOUS

Call it the network effects that make innovators swoon: Consumers who engage in one digital activity also engage digitally in other activities that share similar characteristics or are related to something they are already doing using digital methods.

In Q2, we find lots of opportunity for innovators to swoon.

Half of consumers across all 11 countries who used digital methods to book travel or local transportation also used digital methods to order food from restaurants or grocery stores. More than half also used digital methods to make retail purchases. The common thread

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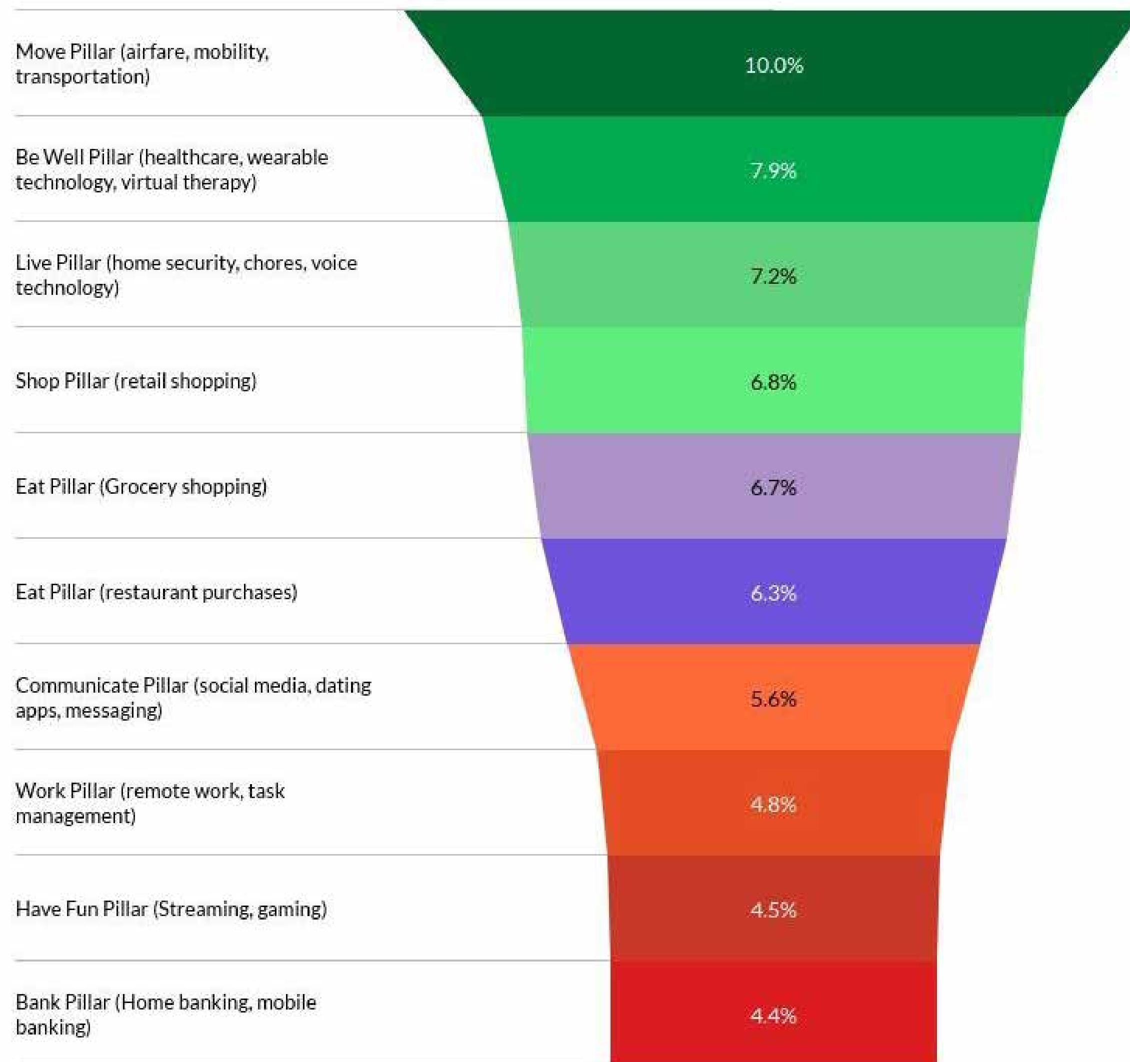

is travel of some kind: for work or pleasure, and the efficiencies of sticking with digital methods to access and purchase things related to those experiences.

But the network effects don't stop there.

Based on these observed correlations, we have used our model to estimate the increase in digital engagement across all 37 activities that would be associated with a hypothetical increase in digital engagement of 10% in local transportation or travel activities.

What we find is that the more exposure consumers have to accessing services and making purchases using digital methods, the more they will stick with those behaviors. They'll also be more likely to explore new ones based on the trust and confidence and ease and convenience they have in other areas of digital engagement.

"Super Apps" are banking that such correlations in digital activities will drive demand for consumers to want a single place to digitally engage in a set of activities that once required multiple apps and logins. We see that in China and other Asian markets. PYMNTS research shows that nearly two thirds of consumers in the U.S., U.K., Germany and Australia have an interest in using a Super App to make buying things and managing their finances more efficient.

Innovators have an opportunity to use the power of these network effects to determine how and where they fit, to influence consumer engagement in activities that connect in some way to their core product or service or by being more accessible on the open web as consumers use search to discover new products and experiences.

We also see enormous potential to integrate payments into the digital activities that consumers largely use today to access services or content.

Eighteen of the 37 activities that PYMNTS monitors are those used by consumers to access content or services, but not to make a purchase: watching movies, listening to music, messaging

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their friends and family, connecting on social networks. Embedding payments and finance into those experiences has the potential to convert the attention of a captive audience of consumers into a commerce experience.

MOBILE WALLETS GO IN STORE, BUT NOT FAR ENOUGH

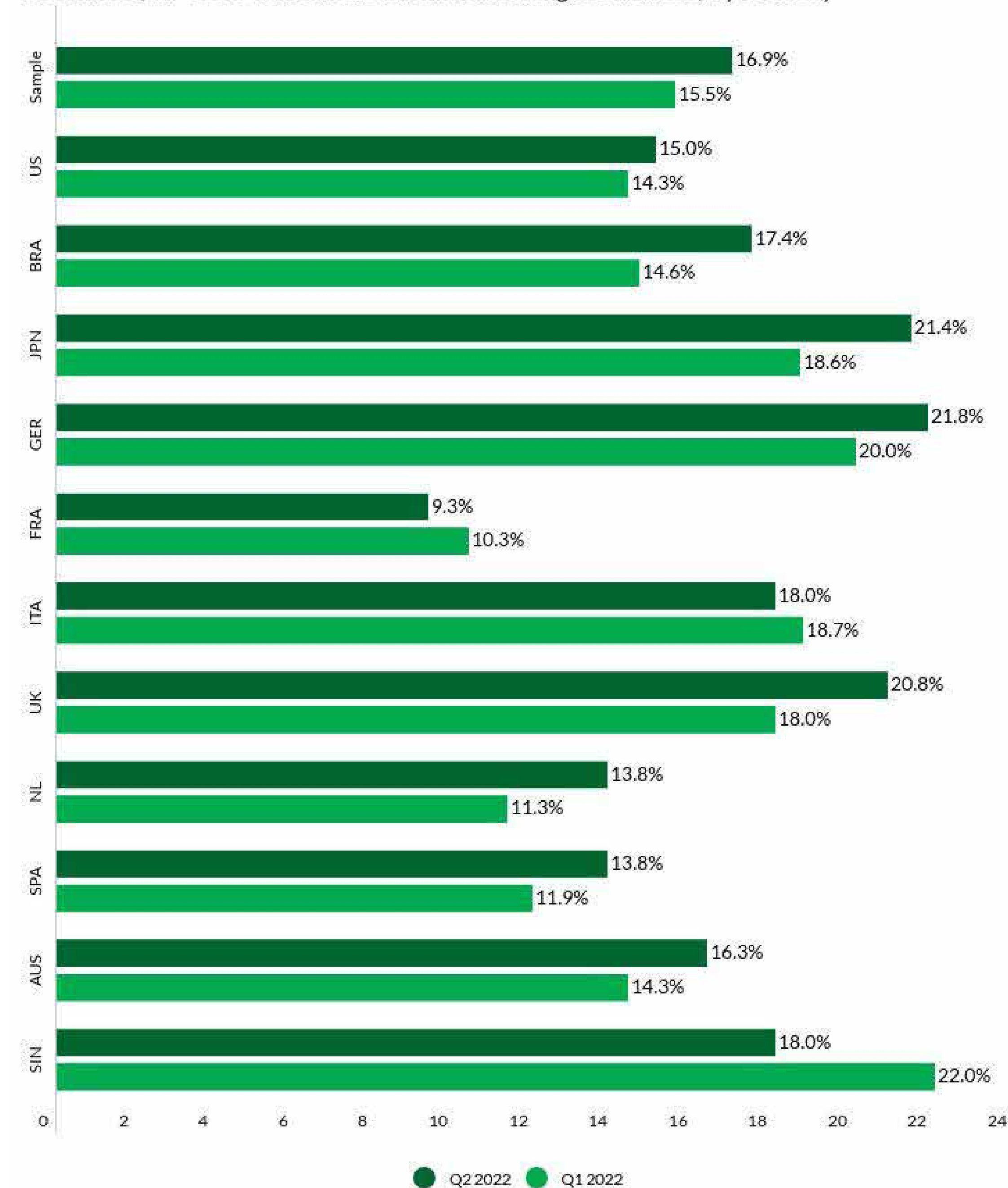
In Q2, PYMNTS' study finds that the use of mobile wallets to pay for purchases made in brick-and-mortar establishments increased by 9%. The greatest increase of in-store digital wallet use was in Brazil, Japan and the U.K., the latter largely driven by an increase in use of Big Tech wallets, e.g., Apple Pay. Native or domestic wallet usage was the principal driver for the increase in digital engagement with mobile wallets in Brazil and Japan.

That's the good news.

Everywhere, the use of mobile wallets to pay for things in the store pales in comparison to their use online — by as much as a third in some countries — and everywhere remains a small fraction of retail sales. In the U.S., the instore mobile wallet story is nothing short of disappointing as the lowly plastic card remains the fiercest competitor at the point of sale despite mobile wallets' eight-year march to replace it.

What held mobile payments' use back was positioning them as a replacement for a card at a terminal in the physical store, rather than a cornerstone of an entirely new checkout experience that lives in the cloud.

Innovators who are focused on the transformation of checkout are already thinking past wallets as a form factor to a set of identity and payments credentials that authenticate the user when they log into an app



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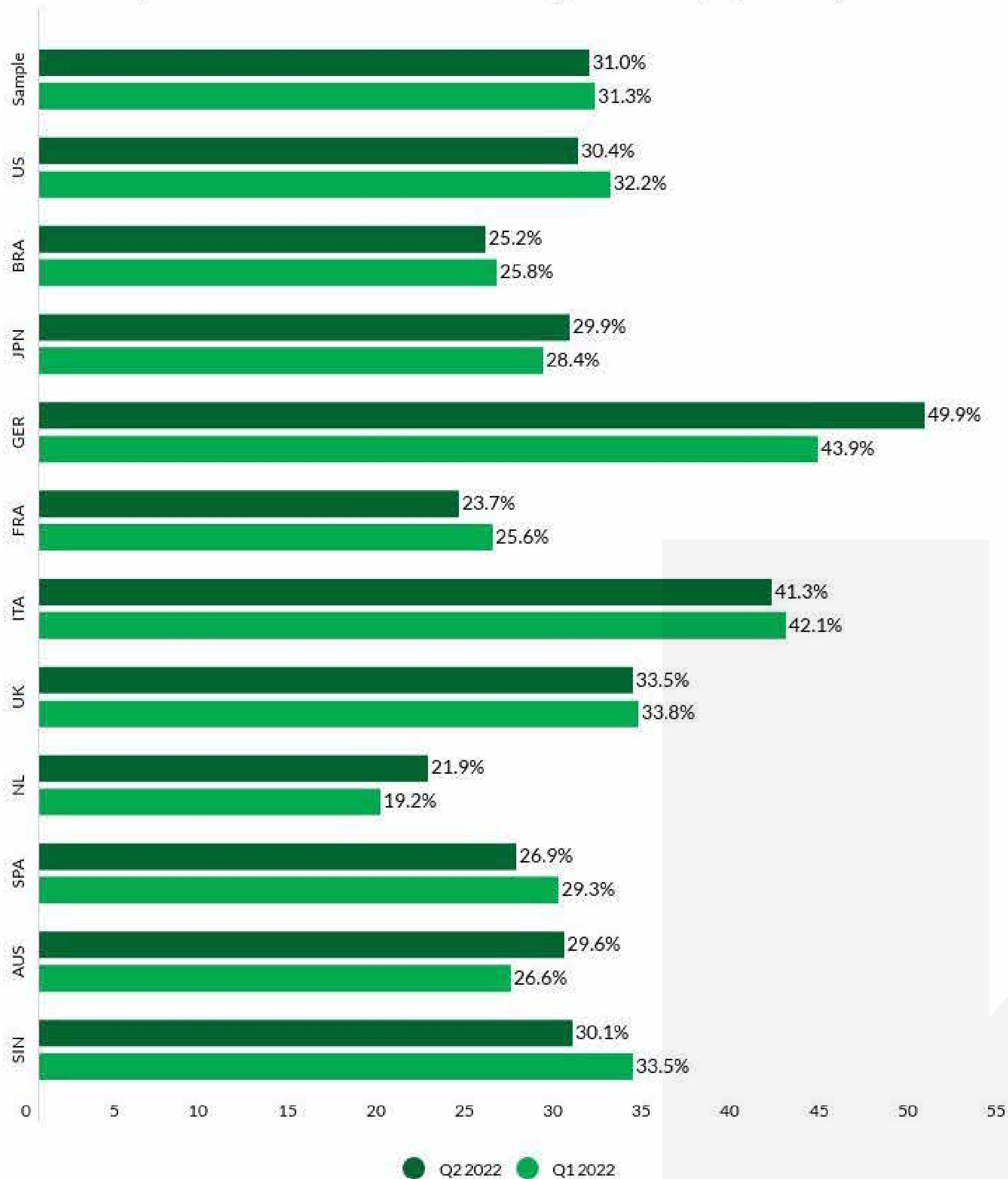

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or a connected device at a store, start their connected car or tell their voice assistant to send the same basket of groceries they ordered last week to their home later in the day.

