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What's News

World-Wide

Biden will increase the cap on refugee admissions for the rest of this fiscal year by May 15, the White House said late Friday, after an executive order keeping it at a record low 15,000 earlier in the day drew swift backlash from progressives. **A1**

◆ **J&J** privately reached out to Covid-19 vaccine rivals to ask them to join an effort to study the risks of blood clots and speak with one voice about safety, but Pfizer and Moderna declined. **A6**

◆ **China** is planning to approve its first foreign Covid-19 vaccine before July as pressure mounts from domestic scientists and the foreign business community to expand beyond the country's own roster of shots. **A7**

◆ **West Point**, in the wake of a cheating scandal, will end a policy that for years protected wayward cadets from being kicked out. **A1**

◆ **Russia** said it would expel 10 U.S. diplomats and bar a number of senior U.S. officials from entering the country in response to measures taken against Moscow. **A7**

◆ **Raúl Castro** announced that he was stepping down as chief of Cuba's ruling Communist Party. **A8**

◆ **Iran** said it had enriched uranium at 60% purity for the first time. **A8**

Business & Finance

◆ **Investors** are cooling to one of the hottest bets on Wall Street as new regulatory scrutiny of special-purpose acquisition companies cuts the flood of new issues to a trickle and share prices drop. **A1**

◆ **Apple Music** disclosed to artists that it pays a penny per stream, according to a letter viewed by The Wall Street Journal. **A1**

◆ **Morgan Stanley** lost \$911 million when Archegos imploded last month, tarnishing a record-setting quarter for the Wall Street firm. **B1**

◆ **New estimates** from the Fed suggest that the economic toll from the pandemic for smaller businesses wasn't as bad as feared. **B1**

◆ **The Dow and S&P 500** rose 0.5% and 0.4%, respectively, with both indexes closing at records. The Nasdaq gained 0.1%. **B11**

◆ **Boeing** said a potential electrical problem in 737 MAX jets affects more areas of the aircraft's flight deck than previously known. **B3**

◆ **NASA awarded** a contract to SpaceX to build a new capsule to land astronauts on the moon. **B10**

◆ **Turkey will ban** the use of cryptocurrencies as a form of payment. **B11**

NOONAN
Republicans
And Immigrants
Need Each Other **A13**

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Gunman Kills Eight People at Indianapolis FedEx Facility



CARNAGE: A body was taken away on Friday after an assailant shot and killed eight people and wounded several others Thursday night at a FedEx site in Indianapolis. Authorities said the 19-year-old suspect, a former FedEx employee, killed himself. **A3**

Biden to Increase Refugee Cap After Outcry by Progressives

By MICHELLE HACKMAN
AND TARINI PARTI

WASHINGTON—In a reversal, President Biden will increase the cap on refugee admissions for the rest of this fiscal year by May 15, the White House said late Friday, after an executive order keeping it at a record low 15,000 earlier in the day drew swift political backlash from progressives.

The initial order, which the

White House announced mid-day Friday, eliminated restrictions the Trump administration had put in place concerning which types of refugees qualify under the cap, but left the limit at 15,000 refugees for the year ending Sept. 30.

In February, Mr. Biden had promised to raise the cap to 125,000 for the next fiscal year, and that he would make a "down payment" toward that goal for the current year. The

order signed Friday surprised many in his party.

"Completely and utterly unacceptable," said Rep. Alexandria Ocasio-Cortez (D., N.Y.) in a tweet after the executive order was announced and before the later statement. "Biden promised to welcome immigrants, and people voted for him based on that promise."

A White House official said ahead of the signing of the initial order Friday that the ad-

ministration hadn't ruled out increasing the cap this fiscal year and would revisit the issue once the 15,000 cap was reached.

Later in the day, following a wave of criticism, the White House said Mr. Biden would set a final, increased refugee cap for the remainder of the fiscal year by May 15.

A group of House Democrats, led by Rep. Ilhan Omar

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Apple Tells Music Artists What It Pays Per Stream

By ANNE STEELE

Apple Music told artists it pays a penny per stream, according to a letter viewed by The Wall Street Journal.

The disclosure, made in a letter to artists delivered Friday via the service's artist dashboard and sent to labels and publishers, reflects music-streaming services' increasing efforts to show they are artist-friendly.

Apple Inc.'s move can be seen as a riposte to Spotify Technology SA, which last month shared some details of how it pays the music industry for streams on its platform.

Apple's penny-per-stream payment structure—which music-industry experts say can dip lower—is roughly double what Spotify, the world's largest music-streaming service, pays music-rights holders per stream. Spotify pays an average of about one-third to one-half penny per stream, though its larger user base generates many more streams. Apple's payments come out of monthly subscription revenue from users.

Artists, managers and lawyers, still reeling from the loss of touring revenue during the pandemic, have been calling for higher payouts from music streaming, which has grown rapidly in the past year. Many fans have joined the push to raise artists' compensation.

The Union of Musicians and Allied Workers weighed in on Apple's letter Friday, saying that all music streamers should pay one penny per

stream. Texas debates how to overhaul electricity market. **B1**

POWER MOVE
Texas debates how to overhaul electricity market. **B1**

EXCHANGE



Listeners Add Commentary To Fed Chief's

* * *

Chat rooms during 'JPow's' talks can provide an earful

By PAUL KIERNAN

Federal Reserve Chairman Jerome Powell has worked hard to explain the central bank's policies to ordinary people, hoping to shore up trust at a time of wavering public faith in institutions. The effort has produced some unintended results.

On Wednesday, for instance, Mr. Powell outlined the Fed's

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Cheating at West Point Spurs End to Leniency

By TAWNELL D. HOBBS

WEST POINT, N.Y.—Cadets at the U.S. Military Academy are constantly reminded about the importance of integrity.

The students must memorize an honor code, warning them to "not lie, cheat, steal, or tolerate those who do." The words are inscribed in marble at the Honor Plaza, in an area of the campus where hundreds, perhaps thousands, of future U.S. Army officers walk by every day.

Now, Covid-19 has put that code to the test.

The U.S. Military Academy at West Point this month concluded investigations into its largest cheating scandal in at

NATE PALMER FOR THE WALL STREET JOURNAL (2)

SPACs' Red-Hot Streak Begins To Cool

Increased regulatory scrutiny of alternative path to going public puts damper on trend

Investors are cooling to one of the hottest bets on Wall Street as new regulatory scrutiny of special-purpose acquisition companies cuts the flood of new issues to a trickle and share prices tumble.

By Dave Michaels, Amrit Ramkumar and Alexander Osipovich

A large exchange-traded fund that tracks SPACs and companies that go public through these "blank check" firms hit a five-month low Friday. It fell almost 6% for the week and is now nearly 30% below a February peak.

Critical comments from regulators appear to be scaring off some investors and new offerings. Until last month, roughly five new SPACs hit the stock market every business day in 2021. In the past three weeks, 12 new SPACs have started trading, SPAC Research data show.

The slowdown comes as other assets such as stocks and cryptocurrencies are at or near records. SPACs are among the market's worst performers lately. Some of the best-known companies tied to SPACs such as space-tourism

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Kim Lee Finger, left, and Michelle Brooks struggled with some of the information they learned about the past. They both wanted to know more about their ancestor.

Researching a woman named Ann led her descendants to confront a painful past

By AMY DOCKSER MARCUS

Kim Lee Finger and Michelle Brooks, like many Black Americans, grew up knowing they are descended from slaves.

Over the years, each had heard fragments of family stories about their great-great-grandparents, who were children of a woman named Ann.

Ann was once owned by a white farmer from a well-known family that helped found what became Fairfax, Va.

Documents indicate she was also the mother of his children.

Yet much about Ann was unknown.

There were no pictures of her, no written accounts chronicling her life or preserving her voice.

The two women, who had never met, would search for

Please turn to page **A10**

least four decades. It punished dozens of cadets found to be dishonest on an exam while studying remotely, though those avoiding expulsion won't have a permanent blemish on their records.

A final summary report of their transgressions, including a decision to end a policy that for years has protected wayward cadets from being kicked out, is being reported for the first time by The Wall Street Journal.

The policy, known as the "willful admission process," can protect a cadet who admits to wrongdoing from being thrown out. It was put in place in 2015 to increase self-reporting with

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U.S. NEWS

THE NUMBERS | By Jo Craven McGinty

As Debt Grows, the Risk Calculus Changes



The U.S. said show me the money, and the world did.

Federal debt—incurred when the government sells Treasury bonds, bills, notes and other securities to help cover its costs—recently hit an all-time high, thanks in part to foreign investors who are happy to park their cash in the U.S.

The securities are attractive because of their safety and stability. The government has never failed to pay back its lenders the full value of the securities when they mature after a fixed period: 20 or 30 years for Treasury bonds; two to 10 years for notes; and as long as 52 weeks for bills.

The transactions provide the government with cash and—as long as the dollar remains the global reserve currency—offer individuals and institutions a safe way to sock away their wealth.

"One thing economists and people in general have miscal-

culated is the massive global appetite for the U.S. dollar and U.S. dollar-denominated debt," said David Andolfatto, a senior vice president of the Federal Reserve Bank of St. Louis. "This demand has exploded in the last 30 years."

About a third of the debt is now held in countries such as China, Japan and the U.K., Mr. Andolfatto said, and the continued demand helps explain how the U.S. has been able to run up record-setting obligations without (so far) suffering any repercussions.

This year, the U.S. government's publicly held debt is projected to hit 102% of gross domestic product—the monetary value of all finished goods and services made in a year. It would be the highest level since 1946, according to the Congressional Budget Office.

At the same time, the annual deficit is expected to reach \$2.3 trillion, or 10.3% of GDP, the second-widest shortfall since 1945, behind last year's record \$3.1 trillion, or

14.9% of GDP.

Traditionally, such eye-popping figures would trigger fears of skyrocketing inflation and the potential for the government to respond by raising taxes or cutting spending.

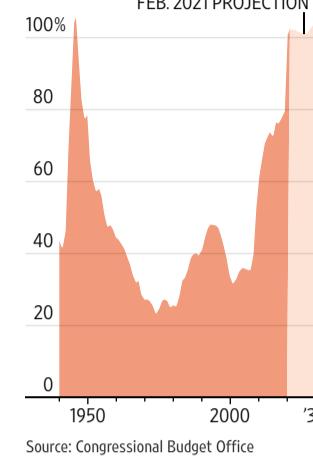
But it isn't clear what level of debt to GDP truly represents fiscal prudence, or financial risk, particularly because the current levels exceed thresholds that were previously considered safe.

When the European Union formed in 1993, it said member countries should have debt no greater than 60% of GDP. A World Bank study in 2010 suggested the figure shouldn't exceed 77%. The same year, two Harvard economists famously concluded—in a paper that was later found to have serious errors—that a debt above 90% of GDP was too risky.

But this year's long-term budget outlook by the CBO declared that debt-to-GDP has no set point at which a crisis becomes likely or imminent.

Japan seems to be testing the limits. In 2019, its debt was

Federal debt held by the public as a percentage of GDP



Source: Congressional Budget Office

Now, not so much.

"Suddenly, the world has changed," he said. "The debt-to-GDP ratio today can be much higher without the same inflationary consequences or interest-rate consequences because the global demand has been elevated."

That demand offsets traditional fears that a high debt-to-GDP level will lead to rising costs, falling wages and the Fed raising interest rates to cool off those inflationary pressures.

Still, there should be a way to simply assess the size of the debt...right?

William English, a finance professor at Yale and a former economist at the Fed, suggested looking at the country's ability to service the debt.

This doesn't necessarily mean the debt-to-GDP level was never useful.

In the past, when most Treasury securities were held domestically and the demand for debt was stable, the traditional debt-to-GDP level may have made sense, Mr. Andolfatto said.

Last year's interest payment on the federal debt was about \$345 billion, or 1.6% of GDP.

Mr. Andolfatto argued for yet another measure: "Inflation should be the metric we use."

According to that argument, if inflation causes the GDP to grow at a faster rate than interest, as it generally has in recent years, the country can afford to take on more debt. If the economy slows and GDP grows at a slower rate, the opposite would be true.

So, when it comes to judging the size of the U.S. debt, which matters more—an interest payment of less than 2% of GDP? This year's projected debt-to-GDP level of 102%? Inflation? Or some other measure?

"The question is to what use are you putting the borrowing?" Mr. English said. "If you're building an economy that's stronger, that's growing faster and so on, then a pretty high level of debt could be both desirable and sustainable. It's hard to have a clear rule."

March Hiring Surge Spanned the Country

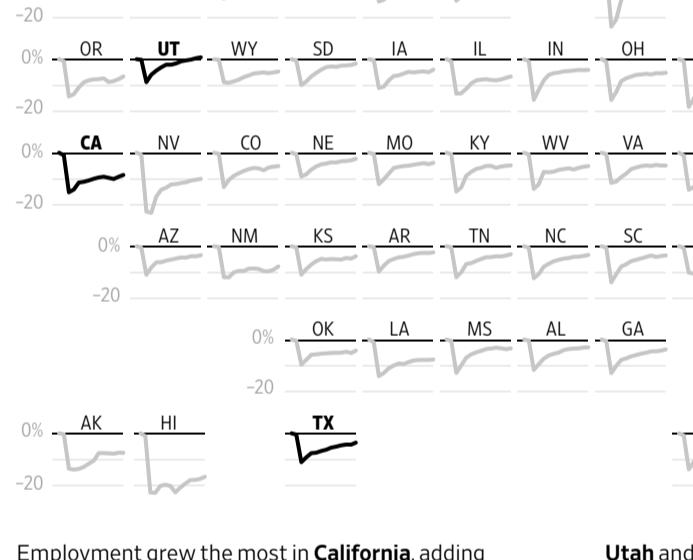
Hiring increased in 49 states across the country in March, with large states such as California, Texas and New York adding the most jobs.

Employers in leisure and hospitality, including at restaurants, hotels and entertainment venues, accelerated hiring across the U.S. That allowed some of the hardest-hit states, such as Hawaii, to see strong job growth last month.

Change in nonfarm payrolls since February 2020

Employers added 916,000 jobs in March, capping 12 months since a steep drop in payrolls last April, as a broader jobs rebound gained momentum.

Only Alaska bucked that rebound, shrinking payrolls by about 200 while employers increased payrolls in 49 states and the District of Columbia.



Employment grew the most in California, adding 120,000 jobs, where payrolls were 91% of pre-pandemic levels in March. Texas followed, adding 99,000 last month, to reach 96% of February 2020's job level.

Note: Payrolls are seasonally adjusted. Dining restrictions are max capacity limits as of April 6 and do not include other pandemic rules that may reduce capacity like requirements for space between tables.

Sources: Labor Department (payrolls) and National Restaurant Association (capacity rules)

Danny Dougherty and Eric Morath/THE WALL STREET JOURNAL

Utah and Idaho, which reached 2020 employment levels earlier this year, continued to add jobs.

Employment in Hawaii grew 1% last month, among the fastest rates. Leisure and hospitality jobs led the growth. Still, the state had 16% fewer jobs than a year earlier.

Oregon and New Mexico saw swift gains, adding 9.3% and 8.1%, respectively, to leisure and hospitality jobs. The states eased dining restrictions in February.

Those jobs shrank the most in Alabama. That state loosened dining restrictions months ago and is no longer seeing a bounce back, shedding 5,200—or 2.7%—hospitality jobs.

Illinois, which went from prohibiting indoor dining at the beginning of the year to allowing fuller capacity, grew leisure and hospitality jobs more than 3%.

Scrutiny Cools SPAC Hot Streak

Continued from Page One company Virgin Galactic Holdings Inc. and online gaming firm Skillz Inc. slid 12% or more for the week, extending recent losses.

Speculative stocks such as electric-vehicle startups Fisker Inc. and Canoo Inc. that went public through SPAC mergers have tumbled.

SPACs are companies that go public with no assets but then look to merge with a private business, which as a result becomes publicly traded. They have proliferated as a faster alternative to initial public offerings, giving many risky, young companies an opening to raise large sums of money and sell shares to the public.

SPACs have raised about \$100 billion so far this year from public listings, more than last year's record of \$83.4 billion, which itself was more than the amount raised in the nearly 30-year history of these blank-check companies. And the market had a record deal on Tuesday, when Grab Holdings Inc., the Southeast Asia ride-hailing, food-delivery and

digital-wallet group, said it would go public via a SPAC deal at a valuation of nearly \$40 billion.

But over the past two weeks, the **Securities and Exchange Commission**, which was largely silent about SPACs through most of last year, questioned the optimistic revenue projections used by startups that are merging with SPACs.

An SEC warning that could require some SPACs to restate their financial results put the brakes on some new offerings.

"The SEC effectively has now come in and stopped the party," said Matt Simpson, managing partner at Wealthspring Capital and a SPAC investor.

Another factor is the confirmation Wednesday of Gary Gensler as SEC chairman. He is expected to take a tougher stand on financial regulation than his recent predecessors.

Some people involved in SPACs believe the SEC is trying to cool off the market.

"There is a pattern of making public announcements that is seeming to have a chilling effect," said Douglas Ellenoff, a partner at Ellenoff Grossman & Schleifer LLP, who has worked on hundreds of blank-check listings.

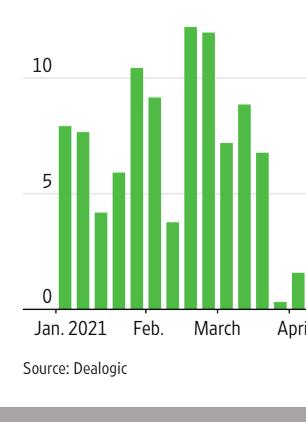
Regulators have been concerned about the SPAC frenzy leading to deals that ultimately burn investors, according to people familiar with the SEC's thinking.

The concern stems from SPACs' unusual structure: They need to find a company to buy, usually within two years, or give their cash back to investors. There are about 430 blank-check companies seeking private firms to take public.

Potential scandals involving SPAC companies such as electric-vehicle startups Nikola Corp. and Lordstown Motors Corp. have soured investors and worried regulators.

The SEC blindsided the SPAC market this week with a warning that some companies may have to restate their financial results because of the way they accounted for warrants, which are instruments that give investors a right to buy more shares in the future.

Money raised by SPACs in 2021, weekly



Source: Dealogic

The SEC hadn't opposed the accounting treatment before.

Warrants are a key part of how early SPAC investors make money on the deals. While the change doesn't affect businesses' operations, it has effectively paused the IPO process for roughly 260 blank-check companies that have filed to go public. The pace of filings for new SPACs is also slowing down.

The problem emerged after Luminar Technologies Inc., which went public through a SPAC merger, asked the SEC whether warrants should be classified as equity or liabilities, according to people familiar with the matter and securities filings.

Hundreds of SPACs must now review whether they might need to restate their financials after the SEC released its new position on the accounting rules, lawyers say. Luminar disclosed Wednesday that it reclassified its warrants as liabilities.

Regulators are questioning the rosy financial outlooks provided by some companies that merge with SPACs. Companies doing traditional IPOs generally don't make projections about the future, but companies that use SPACs can. The SEC is concerned some of them might go too far. In January, the SEC asked Ouster Inc., which makes sensors for self-driving cars and other machinery, to better explain

how it projected to go from just \$12.5 million in revenue in 2020 to nearly \$1.6 billion by 2025. In December, the regulator asked a plastics recycling firm, Purecycle Technologies Inc., to disclose and explain projections it had alluded to in a filing. The company revealed that it planned to go from zero revenue this year to \$2.3 billion in revenue by 2027.

Some companies, including electric-car-technology startups Canoo and Romeo Power Inc., have slashed their projections or changed strategies since going public via SPACs.

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Gunman Kills Eight At a FedEx Facility

Suspect, who then killed himself, had been interviewed last year by the FBI

INDIANAPOLIS—A 19-year-old former employee opened fire at a FedEx Corp. facility here Thursday night, killing eight people and wounding several others before taking his own life, in the third deadly shooting of this scale

By Cameron McWhirter, Jeffrey Horwitz and Nora Naughton

in the U.S. in recent weeks.

Law-enforcement officials identified the suspect Friday as Brandon Hole, and said he was temporarily committed last year for mental-health problems. The Federal Bureau of Investigation also confiscated a gun from him last year. He worked at FedEx for two months, from August to October 2020, FedEx said.

Around 11 p.m. Thursday, the suspect arrived at the FedEx Ground facility's parking lot, got

out of his car and started shooting at people, Indianapolis Metropolitan Police Deputy Chief Craig McCarrt said. The man then entered the building, shooting at more people before killing himself.

Four people with gunshot wounds were taken to local hospitals, and a fifth person shot in the attack sought medical attention in another county, police said. Two others were treated at the scene and released. Of the deceased, four were found in the parking lot and four inside the facility.

When police arrived, they found "an active and chaotic crime scene," Deputy Chief McCarrt said. The incident lasted only a few minutes, and by the time police went inside the facility, "the situation was over," he said.

The suspect used a rifle, police said. Police and local FBI agents were searching a couple of locations and a car related to Mr. Hole, they said.

Police said the eight people killed are Matthew Alexander, 32; Samaria Blackwell, 19; Amrajeet Johal, 66; Jaswinder Kaur, 64; Jaswinder Singh, 68;

Amarjit Sekhon, 48; Karli Smith, 19 and John Weisert, 74.

Among those killed were at least four members of the Sikh community, according to the Sikh Coalition, a national advocacy group, and executive director Satjeet Kaur said the coalition is in touch with law-enforcement officials.

The Sikh community has been growing in Indianapolis since the late 1990s, according to a history of the Sikh Sangat of Indianapolis posted on a website for Butler University, a private college located in Indianapolis. The local congregation has grown from 50 to more than 1,000 community members in the last decade, most of whom are from the Punjab region at the border of India and Pakistan, the website says. Sikhism is a monotheistic religion founded in that region in the 1400s.

In March 2020, the suspect's mother contacted law enforcement to report that he might try to commit "suicide by cop," said Paul Keenan, special agent in charge of the FBI's Indianapolis field office. The suspect was temporarily detained by



JEFF DEAN/AGENCE FRANCE PRESSE/GETTY IMAGES

Crime scene investigators at the FedEx facility in Indianapolis on Friday.

police to determine whether he met the criteria to be involuntarily committed, and officials seized a shotgun.

Last April, he was interviewed by the FBI, and no racially motivated violent extremist ideology was identified during the assessment and no criminal violation was found, but his shotgun wasn't returned, Mr. Keenan said.

Facebook said it took down two accounts connected with the suspect shortly after the shooting at the request of Indi-

apolis police, according to an internal Facebook memo reviewed by The Wall Street Journal.

Content on the accounts revealed no clear evidence of a motive for the attack, the memo stated. In October 2020, one of the accounts was partially blocked for a month by Facebook for posting a cartoon "suggesting that Jesus was reincarnated as Adolf Hitler," according to the memo.

Indianapolis police said they would continue to explore the suspect's social-me-

dia activity but declined to comment further.

Fred Smith, the founder and chief executive of FedEx, said in a message to employees Friday it would take some time to understand what happened in "this senseless act of violence."

Indianapolis Mayor Joe Hogsett said, "What we are left with this morning is grief." Among those grieving include "many Americans struggling to understand how tragedies like this continue to occur again and again."

DOJ Eases Limits on Probes Of Police

By SADIE GURMAN

WASHINGTON—Attorney General Merrick Garland rescinded a Trump-era directive that limited federal prosecutors' ability to rein in police practices they believe violate civil-rights laws, in the clearest sign yet that the Justice Department under President Biden intends to use its authority to hold entire cities accountable for police misconduct.

Mr. Garland's move on Friday came as several recent police killings of Black people and members of other minority groups have set off fresh outcry over policing in the U.S. The new guidelines will make it easier for the Justice Department to use its power to broadly investigate conduct within police departments and use legal settlements known as consent decrees to force change.

The Trump administration sharply curtailed the practice, believing it was unfair for the federal government to mandate costly local overhauls, particularly for police.

Mr. Garland has said he views so-called pattern-or-practice investigations that end in legal settlements as a powerful tool to root out misconduct and promote police accountability.

The memo replaces a directive from former Attorney General Jeff Sessions that required prosecutors to get formal approval for such decrees from political appointees at the highest levels of the Justice Department and provide more detailed justifications for seeking the decrees.

The department entered into no consent decrees with municipal police forces during the Trump administration.

In Chicago Neighborhood, Sound of Gunfire, Anger

BY JESSE NEWMAN AND KRIS MAHER

CHICAGO—In the Little Village neighborhood where a Chicago police officer killed 13-year-old Adam Toledo the sound of gunfire has become more common, Pastor Ramiro Rodriguez said.

"We've been hearing guns every little while in the nighttime," said Mr. Rodriguez, who is the pastor of Amor de Dios United Methodist Church, near the site where Mr. Toledo was killed.

Since March 29, some congregants have been afraid to come to church, he said. That was the day that Adam Toledo was killed by a Chicago police officer responding to reports of shots fired. Video footage released by a civilian oversight group Thursday showed the officer, Eric E. Stillman, chasing the teen down an alley.

The officer yelled, "Show me your f— hands." The boy turned toward the officer with arms raised and nothing in his hands. The officer yelled, "Drop it, drop it," and immediately fired a single shot before rushing over.

Other high-profile cases of police killings, including last week's shooting of 20-year-old Daunte Wright in a Minneapolis suburb, have sparked protests across the country.

In Chicago, this shooting also has highlighted the city's problem: Its children are being shot and killed.

On Thursday, a 17-year-old girl died after being shot in the same Little Village neighborhood while riding in a vehicle, the Chicago police department said. That same day, Chicago Mayor Lori Lightfoot said she was seeking federal help to address the crisis.

"Every year, the Chicago Police Department recovers more guns than New York and L.A. combined, not because we have a better strategy, not because



Victoria Ramon-Fox, left, and Haley Scott pay respects at a memorial for Adam Toledo in the Little Village area of Chicago.

we pay more attention, but because we have too many damn guns on our streets," she said.

The shooting of Adam Toledo is being reviewed by the Cook County State's Attorney's Office. A spokeswoman for the office said such reviews determine whether criminal charges are brought against law-enforcement officers.

Tim Grace, an attorney for Mr. Stillman, said that a review of the video showed that the boy was armed just before the officer took the deadly shot. "We're talking about a half of a half of a second, where this officer needs to make the split decision of whether or not to use deadly force," he said.

Adeena Weiss Ortiz, a lawyer for the Toledo family, said Thursday that it wasn't clear if the boy dropped a gun but that it isn't relevant to the shooting. "The officer said, 'Show me your hands.' He complied. He turned around."

On Friday, mourners gathered in the Hispanic community of Little Village at a cluster of memorials for Mr. Toledo, lighting candles, laying

roses and praying near the site where he was killed.

Down the street, neighbors Nakia Smith and Naim Abdullah said they had overheard a commotion—and a gunshot—in the alley behind their house the night Mr. Toledo was killed. Ms. Smith and Mr. Abdullah, who are Black, and have a 13-year-old son, said they have kept a close eye on their son, Amirion, since the shooting, afraid for his safety at a time when both police shootings and gun violence feel rampant to them.

"I was scared for him to be outside," said Ms. Smith.

Mr. Abdullah's son, Amirion, said he didn't know Mr. Toledo well, but that he was nice and quiet, and had invited him to play soccer.

Chicago's gun epidemic has worsened in the past year. The city saw a 110% increase in gun carrying in 2020, compared with a year earlier, and a 55% rise in homicides, according to an analysis by the University of Chicago's Crime Lab. The analysis uses the rate of gun confiscations during police stops as a measure of illegal gun carrying.

Pompeos Broke Ethics Rules, Report Says

By VIVIAN SALAMA

Former Secretary of State Mike Pompeo and his wife violated ethics rules by asking department employees to carry out tasks of a personal nature, including pet care, a report released Friday by the State Department's internal watchdog said.

The report by the State Department's Office of Inspector General details a range of complaints made by State Department employees. The OIG says it found evidence that Susan Pompeo, Mr. Pompeo's wife, allegedly tasked a senior adviser to the former secretary with purchasing or delivering personal items, ranging from flowers for friends, photograph prints, magazines for Mr. Pompeo's family, and T-

shirts for a friend in Ukraine.

The watchdog says requests exceeded ethical boundaries with regard to some State Department staff. The report, however, didn't find that the couple exceeded ethical boundaries with the special agents protecting them.

"At no time did I, or my wife Susan, misuse taxpayer money or violate rules or ethical norms," Mr. Pompeo said. "Our actions were constantly reviewed by dozens of lawyers, and we made massive efforts, and did, comply with every requirement."

"This latest IG report is yet another attempt to slander me and worse, my wife by our own government," he added.

On at least six occasions, the report said, Mrs. Pompeo had personal items, such as

cleaning supplies and jewelry, shipped to an adviser's home and asked that the items be delivered to the Pompeo residence," the report said. "Secretary Pompeo explained to OIG that, for security reasons, it

was often difficult to get items delivered to his residence."

The Pompeos also made requests on several occasions between 2018 and 2019 to have the senior adviser provide care for the family dog,

the report says. Since Mr. Pompeo is no longer a federal employee and not subject to federal disciplinary or other measures, the report doesn't call for action against him.

The OIG also identified at least 30 instances when Mr. Pompeo or Mrs. Pompeo tasked employees with making restaurant reservations for personal lunches and dinners.

Mr. Pompeo came under scrutiny in 2020 from lawmakers following a decision to terminate State Department Inspector General Steve Linick, who had been investigating these and other claims by State Department employees. Mr. Pompeo later defended his decision to fire Mr. Linick, saying it was unrelated to any reported inquiries against him or his wife.

Former secretary of state says report is an attempt to slander the couple.

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U.S. NEWS

PACs Cut Funds to Election Objectors

Donations from trade groups, corporations slid for lawmakers who didn't certify Biden win

By CHAD DAY AND TED MANN

WASHINGTON—Republican members of Congress who voted against certifying President Biden's victory after the Jan. 6 Capitol riot saw a sharp drop in donations from business and industry political-action committees in the first quarter of this year, new federal filings show.

PACs for companies, trade associations, unions, cooperatives and membership groups gave \$1.3 million in the first quarter of the year to the campaigns of the 147 Republican election objectors, according to a Wall Street Journal analysis of quarterly reports filed by Thursday's deadline.

That was down about 80% from \$6.7 million donated by such groups to the lawmakers in the first quarter in 2019, a comparable period in the last

election cycle, the Journal found.

PAC campaign donations to Republican and Democratic lawmakers who voted to certify the election were also down but not as sharply, falling 35% to \$17.7 million from \$27.2 million, records show. Democratic members saw a 30% decline in such donations.

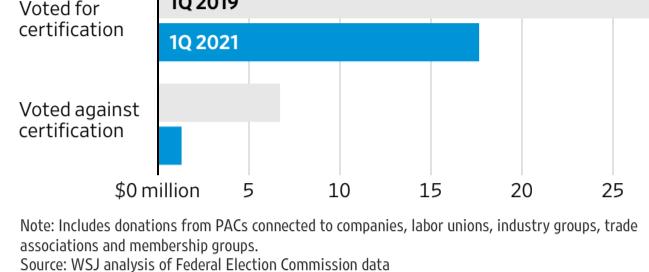
While the first quarter after a national election is often a slow period for donations, the new data indicate that most companies and trade groups that said they would suspend contributions pending a review after the Capitol riot have done so.

A handful of company and trade groups who said they would pause or review their contributions after the riot have resumed political giving. These include political-action committees for the National Association of Realtors, Cigna Corp., JetBlue Airways Corp. and Toyota Motor Corp., filings show.

Across-the-board halts in political donations have drawn pushback from Democrats and

Lawmakers who voted against certifying the presidential election results saw a sharper drop off in business and industry PAC donations than those who voted to affirm the results.

Business and industry PAC contributions



some Republicans who say they are being unfairly penalized for the actions of those lawmakers who on Jan. 6 voted not to certify Mr. Biden's win. That day some supporters of former President Donald Trump stormed the Capitol in an effort to disrupt the certification vote.

PAC money isn't critical to some high-profile politicians who voted against certifying the election results such as Sen. Ted Cruz (R., Texas), Sen. Josh Hawley (R., Mo.) and

Rep. Marjorie Taylor Greene (R., Ga.), whose campaigns are heavily funded by small online donations. All three raised upward of \$3 million in the first quarter of this year for their campaign committees.

Ms. Greene didn't receive any corporate PAC donations and brought in roughly 80% of her campaign money from people who donated \$200 or less in the first quarter. Roughly a third of the Republican objectors saw small-dollar donations increase by 10%

or more compared with the same period in 2019.

Corporate and industry PAC money still matters to many rank-and-file members of Congress, the Journal's analysis found.

For example, Rep. Blaine Luetkemeyer (R., Mo.), who would be in line to lead the House Financial Services Committee if Republicans reclaim the majority, took in more than two-thirds of his \$2 million campaign war chest in 2019 from corporate and industry PACs for their campaigns in the first quarter compared with the first quarter of 2019. Slightly less than two-thirds of them also saw overall fundraising declines.

Firms didn't halt giving to

powerful Democrats who voted not to certify Mr. Trump's election, said one Republican lobbyist from a major bipartisan lobbying firm.

The Journal's analysis relied on filings with the Federal Election Commission to calculate totals for each current House and Senate member and included only donations from PACs connected to companies, labor unions, industry groups, trade associations and membership groups.

Some freshman lawmakers didn't have comparable 2019 data and weren't included in the analysis' individual comparisons.

West Point To End Leniency

Continued from Page One
out fear of removal and to encourage cadets to confront peers about honor violations without having them kicked out of school.

The policy, however, didn't achieve the desired intent, said Lt. Gen. Darryl A. Williams, superintendent of the academy, in an interview. "It's clear to me, it has to go."

The policy change, which will go into effect soon, will be hailed by some alumni who believe the process was too forgiving.

"Back in my day, there was just a zero tolerance," said Jon Williams, a 1991 graduate of West Point and no relation to the superintendent. "If you were caught cheating there was no question about it, you were going home."

Yet some cadets and even some current administrators liked that it gave a second chance to the remorseful.

"West Point is a development institution," said senior Evan Walker, who holds a cadet leadership position. "Some people providing feedback don't get it."

Military academies are among the numerous educational entities that have dealt with cheating scandals during the pandemic.

The U.S. Air Force Academy has said it suspects that 249 cadets cheated during last year's spring semester, with a majority confessing and placed on six-month probation. The U.S. Naval Academy is in the adjudication phase for cases involving cheating on a sophomore-level physics final exam during the fall, an official said.

West Point is the oldest of the U.S. military academies, with a storied history that dates to the Revolutionary War. Its distinguished alumni include Presidents Dwight D. Eisenhower and Ulysses S. Grant. Lloyd J. Austin III, the current defense secretary, is also a graduate.

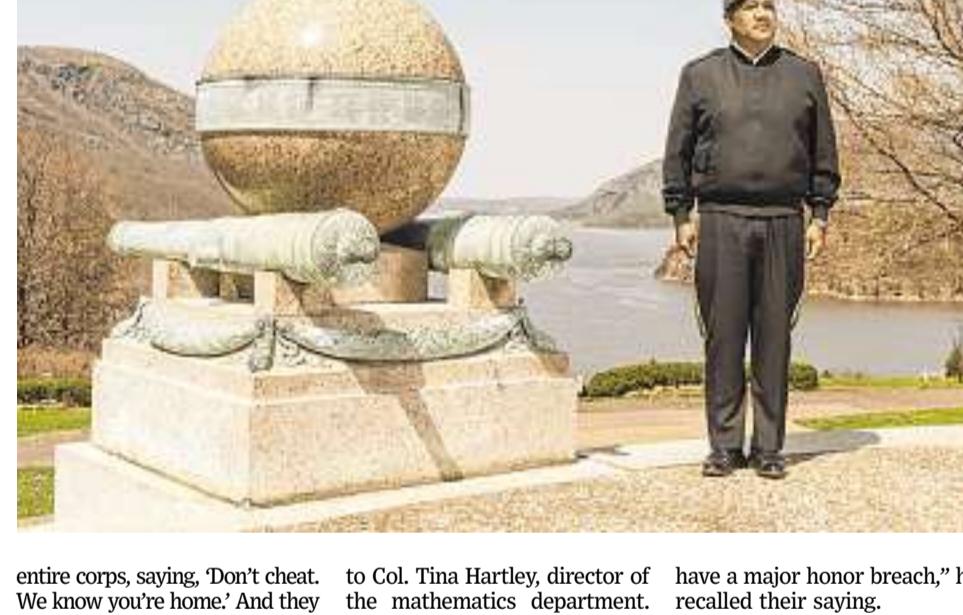
In March 2020, West Point students didn't return to campus after spring break. Instead, they moved to remote learning.

"We sent a video out to the



The U.S. Military Academy in West Point, N.Y., ended its 'willful admission process' after the scandal. Says Lt. Gen. Darryl A. Williams, superintendent, below, 'We sent a video out to the entire corps, saying, "Don't cheat. We know you're home." And they still did.'

SASHA MASLOV FOR THE WALL STREET JOURNAL



entire corps, saying, 'Don't cheat. We know you're home.' And they still did," said Gen. Williams, a 38-year Army veteran.

The first sign that something was awfully came in May, after cadets taking a freshman-level calculus course took their final exam online.

Before the exam, cadets were asked to acknowledge on two occasions the resources that could and couldn't be used, according

to Col. Tina Hartley, director of the mathematics department. Collaborating with classmates or others and not doing the work alone were forbidden.

Nonetheless, professors grading the exams began seeing multiple students with similarly worked solutions.

On a late afternoon, the superintendent was surprised to see senior staffers in his office, unannounced. "Sir, we think we

have a major honor breach," he recalled their saying.

The superintendent said his staff showed him a detailed analysis of how cadets were linked to each other, and how they potentially cheated. The investigation, which included interviews with the cadets, found that small groups had collaborated openly, including by talking by phone as well as by texting and communicating

through FaceTime and Zoom. The academy hadn't faced an honor breach like this since 1976, when dozens of cadets cheated on an electrical-engineering exam.

"I listened, and was thoughtful, thinking about the next steps. I knew that it was going to be a long road ahead," said Gen. Williams, who took command of the academy in 2018 and is the first Black superintendent.

The math department sent an email to suspected cadets with the evidence. It also included information on the willful-admission process, which gives 24 hours to self-admit after being approached for clarification or notification of a possible honor violation.

Most of the cadets, 59 of 73, suspected of cheating on the exam admitted right off, officials said. All but one of the cadets were in the second semester of their freshman year, with the remaining one a sophomore.

About a month into the investigation, the superintendent suspended a "representation policy," and elevated to his level the decision for cadets to continue participating in club activities and NCAA-level sports. In all, 52 of the suspected cheaters were athletes

through FaceTime and Zoom. The academy hadn't faced an honor breach like this since 1976, when dozens of cadets cheated on an electrical-engineering exam.

"I would have evaluated things differently," he said.

Despite that, some administrators spoke in support of giving the cadets a second chance.

"I'm a little disappointed in some of the alumni that have been critical," said Col. Brian Reed, deputy of the academy's Department of Behavioral Sciences and Leadership. "I'm not making excuses for it, but the environment they lived in, none of us has ever dealt with that."

WASHINGTON WIRE

Dispatches from the Nation's Capital

By GABRIEL T. RUBIN

POLICING OVERHAULS at the federal level have stalled, with mutual recriminations over who sank last year's legislative efforts. But the failure masks a growing bipartisan consensus on issues less emotionally fraught than po-

lice use of force, yet still at the top of reformer-to-do lists. Case in point: the steady successes of the movement to protect drivers from having their licenses suspended because they can't afford to pay outstanding traffic fines.

The movement got fresh momentum last week as Arizona Republican Gov. Doug Ducey signed legislation to end license suspensions for outstanding fines. "People need to drive to places like medical appointments, school and work to earn a living," Ducey said. By some estimates, the law will affect around 30,000 Arizonans. Since 2017, at least 15 states and Washington, D.C., have passed curbs on debt-based license suspensions and there are many other states with pending legislation, according to the Fines and Fees Justice Center, an advocacy group.

Opposition to these laws comes primarily from small mu-

nicipalities who derive a significant percentage of their income from traffic fines, and from political apathy about changing laws on the books. There is also some tough-on-crime opposition.

A federal effort is afoot to encourage states to continue phasing out the practice. Republican Sen. Roger Wicker of Mississippi and Democratic Sen. Chris Coons of Delaware introduced a bill last month to give states grants if they end license suspensions for nonpayment.

THE TOURISM INDUSTRY makes its plea to Congress for more assistance dealing with fallout from the pandemic. Steve Hill, head of the Las Vegas Convention and Visitors Authority, told the Senate Commerce Committee that he expects a 70% recovery in travel by next year but that business travel will severely lag behind leisure travel, hampering a full recovery. He and representa-

tives from the casino, restaurant and hotel industries want Congress to pass tax credits for business and leisure travel, and to encourage public-health authorities to distinguish between business gatherings, like conferences, and other mass gatherings when issuing health guidance. Industry also wants restrictions on international travelers lifted.

Other requests from industry are more likely to get a cold shoulder from the Democratic-majority House and Senate. Carol Dover, who runs Florida's tourism industry group, complained about growing labor shortages she attributed to the generosity of state and federal unemployment benefits. And Republican senators criticized continued limits on the cruise industry, with Alaska Sen. Dan Sullivan attacking the Centers for Disease Control and Prevention for not having "a clue on these issues."

NO TO "CYBER PORK": As part of the Senate Intelligence Committee's review of the SolarWinds and Microsoft hacks, Democratic Chairman Ron Wyden blasted the U.S. government's approach to procuring cybersecurity tools. "My concern is that the government's response...is just gonna be to throw a bunch more money at the same companies that sold the government insecure products," he said, an approach he called "cyber pork."

National Security Agency Director General Paul Nakasone pushed back on the characterization, noting that adversaries aren't using simple hacking techniques but are instead penetrating supply chain operations and exploiting "vulnerabilities that the provider doesn't even know about."

AMERICANS' VIEWS of Asian nations haven't changed much in the past few years, with the exception of China, a new survey from the Pew Research Center shows. Americans have generally warm feelings toward Japan, are more neutral toward India, and feel quite negatively about North Korea. While those feelings—on a scale from 1-100—have mostly remained steady, feelings toward China have worsened since 2018. That year, 9% of respondents gave China the worst possible rating, while 24% did so this year.

MINOR MEMOS: Pizza restaurant in congressional cafeteria is forced to close early on its first day back in business after staffers eat all the pizza...Progressive New York Rep. Jamaal Bowman shares a video of an NBA player being furiously dunked on, jokes that it would be covered by Medicare for All...Sen. Ted Cruz receives an autographed copy of former Speaker John Boehner's book, says he put it in an "appropriate place": the fireplace in his office.

U.S. NEWS

Refugee Limit Set To Increase

Continued from Page One

(D., Minn.), a Somali refugee, had sent a letter to the White House earlier Friday asking for the president to lift the cap on refugee admissions. Sen. Dick Durbin (D., Ill.) said on Twitter: "Say it ain't so, President Joe. This is unacceptable."

The change comes as the administration grapples with a surge of migrants at the southern border, with migrant arrests in the region reaching a 15-year high. The administration's response has been met with criticism from both sides of the aisle.

Former President Donald Trump and some Republicans had previously said the influx of refugees should be curtailed in part because of the increasing number of asylum requests at the southern border that have the potential to burden the immigration system.

"The Biden administration knows that they are taking on huge amounts of water politically because of the raging border crisis, and that is the only way to understand and contextualize the decision to keep President Trump's ceiling in place for the remainder of the fiscal year," said Stephen Miller, who served as Mr. Trump's top immigration adviser, on Friday before the White House announcement that it would increase the cap. "It is a really significant promise broken for Biden."

The new executive order lifts requirements that refugees coming within the 15,000 limit fit one of several categories, including Iraqis who aided the American military, Central Americans and people fleeing religious discrimination, a category that primarily admitted Christian refugees.

It will revert to the previous system, in place from the refugee program's creation through 2019, that divides the overall allocation of refugee slots by region.

"We intend to use all 15,000 slots under the new Emergency Presidential Determination and will closely monitor progress toward that end," a White House spokesman said.

The refugee system is run separately from that for asylum seekers. Refugees flee their home countries and go through security and medical vetting before they are permitted to relocate to the U.S., where they receive resettlement aid through religious and other nonprofit organizations. Asylum seekers must meet the same standard of political, religious, ethnic or other persecution, but they make their claims once they reach U.S. soil.

Mr. Biden had hesitated to sign the presidential determination as the numbers of migrants illegally crossing the U.S. border with Mexico to seek asylum increased, fearing the two situations could be conflated, according to two people familiar with the matter.

Mr. Biden reversed course after a swift backlash to an initial order.

The Office of Refugee Resettlement, which runs a network of child-welfare shelters to house unaccompanied minors, has exhausted its \$1.3 billion budget for this year as it copes with record numbers of migrant teenagers and children, according to three people familiar with the matter.

To continue paying for the expanded number of beds, the agency is dipping into money meant to help resettle refugees as well as an \$850 million supplement that was part of the Covid-aid legislation passed last month.

The Trump and Obama administrations also both transferred funds from the refugee program to help cover costs of housing unaccompanied minors.

Since early February, Mr. Biden had been facing pressure to act from some Democrats, refugee advocates and religious organizations after the White

House and the State Department, which runs the refugee program, had settled on raising the cap through the rest of this fiscal year to 62,500. The cap applies only to the number of refugees who are allowed to actually enter the U.S. in a given year, though approvals can exceed that number.