WHAT'S NEXT

Macroeconomic uncertainty and a global consumer challenged to keep pace with historic levels of inflation have forced business leaders and entrepreneurs to make the right bets on where to invest time and money to generate a profitable return. Many of the playbooks that looked great in January, and probably even June, have been tossed aside as consumer and business sentiment have shifted. Everyone everywhere is looking for "what's next."

Six months of examining the digital behaviors of 15,000 consumers living in 11 different countries hasn't uncovered the big lightning bolt quick-fix. Rather, it confirms the power of such a simple concept: physical and digital channels no longer compete as digital reinvents the physical world in mutually reinforcing ways.

Labels like omnichannel minimize that potential, and so do cutesy buzzwords.

Business leaders and entrepreneurs have the power to rethink how to use the advantages of both worlds for the benefit of consumers and businesses everywhere in the world. There is a long runway for doing that, starting with getting more consumers digitally engaged in something, then letting the network effects accelerate their own engagement and that of the country in which they live.

There are many fortunes yet to be made for those who use technology, software, data and connected devices to make digital more physical and physical more digital — and for those who create new sources of value by embedding payments into those experiences as the $84.2 Trillion global economy moves digital.

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OCTOBER 03, 2022

WHAT 2014 TEACHES US ABOUT THE FUTURE OF PAYMENTS AND THE DIGITAL ECONOMY

In 1963, Nobel-prize winning physicist Dennis Gabor wrote that the future can't be predicted, but it can be invented. Gabor, who won the Nobel for inventing the hologram, explained in his book, "Inventing the Future," that it is humankind's ability to invent that shapes the future, even though its impact remains unknown at the moment of its creation.

In October of 2022, almost everyone wants to know what the future will look like, perhaps more intensely than ever. I was asked recently how I thought the future of payments and the digital transformation might look, given the complicated micro- and macro-market dynamics that pose forceful headwinds right now.

As I was reflecting on how to answer that question, I began to think about some of the things that had a profound impact on the evolution of the digital economy over the last decade. It was then that I was struck by how many of those things took root in 2014, seven years after the introduction of the iPhone and six since the launch of the App Store.

They came in just when the foundations for using connected devices, data, the cloud and digital payments began to come into their own.

THE DASH TO ONLINE ORDERING

On April 6, 2014, Amazon introduced Amazon Dash, the wireless wand that consumers could use to scan the bar codes of the products in their fridge, pantry or medicine cabinet and create their weekly grocery shopping list. Rather than taking that list to the grocery store, Amazon had the items delivered to the consumer's front door via Amazon Fresh: all paid for using

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their Amazon account linked to their Dash device.

A year later, on March 31, 2015, Amazon would simplify the ordering experience further with the launch of Dash Buttons for Prime Members. Universally regarded as the ultimate April Fool's prank, pressing one of those product-branded wireless plastic buttons triggered an order — and a free delivery to the consumer's home — when it was time for that product to be replenished.

In perhaps one of the earliest examples of contextual commerce, Dash Buttons were intended to be placed in the environments where products were used, becoming a visual prompt to reorder when supplies were running low: the laundry room for Tide detergent, the kitchen cabinet for Bounty paper towels and Glad wrap, the baby's room for Huggies, the medicine cabinet for Gillette razors or L'Oreal products, the fridge for Gatorade. The buttons also afforded a clever look into consumer behavior and way to collect data.

Fast forward to 2022, and the Dash Wand and Buttons are no more. Instead, there is Amazon's Subscribe & Save platform on the Amazon site. There, consumers can buy name-brand products on subscription and CPGs can use the platform to offer digital coupons to incent purchases of their branded products, hedging the "trading down" to grocery store private-label products when consumers go to the store to shop.

Since 2014, Amazon has subtly shifted consumer behavior from making sure consumers never forgot to order often-used pantry and household staples to ensuring that consumers don't have to remember to buy them at all — and now across a large swath of consumer household, grocery and beauty products.

According to PYMNTS data, Subscribe & Save has become the largest retail subscription service for consumers in the U.S., with ten percent of all U.S. consumers now ordering their name-brand household products and grocery staples using that platform and the registered credentials stored in their Amazon Prime account. This share will only increase as inflation-challenged consumers shift individual retail subscriptions to this platform — in fact, our latest consumer subscription study sees evidence of this happening already.

Also in 2014, then two-year old Instacart raised $154 million after seeing its revenue grow 15x year over year. In December the company valuation hit $2 billion, a quadrupling of its valuation in June of that same year.

Often regarded by grocers as a threat to their sales, Instacart powers the online purchase of groceries at stores, many of which are more accessible to consumers online then if they had to get in the car and drive to them. I wonder if what grocery stores really dislike about Instacart is that it creates more competition among them for the consumer's food spend.

According to PYMNTS data, roughly thirty-seven percent of US consumers order groceries online, of which 36% used same-day delivery services such as Instacart. The growth of online grocery orders grew dramatically over the last two years because of the pandemic — but it has held its own even as most consumers have gone back to the grocery store to shop.

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But that's today. PYMNTS data also shows that shopping in the grocery store is the least favorite of all consumer shopping experiences — not only in the U.S., but across five other countries. As consumers shift more of their spend online to buy the things they no longer need to inspect, how consumers use grocery stores will certainly change. That extends to consumers who use SNAP benefits to shop for groceries and who can now use electronic versions of them to shop online instead of going to a grocery store.

CARS GOT CONNECTED

About 152,000 people were introduced to about 20,000 new products at CES in Las Vegas in 2014, including the perfunctory supply of robots, wearables, video game consoles and high-tech gadgets. Perhaps not as headline grabbing as the Toyota electric 3-Wheel iRoad, which never saw the commercial light of day, was the introduction of 4G LTE capability inside of any

car powered by the Android OS and Qualcomm's Snapdragon Automotive Solutions.

For the first time, car OEMs could integrate real-time navigation, weather and entertainment options into the car cockpit, eliminating the need for third-party devices to connect to those experiences. This innovation gave developers a new channel through which to reach consumers and payments players, and BigTech and FinTechs a new way to attract and monetize that engagement. The connected car also gave OEMs the ability to consider new business models to support an ongoing customer relationship once the car left the dealer's lot.

Over the last eight years, we've seen a tremendous amount of innovation powered by chips to turn cars into connected commerce platforms and the penultimate mobile payments device.

Connected cars and apps now innovate how consumers pay for gas at the pump and trigger orders at QSR drive-thrus. We see innovators using car telematics to turn cars into mobile points of sale to simplify how fleets and fleet drivers pay for fuel at authorized operators and how to finance, manage and reconcile that spend. Voice assistants make hands-on engagement a seamless and safter experience in the car.

Others see the integration of payments into connected car technology to reimagine how car owners finance, register and pay for the servicing of their car at the moment they decide to buy it: linking to their bank for loan origination and underwriting, then registered payments credentials service the loan and pay for purchases made from the car, including insurance, registration, tolls and maintenance.

Autonomous vehicles connected to the internet and the owners' digital payments credentials will be able to find and park their car on demand, saving the driver time and money, and parking operators the expense of hiring people to park cars and collect payment. Connected car use cases will only proliferate as autonomous and EV-powered vehicles become more mainstream.

These innovative payments wheels all started turning in 2014.

UBER STRUTS ITS PLATFORM STUFF

Uber's launch in 2009 was lauded for its reliable and efficient way to get around town. No more taxis, no more "broken" card readers in the backs of smelly cabs, no more uncertainty about getting a ride when one was needed and no more having to wait an extra 3 to 5 minutes to pay at the end of the ride, and maybe get hostile reaction trying to pay with a card. The Uber app and invisible payments redefined mobility and the consumer experience in moving from point A to point B in many markets around the world.

Although ride-hailing was Uber's first use case, Uber's real innovation in 2009 was the launch of the gig economy and logistics business model at scale that efficiently matched and priced the supply of drivers with demand by riders in real time at scale. That platform gave Uber the ability to expand more easily and cost effectively into adjacencies at favorable unit economics over time.

In August of 2014 Uber did that with the launch of UberFRESH in Santa Monica. Uber was a late entrant to the online food aggregator business, but its scale of users and drivers gave it a chance to experiment in one market, then to scale nationally — and later globally — using the same supply of drivers and logistics tech that powered the ride-hailing business.

A year later, UberFRESH rebranded as Uber Eats and gave its drivers an additional source of revenue. In 2020 Uber acquired Postmates to further expand its online restaurant footprint and customer base.

Today Uber Eats is the second-largest delivery aggregator behind DoorDash with reported gross revenues in Q2 of $13.9 billion. Like its category competitors, Uber Eats has also expanded into the delivery of convenience store and retail products, and introduced a subscription product to subsidize delivery fees on purchases made using it.

Although online orders through aggregators remain a low-single-digit percent of the number of online orders that restaurants receive, many restaurants use it as a strategic fill-in for off-peak times, and price-optimize orders taken from that channel.

Consumers have also maintained their aggregator ordering habits. According to PYMNTS data, 27 percent of consumers use online ordering, mostly millennials and Gen Z consumers in a hurry to get food they decided to order at the last minute.

Uber's platform 2014 expansion proved a few things. First, first movers don't always win. In April of 2014, Grubhub, the leader in U.S. online ordering went public with a valuation of more than $3.2 billion at the close of the market and a reported 70% of the market. Today, it only has about 14% of the market as competitors, including Uber, entered the market, drove margins down and gave restaurants more incentive to invest in innovating their own digital online order and delivery experiences.

Second, business model innovations are powerful, sticky and as important as the technology that powers them — and they make it possible for competitors to traditional players to enter at scale and disrupt. Although Uber competes with individual competitors in each of the sectors it operates, its driver and customer base allows it to scale across the many use cases that require people or products to move from point A to point B at more favorable economics.

VOICE COMMERCE SAYS HELLO

On November 14, 2014, a select group of Prime Members were invited to test a voice-activated cylinder called an Echo and a voice-activated assistant called Alexa. In June of 2015, Amazon made Echo commercially available to everyone. By the end of 2015, Amazon reportedly sold 4.4 million Echo devices.

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Most consumers who bought a smart speaker were less interested in the hardware than having access to a voice-assistant named Alexa. This assistant could reliably turn lights on and off, play their favorite music on demand, make their shopping lists, remind them of the things they needed to do, make them look smart in front of their kids by answering trivia questions — even tell them corny jokes.

The 2014 Amazon playbook wasn't to sell hardware, even though the Echo, the Dot and the Show were the onramps to a much larger ambition. It was

to get consumers comfortable with talking to a piece of hardware on the kitchen counter that answered back — and to introduce Alexa as the operating system for the connected economy.

In doing that, Amazon introduced the consumer to a new way of connecting with information and brands that used to require a touch or a tap on a keyboard or a physical interaction with a specific piece of hardware to complete. People didn't need to "fat-finger" a screen or use a keyboard — or find their phone or pop open an app to get information or place an order, track an order, and over time, even pay bills. They could just say what to do and trust that Alexa would just get it done.

Eight years later, there are more than 100,000 Alexa skills, and hundreds of devices and appliances connected to the internet and made smart thanks to Alexa.

According to PYMNTS data, 25 percent of consumers use their voices to order and pay for things, not only in the U.S. but around the world. Not surprisingly, 39 percent of those users are millennials and 34 percent bridge millennials.

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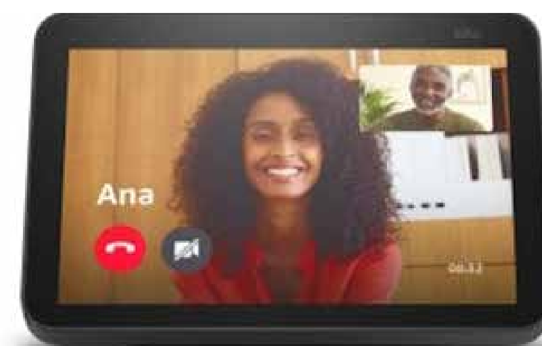
Consumers also use the voice-activated apps on their smartphones to complete many routine tasks — such as making purchases, including via the Alexa app, which can be downloaded on an Apple or Android phone. We've seen these numbers increase over time, as more retailers voice-activate their ordering experiences. The latest introduction of the Echo Show puts another arrow in that quiver as the combination of Alexa, a screen, and curated "buy with recommendations" help drive more sales.