The White House notified Congress of its intent to do so on Feb. 12, a move that typically precedes enactment of a plan by hours or days. The notification cited an emergency refugee situation, detailed in a State Department report laying out the specific humanitarian dangers in more than a dozen countries and providing a breakdown of the increased allowance by region.

But Mr. Biden didn't issue a formal document increasing the cap, leading the State Department, which coordinates refugee flights with resettlement agencies, to book flights for about 700 refugees the day after the notification, only to cancel them suddenly, according to officials at resettlement agencies that work with the government.

Scott Arbeiter, president of World Relief, one of the nine refugee resettlement agencies in the U.S., said that while he was glad to see some change in the policy, keeping the overall cap at 15,000 wasn't nearly enough.

"The reality is it is a break from our historic norms, it's a break with the president's stated intentions and commitments, and most importantly it fails to keep our historic commitment to some of the most vulnerable people in the world," Mr. Arbeiter said in an interview.

The delay in travel to the U.S. affected Congolese refugees in particular, according to resettlement agencies and refugee advocates.

Mr. Biden's initial proposal set regional allocations that would favor Africa, reserving 7,000 slots for the continent, 1,000 for East Asia, 1,500 for Europe and Central Asia, 3,000 for Latin America and the Caribbean and 1,500 for South Asia.

In addition to those, 1,000 would be unallocated by region.

Japanese Prime Minister Visits White House



PERSONAL DIPLOMACY: President Biden and administration officials met with Japan leader Yoshihide Suga and his delegation on Friday. The visit was Mr. Biden's first face-to-face talks with a foreign leader as president and highlighted the allies' focus on China.

TOM BRENNER/REUTERS

U.S. WATCH

CAPITOL RIOT

Oath Keeper Is First To Plead Guilty

A member of the right-wing Oath Keepers militia pleaded guilty to federal charges connected to the Jan. 6 riot at the U.S. Capitol, becoming the first among the more than 400 people facing such charges to formally admit to wrongdoing.

Jon Schaffer pleaded guilty Friday to two counts of obstructing an official proceeding and remaining in a restricted building with a dangerous weapon. Mr. Schaffer, of Columbus, Ind., faces up to 20 years in prison based on the obstruction charge. He agreed to cooperate with investigators as part of his plea deal.

—Aruna Viswanatha

NIH

Curbs on Fetal Tissue Research Reversed

The National Institutes of Health said Friday it would generally allow use of human fetal tissue in federally funded medical research, reversing a Trump

administration policy aimed at curtailing that practice.

Health and Human Services Secretary Xavier Becerra determined there were "no new ethical issues that require special review," the NIH said.

Medical research employing fetal tissue has led to medical progress such as the development of vaccines for rubella and rabies, but such scientific work has long been opposed by leading figures in the anti-abortion movement.

—Thomas M. Burton

VIRGINIA

Liberty University Sues Jerry Falwell Jr.

Liberty University has filed a lawsuit seeking \$10 million in damages against its former President Jerry Falwell Jr., who resigned from the evangelical Christian university last year amid a series of scandals.

The complaint, filed Thursday in a circuit court in Lynchburg, Va., alleges that Mr. Falwell breached his contract and fiduciary duties while negotiating a new contract in 2019. The suit claims Mr. Falwell kept secret damaging information

about himself and his family, as well as his alcohol impairment, in an attempt to obtain a more lucrative compensation package.

Mr. Falwell said the school's lawsuit was "full of lies and half truths." He didn't specify what he considered untrue, but said he had always abided by the requirements for Liberty staff.

—Ian Lovett

JUSTICE DEPARTMENT

Roger Stone Sued For Unpaid Taxes

The U.S. government filed a civil lawsuit Friday against long-time GOP political consultant Roger Stone, alleging that he owes nearly \$2 million in unpaid taxes and penalties.

The suit alleges that Mr. Stone and his wife, Nydia Stone, owe \$1.5 million in taxes, penalties and interest for 2007 through 2011. It alleges that Mr. Stone owes \$400,000 in taxes and penalties on his 2018 income taxes, which was filed separately from his spouse.

Mr. Stone didn't respond to a request for comment.

—Byron Tau

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U.S. NEWS

Rivals Rebuffed J&J on Clot Study

Drug company sought to build alliance with other vaccine makers on scientific exchange

Johnson & Johnson privately reached out to Covid-19 vaccine rivals to ask them to join an effort to study the risks of blood clots and speak with one voice about safety, but **Pfizer Inc.** and **Moderna Inc.** declined.

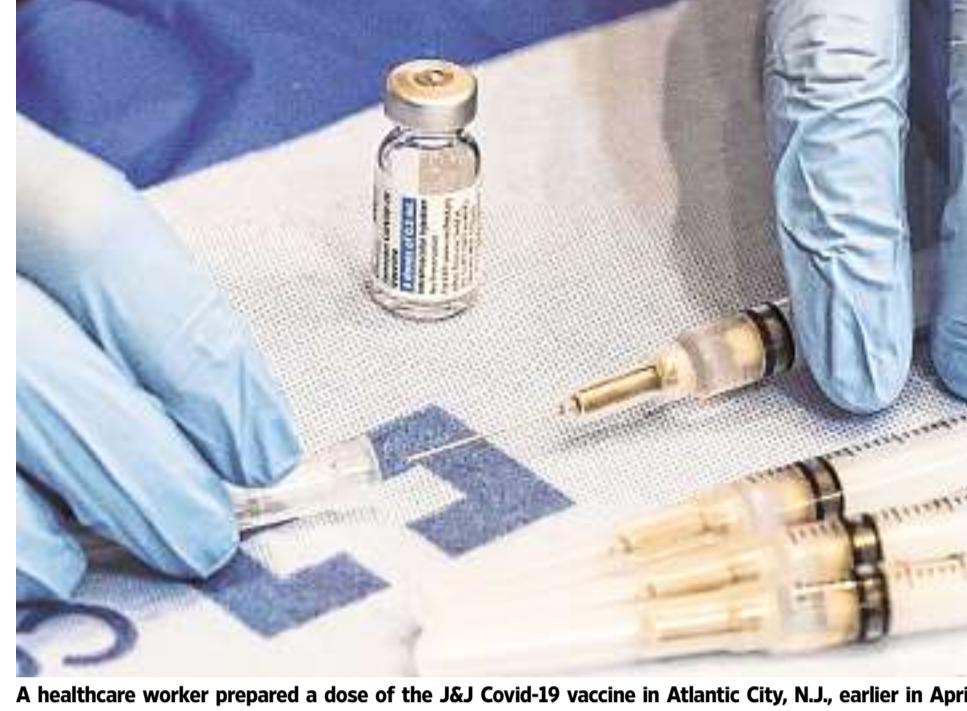
By Jenny Strasburg,
Jared S. Hopkins
and Peter Loftus

As concerns mounted last week over rare cases of blood clots, J&J asked **AstraZeneca PLC** as well as Pfizer and Moderna to join its efforts looking into the reports, people familiar with the matter said. J&J, through emails and phone calls, also sought to build an informal alliance to communicate the benefits and risks of the shots and address any concerns raised among the public by the blood-clot cases, some of the people said.

Six women who got J&J's vaccine developed clots, and one died, out of more than seven million doses administered across the U.S., according to federal health officials. The specific adverse event hasn't been reported by people who received the Pfizer and Moderna shots, the officials said.

Pfizer and Moderna executives declined the offer, saying their vaccines appeared safe, the people said. The pair also objected because they didn't see the need to duplicate the efforts of regulators and companies already looking for blood-clot cases and investigating the cause, the people said. One company's concern: The safety of the Pfizer and Moderna shots could be tarnished by association, some of the people said.

Only AstraZeneca, which had been buffeted by similar blood-clotting concerns for weeks, agreed, the people said. J&J believes collaborative



A healthcare worker prepared a dose of the J&J Covid-19 vaccine in Atlantic City, N.J., earlier in April.

lators extended their probe to J&J's Covid-19 vaccine, which uses a similar technology as AstraZeneca's.

The shots are known as viral-vector vaccines, because they deliver genetic code for mobilizing an immune defense using a harmless cold virus.

It is unclear whether the shots are responsible for the clot cases, and if the viral-vector technology plays a role. Researchers in Norway and Germany said they found that AstraZeneca's vaccine, which is in use throughout the world but not yet authorized in the U.S., could trigger an autoimmune reaction leading to the brain clots.

The main focus of U.S. health authorities is a type of clot found in vessels that drain blood from the brain, known as cerebral venous sinus thrombosis, combined with low levels of blood platelets, which stop bleeding by helping blood clot.

Authorities are exploring whether the viral-vector vaccines may be triggering platelet-activating antibodies, a process that could cause the clots combined with low platelet counts.

J&J began reaching out to other vaccine makers last week after concerns about the safety of its vaccine mounted in Europe, the people said, but before U.S. health authorities warned about a small number of blood-clot cases in the U.S., including one death.

J&J officials didn't bring up the company's interest in a collaborative effort on safety issues during a weekly meeting the four vaccine makers hold on Fridays with consultants and attorneys regarding their vaccine programs, according to one person familiar with the calls.

U.S. health authorities on Tuesday recommended suspending use of J&J's single-dose shot while they investigate reports of the six women who got the vaccine and soon developed serious blood clots. The women were between 18 and 48.

Drugmaker Sees No Causal Link

Johnson & Johnson said there wasn't enough evidence to establish that the company's Covid-19 vaccine causes the rare blood-clotting condition that prompted U.S. health officials this week to recommend a pause in its use.

The New England Journal of Medicine published online a letter from three J&J employees involved in vaccine development and epidemiology saying, "At this time, evidence is insufficient to establish a causal relationship between these events" and J&J's vaccine.

U.S. health authorities this

week recommended a pause in vaccinations using J&J's single-dose vaccine while they investigated six cases of a rare blood clot, combined with low blood-platelet counts, in women who had received the J&J vaccine. One of the women died.

The pause is expected to remain in place at least until a federal vaccine-advisory committee meets April 23 to review the matter.

Authorities in several countries have restricted use of J&J's vaccine, and a shot from **AstraZeneca PLC** and the University of Oxford that uses a similar technology, after receiving reports of people getting blood clots following vaccinations.

—Peter Loftus

Global drugmakers are typically fierce rivals, but they have joined forces in the past year to share research about the coronavirus and develop Covid-19 vaccines and therapies. Leading industry researchers, including from vaccine makers, have held regular calls throughout the pandemic to compare notes and share insights. Other pharmaceutical

companies have merged manufacturing efforts to get more shots to more people as soon as possible.

Reports of blood clots

gained widespread public attention in early March after clotting issues affected a small number of people in Europe who had been given AstraZen-

eca's Covid-19 shot. Health authorities in several big countries on the continent placed restrictions on use, while investigating whether the shot caused the events.

This month, the U.K. advised against using AstraZeneca's shot in people under 30 years old, and European regu-

Covid-19 Cases Rise In Maine

By MELANIE GRAYCE WEST

The spread of variants, increased travel and pandemic fatigue are spurring a new rise in Covid-19 cases in Maine and putting more younger people in the hospital, officials say.

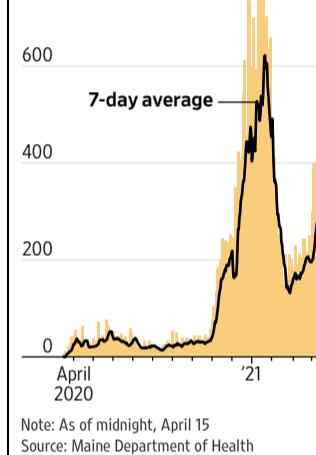
Newly reported infections have been on the upswing since mid-February, even as roughly 48% of the eligible population has received a first dose of Covid-19 vaccine, according to state data. A Wall Street Journal analysis of U.S. Centers for Disease Control and Prevention data shows Maine has fully vaccinated more than 30% of its population, more than any other state.

The state recorded 579 people newly diagnosed with Covid-19 between Wednesday and Thursday, but that includes a data lag from earlier days, Nirav Shah, director of the Maine Center for Disease Control & Prevention, said Thursday.

Maine has had one of the lowest per capita rates of Covid-19 in the country.

Like other states, cases among older populations are down, while the virus is now spreading more rapidly among those aged 20 to 59.

Daily confirmed Covid-19 cases in Maine



dogged

/'dôgəd/

adjective

Despite spending my early life in a shelter, there's no dog more determined than me. Thanks to the National Disaster Search Dog Foundation, if you're ever trapped under rubble after a disaster, I'll find you. That's my job, and what I was born to do. You'll never find a dog more dogged.

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Victor

Active Search Dog

Rescued from Redding, CA.

Photographed by Shaina Fishman at SDF's National Training Center.

NATIONAL DISASTER

SEARCH DOG FOUNDATION

Est. 1996

Apple Pays A Penny Per Stream

Continued from Page One
stream at a minimum and encouraged Apple to make its penny-per-stream payment not merely from a portion of its subscription revenue.

Apple last reported more than 60 million Music subscribers in June 2019. Spotify leads the industry in subscriptions with 155 million, out of 345 million total active users including those who listen free to the ad-supported tier. Amazon.com Inc. said early last year that its music subscription offerings had 55 million subscribers.

"As the discussion about streaming royalties continues, we believe it is important to share our values," Apple said in its letter. "We believe in paying every creator the same rate, that a play has a value, and that creators should never have to pay for featuring" music in prime display space on its service.

Artists aren't paid directly by streaming services, so a single play of a song doesn't result in a penny going into that artist's account. Instead, streaming services pay royalties to rights holders—a group that includes labels, publishers and other distributors—which in turn pay artists based on their recording, publishing and distribution agreements. Both Apple and Spotify pay rights holders based on the share of total streams their artists garner on each service.

Yet artists cite the per-stream pay rate as an indicator of their earnings. Major labels say the average monthly streams per user is a better measure of the streaming economy, and growing numbers of streams mean more money coming in for artists.

Both Spotify and Apple, they say, are at or near the 1,000-streams-per-listener monthly benchmark that is seen as a success.

In the letter, Apple says it

pays 52% of subscription revenue, or 52 cents of every dollar,

to all record labels. Sp

tify, which generates revenue both from subscriptions and its free ad-supported tier, says it pays two-thirds of every dollar of revenue to rights holders, with 75% to 80% of that going to labels—translating to 50 to 53 cents on the dollar, depending on agreements between the service and different labels.

Spotify delivers much more revenue to the music industry than Apple does, since it has many more users. Its average per-stream payout rate is lower, though, because the average Spotify subscriber listens to more music per month than listeners on other services do. Plus, on Spotify's free tier, ads don't generate as

The company's payment structure is roughly double what Spotify pays.

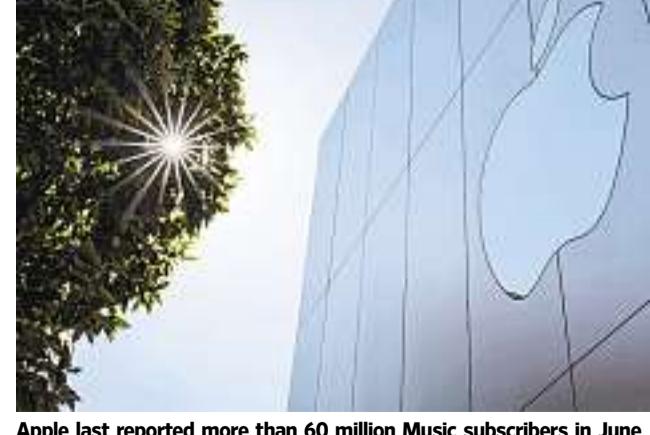
much revenue as its premium service does. Spotify has said that while its free version generates less income than its paid one, it brings in eventual subscribers.

"We've conducted extensive testing that consistently shows that when we take the free service away, those listeners turn to non-revenue-generating alternatives, meaning the collective music industry is missing out on revenue," the company says in "Loud and Clear," an online report

about payments to artists. Apple said it does not pay a lower royalty rate in exchange for featuring, such as being included in a promoted slot on the service or playlist. Last November Spotify said it would begin testing a feature allowing artists and labels to choose songs they wanted promoted in user recommendations in exchange for a "promotional recording royalty rate," meaning artists could get a lower payout when their songs are featured. In February Spotify said the program helped participating labels grow their streams by 30%.

As Apple and Spotify continue to be locked in a battle for subscribers, Spotify has accused the tech giant of operating its App Store in a way that stifles competition. Other developers have also filed similar complaints against the company. In 2019, the music-streaming service filed an antitrust complaint in the European Union alleging that Apple uses its control over the App Store to limit competition from rivals to its music service.

Antitrust investigators in the EU and the U.K. are examining how Apple operates its App Store and treats developers that use the platform. Apple has defended its App Store practices, saying the rules it enforces are applied equally for all developers and that it wants apps that compete with its services to thrive. In 2019, Apple said Spotify wants to benefit from using its service without supporting it.



Apple last reported more than 60 million Music subscribers in June 2019. Artists have been calling for higher payouts from streaming.

DAVID PAUL MORRIS/BLOOMBERG NEWS

WORLD NEWS

Russia Will Expel 10 U.S. Diplomats

The move is a response to measures against the Kremlin over alleged damaging activities

By ANN M. SIMMONS

MOSCOW—Russia said it would expel 10 U.S. diplomats and bar a number of senior U.S. officials from entering the country in response to measures against Moscow over alleged election interference, cyberattacks and other damaging activity, raising the stakes in relations between the two nations.

"The latest attack on our country undertaken by the Bi-

den administration, of course, cannot remain unanswered," Russia's Foreign Ministry said. "Washington, it seems, doesn't want to put up with the fact that in the new geopolitical realities there is no place for unilateral dictatorship."

The Foreign Ministry said it was indefinitely barring entry to eight high-ranking current and former U.S. officials and figures involved in what it described as "the development and implementation of an anti-Russian" agenda.

The officials included U.S. Attorney General Merrick Garland; Michael D. Carvajal, the director of the U.S. Federal Bureau of Prisons; Alejandro

Mayorkas, U.S. secretary of homeland security; Susan Rice, President Biden's domestic policy adviser and a former U.N. ambassador and national security adviser under former President Barack Obama; Federal Bureau of Intelligence Director Christopher Wray; and Avril Haines, director of U.S. National Intelligence.

In addition, John Bolton, a former United Nations ambassador and national security adviser, and Robert Woolsey Jr., a former director of the CIA also have been banned, according to the ministry's website.

Russia would also end what Russian Foreign Minister Sergei Lavrov described as the

practice of "uncontrolled, unlimited travel for short-term employees" of the State Department and other government agencies. U.S. foundations and nongovernmental organizations controlled by the State Department and other American agencies would be barred from operating in Russia under Moscow's sanctions.

Speaking at a news conference, Mr. Lavrov said Russia could take actions that would be painful for U.S. business, but would keep them "for future use."

The Foreign Ministry warned that Washington should "show prudence by abandoning its confrontational

course" or risk further punitive measures.

Representatives at the U.S. State Department didn't respond to requests to comment.

Earlier in the day, the Kremlin reported that Russian President Vladimir Putin discussed the counter sanctions with his security council, and a presidential aide had advised Washington's ambassador to Russia, John Sullivan, of Moscow's intended response.

The U.S. Embassy in Moscow confirmed in an email that Mr. Sullivan had spoken to Mr. Putin's aide on Friday afternoon and received an outline of the Russian government's intended measures.

In a separate email late Friday, Mr. Sullivan said embassy officials had "seen a message that appears on the website belonging to the Russian Ministry of Foreign Affairs and are reviewing the information," he said. "We haven't received any official diplomatic correspondence providing details."

Moscow's measures came a day after the U.S. sanctioned a half-dozen Russian companies for allegedly working to support Russia's spy services and more than 30 individuals and entities for interfering in U.S. elections.

President Biden defended the penalties imposed on Moscow, but appealed to Mr. Putin to scale down tensions.

Moderna to Reduce Supply of Vaccines to Canada, U.K.

By PETER LOFTUS
AND PAUL VIEIRA

Moderna Inc. expects a shortfall in Covid-19 vaccines it will deliver to countries outside the U.S., including Canada and the U.K., citing issues with its European supply chain.

The Cambridge, Mass., company said Friday the shortfall affects expected deliveries for the second quarter in a number of countries but didn't specify others beyond Canada and the U.K. The manufacturing problems won't affect U.S. supplies.

"The trajectory of vaccine manufacturing ramp-up is not linear, and despite best efforts, there is a shortfall in previously estimated doses from the European supply chain," the company said.

The shortfall marks the latest setback for efforts to ramp up manufacturing of Covid-19 vaccines. Moderna and Pfizer Inc. initially were able to make only limited quantities, while they built manufacturing capabilities. In March, AstraZeneca PLC warned European officials its output was falling short of plans. Also that month, Merck & Co. agreed to help Johnson & Johnson make more of its shot.

Canadian Procurement Minister Anita Anand said the next expected shipment from Moderna scheduled for the end of April would be cut in half, to 650,000 doses.

Canada had been anticipating 12.3 million doses from Moderna during the three-month period ending June 30. Ms. Anand said she expects a reduction in the second-quarter supply by as much as 16%.

"We are disappointed," she said. "Our government will continue to press Moderna to fulfill its commitments."

Canada said Moderna advised officials the cutback is due to a slower-than-anticipated increase of production capacity, and that other countries would be affected.

The timing of the Moderna cutback couldn't be worse for Canada, which has witnessed a sharp rise in Covid-19 infections—so much so that the country's seven-day average of new, confirmed cases per million has exceeded the U.S. level for six days in a row. Furthermore, regional authorities across the country have canceled vaccination appointments, citing a lack of supply.

Based on the most recent



Pharmacists transport a cooler containing Moderna doses at the Glangwili General Hospital in Wales.

said more than 41 million shots have been administered.

Moderna has two supply chains for producing its vaccine. The company manufactures doses for the U.S. at its plant outside Boston, and its contract manufacturing partner **Lonza Ltd.** also makes it at a plant in Portsmouth, N.H. Other partners handle vial-filling and packaging at U.S. sites.

Moderna has been boosting its Covid-19 vaccine production for the U.S. and expects to deliver a total of 300 million doses by the end of July. So far, it has delivered more than 117 million of those doses.

Outside the U.S., Moderna has delivered about 15 million doses from a separate supply chain, which includes production at Lonza's plant in Switzerland and partners' facilities elsewhere that handle vial-filling and packaging.

Moderna said Friday that it and its manufacturing partner Lonza are trying to deliver a sustained supply in the shortest time frame possible. The company said it is making investments to support production increases globally, and explore other potential collaboration opportunities.

China Is on Track to Approve First Foreign Covid-19 Vaccine

China is planning to approve its first foreign Covid-19 vaccine before July, according to people familiar with the matter, as pressure mounts

By Keith Zhai, Liza Lin and Sha Hua

from domestic scientists and the foreign business community to expand beyond the country's own roster of shots.

Chinese officials have been scrutinizing clinical-trial data for the coronavirus vaccine made by Germany's **BioNTech SE** and are expected to green-light domestic distribution of the shot within the next 10 weeks, say people privy to these discussions. Some of the people were told of the timeline during a private discussion with government and health officials. The others were government officials briefed on the internal discussions.

Most of China's shot makers cite trial data showing that their vaccines are close to 100% effective in preventing Covid-19 infections serious enough to require hospitalization when fully administered. But some Chinese public-health experts, including the head of China's Center for Disease Control and Prevention, have pushed for the introduction of Western vaccines that are better at preventing milder infections.

Foreign businesses are eager to add Western vaccines to make it easier to travel overseas, where foreign shots are more accepted, according to Ker Gibbs, the president of the American Chamber of Commerce in Shanghai. The chamber has been urging the government to approve the BioNTech vaccine, which is being produced and distributed by **Pfizer Inc.** in most of the world, since December, he said.

BioNTech agreed in December to work with Shanghai Fosun Pharmaceutical Group Co. to deliver 100 million doses to China in 2021, pending approval.

The timetable for approval isn't fixed, and the decision depends in part on approvals for Chinese vaccines abroad, according to some of the people



A vaccination site in Kunming in China's Yunnan province.

familiar with the deliberations, suggesting the timing of the approval is being driven to a certain degree by politics.

The World Health Organization is reviewing vaccines by Chinese state-owned drugmaker Sinopharm and private Chinese company Sinovac Biotech Ltd. for possible emergency-use approval by early May, according to its most recent vaccine status report. The U.S. hasn't approved any Chinese Covid-19 vaccines.

Health authorities in Chile on Friday released the results of a study of 10.5 million people, in-

Timing of decision will depend in part on approval of Chinese inoculations abroad.

cluding people who received and didn't receive the shot, which showed that the Sinovac vaccine was 16% effective against infection after one dose and 67% effective after the second dose. BioNTech and Pfizer recently reported high efficacy, at 91.3%, up to six months after a second dose of their vaccine, based on results in people enrolled in Phase 3 trials.

BioNTech said it is working on making the vaccines available in China upon approval. Fosun declined to comment.

The Ministry of Science and Technology, the National Health Commission and the

National Medical Products Administration didn't respond to requests to comment.

China has approved four do-

mestic vaccines for general use

and one for emergency use. De-

spite having the virus under

control, the country has been

ramping up a vaccination drive

that aims to get 40% of its popu-

lation, or about 560 million

people, immunized by summer.

While trying to vaccinate its

own population, China has also

exported more than 115 million

doses this year, most to the de-

veloping world, according to

data collected by science-analyt-

ics company Airfinity.

Part of the decision on Bi-

oNTech is motivated by the

2022 Winter Olympics, which

are scheduled to take place in

China in February. Beijing ex-

pects the majority of the ath-

letes coming to the Games to

take the BioNTech shot, ac-

cording to one of the people

briefed on the discussions.

George Gao, the head of

China's CDC, has argued that

China should embrace vac-

cines, such as BioNTech's, that

are based on advanced mRNA

technology and have regis-

tered efficacy rates in the 90%

range for even mild cases.

One way to improve the "not

high" efficacy of conventional

vaccines, Mr. Gao said at a con-

ference on April 10, is for au-

thorities to combine them with

shots based on a different tech-

nology such as mRNA. Shots by

Chinese drugmakers range in ef-

ficacy from 50% to 80% for mild

to moderate infections.

doses distributed.

Canada said Friday it struck

another deal with Pfizer to ac-

quire an additional 8 million

doses, which it said would help

offset Moderna reductions.

Moderna's and Pfizer's vac-

cines are given in two doses,

three or four weeks apart.

The U.K. government said it

always knew vaccine supplies

would fluctuate, but its vacci-

nation campaign is on track to

meet the target of offering a

shot to all adults by the end of

July. A health spokeswoman

of light over snow and the crisp atmosphere of the winter air. Similar scenes by Pissarro can be found in the Art Institute of Chicago and the Musée d'Orsay, among other collections. Signed and dated 1885 (lower left). Canvas: 12^{7/8}"h x 16"w; Frame: 22"l x 24^{7/8}"w. #31-2782

Featured in our online and in-gallery exhibition *The Pissarro Dynasty: Five Generations of Artistic Mastery*. Visit msrau.com/pissarro to learn more.



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Celebrated painter. Important work. Impressionist legend. Few artists have so significantly shaped the course of Western art as Camille Pissarro, and this original oil displays his mastery over the Impressionist style that he helped develop. The work is part of a tradition of winter landscapes in the history of Impressionism; Pissarro triumphs in his depiction of the play

of light over snow and the crisp atmosphere of the winter air. Similar

scenes by Pissarro can be found in the Art Institute of Chicago and the

Musée d'Orsay, among other collections. Signed and dated 1885 (lower

left). Canvas: 12^{7/8}"h x 16"w; Frame: 22"l x 24^{7/8}"w. #31-2782

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WORLD NEWS

Cuban Leader Raúl Castro Retires

At the end of an era, he leaves behind a crumbling economy and social unrest

By JOSÉ DE CÓRDOBA

Raúl Castro said he was stepping down as chief of Cuba's ruling Communist Party, leaving behind a demoralized country running on little except post-revolutionary fumes as it struggles with growing food shortages and rising discontent.

Mr. Castro's announcement on Friday, which came during a four-day party congress in Havana, marks a generational change as the old guard that took power with his older brother Fidel Castro in 1959 gives way to a younger generation of bureaucrats. The 89-year-old is expected to be succeeded by his handpicked successor, President Miguel Díaz-Canel, a longtime party apparatchik.

Mr. Díaz-Canel, a burly, white-haired 60-year-old, takes over at a particularly tough time, with Cuba's economy facing its biggest crisis since the collapse of the Soviet Union in the early 1990s. The Covid-19 pandemic has largely shut down the country's vital tourism industry, causing the economy to contract 11% last year, according to the government.

Complicating matters, Mr. Díaz-Canel confronts the challenges without any of the lingering cachet held by the old generation of revolutionary leaders.

Mr. Díaz-Canel will have to balance demands for change from many Cubans, including greater economic and political freedoms, with deeply entrenched resistance to change from an old-guard of military and Communist party hard-liners. Amid rising calls for change, the regime is trying to project an image of business as usual. Mr. Díaz-Canel's Twitter hashtag is #SomosContinuidad



Raúl Castro waved to members of a Communist Party congress Friday in Havana as Cuban President Miguel Díaz-Canel, right, applauded.

or "We Are Continuity," and the congress is billed as the Congress of Continuity.

"Díaz-Canel finds himself in a classic Catch-22 situation," said Ted Henken, a Cuba expert at New York's Baruch College. "He was selected by the old guard to maintain continuity and control, but to have any legitimacy with most ordinary Cubans, he urgently needs to introduce fundamental reforms to halt a collapsing economy and address growing social and political unrest."

That tension marks the backdrop to the Communist Party congress, which must plot a course for the country's next five years. Cuba's dire economy will give reformers more urgency to push for economic liberalization. But hardliners will resist overhauls.

Rising frustration with deteriorating conditions has re-

cently spilled into protests that have seemingly caught the regime off guard. These protests pose a greater threat to the government's near absolute control since Cubans now can access the internet on their mobile phones, enabling them to

'He will be remembered...for his frustrated attempt to modernize Cuba.'

organize spontaneous demonstrations and share information.

In November, an alliance of prominent artists, Black activists and hip-hop musicians from San Isidro, a decrepit Black quarter of colonial Havana, became the driving force

in a growing movement.

Even in retirement, analysts expect Mr. Castro to continue playing a key role in determining Cuba's future, much as Fidel did after he stepped down from the presidency in 2008. The older Castro died in 2016.

On assuming his brother's job, Raúl Castro cautiously implemented modest economic reforms, allowing Cubans to open restaurants, rent out bed-and-breakfasts and sell their cars and houses. He also engineered talks with the U.S. under former President Barack Obama that led to the reestablishment of full diplomatic relations with Cuba's historic Cold War foe in 2015.

But Fidel Castro, afraid that the Obama administration was using the detente as a Trojan horse to bring down the regime, put the brakes on his brother's reforms. The Trump administration rolled back the U.S. de-

tente, arguing it was a lifeline to a decrepit regime. Visitors from the U.S. plummeted.

"I think Raúl was a genuine reformer," says Brian Latell, a former Cuba analyst for the Central Intelligence Agency who has written a biography of Raúl Castro. "He will be remembered for posterity for his frustrated attempt to modernize Cuba, much of which was thwarted by hard-line reaction."

Some in Cuba hoped President Biden would quickly roll back the sanctions imposed by Donald Trump. But the Biden administration has only said it is reviewing its Cuba policy.

Now under house arrest, Luis Manuel Otero, one of the founders of the San Isidro Movement, hopes Raúl's departure could lead to change. "People are more and more miserable, more and more hungry, more and more desperate," he said.

Iran Starts Enriching Uranium At 60%

By SUNE ENGEL RASMUSSEN

VIENNA—Iran said it had enriched uranium at 60% purity for the first time, a move that comes in response to an attack on its main nuclear facility, and which has complicated ongoing talks between Tehran and international powers to revive a 2015 nuclear accord.

"I proudly announce that at 00:40 this morning, young Iranian scientists achieved uranium of 60% purity," Iranian parliament speaker Mohammad Bagher Ghalibaf said Friday, according to state media.

The head of Iran's nuclear agency, Ali Akbar Salehi, confirmed the step to state television, saying Iran is now producing nine grams of 60%-enriched uranium per hour.

Tehran's latest acceleration of its nuclear program beyond the limits of the 2015 deal comes after it accused Israel of attacking its Natanz nuclear facility on Sunday, causing a blackout that destroyed a number of centrifuges used to enrich uranium. Israel hasn't commented directly on the allegation, as per official policy.

Although the actual amount of 60%-enriched uranium that Iran is able to produce will be small initially, Western officials worry that the process of enriching closer to weapons grade of 90% purity would allow Iranian scientists and engineers to gain new insight into a critical building block in creating a nuclear weapon.

The move to 60% enrichment, which Tehran had announced earlier this week, has cast a shadow over nuclear talks in Vienna where international powers seek to re-enlist the U.S. in a 2015 accord, which the Trump administration later left, that imposed limits on Tehran's nuclear ambitions in return for relief from American sanctions.

Despite the recent tension, the talks progressed Thursday, with Iran showing the first sign of willingness to negotiate on its demand that the U.S. lift all sanctions before it would roll back its nuclear breaches. The talks continued Friday.

U.S. Secretary of State Antony Blinken has said Iran's move to increase enrichment to higher levels of purity called into question its seriousness toward the talks. Iran says it remains committed to negotiating, but won't let "sabotage" hinder its nuclear work.

"The fact that I am here now in Vienna proves that we are serious," the head of Iran's delegation in Vienna, Abbas Araghchi, said in an interview.

—Aresu Egbali in Tehran contributed to this article.

Hong Kong Tycoon Draws Jail Sentence

By JOHN LYONS

HONG KONG—A Hong Kong judge sentenced newspaper publisher Jimmy Lai to 14 months in jail after he was convicted on charges related to his involvement in two large but peaceful protests in 2019.

Martin Lee, the 82-year-old founder of the city's democracy movement, received a suspended sentence for his part in one of the protests.

The prosecutions, involving a total of nine prominent pro-democracy campaigners, carry symbolic weight some 10 months into China's sweeping crackdown on the former British colony, which has drawn stern rebukes from the U.S. and

other Western governments. The activists convicted were largely responsible for originating Hong Kong's democracy movement before its 1997 handover to China, and their prosecutions are seen by many as a sign of Beijing's intent to crush that campaign at its roots.

For Mr. Lee, a lawyer who helped found Hong Kong's first pro-democracy party three decades ago and helped write the city's mini constitution, the sentence follows his first criminal conviction in a lifetime of activism carried out through lawful means.

For Mr. Lai, an outspoken tycoon whose newspaper often criticizes China's authoritarian government, the jail term adds

to a mounting list of legal troubles related to his activism. Already in jail awaiting trial on foreign collusion charges under the national security law that China imposed on Hong Kong, Mr. Lai, 73, faces the prospect of life behind bars.

Police arrested the group of activists in early-morning raids in April 2020. In May, China said it would impose the national security law.

Meanwhile, prosecutions targeting democracy activists are under way across the city. A group of 47 mostly younger pro-democracy politicians are being prosecuted for subversion under the national security law.

Prosecutors are alleging a mock primary election that they or-

ganized and participated in last year violated the law, which was imposed by China just before midnight on June 30.

This year, Beijing has used its authority to all but dismantle the remains of Hong Kong's limited democratic institutions. Under new rules, Beijing-backed authorities will vet any possible candidates to ensure that only pro-government patriots may run.

A former British colony, Hong Kong was returned to China in 1997 under a "one country, two systems" accord that was meant to allow the city to mostly govern itself until 2047.

Nine defendants, including Messrs. Lee and Lai, were found guilty of organizing and attend-

ing an unauthorized assembly on Aug. 18, 2019, to protest the mainland government's growing intervention in the city.

Judge Amanda Woodcock cited the premeditated nature of the march amid the volatile climate at the time of the protest in deciding to hand out jail time. The march amounted to a "direct challenge to the police and therefore law and order," she said.

The judge reduced the penalties and suspended four sentences based on the ages of the defendants and their histories of public service including that of Mr. Lee. This means the defendants won't serve time if they don't commit other crimes for two years.

WORLD WATCH

UNITED KINGDOM

Estranged Princes Will Meet at Funeral

A closely watched subplot to Prince Philip's funeral on Saturday will be the interaction between two increasingly estranged brothers: Prince Harry and Prince William.

Queen Elizabeth's two grandchildren were once billed as a royal double act. Today they symbolize a split that risks hanging over the House of Windsor for years to come.

Following allegations by Prince Harry of racism in the royal ranks and his high-profile decision to quit the fold, many royal watchers will be looking for signs of a public reconciliation between the brothers. Covid-19 restrictions that require social distancing and a highly choreographed funeral plan make that look increasingly unlikely.

The queen decided the brothers won't walk together behind their grandfather's coffin during the funeral procession at Windsor Castle. Instead, between them will stand their cousin Peter Phillips, Princess Anne's son. Once inside St. George's Chapel, the brothers won't walk shoulder to shoulder either. A Buckingham Palace spokesman said he wouldn't be "drawn into those perceptions of drama."

Prince Harry's wife, Meghan Markle, won't attend the funeral on doctor's advice because she is pregnant, palace officials said.

—Max Colchester



GETAWAY: British, Canadian and U.S. citizens waited Friday to be evacuated on a cruise ship on the Caribbean island of St. Vincent after the La Soufrière volcano shot out another burst of gas and ash.

ORVILLE SAMUEL/ASSOCIATED PRESS

RUSSIA

Navalny Says He Could Be Force-Fed

Imprisoned Russian opposition leader Alexei Navalny, who has been on a hunger strike since March 31, on Friday described threats to force-feed him, using "straitjacket and other pleasures."

In an Instagram post, Mr. Navalny said an official told him that a blood test indicated his health was deteriorating and threatened to force-feed him if he continues to refuse to eat.

Mr. Navalny, President Vladimir Putin's most vociferous

critic, is demanding a visit from his physician after developing severe back pain and numbness in his legs in prison.

Also Friday, the Moscow prosecutor's office said it asked a court to declare Mr. Navalny's Fund for Fighting Corruption as an extremist group and his staff members as extremists.

—Associated Press

UKRAINE

Merkel, Macron Seek Russian Withdrawal

The leaders of France and Germany are demanding the

withdrawal of Russian troops recently deployed at the border with Ukraine, the German chancellor's office said Friday after the two leaders held security talks with Ukrainian President Volodymyr Zelensky.

Mr. Zelensky met Friday in Paris with French President Emmanuel Macron, and German Chancellor Angela Merkel joined them by teleconference. The Ukrainian president is trying to rally backing from the European Union and the North Atlantic Treaty Organization amid growing tensions between his country and neighboring Russia.

—Associated Press

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OBITUARIES

SHIN CHOON-HO
1930 — 2021

Korea's 'Ramen King' Built a Global Brand

Shin Choon-ho had a hunch in the mid-1960s that instant ramen noodles could become a big business. He formed a company to make them despite opposition from his older brother, Shin Kyuk-ho, head of the family's Lotte business group, who thought it was a terrible idea.

The brothers' split was so bitter that they never spoke again, according to colleagues. The younger Mr. Shin gradually built a global company, Nongshim Co., whose name means farmer's heart in Korean.

He favored beef broth, while Japanese rivals typically used chicken, and insisted on retaining fiery Korean flavors, even though colleagues feared American customers would buy only bland ver-

sions. Nongshim's Shin Ramyun-brand noodles are now exported to more than 100 countries.

Sales boomed during the Covid-19 pandemic as people embraced simple-to-prepare meals. The brand also got a boost from the Oscar-winning movie "Parasite," which includes a scene in which a housekeeper tosses cubed sirloin steak into a mixture of two types of Nongshim noodles, a popular Korean dish known as jjapaguri. Nongshim exploited the 2019 film's success to launch a cup noodle version of the dish a year ago.

Mr. Shin, known as South Korea's "ramen king," died March 27 of a chronic illness. He was 90 years old.

—Dasl Yoon

W. GALEN WESTON
1940 — 2021

Supermarket Tycoon Bought Selfridges

W. Galen Weston, born into privilege as a member of a Canadian-British food-business clan, moved to Ireland in his early 20s to prove his entrepreneurial skills.

While running a small grocery business there, he spotted a billboard featuring an Irish model, Hilary Frayne. He soon arranged for an introduction, and they married in 1966 in Henley-on-Thames, England.

Mr. Weston, whose grandfather originated the family fortune by founding a bakery business in Toronto in 1882, moved with his wife and two children to Canada in the early 1970s to run a troubled branch of the family's international business empire, the Loblaw supermarket chain, then

near bankruptcy. He closed many of the stores, renovated the others and launched a highly successful private-label food line. Today, Loblaw Cos. is the biggest food and drug retailer in Canada.

In 2003, Mr. Weston bought London-based Selfridges PLC, an operator of department stores, and combined it with other high-end chains.

He often showed up unannounced to inspect stores and liked retailing to an addiction.

Though his family was rich, "to bum around would have been unacceptable," he told the *Globe and Mail* newspaper in 1988.

Mr. Weston died April 12 of what his family called a long illness. He was 80.

—James R. Hagerty

FROM PAGE ONE

Viewers Add Their Input To Powell's

Continued from Page One
new policy of seeking inflation that temporarily overshoots its 2% target.

"For the last decade, you've seen central banks around the world really struggle to reach a 2% goal, and in some cases are fighting outright deflation," Mr. Powell said in a virtual event with the Economic Club of Washington.

As he spoke, a message board streaming alongside Yahoo Finance's webcast of the event on YouTube lit up.

"IF INFLATION ISN'T A THING WHY DOES THE MCDONALDS DOLLAR MENU NO LONGER EXIST," a user wrote in a message visible to the 5,000 viewers who had tuned in to watch Mr. Powell.

Such are the pitfalls of public outreach in a digital age.

To the dismay of some longtime Fed watchers, Mr. Powell's online video appearances often are accompanied by live chat-room commentary. The content, to say the least, doesn't always reflect the gravitas of the world's most powerful central banker as he lays out Fed efforts to fight the economic impact of the Covid-19 pandemic.

"Pump pump pump!!! Print the money!!!" a YouTube user wrote during a virtual event by the Bay Area Council business association in November, which featured the Fed chief alongside a stream of comments.

Mr. Powell had just reiterated his intention to maintain easy-money policies until the recovery is complete.

Mr. Powell's online followers frequently address him directly using his internet nickname, JPow. Some urge viewers to buy gold or cryptocurrencies such as bitcoin, an asset class Mr. Powell recently described as "highly volatile...and therefore not really useful as a store of value."

The supposed imminent de-



Fed Chairman Powell at a virtual news conference in December.

mise of the U.S. currency is a favorite topic of commenters, and conspiracy theories abound. It's hard to know what's meant to be a joke. I can't wait till they start talking about their depopulation program to help with the climate change problem," a user wrote in the chat that accompanied the International Monetary Fund's YouTube stream of an event featuring Mr. Powell and other global policy makers on April 8.

David Wilcox, a former Fed director of research, said he closes the chat windows when he can. If he can't, he leans a pad of paper against his computer monitor to block his view of the messages. "If I'm going to get something useful out of Powell's remarks, I have to screen out the blather that's going on," Mr. Wilcox said.

The potential for snarky commentary doesn't factor into decisions about Mr. Powell's speaking schedule, a person familiar with the matter said. The Fed disables live comments for events shown on its own YouTube page, including the chairman's regular news conferences.

It's impossible to identify many commenters because YouTube, where most of Mr. Powell's live events are broadcast, displays only usernames. Some complain about having to stay awake late to watch Mr. Powell speak, suggesting they're in distant time zones.

"Don't taper plz," wrote Nigel Ng, a day trader in Singapore, during a Princeton University event with Mr. Powell

in January.

Tapering refers to the eventual scaling-back of asset purchases by the Fed, which has been buying at least \$120 billion a month of Treasury and mortgage-backed securities. The Fed says it doesn't plan to begin to taper until the economy recovers further. Mr. Ng said he was just joking around on the message board.

A popular refrain in the chats is a Fed-related meme, "Brrr." That's the sound of the central bank printing money, according to the joke. Some liken the Fed's asset purchases, which take place entirely over computer networks, to money printing.

Kyle Koshiyama, a crypto-currency trader in Ann Arbor, Mich., said he tunes in often to an appearance by Mr. Powell. "If I'm going to watch it, I'm 100% jumping in on the message board," he said.

"I'm trying to throw feelers out, seeing what people think about certain asset classes, or what's the general sentiment regarding any specific thing Powell's talking about."

The chat boards' content often can run counter to the messages the Fed wants to convey. During the January event, a Korean-language commenter asked for a translation of Mr. Powell's remarks.

Another viewer responded: "It's a bubble right now. I'm going to raise the interest rate increases are a long way off."

Mr. Powell has played down the risk of financial bubbles and has repeatedly said rate increases are a long way off.

HOWARD WEITZMAN
1939 — 2021

Celebrities in Court Relied On Los Angeles Lawyer

BY JAMES R. HAGERTY

Howard Weitzman's first choice for career was Major League Baseball second baseman. His second choice, after earning a physical education degree at the University of Southern California, was coaching.

When neither of those dreams worked out, someone suggested law school. Though Mr. Weitzman had never thought about a legal career and wasn't sure he had even met a lawyer, he earned a law degree at USC and proved a natural.