Eight years later, Amazon's voice AI operating system is creating the third operating system for commerce, moving consumers



and businesses closer to an always-on connected commerce ecosystem that follows the consumer wherever she goes. This operating system will become far more important and far more pervasive as more devices get deployed through the retail and commercial physical space, powered by super-fast 5G.

APPLE LAUNCHES AN IN-STORE MOBILE WALLET

On October 20, 2014, Tim Cook took to the stage and introduced the world to Apple Pay and the promise of never having to root around a purse or leather wallet for a card to pay at the physical point of sale in the store. I remember the date well — it happened to be PYMNTS' fifth birthday.

Almost eight years later, those plastic cards in those wallets and purses, now contactless, remain the biggest competitor to Apple Pay in store. In the U.S., 39% of consumers paid for their most recent in-store retail purchase using debit cards and 30% using credit cards. In comparison, only 3% paid with Apple Pay. Meaning that more than 10 times more

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consumers used debit cards and credit cards to pay for their last purchase in store than Apple Pay even as the barriers to adoption and use have largely disappeared. Most stores accept contactless cards, and most iPhones now have Apple Pay installed. In fact iPhone users have to install Apple Pay to complete software upgrades. Yet Apple Pay's share of overall retail spend in-store remains small, accounting for roughly 2.1% of US retail sales according to PYMNTS' consumer study of Apple Pay use and adoption conducted in September of 2022.

All that said, Apple Pay holds the largest share of all of its mobile wallet competitors in-store – in fact it accounts for roughly half of all mobile wallet use instore.

The problem is that not enough people use any mobile wallet to pay in the store, including Apple Pay's.

For Apple, the problem compounds further since the very best that it could ever hope to get is 100% of every iPhone user's instore spend — which, according to the latest statistics, is about 50% of the smartphone market in the U.S. This goal is as unlikely as it is improbable, particularly when considering the world's largest physical retailer (Walmart) and the world's largest online retailer (Amazon) don't accept it.

Eight years later the mobile payments foundation that Apple had hoped to create online and in store hasn't materialized, putting at risk its ambitions to become a mobile payments powerhouse online and in store. The same can be said for any of its mobile wallet competitors. Apple Pay and the others that followed in its footsteps didn't solve the consumer's checkout problem, which wasn't about pulling out a plastic card at checkout. The friction that consumers would like solved

is waiting in line to get to the terminal, then waiting for the cashier to scan and bag what was purchased – even navigating the store to find what they wanted to buy in the first place.

The question now for Apple, and every other general purpose mobile wallet, is whether eight years into the adoption and usage experiment, they all just need more time — is the future about waving a phone at a terminal in the store, and we all just need to be patient for most of us to do that?

Or perhaps all the mobile wallets are at risk of being considered legacy tech as the point of sale moves to the cloud, and the consumer's checkout experience moves along with it.

WHAT'S NEXT

I started this opus with a quote, and I'll end with one that is particularly well suited for these times. It is from Peter Drucker and goes something like this:

The relevant question isn't what to do tomorrow, but what to do today to get to tomorrow.

As innovators plan their 2023 roadmaps, some of the decisions about what to do today can be taken from the experiences of these five innovations, many of which seem so obvious in hindsight.

Technology is only as good as the business model that powers it and the real problems that it solves at scale. Platforms have the power to leverage their assets to disrupt sectors that aren't on anyone's radar until it happens. Not everyone can be a platform, even though everyone thinks they can and they should. Most platform wannabes are well-funded features hoping for ignition. Hardware is a means to an end, not the end — whether it's a car, a phone, a thermostat, a connected bike or a speaker sitting on the counter.

And consumers decide the future. They'll embrace and use the things that make their life easier, more convenient, and give them back more of their time.

Just as much as they did in 2014 — and probably even more.

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NOVEMBER 14, 2022

SAM BANKMAN-FRIED, FTX AND THE DEMISE OF THE COOL KIDS

Investors with money sitting on the sidelines, listen up.

I'm on to the next big thing and need capital.

The total addressable market is every single human on the planet. The vision is to change the future of money by creating the real super app, using a new form of currency that allows every single person to do anything they want inside of it: send money, trade, buy things, invest, borrow — you name it.

Actually, "super" really understates its potential, given the fact that it will rewire the financial services ecosystem worldwide for every single person. And at the same time, the business will use its profits to fund important social causes: eliminating world hunger, poverty, the climate crisis — you name it.

From a regulatory perspective, it will be pretty much "Goldilocks perfect," checking the necessary regulatory boxes in the right jurisdictions to protect consumers — even though that's not how things operate today. We're following the tried-and-true startup credo by asking for forgiveness rather than permission, even though we are moving billions of dollars of other people's money. Yes, we are domiciled offshore, but the weather is so much better here — plus, we can try new things without having to worry too much about the regulators shutting us down before we get momentum.

To be clear, we're profitable — making money hand over fist today. Well, maybe not as much as we did a year ago — but whatever, that's life in crypto. You just never know when you might need a billion or two for that rainy day, so we're hoping you'll pony up.

I sincerely hope you don't ask too many questions about an independent board — I don't have one — nor require my CFO to be part of any diligence calls, since I don't have one of those, either. I do have a bunch of smart, young, dedicated, workaholic traders piled into the same room who all work, live and eat together. Most importantly, I have that vision

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thing — based entirely on crypto, which all of you know is the future. And even if you don't, you'll probably be too embarrassed to ask the tough questions and push back anyway.

So … you in?

What you just read is my cynical take on Sam Bankman-Fried's Series B pitch to the Sequoia partners via a Zoom call in July of 2021, which I based on the thirteen-thousand-word SBF profile piece published by Sequoia describing it. Yes, I took some liberties — but scarily, not too many.

Read that profile and you'll understand why the implosion of SBF and FTX and the crumbling of the crypto ecosystem to follow should take no one by surprise. The piece is no longer on the Sequoia website, but an archived copy can be found here.

THE CRYPTO WUNDERKIND

The Sequoia profile, one of many puffed-up pieces published about SBF and FTX published over the last seven months or so, is breathless in its portrayal of SBF, FTX and the Sequoia's team conviction that both would change the financial services world forever.

"Am I talking to the world's first trillionaire?" the author asks a Sequoia partner who replies, "Yes, I think [SBF] has a real chance at that."

Cover of the 13,000-word Sequoia profile

During the July investor pitch, which resulted in a Series B raise of $1B — boy, were they "in" — the partners seemed obsessed with the fact that SBF was answering their questions while in the middle of playing a video game. A multitasking genius, he was called, a "10 out of 10." "Goldilocks perfect" is the term used to describe the regulatory posture that FTX was pursuing, with "no concerted effort to skirt the law."

It gets better.

The story concludes with the author attributing the FTX competitive advantage to its "ethical behavior" — the Effective Altruism (EA) thesis that would plow profits back into projects that would save the world. The utilitarian lifestyle of SBF and his team, the author implies, would be the FTX north star and keep it on the right path.

"I know who I'd rather trust my money with: SBF, hands-down. And if he does end up saving the world as a side effect of being my banker, all the better," is how the story, published on September 22, 2022, ends.

That conclusion is remarkable because it comes after the author details SBF's efforts to open a foreign bank account in Japan when launching Alameda Research, the entity that made a business monetizing the spread between bitcoin prices in the U.S. (lower) and Japan/South Korea (higher) — at the time, anyway.

As any FinTech that's tried knows, getting a bank account in a foreign country is hard, by design — particularly so when crypto is involved, given the KYC, AML, citizenship rules, caps on withdrawals and central bank monetary controls. Undaunted, the story describes how SBF tapped an EA "tribe" member in Japan to help. As a Japanese citizen, the story goes, SBF's "secret weapon" persuaded "the [only] one obscure, rural" financial institution in Japan to agree to move funds in and out of the Alameda bank account. For a fee, of course.

No wonder the story was taken down.

ARE YOU IN?

Sequoia was far from the only investor snookered by SBF, FTX and his vision for the future.

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Vogue spread from April 2022 featuring Gisele Bundchen with Sam Bankman-Fried

Vogue spread from April 2022 featuring Gisele Bundchen with Sam Bankman-Fried

A slew of well-respected investors lined up to give him money — on eye-popping valuations.

Celebrities were captivated by his “altruistic” mission: to make FTX successful just so he could give the money all away. (Or most of it, depending on who asked the question and when.) They wanted to be part of the EA movement.

It was SBF’s commitment to give one billion dollars to charitable causes between April 2022 and April 2023 that persuaded Gisele Bundchen to serve as FTX’s Head of Social and Environmental Initiatives. In April 2022, she and SBF were featured together in a full page spread in Vogue to appeal to female fashionistas who wanted to save the world and expand SBF’s reach to the fashion brands. Taking part meant “getting in” on FTX and crypto.

“Are you in” was the tag line of the commercials that Bundchen and her then husband Tom Brady appeared in when first promoting the FTX app in the Fall of 2021. “This is big,” Bundchen exclaimed in those ads. A year later, a commercial featuring Brady using a flame thrower to thaw Bitcoin from a block of ice hyped the FTX app as the antidote to the crypto winter.

They were far from the only celebrities lured by SBF’s persona: a cool kid, but not a slick and flashy cool kid. A smart kid who drove a Toyota Corolla, who seemed so much smarter than the average cryptopreneur. One motivated by doing good things, working 24/7/365 to pull it off without ever being pressed on the important details.

The crypto savior, the white knight, the J. P. Morgan of our times.

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PLEASE DON’T ASK, SO I DON’T TELL

SBF interviews were softballs, even by the most respected journalists and public figures. No one asked tough questions, and no one followed up when the answers to quasi-tough questions didn’t make any sense.

For example:

When SBF was asked in September of 2022 how much he had given away, the answer was vague: “I think $100M,” he replied, without saying specifically what charities got his millions.

There was no follow-up asking who, when and how much.

When David Rubenstein asked SBF in a September 1, 2022 interview how he funded the bailout of Voyager and BlockFi, here’s how he answered:

“There were a few different versions of it. And one piece of this was the FTX balance sheet. We keep our corporate cash in dollars, and so we have raised a few billion dollars over the last couple of years, and we are a profitable business. Now we have also done some acquisitions which partially balance that out. But we had some cash left, and with the BlockFi deal for instance — that was on, I think, the FTX US balance sheet.”

Huh?

Rubenstein’s next question was whether SBF was bothered by being referred to as the J. P. Morgan of crypto, since he was bailing out entities like Voyager and BlockFi.

“Not too much,” he replied, adding, “it was the right thing to do” and that the goal was to do “an okay deal” that didn’t get their “faces ripped off.”

Words of wisdom for all you deal makers out there: do okay deals

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that don't get your faces ripped off.

In all fairness, those questions were better directed to the FTX or Alameda CFO.

Oh wait — there isn't one. Or, at least, not one that's listed on LinkedIn for either the FTX US business or Alameda Research. If you're out there and just forgot to update your LI profile, give us a shout. There are a lot of people that would like to ask you a few questions.

Like this one:

How is it that when every other crypto exchange was getting crushed in the summer of 2022 — with Bitcoin having lost 50% of its value by June in the face of the Terra Luna collapse in May and with trading volumes down — FTX was seemingly immune, and had the cash to bail other players out?

What we know now is that it wasn't.

The FTX business was great if the spreads were favorable, and the value of FTT tokens reflected that dynamic. The bankruptcy filing that reports $900M in liquid assets against $14B in liabilities suggests that not all was champagne and roses in FTT token land. Even less so as news of their liquidity crisis was made public a week ago today.

Knowledgeable crypto experts speculate that the FTX "bail out" of Voyager and BlockFi in July was intended to avoid a run on FTT tokens and a liquidity crisis back in the summer. What seems clear is that SBF knew then, or should have known, there was trouble brewing. Which just happened to be at about the same time that the SBF and FTX publicity tour went into high gear, seemingly to boost confidence in both — to bolster the image of the crypto white knight who said he was out to save the day, who said he did so out of the goodness of his heart because no one else could or would step up.

Some reports claim that this cool kid used customer money to provide liquidity to Alameda Research, using a backdoor to move FTX funds to Alameda that he created and only he had access to and could use. The

DOJ and SEC wagons are now circling. SBF is now reported to be under criminal investigation in the Bahamas.

We will have to wait for the investigations to let us know for sure. Given how much has been uncovered under the rocks of FTX in the last few days it is likely, from experience, that a lot more will be revealed over the coming months.

Where Were the Adults in the Room?

Unfortunately, we've seen this movie before. The cast of characters changes, but the ending is always the same. The business implodes, the cool kids flame out, and people say that we should have seen the red flags and done something sooner.

The most recent example is Elizabeth Holmes and Theranos. Holmes was a smart, articulate cool kid out to change the world of blood tests in her Steve Jobs-esque black turtleneck. A kid growing up afraid of needles, or so she said, who created the next big thing that required only a pin prick on a finger and a drop of blood to diagnose hundreds of diseases. The story was compelling, the storyteller convincing enough to get the likes of Henry Kissinger and George Shultz on her board and investors to plow $700M into the company at a $10B valuation. And Walgreens to test it.