He zoomed into national recognition in 1984 by successfully defending the automobile entrepreneur John Z. De Lorean against charges of conspiring to import cocaine. "He took the government's case and rammed it down their throats," Warren L. Ettinger, a friend and a former California state judge, said at the time.

That led to a parade of other celebrity clients—or "people of profile," as he liked to call them—including Courtney Love, Magic Johnson and Paris Hilton.

Mr. Weitzman died April 7 at his home in the Pacific Palisades section of Los Angeles. He was 81 and had been under treatment for cancer.

His rise to prominence in the mid-1980s coincided with intense cable TV coverage of celebrity trials. "I learned then that on TV they tend to take three words from the 10 sentences you spoke," he told *Southern California Super Lawyers* magazine in 2008. "You learn pretty quickly to speak in sound-bites."

Some lawyers complained that his media performances, including almost daily news conferences on the courthouse steps during the De Lorean trial, demeaned the profession. "Those lawyers doing all the griping would give their eye teeth to be in my position," he retorted.

Howard Lloyd Weitzman was

born Sept. 21, 1939, in Los Angeles. His father ran a grocery business.

Physical-education majors weren't on an obvious track for legal studies, but his baseball coach, Rod Dedeaux, recommended Mr. Weitzman to the law school dean at USC. While in law school, he was elected student body president.

In the De Lorean trial, prosecutors played video and sound recordings they said showed the former auto executive as an enthusiastic participant in a scheme to sell millions of dollars of cocaine. Mr. Weitzman convinced jurors that Mr. De Lorean was entrapped by the government.

He defended Ozzy Osbourne, a heavy metal rock star, in a 1986 lawsuit alleging that his song "Suicide Solution" incited a teenager to kill himself. A California judge dismissed the suit.

Representing Sean Penn in 1987, when the actor was in trouble over fistfights and a violation of probation, Mr. Weitzman promised to arrange for counseling. "He has to learn that people are going to attempt to goad him into situations where he may react inappropriately," Mr. Weitzman told a Los

Angeles municipal judge.

Mr. Weitzman represented Michael Jackson on a variety of matters, including allegations of child molestation in the 1990s, and later represented the late singer's estate.

One key to Mr. Weitzman's success was that he was a brilliant storyteller, whether having dinner with friends or addressing a jury, said Michael E. Kassan, a longtime friend and chief executive of MediavLink, a consulting firm. "He had a crazy memory for detail."

Another friend, the movie director Bill Friedkin, said he relished chats with Mr. Weitzman about his cases. "It always seemed to me that Howard really believed in the causes of his clients," particularly Michael Jackson, Mr. Friedkin said.

Mr. Weitzman worked as an executive at Universal Studios Inc. in the mid-1990s but was bored by corporate meetings and went back to legal practice.

He met Margaret Garabedian, then a sociology student at Pepperdine University, in the 1970s and they married in 1981. She survives him along with two sons and two grandchildren. Ms. Weitzman said she attended his jury trials and sometimes passed him notes with her observations. Two earlier marriages ended in divorce.

Later in his career, Mr. Weitzman generally avoided criminal law and focused on corporate matters. "Criminal defense is a very difficult proposition," he told the *Los Angeles Business Journal* in 2002. "I was always intellectually concerned with winning in a way that wasn't appropriate, and it always bothered me when guilty people walked free," he said, adding that "I've turned down a lot of cases in the last 20-plus years because I believe the person committed the crime they were charged with."

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FROM PAGE ONE

Views Differ On Family History

Continued from Page One

Ann's features in photos of their great-great-grandparents, each wondering about her story.

Eventually, Ms. Finger and Ms. Brooks connected on a genealogy website. Over time, they decided to pool what they knew and set out to learn more.

Both women hoped exploring their common ancestry would lead to a better understanding of their painful history. But that proved hard to come by. Each reached different conclusions about what they learned. Their reactions are a reminder of how the past remains up for debate in ways that resonate today.

"This is overwhelming," Ms. Finger, 60 years old, said at one point in the process. "Sometimes I want to step away."

Said Ms. Brooks, who is 54: "I just wanted to know the truth."

'Missing branches'

It's difficult to uncover detailed information on individuals who were enslaved. They were rarely permitted to read or write, and couldn't easily record their own histories. Record-keeping was spotty. Families were broken apart when individuals were sold. Some took their owners' last names; others, after Emancipation in 1863, rejected those names and chose new ones, making them tougher to track in official records.

"Every family that came out of slavery is missing branches in the family tree," said LaBrenda Garrett-Nelson, a genealogist who specializes in helping African-American families research their past.

The amount of DNA that two people share falls as each generation moves further away from a common ancestor. The tangled and often hidden history during the slavery era can make the research harder—and the findings more devastating.

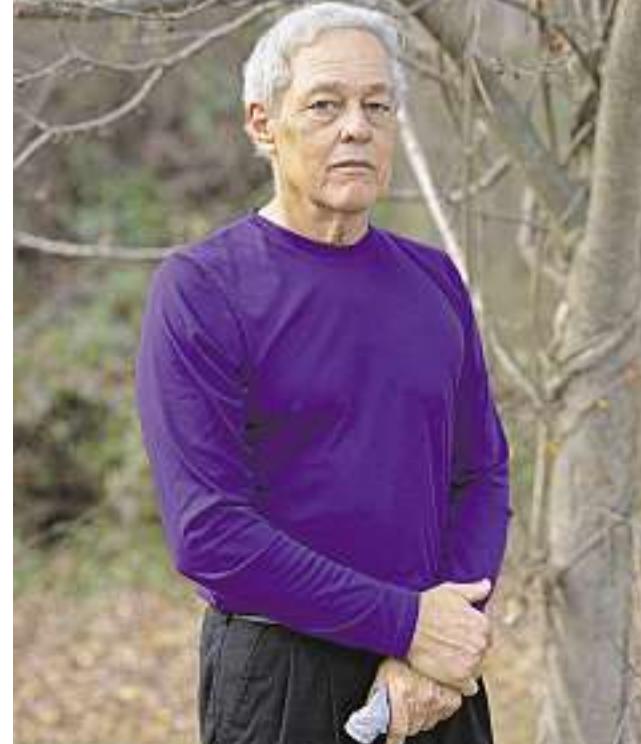
Black Americans are often underrepresented in databases of direct-to-consumer DNA-testing companies, and for many, DNA reports can include unexpected or high percentages of European ancestry, due to sexual exploitation and rape. A large study published last year by the company 23andMe concluded that African women have contributed significantly more to the gene pool across the Americas than African men.

"Researching the enslavers is an integral part of researching the enslaved," said Ms. Garrett-Nelson. "They remain intertwined."

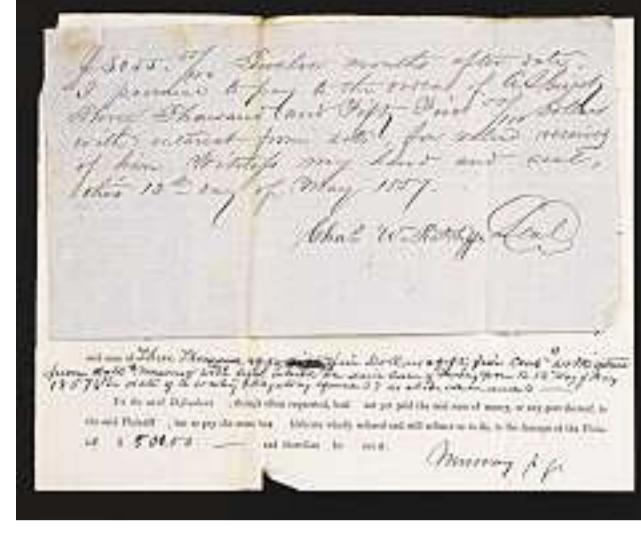
Family history

Long before they met, Ms. Finger and Ms. Brooks had something in common: Each felt drawn to their family history, especially the story of the enslaved woman named Ann.

Ms. Brooks visited the Fairfax County Courthouse in Virginia, in search of answers. In the historic records there, she saw the name of her great-great-grandfather—one of Ann's children—along with those of his presumed siblings.



Robert Lee viewed documents with family members; A ledger of Charles's grandfather, which lists Ann and her children, at the Fairfax Historic Courthouse in Virginia.



NATE PALMER FOR THE WALL STREET JOURNAL (4)

Ms. Finger holds a photo of her great-great-grandmother, Jane, left, a child of Ann; above, an IOU signed by Charles Ratcliffe.

Ann and two of her children. But she was unable to repay her debt, and Ann and the children were sold again, to a well-known slave trader, at a public auction on Jan. 1, 1856.

Between February 1856 and May 1857, there are no known records on the whereabouts of Ann and the children—a not-uncommon gap. But in May 1857 Charles signed an IOU note to a slave trader for \$3,055.55. Slave traders often served as lenders. Charles used the money to buy Ann and all her children, including Maria.

The IOU, and the ownership it represented, was a stark document for Ann's descendants to see. "I am trying to imagine this," said Ms. Finger, studying the document. "Charles signed a deal with the devil," said Ms. Bollinger.

For two hours, they discussed what they had learned. Ms. Brooks had always been told that Charles and Ann met as children and grew up together. Charles was 19, and Ann 17, when Maria, their first child, was born. "They were a loving couple," she said.

Ms. Finger saw the relationship differently. "Ann was a slave," she said. "She was thrown around. It was moneymotivated. She had no choice."

Ms. Finger's cousin, Robert Lee, later said he didn't understand how Charles could separate his emotions as the father of the children from his actions as their owner. "You had to compromise things in your soul," he said.

His wife, Anita, said Charles had cared for Ann like someone values a favorite possession, nothing more. "You can care a lot for your furniture, then you sell it or auction it off," she said. "As for Ann, she had to do whatever she could to get through and protect her children."

Said her husband, "You could be right, you could be wrong. It is difficult to get in their heads."

On the day they visited the archives, the family also stopped by a church cemetery where some of Ann's children were buried. The caretaker searched records and found where Maria had been buried—near her siblings, but with no gravestone. "I am glad we found her," said Ms. Finger.

Different views

The group felt unsettled not only by what they'd learned, but by how they viewed it.

"I appreciate Michelle's approach," said Ms. Finger. "But it is different than mine. Michelle is more of a romantic."

Ms. Brooks said her views were shaped by her great-grandmother's stories. "There was never any bitterness passed down to me," she said.

"We can't tell the full story without each other," said Ms. Finger.

Slavery Index

Heather Bollinger manages the historic records at the Fairfax court. With the assistant archivist Georgia Brown, she maintains the Fairfax Court Slavery Index, a detailed collection of more than 40,000 references to slaves in wills, deeds, bills of sale and probate records. Slave auctions were once held just outside the building.

"The people in these records are alive for us," Ms. Bollinger said. "We talk about them. We gossip about them."

She had unearthed a photo of the slave trader. Did the family want to see it?

We think about them."

Last August, the two met with Ms. Finger, Ms. Brooks and some of their relatives. They presented each family member a packet of documents, many of them chancery court cases, that opened a window into the story of Charles Ratcliffe and Ann.

A narrative began to take shape. The documents showed that until February 1854, Ann and her children were the legal property of Charles's grandfather. When he died, his slaves were divided among his heirs. One of Charles's cousins drew the lot that included Ann and her children.

But that cousin soon ran up debts buying copious quantities of whiskey. To pay his debts, he asked a slave trader

to sell the slaves. He eventually wound up in court, fighting over their value and ownership.

He complained that while he was legally entitled to Ann and the children, Charles was living with them. He feared Charles would run off with Ann, "it being notorious that she lived in a state of concubinage with Charles W. Ratcliffe," according to a slave trader's testimony. So the trader sold Ann to another slave trader.

Charles's mother then stepped in. While never declaring herself the children's grandmother, she told the new owner that Ann and her three children were "of the family" and said she wanted to buy them back, a trader testified. She borrowed money to buy Ann and the youngest two children, but refused to buy the oldest child, 6-year-old Maria, saying she was unsure about her paternity.

Interrupting the narrative, Ms. Bollinger said she had unearthed a photo of the slave trader. Did the family want to see it?

Ms. Finger said no, and passed it to Ms. Brooks. "I don't want to see him," she said. She was angry that Charles's mother had refused to buy Maria.

But Ms. Brooks studied the image. The trader was looking away from the camera. He wore a black hat and an ill-fitting coat too tight to button. His pants were splitting apart at the seams. "He looks like a character," she said.

Later, she said she didn't understand Ms. Finger's reaction. "It is history and can't be rewritten," she said. "I want to know every part, even the ugly parts of it."

After her intervention, Charles's mother now owned

1000, Sarah	1000
1000, John F.	1000
1000, Jane & child f 900	1000
1000, child f 1050, Milly f 225	1275 00
1150, Bill Ellis f 600	550 00
1000, Ann & 2 children f 250	1600 00
1000, Nancy f 900	1900 00
1000, Ann & 2 children f 150	1800 00
1000, Anna f 50	500 00

"She didn't talk about it much, but she was very proud of the Ratcliffes. She was proud of her heritage."

To her, what they'd learned was the story of Charles Ratcliffe trying to keep his family together. "Even though Ann did not have agency, we always believed she was in a loving relationship," said Ms. Brooks. "Yes, these people owned slaves and they were terrible for doing so. But they actually loved Ann."

She said there was evidence to support her view. Marriage licenses for three of Charles and Ann's children, issued in the 1870s, listed both of them as parents. The information was provided by the people getting married.

That was rare for that time, said Ms. Bollinger, and is the only instance she knows of in Fairfax County from that era in which a Black woman and a white man are publicly acknowledged on documents as parents.

But the records also had frustrating blanks. The archivists sought evidence of Charles's views. What they found disturbed them.

His IOU note showed Charles had agreed to pay \$3,055.55 for 35 acres of land and Ann and the children. For a man like Charles, unestablished and with few assets, this was exorbitant, the equivalent of more than \$135,000 today, Ms. Bollinger said.

Later, when Charles failed to repay his debt, the slave trader who lent him the money insisted Ann and her children be sold. Asked in court if he planned to subvert the sale by running away with his family, Charles swore he wouldn't—and called the suggestion "an unprovoked and wanton libel."

Said Ms. Bollinger, "He doesn't ever claim them. He doesn't say they are his family." He was probably bluffing, she said, since the proceedings were public. He likely didn't want to declare he had a family with an enslaved woman.

"But even if he is bluffing, which we don't know, it is down there on paper that he was ready to give them up," she said.

The sales never happened. Charles persuaded a wealthy family friend to take over the debt, according to a document filed with the court. Then he defaulted again. He lost his land. His name never appears again in official records of landowners.

In 1870, seven years after the Emancipation Proclamation had legally freed Ann and the children, the federal Census showed Charles was still living with them. Eventually, the trail about the couple ran cold, leaving more questions.

"The family wants to know what the relationship was between Charles and Ann," said Ms. Bollinger. "They have to take the family stories and the histories and make a decision for themselves."

Ms. Brooks couldn't decide what she thought of Charles Ratcliffe. "It made me feel he was a wreck," she said. "I don't want to call him a loser, but he was in a bad situation." She intends to keep looking for information about Ann.

For her part, Ms. Finger concluded that she would never understand Charles's behavior. "I had settled in my mind that I am never going to know Charles," she said.

She thinks often about Ann, she said, and the way in all the documents, "Ann is silent. Ann's voice is missing." But she said she no longer thinks of the origins of Ann and her children as only a personal family story—but as an American one.

"It is our story," Ms. Finger said. "It is up to all of us to decide how we get past it."

OPINION

THE WEEKEND INTERVIEW with Steven Koonin | By Holman W. Jenkins, Jr.

How a Physicist Became a Climate Truth Teller

Barack Obama is one of many who have declared an "epistemological crisis," in which our society is losing its handle on something called truth.

Thus an interesting experiment will be his and other Democrats' response to a book by Steven Koonin, who was chief scientist of the Obama Energy Department. Mr. Koonin argues not against current climate science but that what the media and politicians and activists say about climate science has drifted so far out of touch with the actual science as to be absurdly, demonstrably false.

This is not an altogether innocent drifting, he points out in a videoconference interview from his home in Cold Spring, N.Y. In 2019 a report by the presidents of the National Academies of Sciences claimed the "magnitude and frequency of certain extreme events are increasing." The United Nations Intergovernmental Panel on Climate Change, which is deemed to compile the best science, says all such claims should be treated with "low confidence."

After a stint at the Obama Energy Department, he reclaims the science of a warming planet from the propaganda peddlers.

In 2017 the U.S. government's Climate Science Special Report claimed that, in the lower 48 states, the "number of high temperature records set in the past two decades far exceeds the number of low temperature records." On closer inspection, that's because there's been no increase in the rate of new record highs since 1900, only a decline in the number of new lows.

Mr. Koonin, 69, and I are of one mind on 2018's U.S. Fourth National Climate Assessment, issued in Donald Trump's second year, which relied on such overegged worst-case emissions and temperature projections that even climate activists were abashed (a revolt continues to this day). "The report was written more to persuade than to inform," he says. "It masquerades as objective science but was written as—all right, I'll use the word—propaganda."

Mr. Koonin is a Brooklyn-born math whiz and theoretical physicist, a product of New York's selective Stuyvesant High School. His parents, with less than a year of college between them, nevertheless intuited in 1968 exactly how to handle an unusually talented and motivated youngster: You want to go cross the country to Caltech at age 16? "Whatever you think is right, go ahead," they told him. "I wanted to know how the world works," Mr. Koonin says now. "I wanted to do physics since I was 6 years old, when I didn't

know it was called physics."

He would teach at Caltech for nearly three decades, serving as provost in charge of setting the scientific agenda for one of the country's premier scientific institutions. Along the way he opened himself to the world beyond the lab. He was recruited at an early age by the Institute for Defense Analyses, nonprofit group with Pentagon connections, for what he calls "national security summer camp: meeting generals and people in congress, touring installations, getting out on battleships." The federal government sought "engagement" with the country's rising scientist elite. It worked.

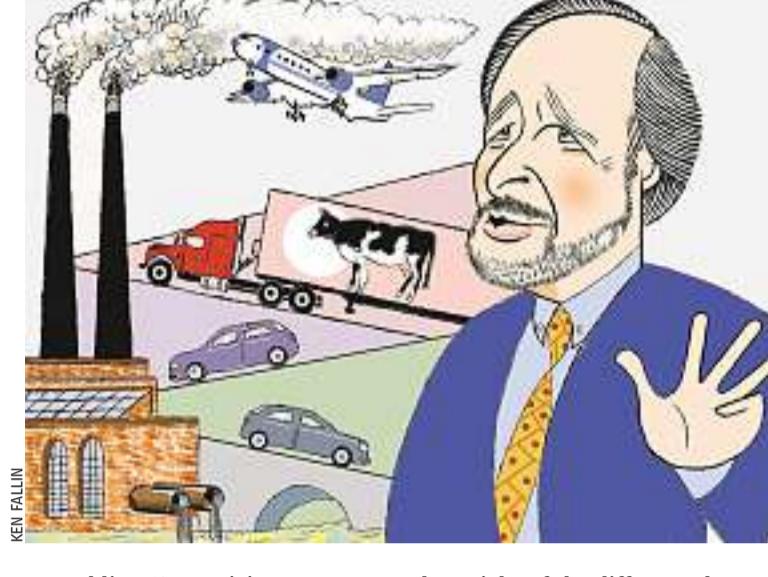
He joined and eventually chaired JASON, an elite private group that provides classified and unclassified advisory analysis to federal agencies. (The name isn't an acronym and comes from a character in Greek mythology.) He got involved in the cold-fusion controversy. He arbitrated a debate between private and government teams competing to map the human genome on whether the target error rate should be 1 in 10,000 or whether 1 in 100 was good enough.

He began planting seeds as an institutionalist. He joined the oil giant BP as chief scientist, working for John Browne, now Baron Browne of Madingley, who had redubbed the company "Beyond Petroleum." Using \$500 million of BP's money, Mr. Koonin created the Energy Biosciences Institute at Berkeley that's still going strong. Mr. Koonin found his interest in climate science growing, "first of all because it's wonderful science. It's the most multidisciplinary thing I know. It goes from the isotopic composition of microfossils in the sea floor all the way through to the regulation of power plants."

From deeply examining the world's energy system, he also became convinced that the real climate crisis was a crisis of political and scientific candor. He went to his boss and said, "John, the world isn't going to be able to reduce emissions enough to make much difference."

Mr. Koonin still has a lot of Brooklyn in him: a robust laugh, a gift for expression and for cutting to the heart of any matter. His thoughts seem to be governed by an all-embracing realism. Hence the book coming out next month, "Unsettled: What Climate Science Tells Us, What It Doesn't, and Why It Matters."

Any reader would benefit from its deft, lucid tour of climate science, the best I've seen. His rigorous parsing of the evidence will have you questioning the political class's compulsion to manufacture certainty where certainty doesn't exist. You will come to doubt the usefulness of century-long forecasts claiming to know how 1% shifts in variables will affect a global climate that we don't understand with anything



resembling 1% precision.

His book lands at crucial moment. In its first new assessment of climate science in eight years, the U.N. climate panel—sharer of Al Gore's Nobel Peace Prize in 2007—will rule anew next year on a conundrum that has not advanced in 40 years: How much warming should we expect from a slightly enhanced greenhouse effect?

The panel is expected to consult 40-plus climate computer simulations—testament to its inability to pick out a single trusted one. Worse, the models have been diverging, not coming together as you might hope. Without tweaking, they don't even agree on current simulated global average surface temperature—varying by 3 degrees Celsius, three times the observed change over the past century. (If you wonder why the IPCC expresses itself in terms of a temperature "anomaly" above a baseline, it's because the models produce different baselines.)

Mr. Koonin is a practitioner and fan of computer modeling. "There are situations where models do a wonderful job. Nuclear weapons, when we model them because we don't test them anymore. And when Boeing builds an airplane, they will model the heck out of it before they bend any metal."

"But these are much more controlled, engineered situations," he adds, "whereas the climate is a natural phenomenon. It's going to do whatever it's going to do. And it's hard to observe. You need long, precise observations to understand its natural variability and how it responds to external influences."

Yet these models supply most of our insight into how the weather might change when emissions raise the atmosphere's CO₂ component from 0.028% in preindustrial times to 0.056% later in this century. "I've been building models and watching others build models for 45 years," he says. Climate models "are not to the standard you would trust your life to or even your trillions of dollars to." Younger scientists in particular

lose sight of the difference between reality and simulation: "They have grown up with the models. They don't have the kind of mathematical or physical intuition you get when you have to do things by pencil and paper."

All this you can hear from climate modelers themselves, and from scientists nearer the "consensus" than Mr. Koonin is. Yet the caveats seem to fall away when plans to spend trillions of dollars are bruited.

For the record, Mr. Koonin agrees that the world has warmed by 1 degree Celsius since 1900 and will warm by another degree this century, placing him near the middle of the consensus. Neither he nor most economic studies have seen anything in the offing that would justify the rapid and wholesale abandoning of fossil fuels, even if China, India, Brazil, Indonesia and others could be dissuaded from pursuing prosperity.

He's a fan of advanced nuclear power eventually to provide carbon free base-load power. He sees a bright future for electric passenger vehicles. "The main reason isn't emissions. They're just shifted to the power grid, and transportation anyway is only about 15% of global greenhouse-gas emissions. There are other advantages: Local pollution is much less and noise pollution is less. You're sitting in a traffic jam and all of these six- or four-cylinder engines are throbbing up and down burning fuel and just doing no good at all."

But these are changes it makes no economic sense to force. Let technology and markets work at their own pace. The climate might continue to change, at a pace that's hard to perceive, but societies will adapt. "As a species, we're very good at adapting."

The public now believes CO₂ is something that can be turned up and down, but about 40% of the CO₂ emitted a century ago remains in the atmosphere. Any warming it causes emerges slowly, so any benefit of reducing emissions would be small and distant. Everything Mr. Koonin and others see in the science suggests a slow,

modest effect, not a runaway warming. If they're wrong, we don't have tools to apply yet anyway. Decades from now, we might have carbon capture—removing CO₂ directly from the atmosphere at a manageable cost.

He's less keen, except in the most extreme circumstances, on what many see as the cheaper, easier fix of augmenting the aerosol effect, which already partially offsets the warming caused by greenhouse gases, by injecting particles into the upper atmosphere. The political and practical unknowns are large. "You could have some country or even some individual do it. The policy community is just starting to grapple with that."

Mr. Koonin does not drive an electric car. He drives what he jokes is the official car of Putnam County, a Subaru Outback, while he and his wife weather the pandemic in a woodsy enclave along the Hudson River. An Audi meant to haul them and the dog back to New York City, where he started and ran New York University's Center for Urban Science and Progress, collects dust.

Mr. Koonin says he wants voters, politicians and business leaders to have an accurate account of the science. He doesn't care where the debate lands. Yet his expectations are ruled by a keen sense of realities. I mention, along with some names, that I never met any one of serious judgment who didn't privately pooh-pooh the idea that humanity will control CO₂ by means other than the mostly unregulated progress of markets and technology. Mr. Koonin nods his agreement.

He speaks of "could," "should" and "will"—and what "will" happen is a lot less than elites, in response to current reward structures, are pretending will happen. Even John Kerry, Joe Biden's climate czar, recently admitted that Mr. Biden's "net-zero" climate plan will have zero effect on the climate if developing countries don't go along (and they have little incentive to do so). Mr. Koonin hopes that "a graceful out for everybody" will be to see the impulse for global climate regulation "morph into much more impactful local environmental action: smog, plastic, green jobs. Forget the global aspect of this."

This is a view widely shared and little expressed. First, the mainstream climate community will try to ignore his book, even as his publicists work the TV bookers in hopes of making a splash. Then Mr. Koonin knows will come the avalanche of name-calling that befalls anybody trying to inject some practical nuance into political discussions of climate.

He adds with a laugh: "My married daughter is happy that she's got a different last name."

Mr. Jenkins writes the Journal's Business World column.

Why Struggling Cities Should Cut Property Taxes



CROSS COUNTRY
By Thiru Vignarajah

As the pandemic recedes, cities and towns are feeling the budget pinch. Many will be tempted to raise property taxes to fill the gaps. They should cut them instead. This isn't only sound economics—it's also an antidote

to a regressive taxation scheme whose costs fall unfairly on the country's poorest homeowners, many of them minority residents of struggling cities.

The traditional case against high property tax rates is that they deter investment, chase people out of cities, and make it harder to attract new residents. Growing empirical evidence from across the country shows that property taxes are also inequitable, saddling low-income homeowners with a lopsided share of municipal tax burdens.

On the surface, it isn't intuitive why property taxes are unfair. They are calculated, after all, as a fixed percentage of a home's assessed value. The problem is that houses in poor neighborhoods generally sell for less than the assessment values used to calculate their property taxes, while expensive homes in affluent communities reliably sell for more than their assessed values. Tax assessors systematically undervalue America's priciest homes and consistently overvalue the country's least expensive homes. Affluent homeowners may be paying less in taxes than they should, and poorer homeowners have been paying

more than they should.

Take Baltimore. According to data from a recent University of Chicago study, more than 75% of the city's least valuable homes sold between 2007 and 2018 yielded prices that were lower than the assessment value used for property taxes. The exact opposite is true when it comes to Baltimore's most lavish homes. During that same period those residences sold, on average, for more than twice the value used to compute property taxes.

This absurdity is amplified by Bal-

It's the perfect time to reboot urban economies and help the country's poorest homeowners.

timore's high property tax rate, which is twice that of neighboring counties, even as the city hemorrhages people. Baltimore has fewer residents in 2020 than it had in 1920. In return for paying the highest property taxes in the state, city dwellers get a slew of the worst services and outcomes in the U.S.: Municipal ineptitude leading to uncanceled water bills, potholes pockmarking every other street, alleys strewn with trash. Many of Baltimore's public school buildings lack heat or drinkable water, and the city's homicide, drug-overdose, illiteracy and lead-poisoning rates are among the highest in America.

What an injustice that the residents most directly affected by this

dysfunction are often the same homeowners who, because of inflated assessments, pay a higher share of the city's property taxes. Baltimore isn't alone in this regard. The same cruel irony persists in Detroit, Atlanta, St. Louis and other cities caught in the quicksand of exorbitant taxes.

Because of the myopia caused by the current crisis, leaders in cities like Baltimore may be unwilling to cut taxes. To reverse decades of decline and inequity, however, this is exactly what they must do. And they need to start now because U.S. cities are about to enter a fierce contest for capital as the economy emerges from pandemic-related strictures. How we work and where we live will never be the same, and unrivaled investments will accompany this transformation. Relief dollars from Washington will be dwarfed by pent-up private capital spilling into markets as American consumers begin to spend money again. This could be the biggest infusion of federal capital into the economy since the New Deal and the largest introduction of private investment ever.

Those investments won't be distributed evenly, however, and cities will need to set themselves apart, conspicuously and fast. In the scramble to grab a share of this gold rush, there's no time to lose. Cities should pledge to cut property taxes immediately because investment decisions are being made now.

The economic upside of cutting property taxes is evident in the academic literature. A 1999 school-finance reform in New Hampshire resulted in property-tax cuts across

the Granite State. In low-density areas, economists found an 11% to 22% jump in residential construction; in southern New Hampshire, where housing concentration was already high, tax cuts drove up home prices instead. Both results—a surge in construction and higher home values—materialized in Boston and San Francisco too. Many forget that before they were two of America's darling coastal cities, both were in steep decline, with substantial population loss between 1950 and 1980. Critical to their turnaround were statewide ballot measures in California (1978) and Massachusetts (1980), which slashed taxes. San Francisco's property-tax rate plunged 57% practically overnight. Over the course of two

years, Boston's property-tax rate fell 75%.

These are lessons with renewed importance today. A modern cataclysm sparked by disease could give way to a renaissance of smart and righteous reform. In cutting property taxes, cities have a chance to reboot their economies and dismantle hidebound tax policies that have hurt poor homeowners the most. Leaders who seize this moment will see their cities surge ahead. Those who don't will fall further behind.

Mr. Vignarajah, a fellow with the Institute for Corporate Governance and Finance at New York University School of Law, previously served as deputy attorney general of Maryland.

Notable & Quotable: Pullout

Sen. Lindsey Graham and retired Gen. Jack Keane writing at WSJ.com:

President Biden's decision to withdraw all military forces from Afghanistan, against sound military advice, will come back to haunt the nation and the world, just as it did in Iraq in 2011.

Only months away is the 20th anniversary of 9/11, when almost 3,000 Americans died at the hands of al Qaeda terrorists trained and directed by Osama bin Laden from Afghanistan. Surely we should have learned that allowing radical Islamists sanctuary to plot attacks against America and its allies isn't wise. . . .

President Biden has made what appears to be a political decision that

will harm U.S. national security. There are no great choices when it comes to Afghanistan—only difficult ones. Unfortunately, President Biden chose the riskiest option.

It is sad to see all America fought for in Afghanistan put at risk for no appreciable benefit. The women of Afghanistan, who have come so far, will be in peril. China, Russia and Iran will benefit from the power vacuum created by Mr. Biden's decision to withdraw. . . .

Many Americans are tired of fighting radical Islam, but radical Islam isn't tired of fighting us. More likely than not, Americans will have to return to Afghanistan someday to protect our interests. We have two choices: fight in their yard or fight in ours.

OPINION

REVIEW & OUTLOOK

If Democrats Pack the Court

The media mostly treated President Biden's announcement of his 36-member commission on the Supreme Court last week as a deft deflection of court packing. Well, not so fast. The Chairman of the House Judiciary Committee and other Democrats introduced a bill this week to expand the Supreme Court to 13 Justices from nine.

Message: The Democratic left is serious about this, and the Biden commission better not dismiss it. Oh, and pay attention, Justices. Congress will remake the Court if you issue rulings that offend progressives.

Republicans are rightly calling this out for the political intimidation it is. But here's another message for the GOP and the commission to consider: If Democrats do turn the Court into another legislature by packing it, the GOP has the power to limit or strip its jurisdiction.

* * *

If that sounds radical, consider what Democrats are proposing. Merely because GOP appointees now hold a 6-3 majority on the High Court, progressives want to blow it up on a partisan Congressional vote. Adding Justices in this way would undermine the Court's legitimacy with the American public, with perhaps lasting harm, as Justice Stephen Breyer warned in a timely speech last week.

Many Republicans respond by saying they'll return the disfavor when they next have power and add more Justices. But this concedes the progressive view that the Court is merely another policy-making body. It would turn the Court into a de facto House of Lords, albeit with power, which would put an end to its traditional judicial role of applying the law to cases and controversies.

There's a better response: Limit the Supreme Court's ability to function as a super legislature. Congress can do this by limiting the appellate jurisdiction of the Court. This would limit a packed Court's power by returning it to the original role of the judiciary under the Constitution's separation of powers.

The Constitution explicitly gives Congress the power to determine the appellate jurisdiction of the federal courts in Article III, Section 2. The Supreme Court recognized this Congressional authority in the 1869 case, *Ex Parte McCord*. Justice Antonin Scalia invoked *McCord*'s view of jurisdiction in his 2006 dissent in *Hamdan v. Rumsfeld* and was joined by Justices Clarence Thomas and Samuel Alito.

Much would depend on how Congress chose to define jurisdiction to limit judicial policymaking on an expanded Court. One idea would strip jurisdiction over cases seeking to find

rights not expressly mentioned in the Constitution. Progressives regularly ask the Justices to recognize new rights that are protected by the doctrine of "substantive due process," as the right to abortion was. Congress could bar the Justices from hearing cases asking them to use that analysis to invent new rights such as a right to suicide or to a guaranteed income.

Another possibility would be cases that seek to restrict political free speech by regulating campaign contributions. A Court packed by Democrats would surely seek to overturn *Citizens United v. FEC* (2010), and a Republican Congress could deny the Court's ability to hear such cases.

Stripping the discretion of courts over immigration decisions would return final authority to the federal agencies created by Congress. This would clear away the judicial interference that has bedeviled immigration policy and contributed to the mess on the Mexico-U.S. border.

Congress could also remove the Court's ability to hear cases under the 1971 *Bivens* precedent that recognized implied cause of action in the absence of Congressional authorization. This gave the federal courts more power over federal and state policies, and Justice Thomas has said *Bivens* was wrongly decided.

Cases challenging the detention of enemy combatants could also get the heave-ho, as per Justice Scalia's opinion in *Hamdan*. So could cases seeking national injunctions, which proliferated during the Trump Presidency. And don't forget cases that challenge such fundamentally political decisions as Congressional redistricting or the Census.

* * *

We can think of others, but you get the idea. If Democrats want to turn the Court into a super legislature, then they would run the risk of having a future Congress circumscribe the Court's writ to narrower and traditional judicial purposes.

It's true that a packed Court could react to this by using its power to invalidate these jurisdictional limits. But if the Court did so, it would invite other retaliation by Congress using its power of the purse. Perhaps Congress would cease to fund law clerks and Court staff.

We want to be clear that we favor none of this, at least not now. But this scenario is a warning to the Biden court commission to be careful what you recommend. The political intrusion into the judiciary isn't likely to end with the addition of two or four more Justices. Democrats are playing a dangerous game by toying with the judiciary, and the courts and the country would be the losers.

The Great Student-Loan Income Transfer

The great student loan scam rolls on, mostly out of public sight. But occasionally the ugly fiscal facts appear as they did this week at a Senate Banking hearing.

The CARES Act allowed student loan borrowers to defer payments without accruing interest through last September. Presidents Trump and Biden have both used emergency executive power to extend the forbearance. Now borrowers don't have to make payments until at least October, and meantime their balances won't increase.

As of the fiscal 2020 fourth quarter, more than half of the \$1.6 trillion federal student loan balance was in forbearance. Twenty-two million borrowers weren't making payments, saving on average \$400 a month. Most college-educated Americans haven't needed the relief since they have suffered far less financial harm from the pandemic than lower-income workers without college degrees.

According to news reports, some borrowers have used the money saved from forbearance to buy homes, pay off higher-interest debt and

day-trade stocks. But there's no such thing as a free debt deferral. Taxpayers are paying for it. Sen. Elizabeth Warren noted at the hearing that the Education Department "is currently canceling about \$5 billion of debt per month in interest."

Mull over that one. Eighteen months of student loan deferrals could cost taxpayers \$90 billion—and that's without any defaults or debt being discharged. The reason is the federal government's student loan portfolio is heavily leveraged. Treasury borrows at ultra low rates and then lends the money to students at somewhat higher rates. But when borrowers aren't making payments or accruing interest on their federal loans, Treasury loses money.

Ms. Warren doesn't worry about taxpayers or the rubes who have responsibly repaid student loans even during the pandemic. She wants President Biden to cancel \$50,000 in student debt per borrower by fiat. Her plan would disproportionately benefit millennials with advanced degrees. Thus has the pandemic become a pretext for a massive income transfer to privileged Americans.

Prison for Hong Kong Democrats

A Hong Kong court confirmed this week what everyone has known for months: If you publicly challenge Beijing, you will be sent to prison. On Friday nine people charged with organizing or joining an unauthorized protest received prison sentences ranging from eight to 18 months. Four of them, including 82-year-old Martin Lee, founder of Hong Kong's democracy movement, received suspended sentences.

The most prominent "convict" is Jimmy Lai, owner, publisher and writer for Apple Daily, which is frequently critical of China. Mr. Lai also has a following overseas, which especially rankles Communist Party leaders. Two months ago Beijing's point man for Hong Kong affairs, Xia Baolong, gave a speech mentioning Mr. Lai by name, accusing him of "extremely notorious acts" and making clear that, in Beijing's view, he needed "to be punished severely in accordance with the law." It's no surprise that the judge in the case obliged by giving Mr. Lai a long sentence of 12 months.

Most of the charges against those on trial related to an Aug. 18, 2019 peaceful, pro-democracy march that drew as many as 1.7 million Hong Kong people. The punishment is part

Nine are sentenced, including Martin Lee and Jimmy Lai.

of Beijing's campaign to crush Hong Kong's democracy movement. As Mr. Xia put it, "only patriots" must govern Hong Kong—i.e., only those who are willing to do Beijing's bidding.

Mr. Lai's trials aren't over.

Denied bail, he faces other charges related to the unpopular National Security Law that China demanded Hong Kong implement last year. On Friday the government added new security charges that could mean a life sentence for the 72-year-old publisher.

In his first call with Chinese President Xi Jinping in February, President Biden raised China's crackdown on Hong Kong as one of many areas where the U.S. takes issue with Chinese behavior. But the truth is that China has paid little international price for breaking its treaty with Britain that guaranteed autonomy for Hong Kong through 2047.

It's time for the U.S. to make the imprisonment of Hong Kong's democrats a larger public issue. If China can't be trusted to keep its treaty promises on Hong Kong, it can't be trusted to keep them on anything else. The U.S. should start to lobby for Mr. Lai's release from prison, and the Nobel committee should award Hong Kong's freedom fighters the peace prize.

LETTERS TO THE EDITOR

The Business of Business Shouldn't Be Politics

Harvey Golub's "Politics Is Risky Business for CEOs" (op-ed, April 13) is right—on principle and in practice. Taking positions on public policy is not a CEO's job (unless it affects the business), and it is tricky to execute.

At Ogilvy & Mather, we did not accept political clients. First, it is divisive; not everyone would agree with backing that candidate. Second, it is disruptive; political campaigns are work-intensive for short periods and disrupt work for other clients. Third, campaigns are notorious for not paying their bills.

But we encouraged our people to engage with politics as citizens. Talented creative directors at our agency, on their own time, created campaigns for Richard Nixon ("Nixon's the One") and Ronald Reagan ("It's Morning Again in America") as well as Bobby Kennedy. I was a low-level advance man for Hubert Humphrey's presidential campaign. The principle is the same as that articulated by Mr. Golub: We have obligations as citizens, not as corporations.

KENNETH ROMAN
New York

Mr. Roman is former chairman and CEO of Ogilvy & Mather.

Mr. Golub writes that "it is wrong for executives to take a company position on public-policy questions that don't directly affect their business." I am more concerned with the executives who haven't taken a position.

Send out a search party for the last time CEOs took a strong public position supporting free-market capitalism, unless it affected them personally. They free-ride, believing that others will make the case against the growing political and cultural trend of discrediting capitalism. Credit the liberals this time for knowing which invertebrates are easiest to shame.

BRIAN KLIPPENSTEIN
Platte City, Mo.

Delta CEO Edward Bastian would do well to read and listen to the advice of Mr. Golub. My 43 years as an American Express card holder were validated with his well-thought-out article. I've advised Mr. Bastian that I've canceled six tickets and rebooked with another airline. I'm doubtful he cares but I'll bet his shareholders will when thousands of Delta Frequent Flyers do the same.

DANIEL W. RICHARDS
Ontario, Calif.

Noonan—Not Voters—Left the GOP for Dead

Peggy Noonan's near-obituary for the Republican Party ("America Needs the GOP, and It Needs Help," Declarations, April 10) overlooks many of the results of the 2020 elections. In the states, Republicans were defending seven governorships to the Democrats' four but still managed to gain one, increasing the GOP's share of governorships to 27. In the U.S. House, Republicans gained 14 seats on net from 2018, leaving the Democrats with only a very narrow majority. The Senate ended up tied.

It is interesting to read of Ms. Noonan's political comings and goings over the years, but "no one likes the Republican Party"? Let's stick to the facts.

KEN LAUDENBACH
Bala Cynwyd, Pa.

In 2004 Republicans won the House, the Senate, 28 governorships and the White House. This prompted "One Party Country," a book predicting long-term Republican dominance.

The party then lost big time in 2006 and 2008, prompting the 2009 book "The Death of Conservatism." That year Republicans were called an "endangered species" on the cover of Time magazine.

Today Republicans are raising record amounts of money even though big business is jumping on the Democratic bandwagon. Republicans fully control 23 states, versus 15 for the Democrats and 12 in the middle. As with Mark Twain, the death of the party is greatly exaggerated.

FRED SCHNAUBELT
San Diego

Ms. Noonan cites a few "break points" for the GOP: "Iraq was one" and "immigration was another, with the elite decision makers of the party not caring at all how the unprotected see and experience life." The Republican Party addressed these issues by nominating Donald Trump for president. But it was Ms. Noonan who opposed the change, along with "pretty much every power center in America," as she puts it.

DOMINIC D'AMELIO
Tallahassee, Fla.

Republicans are disliked in the media, the academy, entertainment and, lately, the corporate suite, Ms. Noonan writes. But this isn't reflective so much of a disavowal of all things Republican as it is of the national woke culture promulgated by Democrats.

Something is terribly wrong in our country. Schoolchildren are screened for gender identity, people are asked to examine their "white privilege" and massive cash handouts undermine motivation to work. Republicans are reviled because they refuse to accept the woke revolution.

DOC WALLACE
Rockport, Maine

YouTube's Censors Get the Science of Medicine Wrong

How shocking it is to read in your editorial that YouTube's standard for medical misinformation is information that contradicts authorities ("YouTube's Assault on Covid Accountability," April 9). Modern medicine doesn't believe in authorities but in evidence based on data analyzed from randomized controlled studies. We must never allow anonymous censors to determine what is medical misinformation and cancel scientific inquiry and discussion with which they disagree.

ASSOCIATE PROF. SEYMOUR M. COHEN
Mount Sinai School of Medicine
New York

The Infrastructure Bill and The Mysteries of the Universe

Just as I was growing accustomed to the idea that everything is racism, the left changed the rules again. Now everything is infrastructure (William McGurn, "The Buttigieg Infrastructure Switcheroo," Main Street, April 13).

Philosophers going back to ancient Greece have entertained the notion that nothing can be anything. Too bad they couldn't learn from our Democrats that anything can be everything.

MICHAEL SMITH
Georgetown, Ky.

Pepper ... And Salt

THE WALL STREET JOURNAL



"This is a lovely new color just sent back by the Mars rover."

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OPINION

Republicans and Immigrants Need Each Other

**DECLARATIONS**

By Peggy Noonan

We have been thinking about the Republican Party and how it can come back—worthily, constructively—after the splits and shatterings of recent years. The GOP is relatively strong in the states but holds neither the White House, House nor Senate and in presidential elections struggles to win the popular vote. Entrenched power centers are arrayed against it, increasingly including corporate America. But parties have come back from worse. The Democrats came back from being on the wrong side in the Civil War.

Some thoughts here on Republicans and immigration.

From Pew Research's findings on

The GOP should be the party of the working and middle classes, whatever their country of origin.

U.S. immigrants, published in August 2020: America has more immigrants than any other nation on earth. More than 40 million people living here were born in another country. According to the government's 2020 Current Population Survey, when you combine immigrants and their U.S.-born children the number adds up to 85.7 million. Pew estimates that most (77%) are here legally, including naturalized citizens. Almost a quarter are not.

Where are America's immigrants from? Twenty-five percent, the largest group, are from Mexico, according to Pew. After that China at 6%, India just behind, the Philippines at 4%, El Salvador at 3%.

America hasn't had so many first- and second-generation Americans since the great European wave of the turn of the last century. The political party that embraces this reality, that becomes part of it, will win the future.