This without a single medical advisor on the Theranos board and without a single piece of published research to support her claims — both de rigueur when creating and funding a breakthrough in medical science. No one wanted to be ridiculed for asking important questions. And, if it was good enough for Henry Kissinger, it must be good enough for the rest of us. But at least Theranos had an independent board that could have and should have asked questions.

So why was SBF allowed to operate the business without an independent board — or, it appears, even a prominent CFO — and why didn't investors insist on that? Why were SBF and FTX allowed to operate in a highly risky space that involved moving

money between accounts and across borders without either, when every other business of any size or consequence has both?

I suspect that no one felt they could push back or ask the tough questions for fear of being denied access to the cool kid who was going to change the world. Or risk being ridiculed for not being “smart enough” to understand the vision that only cool kids at the cool kid table could fully comprehend.

A lot of people will lose a lot of money, and it will take time before the full extent of this crisis will be known — a crisis that was largely avoidable if investors had done their job and the media with access to him had done theirs.

Now it will be up to the regulators, lawmakers and the courts to do theirs.

When John Pierpont Morgan bailed out the banks in the 1907 crisis, he pulled together a bunch of bankers to save those worth saving. What came out of that crisis was the creation of the Federal Reserve, our central bank, and regulations protecting banks and consumers from bank runs.

What regulation comes out of this, we will yet see. It may be that SBF turns out to be the J. P. Morgan of crypto after all, but in a much different way than he intended — or the hype machine portrayed.

J. P. Morgan helped save a real financial system that supported the emergence of American industry in the late 19th and early 20th century.

SBF, and the collapse of FTX, may lead more and more people to ask an important question: When it comes to crypto, is there any there there? The ecosystem once valued at $3 trillion dollars is now worth $825 billion almost a year to the day later.

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NOVEMBER 28, 2022

THE GREATLY EXAGGERATED DEMISE OF ALEXA, ECOMMERCE AND THE CARD NETWORKS

Almost 57 years ago to the day, the 1960's rock band The Byrds appeared on the Ed Sullivan Show to sing their number one hit "Turn, Turn, Turn." A song originally written by Pete Seeger in the 1950's, it's said to be one of the few songs based on Biblical verses to rise to the top of the Billboard charts. The lyrics, adapted from Ecclesiastes 3:1-8, suggest that the natural order of life includes a time and place for everything — including a time to die.

Reading much of the mainstream press lately, one comes away thinking that the time and the place for the card networks, eCommerce and Alexa is more yesterday than tomorrow.

The card networks, the Financial Times reports, are destined to suffer the same fate as the Kodak camera at the hands of Elon Musk, crypto, Alipay, and Apple, among others.

The requiem has all but been written for the "colossal failure" that is Alexa, Amazon's expensive and unprofitable distraction.

And we might as well just stick a fork in eCommerce, since COVID artificially inflated its relevance; consumers now shop like it's 2019, ditching online in droves as they return to the physical store.

In some sense, none of these prognostications are new.

Analysts and pundits have been predicting the end of the card networks for decades, egged on by a series of new payments schemes over that time with "merchant-friendly" business models. The media panned Alexa from the beginning as a personal assistant in need of "smarts." And the digital transformation of retail was its future for most of 2020 and 2021, until eCommerce's triple-digit growth fell back to double digits and analysts said, "never mind."

So, maybe there is a time and a place for everything. Like a time for using data and frameworks to understand the dynamics of platforms and how they ignite

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and scale before we declare them dead or dying.

THE KING IS DEAD, LONG LIVE THE KING!

The general-purpose credit card will turn sixty-seven next year. The path to ignition over almost seven decades was wrought with the challenges facing any network trying to get off the ground: getting a critical mass of merchants and consumers on board, further complicated by creating a business model with the incentives for banks to issue those cards to consumers. Then, add the not-so-insignificant development of the technology necessary to clear and settle transactions between merchants and those issuing banks to provide liquidity for all parties.

Not surprisingly, banks struggled to make profits in the beginning as cards were issued with little more than a rudimentary credit check to get accounts and drive volume. Fraud ran rampant. Paper-based processes were no match for consumers who racked up balances and couldn't repay, nor for bad actors who gamed the system without any intention to ever pay. Some banks got so frustrated that they considered pulling the plug.

> **There's a time for using data and frameworks to understand the dynamics of platforms and how they ignite and scale before we declare them dead or dying.**

Here's a great read documenting the birth of the credit card industry that is a must-read for anyone in and around it.

Today, Mastercard and Visa combined have 6.7 billion cards in circulation, an increase of 6.3 percent year over year. 63 percent of U.S. adults used a debit or credit card at the physical or digital point of sale to pay the last time they purchased groceries.

In the U.S., among consumers who made an online purchase in the last 30 days, 52 percent paid with a stored debit card at least once and 45 percent used a stored credit card. In the ten other markets PYMNTS has studied since January 2022, 43 percent of consumers used a network-branded card (debit or credit) to make their last purchase in store and 37 percent did so online.

The reason for branded cards' consumer popularity can be summed up in two words word: certainty and trust. Consumers can stick a debit or credit card in their pocket and go just about anywhere in the world and make a purchase. Digital card issuance makes that possible for any number of general-purpose mobile wallets, too.

Consumers know what to do if the item they purchased needs to be returned. If their card is lost or stolen, consumers know that their issuing bank has their back. For the approximately half who are credit card revolvers, the ability to use one card to pay at any store and then manage their cash by repaying over time is the appeal. For consumers who don't revolve, getting 20 or 30 days of float before settling the bill makes using them easy and convenient. Contactless cards make the process at checkout faster and easier than ever, something that became particularly convenient during COVID. Both Visa and Mastercard report the massive shift to contactless at the point of sale over the last 24 months.

GETTING TO IGNITION

After their launch around 1966, it would take about two decades for credit cards in the U.S. to ignite and begin to scale, a tipping point buffeted by a long period of economic stability in the U.S. in the 1980s. It would take about 15 years for debit cards to get real traction.

Throughout, Visa and Mastercard continually invested to improve the speed and security of their rails to clear and settle volumes at scale globally and harden their systems against the growing cyber threat. Their global rails have become the foundation upon which FinTechs have built their own businesses, leveraging the ninety-two million global endpoints that they provide and the clearing and settlement capabilities they enable.

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That's not to say that something new couldn't or won't emerge to chip away at the share that they have globally. It's also not a news flash to Mastercard and Visa that challengers are circling the waters.

The card networks' investments in a variety of initiatives — installments, push to card/instant payments for P2P, retail and commercial use, tokenization, network-of-networks/network-as-a-service model to enable any form of payment between consumers and businesses across their rails, cross-border and domestic payments initiatives, and virtual card programs for retail and commercial use cases — acknowledge the threats to their core business.

These investments acknowledge the traction that once-nascent payment alternatives like Buy Now, Pay Later, Open Banking and Real Time/Account-to-Account Payments are getting in many global markets — and the potential challenge they could pose in the future. Not to mention the divided loyalties of banks who see the opportunity to leverage their lending, compliance, and treasury services capabilities to reach new customers and power new business models.

> **It's not a news flash to Mastercard and Visa that challengers are circling the waters.**

In the B2B payments space where so much friction remains, the card networks acknowledge both the opportunity and the challenges they face to be competitive — and the products, business models and partnerships necessary to be at the decision-makers' table.

But any successor must overcome the classic chicken-and-egg problem, complicated in payments by the massive requirement to process trillions of dollars of payments volume every year securely, reliably and in compliance with global regulators.

That's what wannabees must convince stakeholders — issuers, merchants, and consumers — they will do, so that

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stakeholders have incentives to switch to something new: a trusted network with a business model that can help them drive their profits at scale and preserve payments choice for consumers and businesses.

DON'T SWEAT THE IRRELEVANT STUFF

That's why no one should be at all worried about Elon Musk and Twitter's Everything App.

Consumers may want the simplicity of a single app for their banking and payments transacting — and Musk may have payments chops and ambitions to create the "X" app — but the basis for payments and commerce is trust. When 91 percent of Twitter users say that some of what they see on Twitter is inaccurate or misleading, Twitter has a hard time checking that box for payments transactions. Just because the Chinese Super Apps got their start in messaging doesn't mean that Twitter is destined for the same success because Elon Musk says so. And right now, Twitter is not much of an Anything-Besides-Tweeting app.

I also wouldn't be too concerned about Apple on a global scale. If anything, Apple Pay demonstrates the complexity of getting a new payments network off the ground and the challenge of convincing people to use a new way to pay that doesn't offer a new source of value. After eight years, Apple Pay in the U.S. remains at 4.1 percent of retail transactions, according to the latest PYMNTS research, and even less on a global scale, excluding the U.K.

Everywhere, Apple Pay's toughest competitors are the card networks, PayPal and — outside of the U.S. — local mobile schemes. Even if Apple Pay were to suddenly gain a head of steam, it maxes out at 50 percent of the U.S. market, and even less everywhere else, given the popularity of Android phones outside of the U.S.

Right now, Apple Pay depends heavily on the card networks and card issuers for payments. For Apple Pay — or any Big Tech player — to fully challenge them,

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they would have to convince users to switch from using their registered card credentials to their bank accounts for debit purchases and create installment payments options for any purchases they wish to make using credit. Not impossible, but far from a slam dunk.

Then there's crypto. Is anyone really having this discussion now?

What will be interesting to watch is the emergence of new "on us" networks with direct consumer-merchant relationships. Two such networks exist today in the U.S. — Amex and Discover. PayPal with its 426 million active accounts (which may represent some users with multiple active accounts) is a hybrid whose success reflects the ability for consumers to use any method of payment, including network-branded cards, inside of its wallet.

Many posit that J.P. Morgan could become a successful card network challenger. The ten-year deal that J.P. Morgan signed with Visa in February 2013 gave it the ability to negotiate fees directly with merchants, which means it functions very much like a closed-loop network today with JPM card transactions processed over VisaNet rails. Then again, did I mention that was a ten-year deal?

More interesting, potentially, is how J.P. Morgan will use its investments, including those in hospitality/travel bookings services, to potentially challenge Amex and its Platinum cards for the very lucrative consumer and business travel segments.

HEY ALEXA – HOW DOES AN OPERATING SYSTEM MAKE MONEY?

Since its debut on November 6, 2014, consumers have connected more than 300 million devices to Alexa. Device manufacturers have used Alexa's APIs and SDKs to voice-enable everything from appliances to thermostats, doorbells, garage doors, security cameras, blinds and lights.

That's in addition to one hundred million smart speakers that Amazon has sold over the

last eight years and consumers who use the Alexa app on their smartphones. Some automobile manufacturers talk about their new cars not by make and model but by the voice assistant that comes with the car — Alexa.

> **What will be interesting to watch is the emergence of new "on us" networks with direct consumer-merchant relationships.**

More recently, Alexa has integrated with Matter, the open-source standard that makes devices interoperable across voice platforms and will accelerate the reality of the connected home. Matter is the voice standard that 550 tech companies have already agreed to use; 280 device manufacturers have already signed on to have their devices compatible with it. In July, Amazon released its Ambient Home Smart Home SDK for developers to embed Alexa into any device, and October of 2022 saw the first release of devices using the Matter standard.

Only three hundred million devices are powered by Alexa? No wonder the media is trashing it.

The Alexa doom and gloom headlines followed a series of stories about Amazon's cost-cutting efforts, which included slashing costs from its Worldwide Digital unit that includes Alexa. It's that unit which is said to be on target to lose $10 billion dollars by the end of 2022. Worldwide Digital includes all hardware devices, including the Echo family of voice-activated devices, as well as Prime Video. Details related specifically to Alexa and its losses are scant.

Reports speculate that Alexa is unprofitable because the sale of speakers can't cover its costs. And since consumers aren't using Alexa enough to buy things, transaction revenues aren't enough to close the revenue gap.

It's easy to see how both of those things could be true. It's also not how an operating system makes money or adds value to an ecosystem.

EMBEDDED ALEXA

Alexa is the third operating system of the digital economy — iOS, Android, and Amazon's Alexa — something that I wrote in September of 2021 after reports were first released about Amazon's slowing Echo speaker sales. Alexa is cross-platform, cross-device, and its user interface is as ubiquitous as it is easy to use: voice.

Early attempts to produce and integrate Alexa into Amazon-produced hardware were to get consumers comfortable using it, gathering intelligence about how it was used and where opportunities existed for further monetization.

The ambition, perhaps not publicly articulated as such, was to make Alexa the foundation for an ambient, always-on, voice-activated commerce ecosystem. Keep in mind that with every Alexa-enabled device, there is also an Amazon Pay credential connected to its vast commerce ecosystem.

That makes the Alexa operating system capable of making a sale and fulfilling an order without introducing any friction to the consumer or the merchant, and that capability comes embedded into the smart devices people have in their homes, and the many more they will acquire and use over time.

> **Alexa's business model is just like any other operating system: License its use, share revenue from users' sales and give advertisers a new channel to a captive audience.**

Today, PYMNTS research suggests that only 1.9 percent of consumers in six global markets use Alexa to purchase groceries and other retail items — piddly and not very much at all. Early adopters include Gen Z and Millennials, mostly for things that are not complicated to order, like groceries.

Alexa's future, though, is one where she won't wait for consumers to ask her to do things, but instead remind them to reorder items before they run out — all using intelligence based on order history and usage patterns.

Alexa will also likely use the real-time data from devices to troubleshoot maintenance problems by sending alerts and suggestions for repair or replacement. It could make those data available to third parties who want to know how to improve the quality of the products they produce. We've already seen how data from its Ring doorbells has been shared, with permission by the user, to make communities safer.

Alexa can, over time, also suggest makes and models and brands based on preferences as well as recommendations from other users.

That makes Alexa's business model just like any other operating system: licensing its use to app developers and device manufacturers, sharing revenue from sales made to those that enable it and giving advertisers a new channel to introduce their brands to a captive, relevant audience.

CLEARING THE ECOMMERCE SMOKE AND MIRRORS

Wait, this can't be right.

According to PYMNTS' 2022 national Black Friday study of 2,439 consumers, more of them shopped online on Black Friday (25.8 percent) than in the physical store (17 percent). And the number of consumers who shopped in the physical store decreased 23 percent year over year.

I guess these consumers forgot that online shopping is off the table now since we've all gone back to the physical store.

Such is the claim of analysts and pundits who point to the consumer's return to the brick-and-mortar store in 2022 as evidence of their waning appetite for digital shopping. More specifically, they say that the shift to digital during COVID was a temporary blip; now that COVID is in their rear view, consumers have all gone back to their 2019 habits. The permanent shift to digital because of the habits formed over the 2020/2021-time frame never happened.

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That's flat out wrong.

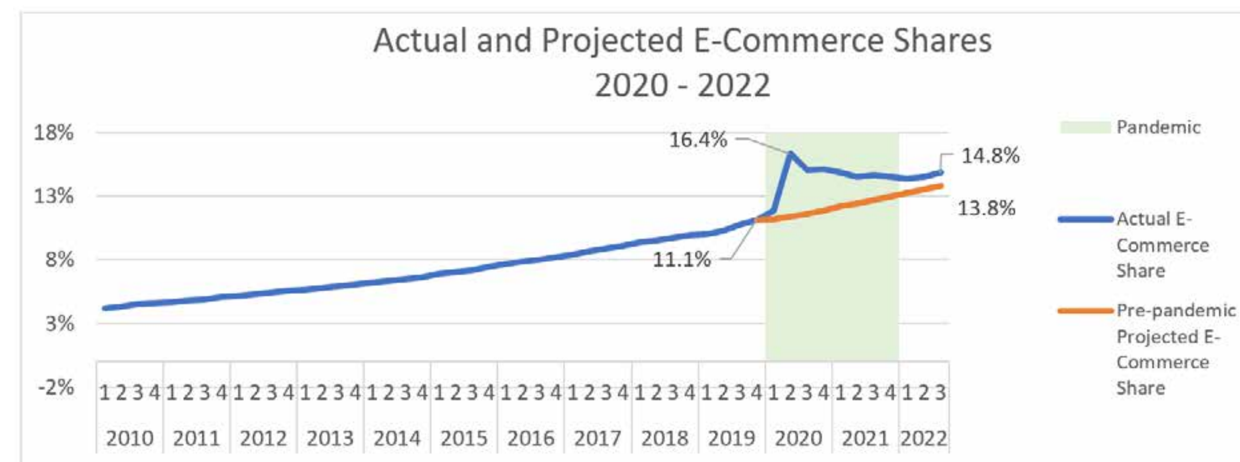
Naturally, the highest use of eCommerce channels happened in Q2 2020 — at 16 percent of sales — for the obvious reason. The levels have moved up and down since then, dropping to 14 percent by the first quarter of 2022 and more recently increasing to a seasonally-adjusted level of 15 percent in Q3 2022.

At the same time, consumers have gone back to the physical store, something that started to happen in 2021, and increased even more in 2022.

But look at this chart that compares U.S. Census data, *and projections of eCommerce sales based on e-commerce share data from 2010 to Q4 2019* (the last quarter before the pandemic began) with ecommerce sales reported by Census.

What's clear is that eCommerce did get a permanent bump because of the digital habits honed during COVID, and PYMNTS calculates that to be **approximately one percentage point higher today** than it would have been (13.8 percent) without the increase in use of digital channels by consumers between 2020 and 2022

So — big deal and so what, you might say — what's one percent? That one percent represents an additional $81.6 billion in eCommerce sales over the last four quarters, or an 8% increase in eCommerce sales that can be solely attributed to the increased use of digital channels to make purchases between 2020 and 2022. According to Census data, total retail sales over the last four quarters were $7 trillion, and $1 trillion of these retail sales were made via eCommerce techniques.



PYMNTS Actual and Projected E-Commerce Share data from November 18, 2022.

Source: PYMNTS.com, U.S. Census Bureau Data. Estimated Quarterly U.S. Retail Sales (Seasonally Adjusted): Total and eCommerce.

This analysis is courtesy of PYMNTS analysts and tested across a variety of statistical models and estimation procedures. It also reflects the silent revision by Census of their eCommerce sales estimates over the course of the pandemic, which I summarized in a piece published in May of 2022.

Soon-to-be-released PYMNTS data for six large countries shows similar patterns: even as consumers went back to the stores more than they did in 2020 and 2021, they aren't shopping in those stores as they did in 2019. Digital is down slightly, but way up over levels recorded pre-pandemic.

In fact, consumers now bucket their shopping into digital for the things they don't need to see and inspect, which is a lot of retail and CPG products, and in-store for things they would like to inspect before buying — groceries, some electronics and home furnishings.

None of this should come as a surprise. Physical retail has been in a serious state of decline since 2010 with massive store closings each year — including 9100 alone in 2019. Consumers may be heading to stores more now than they were during the pandemic, but they are still using eCommerce more than they would have had the pandemic not occurred.

And that is a fact.

For more proof, check your front porch to see how many boxes from orders placed online are there.

FRAMEWORKS AS FRIEND

Platforms power digital transformation across every facet of the global economy, many with stakeholders

who compete one day and collaborate the next. Payments have helped monetize many of these new connected ecosystems and fuel the business models that provide new ways for consumers and businesses to engage.

The interdependencies of these platforms, new ecosystems really, make them challenging to understand. Frameworks can help.

> **Digital is down slightly, but way up over levels recorded pre-pandemic.**

Successful platforms must eliminate the **frictions** that exist today and improve the outcomes for the stakeholders who drive the financial success of the platform. Eliminating those frictions must save those stakeholders **time**, their most precious asset, and **remove the uncertainty** that keeps many interested parties from making a change. And do that at scale.

Like most successful platforms that have ignited, scaled, and operated successfully for many years, observers from afar believe creating a new one from scratch is easy-peasy.

Meanwhile, I can count on one hand, without using any of my fingers, the number of innovators who've started platform businesses and said it was easy.

I'll need more than all my fingers and toes to count the ones that have crashed and burned.

With platforms, "turn, turn, turn" follows a different rhythm than life. New ones die quickly and only a few survive. Successful ones can be resilient and tough to displace, including those that have been around for some time and keep getting the job done.

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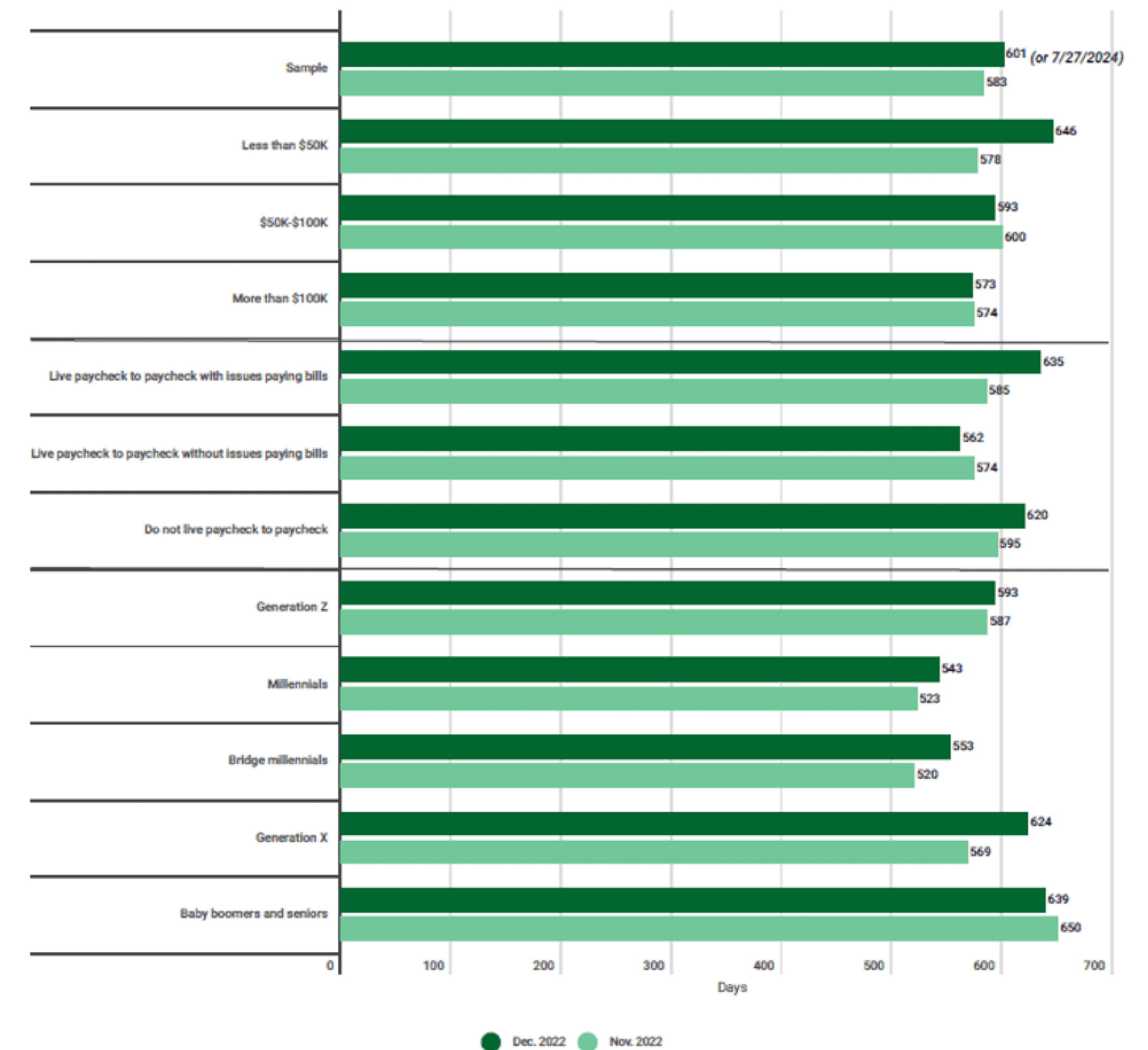
DECEMBER 12, 2022

CONSUMERS SEE HIGHER, LONGER INFLATION THAN GOVERNMENT – WHY THAT MATTERS

PYMNTS' national study of 13,250 U.S. consumers over the last seven months may tell policymakers everything they need to know about inflation expectations: consumers think it will take another nineteen months — until roughly June 2024 — for inflation to return to the Fed's 2 percent target.

Projected time to stabilization

The amount of time expected until prices begin stabilizing (in days), by demographic



Source: PYMNTS
Consumer Inflation Sentiment
N (November)= 2,379: Whole sample, fielded Nov. 3, 2022 – Nov. 7, 2022
N (December)= 2,140: Whole sample, fielded Dec. 1, 2022 – Dec. 5, 2022

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Millennials are slightly more optimistic and call it sometime around April 2024.

Perhaps more telling: month after month, according to our surveys, the consumer's inflation expectation timeline has wavered little, despite the government reporting that monthly inflation levels have moderated. If anything, the timeline has extended a month since we began fielding the monthly consumer inflation sentiment studies of roughly 2,000 consumers in July of 2022.

These inflation expectations are important for macroeconomic policy because they suggest that the Fed has a long way to go to convince consumers — many of whom are also wage earners — that their salary increases and job offers don't need to cover rising costs of living.

More importantly, these findings suggest that consumers may have a better handle on inflation than the governmental data and the economists poring over it.