Here I jump to a political memory. A few weeks before the 2012 election I was sitting on a step watching Bay Ridge, Brooklyn, walk by. It was their annual street fair. The whole world was there. I'm from Brooklyn and had parts of my childhood there; much of the world was there back then, too. It really is the place where America keeps getting made. But that day in 2012 just seeing everyone—young Asian kids, Arab teenagers, people from Russia, Ukraine, Central America, Mexico—I had, not for the first time, an epiphany. "The entire political future of America is on this street," I wrote. In part because so many were young, I felt they were politically up for grabs. The Democrats were trying harder, though. There was a political booth, with a sign that said "Democrats for Change." There was no Mitt Romney booth, because Brooklyn is New York and New York wasn't in play. But I felt then and feel more strongly now that in 21st-century America everything is in play. You have to have imagination, and confidence, to see it.

It's my belief that the immigrants of America the past 40 years are a natural constituency of the Republican Party. When I say this to Republican political professionals they become excited or depressed. The excited say yes, we made progress in the last election with Hispanics; if we could become more liberal on illegal immigration, we could start to clinch the deal. The depressed say no, Republicans can't win them because we're too tagged as the anti-immigrant party.

To them I say when a whole class of people think you don't like them, they are probably picking up a signal you don't know you're sending. Which leads us to Donald Trump, and



New citizens after a naturalization ceremony in Winter Park, Fla., July 4, 2019.

the signal he did know he was sending. In opposing illegal immigration he opposed—he insulted and denigrated—immigrants themselves. His supporters didn't mind because they recognized it as burn-your-bridges language: It meant he wouldn't go to Washington and sign some big, lying, establishment-driven comprehensive reform like all the rest.

What he said did a lot of damage and caused a lot of just resentment. But he's gone right now, and something new, day by day, is being built in his place.

The GOP should continue as the anti-illegal-immigration party, because illegal immigration is a violation of law and sovereignty, takes jobs, depresses wages, and is an abuse of all who came here legally. It will continue as a grinding crisis and in time be appreciated as a burden that cannot be forever borne locally or nationally. But the Republican Party's attitude toward illegal immigrants themselves—toward all immigrants—should be sympathy and respect: They're looking for a job and a better life. So was your great-grandfather!

A friend of mine, a businessman in New York, a big taxpayer, a moderate

conservative, always smiles when he talks about illegal immigration. He's against it. Then again his grandfather 100 years ago, an Italian seaman, found himself in a ship off America, liked what he saw, and jumped. He made his way to Brooklyn. Behind every great fortune lies a great crime, Balzac said. No, but in America a lot of fortunes started with a jump from a ship in the night.

The approach of the Republican Party should be one not of distance and guilt but of affinity and identification. Immigrants, legal and illegal, are tough. They've often had hard lives. They left everything, even the sound on the street of their old lives, to come to this different place. "I made myself lonely for you" is something almost all of them can say to their children.

No one who comes here from El Salvador really wants it to become El Salvador. People don't flee Nicaragua so America can turn into Nicaragua. This is where Republican policies come in. There's no reason to believe the bulk of immigrants to America the past 40 years want to tax people to death or see an economic system they risked so much to enter radically al-

tered. They don't want small businesses to be subject to the endless shakedowns of state and local government. They don't want to defund the police, they depend on the police. The riots of 2020 would have shocked and repelled them, and may prove to have been a turning point.

Identity politics is powerful but not as powerful in the long term as here's-where-we-stand politics. Republican officials ought to be going to America's immigrants and saying: We might have had a rocky road but we are seeing the world the same way. The appeal must be to the brains and wisdom of their audience, not some patronizing babbles on Republican Hispanic Voter Night.

The GOP donor class hasn't liked restrictions on illegal immigration. More workers keep wages down. But great parties know who their base is. The GOP's should be the working and middle class of all colors. Workers already here need backup. It's better to lose campaign contributions than voters.

The Democratic Party is increasingly in thrall to a progressive left whose most impressive accomplishment has been communicating an air of its inevitable triumph. Under their pressure Democrats will make a lot of mistakes. They already are.

During the Bush immigration debates, when the base of the party rebelled against his comprehensive reform bill, a mostly unspoken accusation emanated from the president's operatives. It was that the new Americans, including illegal immigrants, were kind of better than the existing American working class, harder-working. This was situational snobbery: The operatives themselves had left the working class behind, but daily rubbed shoulders with newer Americans at home and at the club. That snobbery helped break the party.

But I'll tell you what is true. We do have the best immigrants in the world. I so want the Republican Party to know this, embrace it. Embrace them.

Media's Racial Narrative Targets Whites, Harms Blacks

By Robert L. Woodson Sr.

Are only white people capable of hate crimes? If you get all your news from mainstream media sources, that's what you'd think. A 51-year-old black man allegedly stabbing a 12-year-old white boy in Pittsburgh while shouting racial epithets barely made national news. The same was true when a black man was arrested for savagely beating a 65-year-old Asian woman in Midtown Manhattan. We saw endless coverage of the despicable assault on the Capitol on Jan. 6, but when a 25-year-old black male allegedly killed a Capitol police officer last week, MSNBC erroneously reported the suspect was white.

Throughout 2020 there was a rise in violence against Asian-Americans, but the race of the perpetrators was typically mentioned only when they were white. Media and other elites obsessively push the narrative that the greatest threat in this country is coming from "white supremacists." This gross oversimplification has dire consequences for the most vulnerable in our society—those living in the poorest neighborhoods—and for the nation as a whole.

A media environment in which the only acceptable villains are white creates a more dangerous world for all of us. The rush to judgment based on skin color is familiar to those of us who lived through segregation. In those days, some in law enforcement couldn't care less about crimes committed by blacks against other blacks, but there were severe penalties for offenses against whites. We marched and demanded fair and equal treatment under the law. As far as the application of criminal law, much of what is happening today is a retreat to the pre-Civil Rights South.

Every tragic police killing of a black person is amplified by radical progressives to accuse police of white supremacy and to push for defunding and anarchy. The more law-

enforcement officers we lose to defunding, early retirements and drastic drops in recruitment, the fewer we have to patrol lower-income neighborhoods. Homicides among lower-income minorities soar. Meanwhile, the cries of the 81% of blacks who oppose defunding the police are chronically ignored.

The loudest advocates of defunding the police don't have to live with the consequence of their advocacy. The Los Angeles City Council president pushed for defunding the police while having a personal police escort at her home. Thanks to so-called racial progressives like her, low-income black neighborhoods are experiencing some of what it was like to live in the pre-Civil Rights South.

The assertion that blacks must rely on white people to solve all their problems by somehow ending systemic and institutional racism is

both nonsensical and self-defeating. By focusing on the past and present sins of white America as the source of all our problems, we ignore the enemy within, and that which is in our power to change. We turn a blind

An insistence on 'systemic' racism tells minority communities they have no power over their own lives.

eye to the destruction within our communities that is consuming more of our lives than the Klan ever did, even at the height of its power.

Furthermore, remedies applied to a single racial group almost always include a kind of bait and switch. The social pathologies are the bait: high

unemployment, poverty, inequities in education, high crime rates and so on. When the remedies arrive—generally money—you get the switch. A large share of the benefits never go to the people actually suffering from high unemployment or poverty or crime. They go to the elite members of that race who are already insulated and connected enough to capture the prizes.

For example, Coca-Cola now requires the law firms that do business with it to have 30% of their attorneys be "people of color." Other companies, such as Wells Fargo, Ralph Lauren and Delta Airlines, are following suit with their own racial quotas for highly skilled positions. Even race-neutral programs aimed at lower-income households spend most of their funding on their middle-class administrators rather than on their supposed beneficiaries. How does this

help low-income blacks trapped in unsafe neighborhoods and failing schools? How does requiring corporations to have a certain percentage of women of color on their boards of directors help the thousands of black women in prison, many of whom are being mistreated by their guards, most of whom are also black?

Race remains a salient issue in America, but not only because of whites victimizing minorities. Yet the U.S. is the world's most prosperous and harmonious multiracial society. We have some serious problems we must address, but we can't solve them unless we're willing to speak about them honestly.

Mr. Woodson is founder and president of the Woodson Center and author, most recently, of "Lessons From the Least of These: The Woodson Principles."

Investment Options for the Unwoke

By Daniel Grant

Milton Friedman argued that a corporate executive's responsibility is to maximize profits while conforming to the basic rules of society, as embodied in law and "ethical custom." American corporations donated \$21 billion to charity in 2019, but the growing "stakeholder capitalism" movement is using the ethical-custom concept to impose a progressive agenda on American businesses. It will have negative implications for investor returns.

If you bought stock in a company whose management embraced stakeholder capitalism, or invested in a fund that includes such companies, you also invested in their definition of what is good for society. That definition can be found in "environmental, social and governance" (ESG) investment criteria that place progressive agenda items on par with, if not above, a business's obli-

gation to maximize returns.

The S&P 500 has become a hot mess of ESG costs, policies and requirements. It now consists of companies focused more on ideology than shareholder value. This seems to be fine with the world's largest asset managers, who "are signing on to sustainability codes, publishing ESG papers and voting policies, and paying for rating providers," according to shareholder advisory firm SquareWell Partners.

It can be an expensive trend. Investment firms have been known to threaten adverse proxy votes when companies fail to implement costly green initiatives. Large banks have committed to spending tens of billions of dollars "to advance racial equity." Some retailers have ended profitable firearms sales. These ideological decisions are in effect business taxes that can diminish shareholder returns and alienate consumers.

While investors are free to do what they choose with their money, many object to progressives' use of corporate governance to advance their agenda. Recent polling and election results indicate that about half the country feels that way. As stakeholder capitalism gains steam,

Our funds choose firms that don't let politics distract from their mission of serving shareholders.

conservatives, libertarians, and Reagan Democrats have had little choice but to read the headlines in frustration.

The CEOs of Coca-Cola and Delta

Airlines spoke out against Georgia's new voting law, leading to calls for costly boycotts of both brands. More than 100 corporate leaders echoed this opposition on a Zoom call last weekend. Did these CEOs put their fiduciary responsibility to shareholders first by considering the damage to their brands, the loss of business and reputational harm? A recent Morning Consult poll found that 42% of Americans support Georgia's new voting law, while only 36% oppose it.

I broadly support diversity and inclusion, and I am not advocating only for projects with high returns, but it is important for investors to understand the trade-offs when management teams pursue the ESG agenda. Financial research company 2ndVote Inc. performs a full social audit of every company in the S&P 1500, analyzing their advocacy, philanthropy, corporate statements and legislative support to determine the quality, quantity, type and extent of a corporation's social activism. To give you some idea of

how ESG-focused the S&P 500 has

become, 73% of the companies the index includes are either "liberal" or "lean liberal" according to 2ndVote Inc. The remaining 27% are rated "neutral." None of the S&P 1500 companies that 2ndVote Inc. analyzes rate "conservative" or "lean conservative."

At 2ndVote Advisers—which is affiliated with, but not owned by, 2ndVote Inc.—we take the 1,000 largest companies listed on the New York Stock Exchange and Nasdaq and screen out those ranked as "liberal" or "lean liberal" by 2ndVote Inc. Then we select the companies we believe offer the best potential for superior long-term returns. We focus on profits, not politics. Our strategy is based on the notion that businesses focused on profits will be more profitable than businesses that aren't.

Although nobody can guarantee future returns, the data support our approach.

The average annual five-year return for the 2ndVote First Amendment Large-Cap Index (21.94%) outperformed both the S&P 500 (15.88%) and the MSCI KLD 400 Social Index (15.99%, the first index based solely on ESG criteria). An investment of \$1,000 in the 2ndVote index made in 2015 would be worth \$2,697 today. That same investment in the S&P 500 would have grown only to \$2,089. Investing in the KLD400 would have yielded \$2,099.

Companies that value profits over politics are far more ethical and healthy for society. 2ndVote Advisers is seeking a return to the halcyon days of traditional shareholder capitalism by investing in companies that serve the interests of all their stakeholders by generating profits.

Mr. Grant is CEO of 2ndVote Advisers.

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SPORTS



REUTERS/2

The Best Bad Team in the NBA

The numbers say the Toronto Raptors are good. Their record says otherwise.

By BEN COHEN

Even before the NBA season began, things were already weird for the Toronto Raptors. They were about to get weirder.

The pandemic forced the Raptors to become NBA snowbirds as they relocated from Toronto to Tampa, Fla., where there are palm trees outside and "We the North" signage inside, a move that turned out to be the beginning of a season that would make absolutely no sense.

They have since become the league's most puzzling anomaly. There are good teams and bad teams every year in the NBA, but there has never really been a team like the Raptors. They're either a bad team that's good—or a good team that's bad.

This is how much of an outlier they are: The difference between the Raptors' expected number of wins based on their statistics and their actual number of wins is the largest of any team with a positive net rating in at least three decades, according to a Wall Street Journal analysis of Stathead data.

There have been 39 teams in NBA history with losing records and positive point differentials, meaning they outscored their opponents for the season and still lost more games than they won. Most were barely under .500. There is one notable exception. The lowest winning percentage on this list of basketball aberrations would belong to this

Entering Friday, the Raptors are in 11th place in the East. Pictured right, Kyle Lowry.

season's greatest source of dissonance: the Toronto Raptors in Tampa.

They appear to be the best, worst NBA team of all time.

Entering Friday's play, the Raptors are currently sitting in 11th place in the Eastern Conference with a 22-34 record after being ravaged by the coronavirus and living away from home while most people are stuck working from home.

If the NBA playoffs started today instead of next month, they wouldn't even qualify for the league's

first play-in tournament. Not making the playoffs when more teams than ever will make the playoffs would be a huge disappointment, and it might even make sense at this point to bottom out temporarily and increase their lottery odds in a tantalizing draft.

But what makes the Raptors more interesting than other bad teams with tanking incentives is that it's still not clear if they're one of them. They have the mathematical profile of a team that's actually good.

A funny thing about the NBA is that a team's win-loss record is not always the most reliable metric of whether it's good or bad, since that



number is subject to luck, random variation, statistical noise and so many other vagaries of playing sports. A better measure in the short term is a team's net rating—the point differential per 100 possessions—and the Raptors have outscored their opponents. Their net rating is higher than the teams in seventh, eighth, ninth and 10th place in the East.

There is even a stat called Pythagorean wins that predicts a team's expected record from the number of points it scores and allows. It was devised by the pioneering baseball quant Bill James and then applied to basketball by Philadelphia 76ers president Daryl Morey.

rey when he was a Stats Inc. researcher as a college student.

But not even a formula designed by the greatest analytical minds in sports and named after a Greek philosopher's theorem is powerful enough to crack this NBA team.

The numbers suggest the Raptors should be 29-27. Instead they are 22-34. Those numbers are skewed by their peculiar ability to win big and lose close games. The Raptors have somehow won nearly the same number of games by 20 points or more and 10 points or fewer. They also had six game-winning or game-tying shots in the final seconds of the fourth quarter before April—and missed them all. That helps ex-

plain why they would be the first team ever to outscore their opponents and lose more than 60% of their games.

That's also part of the confusion. They have the statistical indicators of a good team and the record of a bad team. So which is it?

The answer is probably both, but it's a tricky question. One of the more trivial difficulties of playing basketball during a pandemic is that it's hard to tell what to make of a team. The season is shorter. The games are packed tighter. The arenas are emptier. Add injuries and Covid protocols. Subtract home-court advantage. What do you get?

"A season unlike any other," said Jack Armstrong, the Raptors' television analyst for the last 23 years.

But when it comes to evaluating any team this season, it's hard to ignore the massive purple dinosaur in the room.

The NBA has managed to plow ahead with minimal disruptions and, like the rest of the country, can see light at the end of the tunnel with players getting vaccinated and fans trickling back into arenas. The worst seems to be over. But in a sport where one case and the subsequent contact tracing can wipe out an entire team, this season was inevitably going to favor teams that were spared the wrath of a microscopic pathogen.

Toronto wasn't one of them. Raptors players have missed 114 days because of Covid-19 protocols, according to a Fansure study of the league's injury reports. Only the Dallas Mavericks and Boston Celtics were hit so hard.

Their exposure started with a Feb. 26 announcement that coach Nick Nurse and five members of his staff would be working remotely while sidelined by the league's health and safety protocols, followed by Pascal Siakam, Fred VanVleet and OG Anunoby being out for more than two weeks each. The Raptors had three games postponed and then lost nine straight from March 3 to March 22—and the Covid-related free fall could have been worse if not for a weeklong break for the All-Star Game.

At the beginning of March, when their record was 17-17, they could squint at glimmers of hope. By the end of March, when they were dealing with the human toll of being demolished by Covid, losing 13 of 14 games and nearly trading Kyle Lowry, they were staring into the NBA abyss.

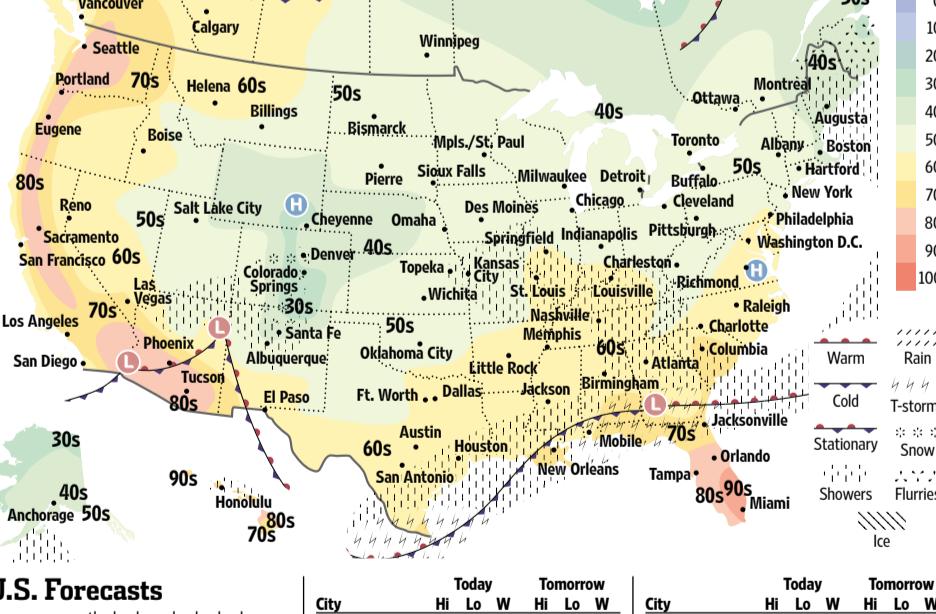
"Pretty much everything that could possibly happen," Armstrong said, "happened."

There are still reasons to believe this might be a good team disguised as a bad one.

It's why the more obviously good teams aren't exactly clamoring to play the 2019 champions if they can sneak into the playoffs. As far as first-round opponents for the Brooklyn Nets, Philadelphia 76ers or Milwaukee Bucks go, this one would have the rough appeal of wrestling a velociraptor.

And it wouldn't be entirely surprising if the Raptors do something else that no team with a losing record has done in three decades: win a playoff series.

Weather



U.S. Forecasts

s.sunny; pc... partly cloudy; c.cloudy; sh.showers; t.tstorms; r.rain; sf.snow flurries; sn.snow; l.ice

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THE SCORE

THE BUSINESS WEEK IN 7 STOCKS

MICROSOFT CORP.

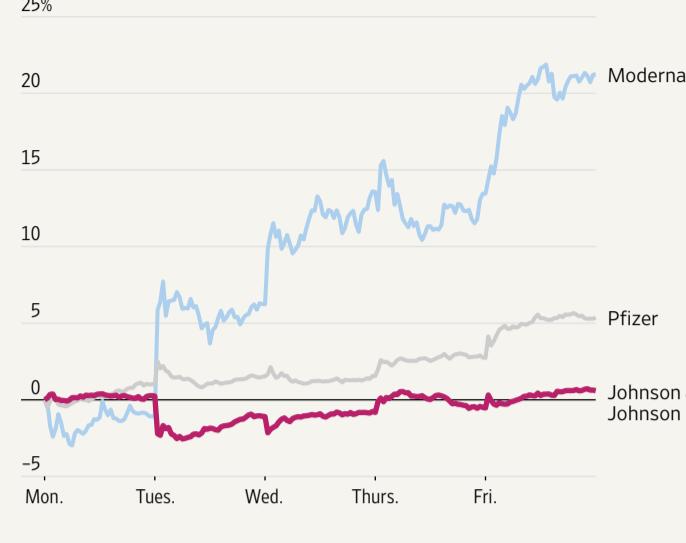
Microsoft is extending its run of big acquisitions. The tech giant has agreed to buy artificial-intelligence company Nuance Communications Inc. The \$16 billion all-cash deal is Microsoft's second-largest acquisition under Chief Executive Satya Nadella, after the company in 2016 spent about \$26 billion for professional network LinkedIn Corp. The latest acquisition comes as rivals Facebook Inc., Amazon.com Inc. and Alphabet Inc.'s Google may be distracted by antitrust probes that could hobble their ability to strike deals. Microsoft shares **added 1% Tuesday.**

COINBASE GLOBAL INC.

Coinbase made a splash in its market debut Wednesday. The cryptocurrency exchange fetched an \$85 billion valuation, a watershed moment for an industry that began a decade ago as an experiment in digital money. Shares of Coinbase opened at \$381 on the Nasdaq Global Select Market. The exchange set a reference price of \$250 on Tuesday, but no trades were executed at that price. Founded in 2012, the company has seen its profitability explode amid a rally in the price of bitcoin and other cryptocurrencies. Coinbase shares ended at \$328.28 Wednesday, **up 31% from its reference price.**

PERFORMANCE OF PHARMA STOCKS THIS WEEK

Source: FactSet



JOHNSON & JOHNSON

Johnson & Johnson's rollout of its Covid-19 vaccine has hit another snag. U.S. health authorities on Tuesday recommended a pause in the use of J&J's shot after finding that six women who got the vaccine had developed blood clots and one died. The development comes after a quality lapse at a manufacturer recently affected about 15 million doses of the vaccine's main ingredient. J&J shares **added 0.3% Wednesday.**

TAIWAN SEMICONDUCTOR MANUFACTURING CO.

Taiwan Semiconductor Manufacturing is setting up for soaring chip demand. The world's largest contract semiconductor maker said on Thursday that it would increase its investment budget and raise its revenue-growth forecast for 2021, a sign of confidence that strong global chip demand will continue. The company's heftier investment budget comes as its global competitors also move to beef up production capacity during a widespread semiconductor shortage. American depositary shares of TSMC fell **2.1% Thursday.**

VIACOMCBS INC.

Simon & Schuster won't distribute a book written by a Louisville police officer involved in the Breonna Taylor shooting. The publisher, a unit of ViacomCBS, said on Thursday that it wouldn't distribute the book acquired by its client Post Hill Press LLC, an independent conservative publisher that prints its books and usually uses Simon & Schuster as its outside distributor to get them into the hands of retailers and wholesalers. In early January, the publisher said it wouldn't publish a coming book by Missouri Sen. Josh Hawley. ViacomCBS shares rose **0.3% Friday.**

DELTA AIR LINES INC.