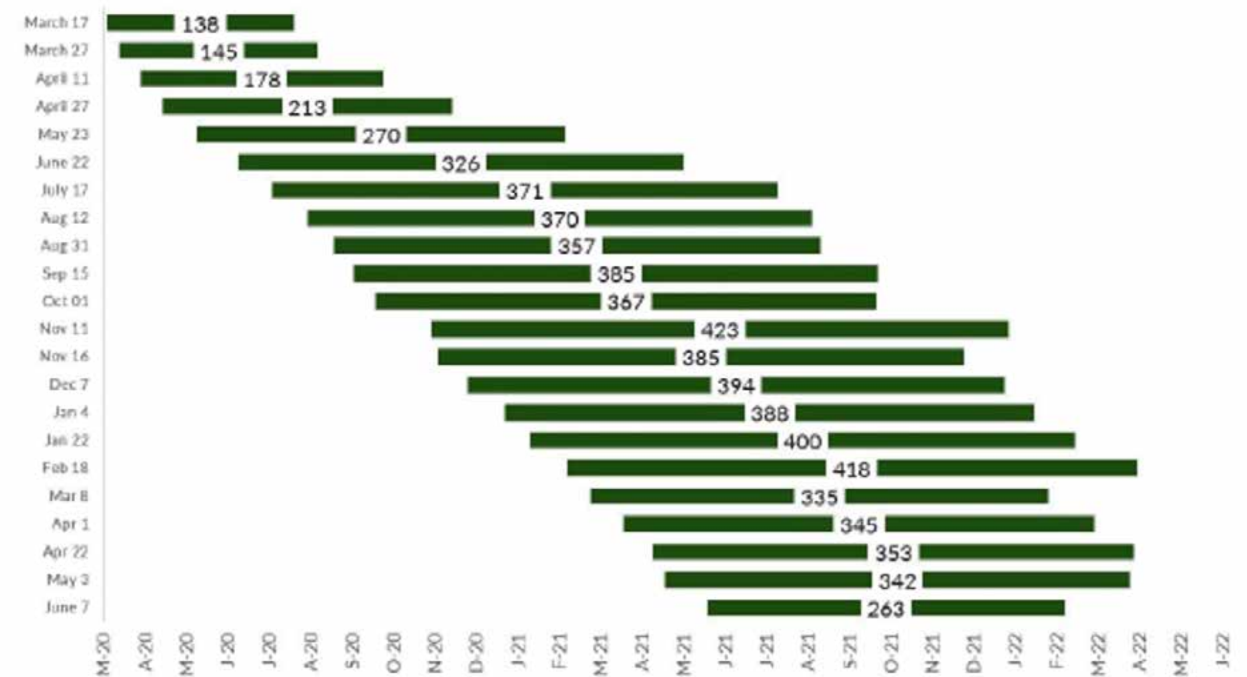
CONSUMERS CAN BE BETTER EXPERTS THAN THE EXPERTS

Our twenty months of data, collected monthly during the pandemic, shows how accurate consumers are when predicting the duration of once-in-a-generation events.

In March of 2020, when the government and epidemiologists were predicting a two-month COVID timeline, PYMNTS data reported a U.S. consumer who said it wouldn't be until the Fall of 2020 until things would "return to normal."

In May of that year, when epidemiologists said it would be Fall, consumers said February of 2021. In December of 2020, PYMNTS data reported a consumer who said it would take until the end of 2021 before COVID would be under control at a time when most everyone else predicted March of 2021.

It was the consumer who was right on the money, despite the world's foremost experts with their spreadsheets and piles of data.



Source: PYMNTS
Coronavirus Series
2,000 consumers per survey. March 2020 to June 2021

That sentiment influenced the consumer's day-to-day — how they worked, shopped, traveled, lived, had fun, ate and communicated with others. Their shift to digital was pervasive and has largely redefined the digital-first dynamics of how consumers and businesses engage today, even as consumers return to the physical world.

When faced with another once-in-a-generation event — like 40-year historically high levels of inflation — it may be the consumer who predicts inflation's level and duration more accurately and influences the market dynamics underpinning it.

The consumer who looks at her bill when checking out at the

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grocery store, scans the menu prices at her favorite restaurants and QSRs, and tallies up how much more she pays for clothes and household items now than she did in 2020 and 2021.

The consumer who calculates the gap between a paycheck that has not kept pace with the unprecedented levels of inflation and the prices staring back at her on those checkout receipts.

The consumer who reads about layoffs at companies that aren't only the FinTechs or the Big Techs and starts to worry and pulls back.

The consumer, now suddenly an expert, crafting expectations about inflation by measuring and managing the only metric that matters: her personal financial well-being.

WHEN PERCEPTION IS REALITY

Professors John Gourville and Dilip Soman wrote an article for *Harvard Business Review* in 2002 on pricing and the psychology of consumption. Their thesis is that few executives consider the relationship between how a product is priced and how consumers buy and use them.

One of their theories relates to the timing of payment and the use of a product.

They cite as an example the purchase of a theatre ticket of identical value.

Twice as many consumers who bought a ticket the day before the event said they would still attend if they woke up sick with the flu the day of the event as those who bought their ticket six months before and also became ill the same day of the performance.

Their insight: the closer the payment to the point of consumption, the more likely consumers are to use the product.

Or, in inflationary times, perhaps not buy one at all.

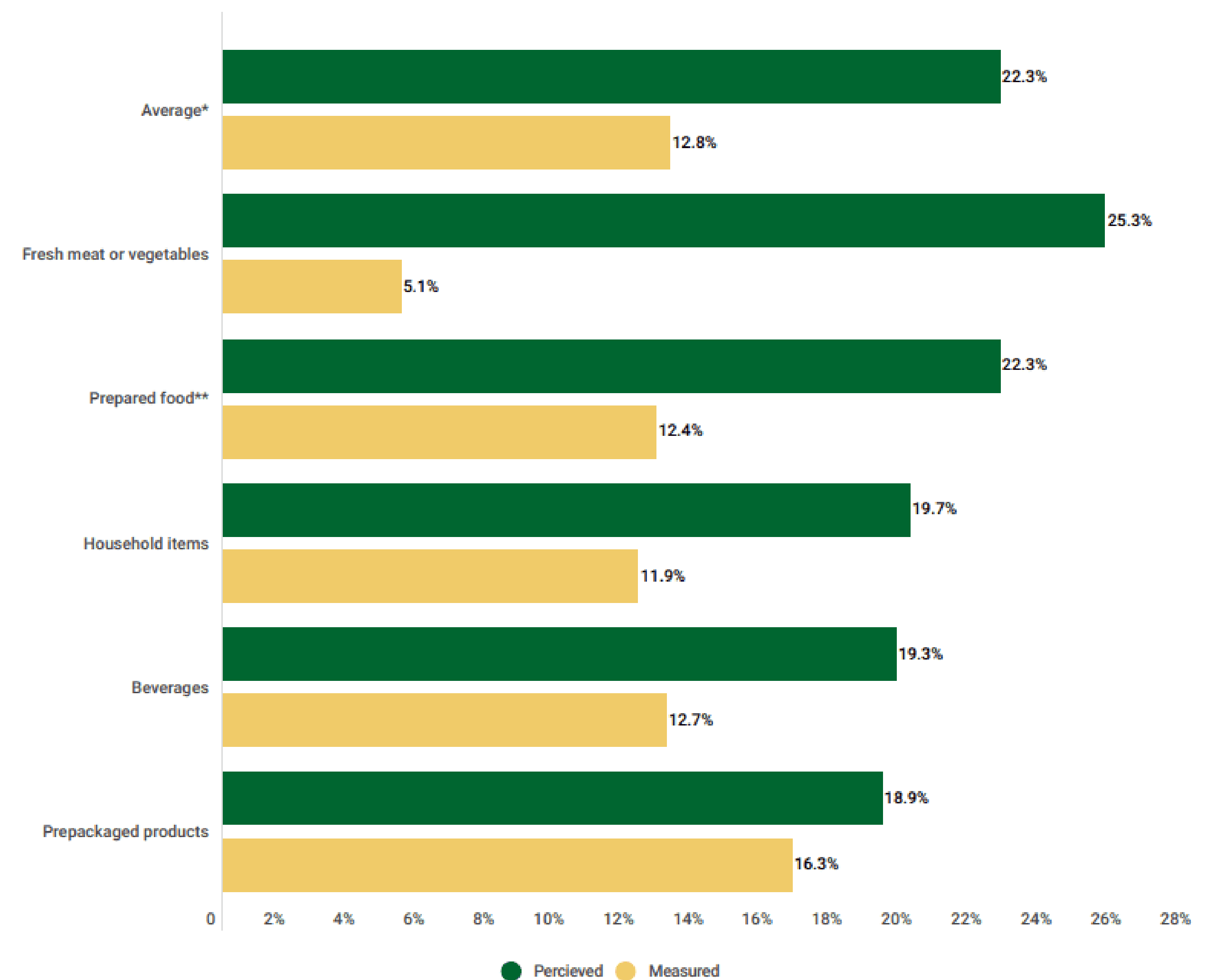
I'M FROM THE GOVERNMENT AND I'M HERE TO TELL YOU ABOUT INFLATION

Seven months of consumer data as reported by PYMNTS show that consumers consistently **say** that the prices they pay for food, gas, clothing and household essentials are more than twice as high as what government data **reports**.

For example, consumers report that food prices at the grocery store are nearly twice what CPI data reports. They report the prices of fresh meat and vegetables — the reason most

Measured and Perceived Price Increases: Groceries

Measured vs. perceived price increases. Year-on-year percent change



PYMNTS: Consumer Inflation Sentiment and Bureau of Labor Statistics
Fielded Dec. 1 to Dec. 5
N=1,887: Respondents who purchased grocery products in the last 30 days

*Average is the weighted average of listed items, weight corresponds to relative importance of the item for overall CPI as informed by BLS
** Proxy is provided when exact corresponding category is not listed in CPI readings

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consumers go to the physical grocery store — have risen at a rate five times higher than CPI reporting.

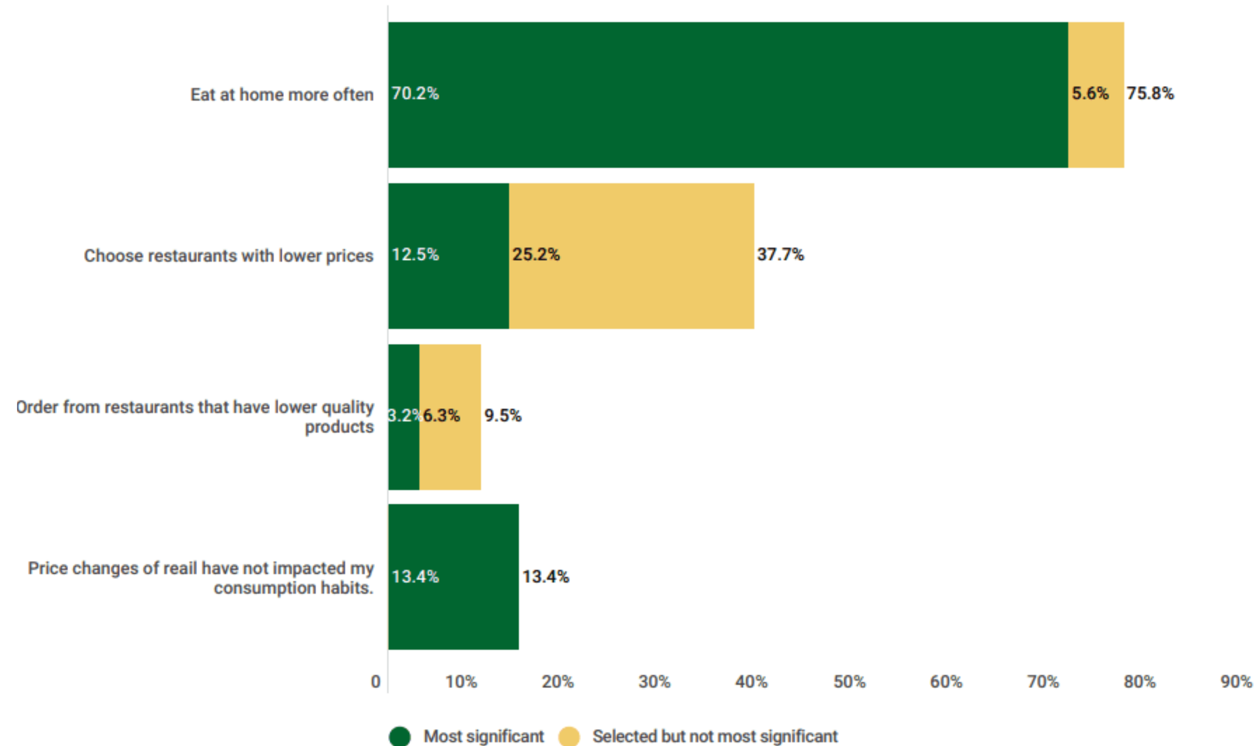
CPI data reports an increase of 8 percent in food prices at restaurants, a third less than the 12 percent increase reported for groceries. When looking strictly at government data, one might assume that eating out is more financially compelling than buying groceries and cooking food at home when compared to 2021.

However, according to PYMNTS data, three quarters of consumers say they are eating at home more often than they once did. More than a third are switching to cheaper restaurants when they do dine away from home.

Overall, restaurant customers say prices have jumped 21 percent, triple what CPI pegs

Changes in Consumers' Habits Due to Restaurant Price Increases

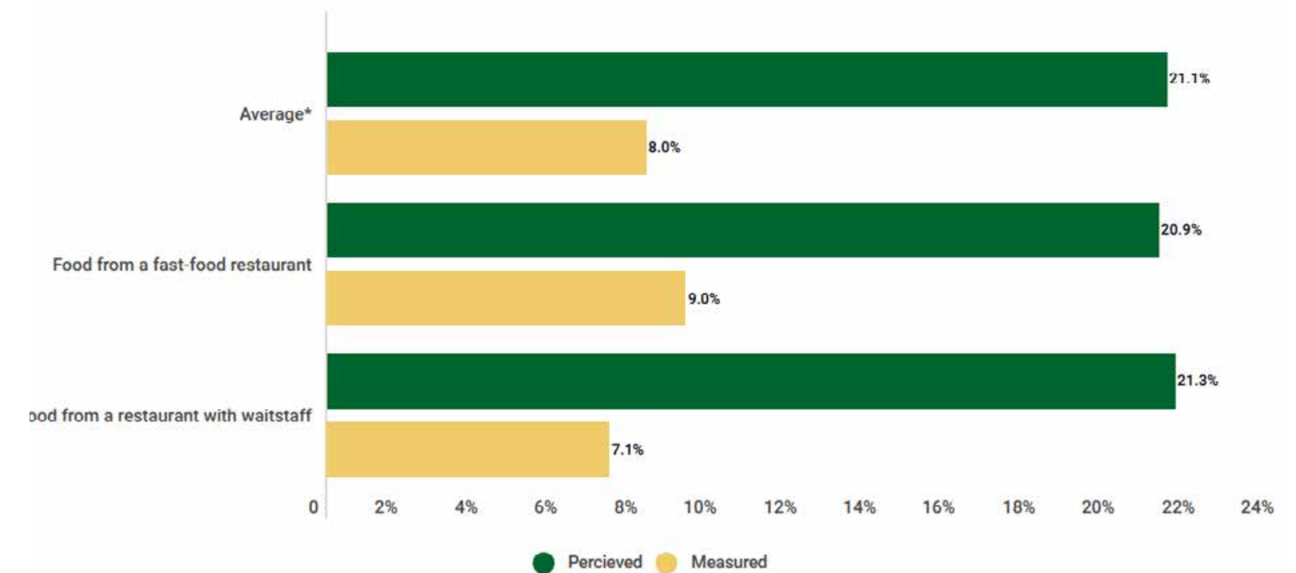
Share of restaurant shoppers citing select changes in their habits due to increases in restaurant prices



PYMNTS: Consumer Inflation Sentiment, December 2022
Fielded Dec. 1 to Dec. 5
N= 1217: Respondents who purchased food from restaurants in the last 30 days and noticed price changes

Measured and perceived price increases: Restaurants

Measured vs. perceived price increases. Year-on-year percent change



PYMNTS: Consumer Inflation Sentiment and Bureau of Labor Statistics
Fielded Dec. 1 to Dec. 5
N= :1568 Respondents who purchased food from restaurants in the last 30 days and noticed price increases

Average is the weighted average of listed items, weight corresponds to relative importance of the item for overall CPI as informed by BLS
* Proxy is provided when exact corresponding category is not listed in CPI readings

as the increase and double the CPI's measure of the upswing in food expenses. This is true wherever consumers report eating out — across cities, suburbs and small towns — and whether they eat at table service restaurants where a waiter takes their order or pick up a cheeseburger and fries at the drive-thru window.

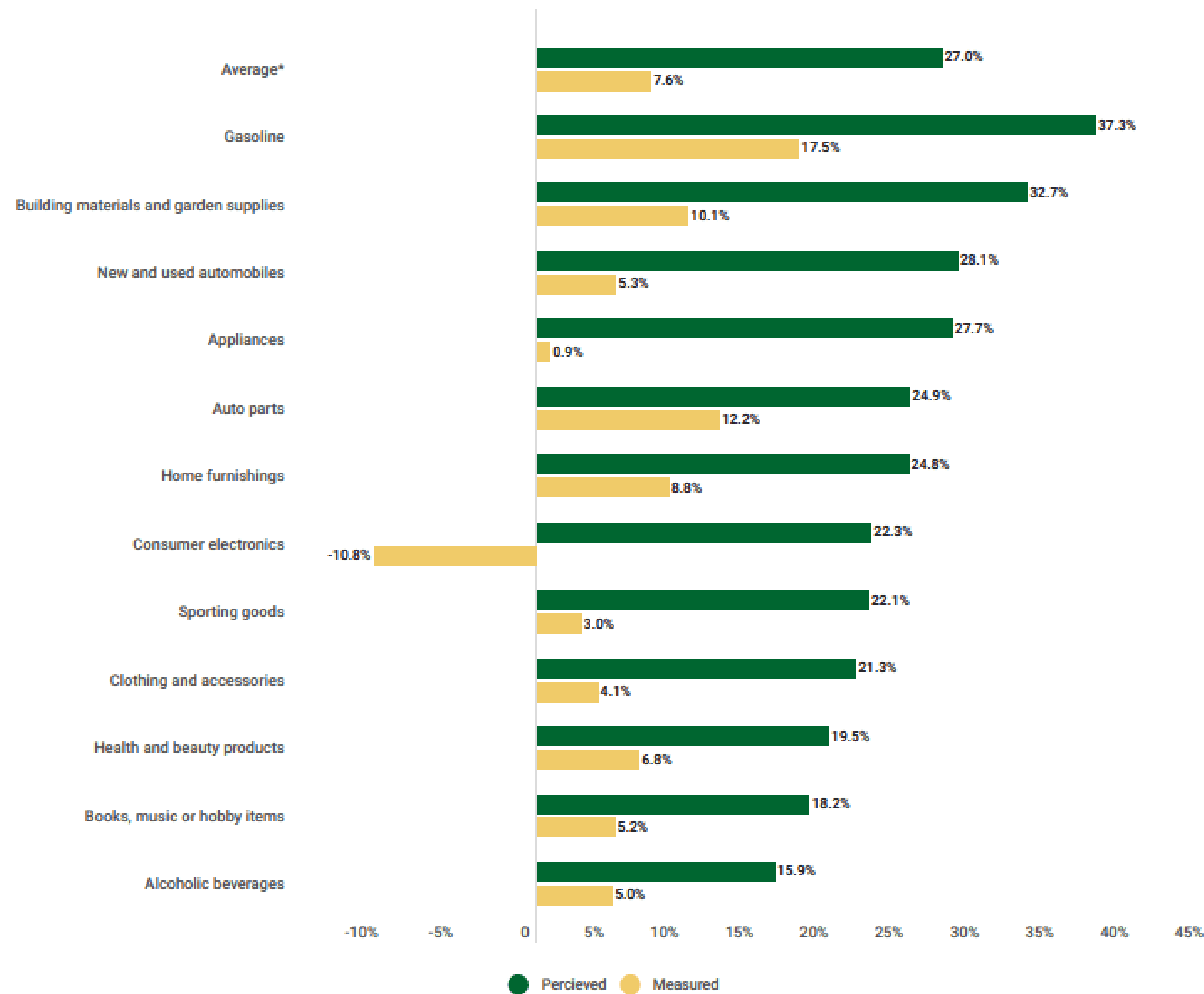
Then there's retail, where consumers report paying prices that are about four times higher than CPI reported data: 7.6 percent is the average increase in retail prices, according to government data, compared to the 27 percent consumers report across all retail categories.

Included in that total is gasoline — despite lower gas prices, consumers still report what they pay for gas to be twice as high as what CPI reports.

Clothing prices, consumers say, are 21 percent higher; CPI reports an increase of

Measured and Perceived Price Increases: Retail

Measured vs. perceived price increases. Year-on-year percent change



PYMNTS: Consumer Inflation Sentiment and Bureau of Labor Statistics
Fielded Dec. 1 to Dec. 5
N= 1,254: Respondents who purchased retail products or services in the last 30 days

*Average is the weighted average of listed items, weight corresponds to relative importance of the item for overall CPI as informed by BLS
** Proxy is provided when exact corresponding category is not listed in CPI readings

4 percent — a gap of seven times. The only reason that there is a decrease in consumer electronics prices is that CPI data controls for the quality of product; the "same" product gets cheaper each year even as technology improves the quality.

So, what gives?

The classic perception/reality disconnect?

Or perhaps the timing of the payment to the point of consumption, which defines the consumers' reality and determines what they buy.

For the consumer, it's their basket, not the government's, that matters. And, as the Fed well knows, it is consumers' perceptions and expectations that can drive the wage-price spiral behind the inflation dynamics.

TRADING DOWN AND DOWN EVEN MORE

As of Q3 2022, according to BEA estimates, U.S. consumers spent 98 billion dollars more in everyday goods and interest payments than Q3 2021. That number is expected to climb as prices remain high, interest rates rise and more consumers take on debt and revolve those balances.

Today, nearly all U.S. consumers — 85 percent — say inflation has changed their spending habits. Not surprisingly, consumers who say their paychecks lost the greatest amount of purchasing power are the most likely to cut back on nonessential spending and switch to cheaper merchants and products.

Paycheck-to-paycheck consumers, who struggle to pay bills and are dipping more into savings to make ends meet, have made the most severe adjustments. They also remain the most pessimistic about their overall financial prospects and the state of the U.S. economy.

Yet even 59 percent of those who say their spending power hasn't taken any or as much of a hit are cutting back on non-essential purchases. The same consumer with a good job and a steady paycheck who may have felt flush last year when housing prices were up and investment accounts were growing double digits may not be as willing to spend right now, even if they can.

Regardless of why, all consumers are adjusting. Most are trimming the things that they don't

consider essential to some degree. Consumers who buy retail and grocery products are three times more likely to eliminate the nice-to-haves than buy lower-quality substitutes.

More than half of consumers (54 percent) are hunting for deals, with many more willing to leave their favorite merchants for those with lower prices when buying retail products.

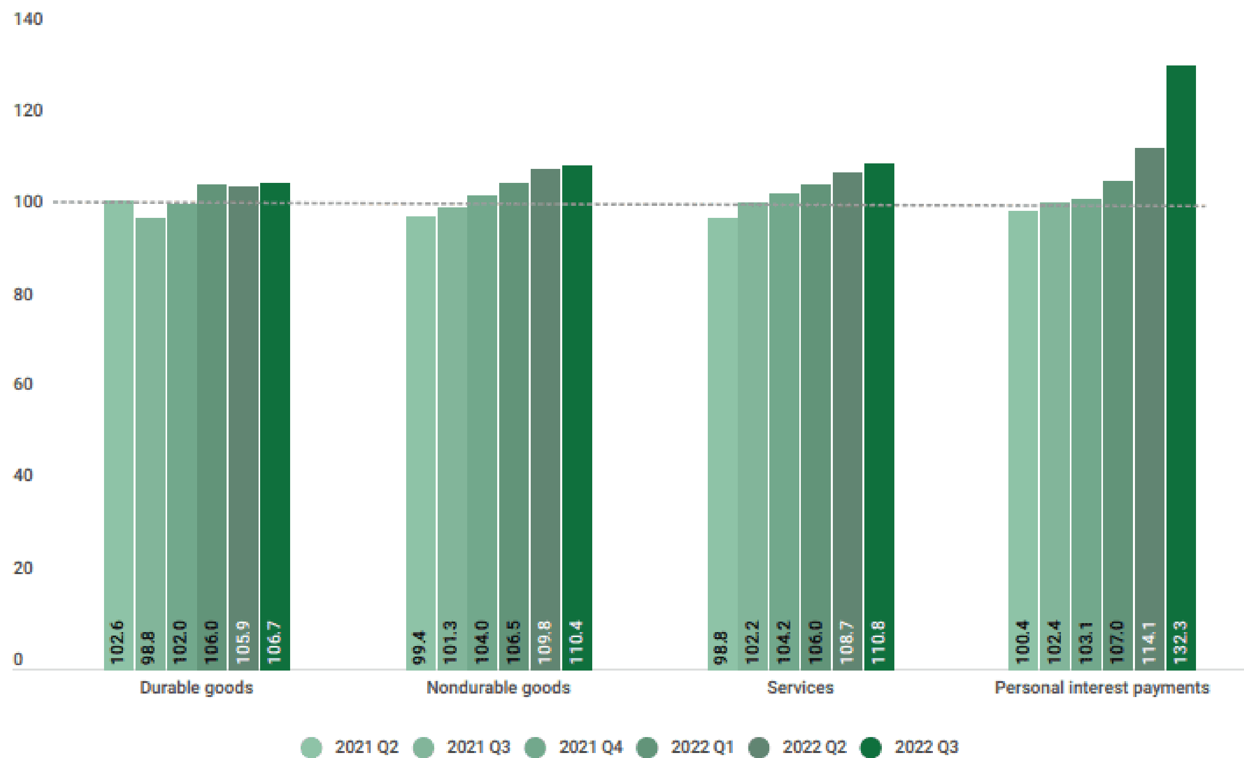
Change in consumption expenditures 2021-2022

In Billions of Dollars (Seasonally Adjusted)

	Q3 2021	Q3 2022	Change (billion)	Change %
Personal consumption expenditures	4,036.8	4,379.3	342.5	8.5%
Goods	1,379.3	1,497.9	118.6	8.6%
Durable goods	508.8	549.7	40.9	8.0%
Nondurable goods	870.6	948.2	77.7	8.9%
Services	2,657.6	2,881.4	223.9	8.4%
Personal interest payments*	70.3	90.8	20.5	29.1%

*Nonmortgage interest paid by households.

Quarterly Personal Consumption Expenditures. 100= 2021 Average



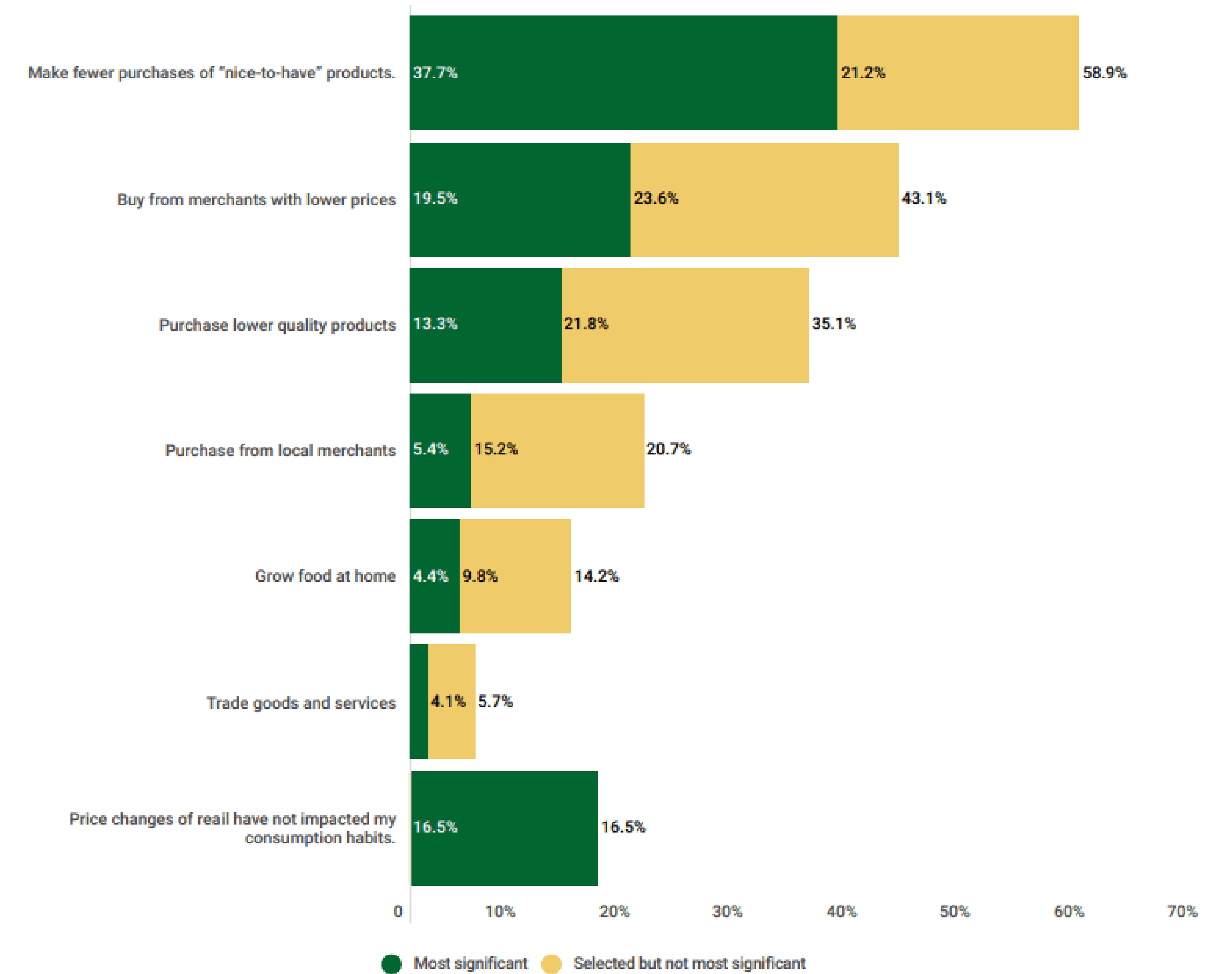
Bureau of Economic Analysis.Personal Income and Outlays. Retrieved December 2022. https://www.bea.gov/data/income-saving/personal-income

Consumers are also more inclined to use what they have or buy lower quality than buy used items when purchasing retail products — interesting when examining the financial pressure now experienced by reCommerce players

When it comes to eating out, nearly four in ten consumers say they are trading down to

Changes in Consumers' Habits Due to Grocery Price Increases

Share of grocery shoppers citing select changes in their habits due to increases in the price of groceries



PYMNTS: Consumer Inflation Sentiment, December 2022
Fielded Dec. 1 to Dec. 5
N= 1,696: Respondents who purchased grocery products in the last 30 days and noticed price changes

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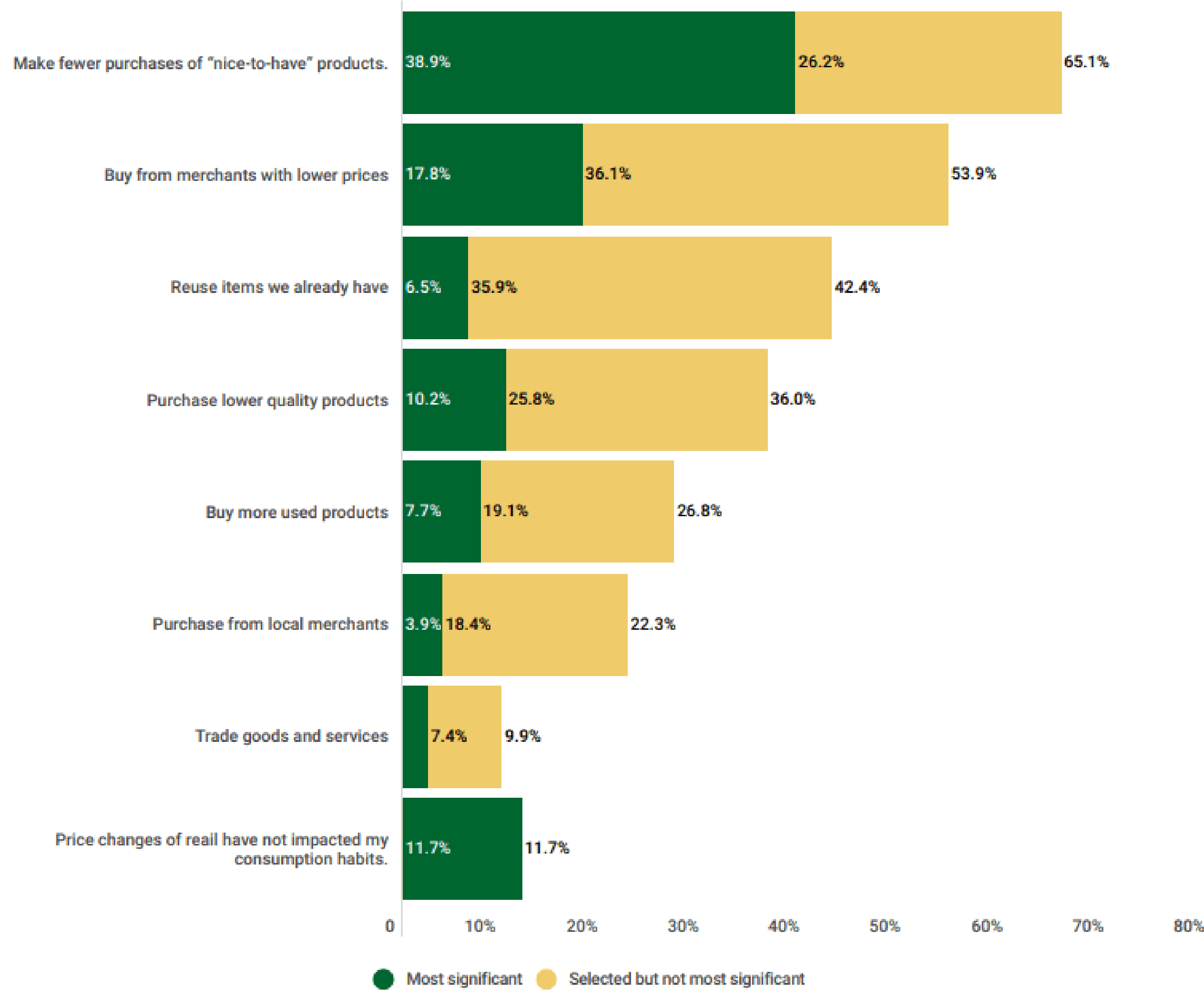
Changes in Consumers' Habits Due to Retail Price Increases

Share of retail shoppers citing select changes in their habits due to increases in the price of retail items



PYMNTS: Consumer Inflation Sentiment, December 2022
Fielded Dec. 1 to Dec. 5
N= 1,161: Respondents who purchased retail products in the last 30 days and noticed price changes

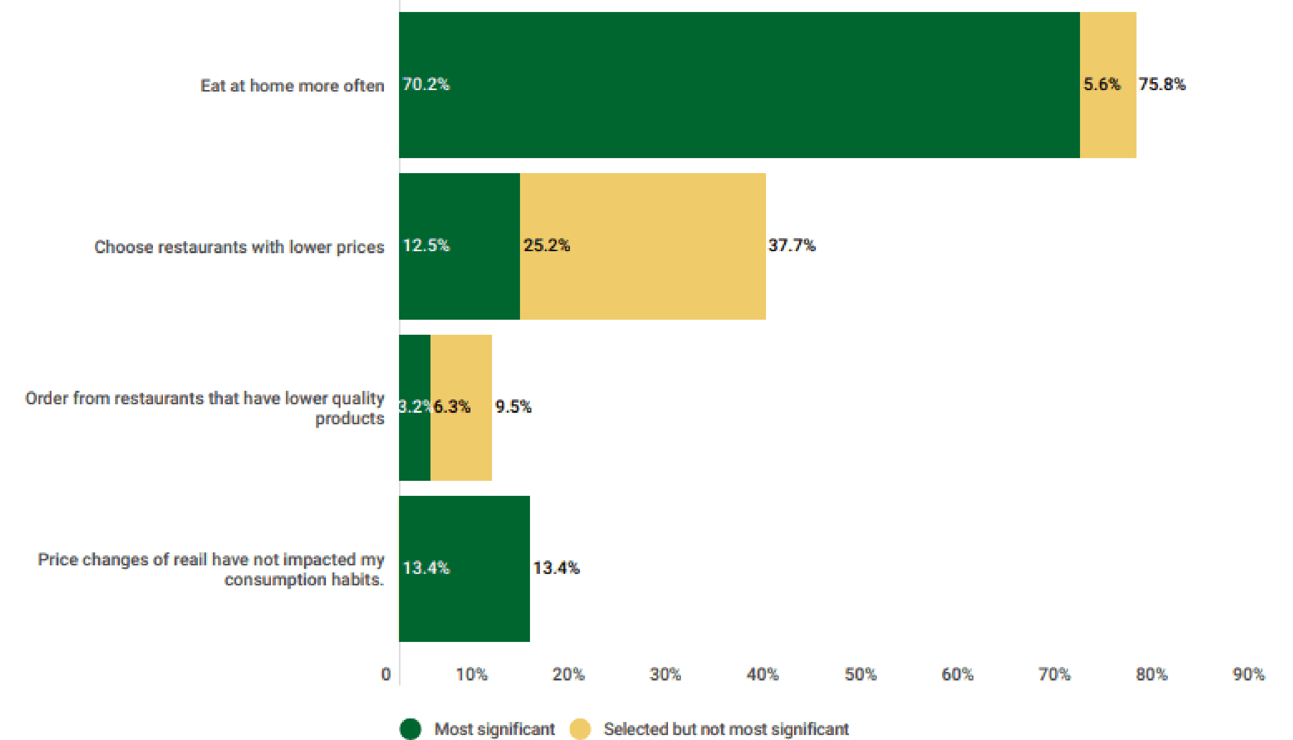
restaurants with cheaper prices. Even more (76 percent) are eating more at home where consumers have much more control over how much they spend on food, in total.

THE CASE FOR CONSUMER CERTAINTY

Walmart is running a holiday commercial whose hero image is an itemized grocery receipt

Changes in Consumers' Habits Due to Restaurant Price Increases

Share of restaurant shoppers citing select changes in their habits due to increases in restaurant prices



PYMNTS: Consumer Inflation Sentiment, December 2022
Fielded Dec. 1 to Dec. 5
N= 1217: Respondents who purchased food from restaurants in the last 30 days and noticed price changes

for Christmas dinner with all the trimmings.

The receipt has two columns: 2021 and 2022. The commercial scrolls down the receipt comparing the cost of specific products at a line-item level — with some higher than last year, and some lower. The commercial ends with the receipt total identical to what was spent in 2021, maybe 50 cents cheaper.

It would be hard to imagine an outcome any different — after all, why would Walmart show an itemized list with prices that wouldn't reflect an outcome in Walmart's favor? Especially when all of the data shows a consumer very much aware of grocery prices.

The Walmart commercial seems to tap into the consumer's desire for predictability and certainty, where the stakes are high — the holiday dinner at home with family.

That's consistent with PYMNTS data that show a U.S. consumer who would rather cut out or cut back than cut quality, a consumer who can control both her spend and the outcome of her spend without creating uncertainty about whether what is purchased will meet her expectations.

THE LONG ROAD TO JUNE 2024

The consumer attitudes that we report about inflation and its duration should give everyone pause.

Consumers are beginning to really cut back in response to the perception — and maybe the reality — that prices keep climbing. And they don't think the Fed is going to get those price increases back down to a normal 2 percent or so a year until mid-2024.

But then the Fed may have to step up its efforts to tamp down these expectations.

If consumers cut back on purchases, in inflation-adjusted dollars, and the Fed feels it has to keep ratcheting up interest rates, 2023 could be a rough economic year for retailers.

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ABOUT

PYMNTS

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