Delta Air Lines sees clearer skies ahead. The airline on Thursday signaled the worst of the coronavirus pandemic is likely behind it, expecting travel demand to keep gaining steam in the coming months. Delta reported a net loss of \$1.2 billion for the first quarter, but said its operation began generating cash again last month for the first time in a year. As more people have received Covid-19 vaccinations, interest in travel has returned. Delta said that its net sales—the difference between new ticket sales and refunds—doubled from January to March. Delta shares **lost 2.8% Thursday.**

MORGAN STANLEY

Morgan Stanley lost \$911 million when Archegos Capital Management imploded last month, tarnishing its record-setting quarter. The euphoric market conditions of early 2021 helped push the bank and its rivals to big earnings in the recent quarter. But the record performance across many of Morgan Stanley's businesses was offset by credit and trading losses it booked following a fire sale of more than \$30 billion worth of stocks tied to Archegos, the family office run by former Tiger Asia manager Bill Hwang. Morgan Stanley shares **fell 2.8% Friday.**

Francesca Fontana

Billionaire Shakes Up Crypto Game

Continued from page B1
on beanbag chairs in the office. The California native drew attention last year when he gave \$5 million to a group backing Joe Biden's campaign, making him the second-biggest CEO supporter of Mr. Biden after Michael Bloomberg, according to an analysis by The Wall Street Journal.

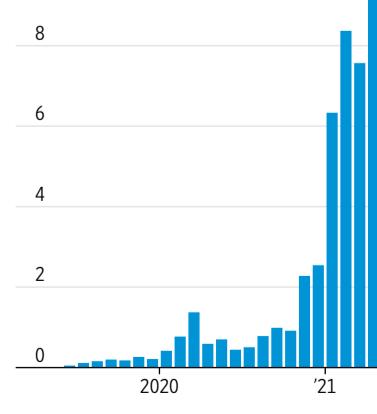
More recently, FTX notched a \$135 million, 19-year deal to buy the naming rights to the home of the Miami Heat. The deal—which was approved by the National Basketball Association last week—means the venue now called American Airlines Arena will be FTX Arena starting with the 2021-22 NBA season. FTX says the deal is aimed at promoting its smaller U.S. exchange, which offers a less exotic array of products than FTX's overseas operation.

Cryptocurrencies are increasingly going mainstream. Bitcoin has more than doubled in value this year, and Coinbase Global Inc., one of the biggest U.S. crypto companies, went public on the Nasdaq Stock Market this week. Depending whom you ask, Coinbase's market capitalization of \$84 billion is either a sign that bitcoin mania has gotten out of hand, or that traditional finance is about to be conquered by disruptors from the crypto world.

To many crypto insiders, the real action isn't at Coinbase, which embraces regulation and has long focused on making it easy for newbies to buy bitcoin. Far more exciting are offshore exchanges like FTX. These operate outside the reach of U.S. authorities and offer both digital currencies and crypto derivatives—complex products that let traders make risky bets on the future price of bitcoin, ether and other coins.

Mr. Bankman-Fried, who worked for quantitative-trading giant Jane Street Capital LLC before getting into bitcoin, has won praise for running a more reliable crypto exchange than many of his competitors and for FTX's policy of donating 1% of its revenue to charity. But he has raised eyebrows with his aggressive approach to launching new markets, including some that skirt the boundary of what's permitted under U.S. law.

FTX average daily trading volume, by month



BUSINESS NEWS

Boeing's MAX Jet Electrical Problem Expanded

By ALISON SIDER

The potential electrical problem that prompted airlines to remove dozens of 737 MAX jets from service affects more areas of the aircraft's flight deck than previously known, Boeing Co. said Friday.

The aerospace giant previously had told 16 MAX operators to inspect their jets for a potential electrical problem that was identified during a plane's assembly in Seattle. The manufacturing issue, which Boeing now says affects components in a few locations, will need to be addressed in roughly 90 jets in airline fleets as well as in many undelivered planes.

Airlines have been eager to put their MAX jets back into service as they gear up for a busy summer, but carriers have said they have largely been able to manage without the planes by substituting other jets. Still, the newly discovered defect threatens to undermine airlines' and Boeing's efforts to restore passenger confidence in the aircraft. That challenge comes as the plane maker is also working to resolve quality issues that have dogged some of its other commercial and military jets.

The issue involved the electrical grounding path for the standby power unit in certain electronic systems on the plane. A change in how that unit was installed during production in early 2019 could have interrupted that grounding path; in some circumstances, that could affect how the backup power source operates, Boeing, the Federal Aviation Administration and airlines have said.

The same production changes also affected the grounding path of the aircraft's main instrument panel and the rack that houses the standby power unit, Boeing found during its recent assessments. Those areas must be inspected and modified as well, Boeing said.

The issue stems from the use of a paint coating that could potentially disrupt the grounding pathways, people familiar with the matter said.

EXCHANGE

KEYWORDS | CHRISTOPHER MIMS

The Tech That Could End Some Business Travel Forever

Some manufacturers say visits with business partners will stay virtual



Christopher Mims, inset, takes a virtual tour of the Arcimoto factory in Eugene, Ore.

The lack of these trips, he says, has led to problems over the past year: parts that were out of spec and unusable.

Despite these setbacks, Mr. Becker believes that many meetings both within and outside his company will remain remote even after the pandemic.

At Clearpath, engineers used to have to come to the company's test facility, in a large warehouse in Kitchener, to test changes in the software that runs the company's Otto robots, which can weigh as much as 3,000 pounds. Now they can try out software upgrades on stripped-down versions of those robots. These "wallbots," as the company calls them, include only the robots' onboard sensors, actuators and computers. Since they don't have the half-ton body and suspension system, they're small enough to fit in a home garage.

While wallbots were originally a contingency of the pandemic, they have the potential to become a permanent way for the company to recruit remote talent. Engineers can now work from almost anywhere and don't have to be within commuting distance of the company's facilities, says Mr. Rendall, who has expanded the geographic reach of his search for talent.

An October 2020 analysis from management consulting firm Oliver Wyman projected that business travel will bounce back more slowly than leisure travel. A year of lockdown has shown that technologies like video conferencing can replace meetings that take place within companies, and they work well when people already have an existing relationship, says Khalid Usman, a partner at Oliver Wyman. But not all business travel will be affected the same—the firm says travel for sales and client meetings will bounce back first.

It's the opposite for Mr. Rendall, however. He hasn't seen his chief operating officer in a year. He says he can't wait to fly down to Texas, where the other executive lives, to reconnect. But he says he'll continue to conduct initial meetings with potential investors and customers over Zoom.

"We've proven over the past 12 months that you can establish a new investor or customer relationship remotely, and I think over time it's going to be the most important relationships where you invest the time required to travel," he adds.

TikTok Turns Average Joes Into Stars. Then What?

Even when a creator scores a viral hit, repeat success can prove elusive

BY GEORGIA WELLS

When Kendra Womack uploaded a short video of her aunt's Labrador retriever to TikTok last year, she didn't expect what happened next.

The social-media app's algorithm picked up the clip of the 26-year-old student and part-time barista tossing a yellow squeeze toy to Daisy, who appeared to devour it in a single gulp, and promoted it to users around the world. Overnight, the 12-second clip went viral, getting hundreds of thousands of views. It has since been seen by more than 14 million people.

"I was in shock and disbelief," Ms. Womack said. "I couldn't believe how easy it was."

Ms. Womack and other enterprising smartphone users around the world have turned to TikTok as the go-to platform for delivering an instant shot at internet fame. At a time when a growing number of social-media platforms are basing their business models on celebrity creators and other popular influencers, TikTok is emphasizing the idea of turning nobodies into viral sensations as it tries to regain momentum following a turbulent 2020.

Some TikTok users, though, get frustrated when the viral fame of one video is hard to replicate with subsequent clips. And TikTok's short-form video format, which was novel when it was launched less than five years ago, now faces competition from a host of rivals.

For more than a decade, social media was dominated by a handful of platforms—primarily Facebook, its photo-sharing app Instagram, YouTube and Twitter—driven by algorithms that served content to users based on their connections to friends and what people searched for. This made it hard for newcomers to attract attention without first building up sizable followings.

TikTok, which is owned by Beijing-based ByteDance Ltd., was different. TikTok's secretive algorithm appears to prize engagement, according to social-media analysts

and consultants. When a user opens TikTok, the app serves videos that it determines the user is likely to watch for longer, with little consideration for who created them or their follower counts.

"On TikTok, everyone feels like they can be seen," said Sarah Peretz, a social-media consultant who helps brands and musicians with marketing. "Everyone feels like they can be discovered."

A spokeswoman for TikTok declined to specify how the app selects videos to show its users.

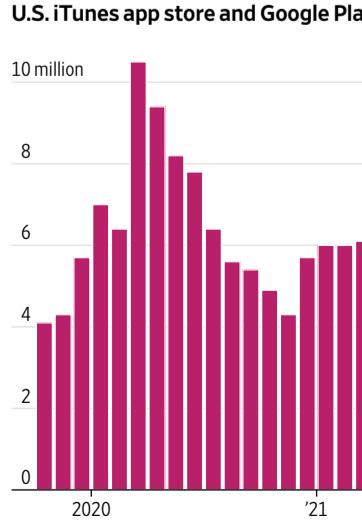
TikTok grew rapidly through 2018 and 2019, but that growth hit a speed bump last year.

Former President Donald Trump said in August that he planned to ban TikTok if it didn't find an American buyer for its U.S. operations, citing concerns that user data could be shared with the Chinese government. TikTok has said that would never be allowed, but the U.S. government's demands kicked off months of legal wrangling and deal talks.

Those efforts stalled when Mr. Trump lost re-election, and the U.S. plan to force TikTok's sale has been shelved indefinitely.

The controversy and the risk of the app being banned took a toll,

Monthly installs of TikTok from the U.S. iTunes app store and Google Play



with monthly downloads in the U.S. dropping to 4.3 million in November, from 10.5 million in March 2020, according to research firm Sensor Tower. TikTok has said it has about 100 million users in the U.S.

Competitors also seized the moment. Snapchat and Facebook both attempted to replicate the success of TikTok's recommendation algorithm, and in August, Facebook announced its own TikTok-like video feed, called Reels. In November Snapchat launched its own version, called Spotlight. Snapchat has said 100 million people use its Spotlight feature monthly. Facebook hasn't shared data on how much people are using Reels.

Despite the decline in downloads, TikTok was the most-downloaded app in 2020, both in the U.S. and worldwide, according to App Annie. This spring, TikTok's downloads have rebounded, as the controversy receded and users flocked to the app while the pandemic continued to keep them inside. TikTok remained the top downloaded app in the U.S. in the first quarter, according to App Annie.

Though TikTok's future in the U.S. appears safe, at least for the moment, a new crop of buzzy upstarts is focused on helping established creators make money, rather than get discovered.

Substack serves writers; Patreon focuses on artists and musicians; OnlyFans specializes in amateur porn stars.

TikTok is now stepping up efforts to build its own creator base. The company has a team that meets with creators, helps them figure out new tools and strategizes about how to attract followers. TikTok doesn't share ad revenue with creators the way YouTube does, but it has started to pay them through a fund if they have logged at least 100,000 video views in 30 days. TikTok doesn't say how much that experimental program pays.

But some regular users feel it has become harder to catch the attention of the app's all-powerful algorithm. The spokeswoman for TikTok disputed this notion—she said as more people join TikTok, the additional eyeballs create an even



Nathan Apodaca's TikTok video attracted more than 72 million views.

greater opportunity for people to make it big.

Nathan Apodaca was one of those who became a TikTok supernova. When his pickup truck wouldn't start on his way to a job packing potatoes at a warehouse in Idaho Falls last fall, he filmed himself instead commuting on his skateboard, drinking from a large bottle of juice and lip-syncing to Fleetwood Mac's "Dreams." The internet loved him. By the end of the year his video had logged more than 72 million views.

Now the 38-year-old is filming promotional videos for independent artists, taco trucks and fast-food restaurants. He said he's trying to break into acting, and has traveled a handful of times to L.A. for auditions, riding on an airplane for the first time. "I did not know we could fly over clouds," he said. "It was

mind-boggling."

Mr. Apodaca said his promo deals and donations from fans earned him enough to move out of his RV and into a home he bought for about \$320,000.

But how to replicate his initial success on TikTok is still a mystery, he said. That has been Ms. Womack's experience as well.

She's posted about 50 videos since her viral video of Daisy, and none has received more than 1,700 views. She tried making videos about trending challenges, such as costume changes and funny bits of dialogue, but none clicked.

She said she loves TikTok, but posts there less often.

Thinking back on her success with Daisy, she shrugs. "To me, it was just a fluke," she says.

Every time she watches the video it makes her laugh.

EXCHANGE



'I'm haunted by my 2020 capital-gains tax,' says Dayton Leong, a day trader and property manager.

TAX REPORT | LAURA SAUNDERS

Robinhood's Tax Pitfalls

Common tax-minimizing strategies are difficult or impossible to implement on the trading platforms that have boomed in popularity in the past year



Last year Dayton Leong, an active trader with accounts at nine firms, made scores of trades using the Robinhood app. He liked the free stocks he got from referring more than a dozen friends and found it easy to trade on his phone.

Recently, however, he has stopped trading in his Robinhood account, which has about \$238,000 in it, mostly in Tesla stock. He says a major reason is taxes.

"Robinhood puts all shares of a stock into one big bucket," says Mr. Leong, age 43, who lives in Berkeley Heights, N.J., and also works as a property manager. "I'm haunted by my 2020 capital-gains tax."

With 2020 tax bills coming due, a wave of new retail traders are waking up to the fact that it can be difficult, and often impossible, to make

tax-minimizing moves on new brokerage platforms such as Robinhood, Webull, SoFi, Uphold and Public.com. Some don't allow trading within tax-favored retirement accounts such as IRAs. Traders can also find it hard to track their "wash sales" that reduce tax benefits if they buy a stock within 30 days of selling the same stock at a loss.

Most vexing for investors like Mr. Leong is that despite the new platforms' sophisticated technology they don't make it easy to deploy a tax-wise technique known as "specific-lot identification." Investors use it to lower their taxes, sometimes significantly, by choosing which shares to sell if they have lots bought at different prices and aren't selling all of them.

Here's why this issue matters. Tax laws allow investors with taxable accounts to use the losses they incur when they sell a stock that's

dropped to offset the taxes on gains from the sales of stocks that have climbed. The losses can also offset up to \$3,000 of other income, such as wages, each year. Unused losses carry forward for use against future gains and other income.

"Now that I've done research on taxes, I wish I could sell the shares I choose, not a share selected by the 'Sell' button," says Ashton Courson, age 26, a construction worker and manager from Portland, Ore., with about \$17,200 in an account at Robinhood he's not using much, in part for tax reasons.

The option of selling specific lots is readily available at traditional brokerage firms. But Webull, SoFi, Public and Uphold don't allow it, and Robinhood makes it difficult. This fact shocks professional money managers.

"I think it's absurd. Taxes are a huge component of investment re-

turns, and it's an area where investors have some control," says Bill Mulvahill, a CPA and money manager at Trailhead Planners in Minneapolis.

"It's crazy—and it's one reason Robinhood has been a boon to my business this year," adds Kevin Kleinman, a financial adviser with Blue Haven Capital in Geneva, Ill. Mr. Kleinman said he has more than 10 new clients who were unhappy with Robinhood, and all had tax complaints, among them Mr. Leong.

Smart use of specific-lot identification can minimize current tax bills. Say that a trader holds Tesla shares bought at \$400, \$650 and \$850 apiece since mid-September, 2020. If this person decided to sell some of the winners at a recent price of \$675, the taxable gain would be either \$275 or \$25 per share, depending on which shares were sold. That's a big difference—and it's even bigger if some \$850 shares were sold, bringing a loss of \$175 per share that could offset taxable gains.

Any of these tax results could make sense: An investor with losses elsewhere in a portfolio might want to take gains, and one with gains might want to take losses. But many of the new trading platforms make this hard or impossible to do.

On Robinhood's webpage about tax lots, the firm doesn't tell customers they have the option of selling specific lots. Instead, it says sales will be on a first-in-first-out basis, known as FIFO, in which oldest shares are sold first. While FIFO could lower tax rates if the oldest shares have been held longer than a year, it might not. In the Tesla example above, FIFO would give the trader conceivably the worst outcome—a short-term gain of \$275 per share, taxed at the rates for ordinary income like wages.

In the fine print of trade confirmations sent to customers after they've sold shares, Robinhood does offer the option of specifying lots. But the process is complicated.

Customers at Robinhood can't specify a lot at the time of sale, as they typically can at traditional brokers. Instead, they search their history and email customer service with six datapoints, including dates and prices, before the trade settles two days after the trade date. Each request is assigned a case number and handled individually.

A Robinhood spokeswoman said it typically tries to tell customers if their request was successful

within seven days, but the tax-season rush has temporarily expanded the wait to up to 30 days. Because of a high volume of inquiries, it's also asking customers to email to find out the request's status to ensure they'll receive the information as quickly as possible.

Mr. Leong says he finds the process so daunting he hasn't used it: "It's too much work to dig through my order history to find lots and then hope they approve the sale." In another account at a traditional broker, he says, his specific-lot history pops up as he's selling shares, and he can easily select which ones he wants to sell.

Mr. Mulvahill, who has experience selling lots online at five different traditional firms, says that at those firms typically lots can be chosen and sold with a few clicks.

A spokeswoman for Robinhood says it's always looking for ways to improve its customer experience but has nothing to share at this time about changes to the process of specific-lot identification.

Other new platforms don't allow specific-lot ID at all. Both Webull and Public mandate FIFO for sales, while Uphold sells the most expensive shares available (called highest-in-first-out, or HIFO), and SoFi orders lots so that losers are typically sold before winners.

Anthony Denier, chief executive of Webull, says it's "looking to add more customization," and a spokeswoman for Public says the company is "studying tax-minimizing options." A spokesman for SoFi says tax-lot detail is "on the road map for future releases." Josh Greenwald, head of trading for Uphold, says the company will consider making changes to tax offerings as it expands.

What difference does tax management make to the bottom line? According to a recent study, systematically taking losses that reduced taxable gains boosted after-tax returns by an average of 0.82% a year from 1926 to 2018 for an investor in a 35% tax bracket. The gains could be larger under some circumstances, says one of the study's authors, Terence Burnham of Chapman University, such as if an investor traded small or volatile stocks or shorted them.

Dan Herron, a CPA in San Luis Obispo, Calif., who just prepared a return for a client who made more than 10,000 trades on Robinhood last year, says: "I tell clients who trade to specify lots when they sell, or they could get hosed on taxes."

THE INTELLIGENT INVESTOR | JASON ZWEIG

You Want to Go Green. Wall Street Smells Opportunity.

The surge in ESG investing comes with a cost



Using your investments to cool a warming planet is one of the hottest ideas on Wall Street.

Low-carbon funds, which seek to invest more in companies that pollute less, are part of the boom in ESG—environmental, social and governance—strategies. On April 8, BlackRock launched its U.S. Carbon Transition Readiness exchange-

traded fund, raising roughly \$1.25 billion, the biggest first day in the nearly 30-year history of ETFs.

You need to understand two fundamental facts about ESG or "sustainable" investing. First, corporate responsibility is in the eye of the beholder; one investor's paragon is another's pariah. Second, ESG is the last best hope for investment firms seeking to hang onto fat fees.

In the first quarter of 2021, exchange-traded ESG portfolios listed in the U.S. took in \$14.8 billion in new money, according to ETGFI, a research firm in London. More than half their total assets of \$86.2 billion have flowed in since the beginning of 2020.

Last year, sustainable portfolios in the U.S. took in nearly one-fourth of all new money across ETFs and mutual funds alike, estimates Morningstar.

Professional investors and rating services disagree widely on how to rate corporate responsibility. You could admire Tesla Inc. for reducing society's reliance on internal-combustion engines—or reproach it for squandering electricity on bitcoin and relying on batteries made with lithium, which can be hazardous and difficult to recycle.

The push for ESG comes partly from investors who want to use their money to pressure companies into certain behavior.

At least as big a push comes from investment managers. With market-matching index funds beating traditional stock pickers, it's become harder to keep charging high fees.

Asset managers are rescuing underperforming vehicles from oblivion by converting them to a sustainable approach. One in six ESG funds has been retrofitted out



of a pre-existing, often struggling strategy, according to Morningstar; last year, 25 portfolios became born again as sustainable funds.

Investors, it seems, are more likely to put up with low returns and high fees if you enable them to feel righteous.

Some sustainable portfolios exclude companies or entire industries, such as coal or weapons manufacturers. Others hold stock in companies they don't regard as leaders but seek to rehabilitate.

The new BlackRock U.S. Carbon Transition Readiness ETF takes a third approach.

The ultimate goal, says Carolyn Weinberg, global product head for iShares and index investments at BlackRock, is "to change corporate behavior" by "rewarding the winners and going light on the potential losers" in the conversion to an economy that consumes less carbon.

The Carbon Transition fund doesn't exclude lots of stocks. Instead, it holds slightly above-average stakes in the companies BlackRock believes are making the most progress toward a low-carbon world—and owns a bit less of those it considers laggards. The fund applies those tilts to each of its approximately 350 holdings.

The result is a basket of stocks

the average investor might find indistinguishable from the market as a whole.

The Carbon Transition fund's top five companies, totaling 19.5% of total assets, are Apple Inc., Microsoft Corp., Amazon.com Inc., Facebook Inc. and Google's parent, Alphabet Inc. After a fee waiver, the fund charges 0.15% in annual expenses.

A sibling fund, iShares Core S&P 500 ETF, holds the identical top five companies, in slightly different order and at 21.5% of total assets, for an annual expense of only 0.03%.

So the Carbon Transition fund looks a lot like a carbon copy of a broad-market index, but with higher fees.

To be fair, it's benchmarked not to the S&P 500, but to the Russell 1000. Another sibling fund that invests in that index, iShares Russell 1000 ETF, also charges 0.15% and holds the same top stocks.

The similarity to a plain-vanilla market index doesn't bother Kirsty Jenkinson, who heads sustainable investment and stewardship at the \$287 billion California State Teachers' Retirement System, a charter investor in the fund. "This is for investors who want broad market exposure and want to shift those positions along the margin

in a risk-controlled way," toward greener companies that can outperform, she says.

What's more, BlackRock argues, the tweaks it makes to the size of holdings—for instance, 1.26% in Berkshire Hathaway Inc. and 1.17% in JPMorgan Chase & Co., versus 1.28% and 1.16%, respectively, in the Russell 1000 fund—add up to a huge difference in carbon impact.

That isn't easy for outsiders to verify independently. Estimates of emissions can be unreliable. And auditing the carbon impact of every aspect of corporate operations—from sourcing raw materials to manufacturing and distribution—is complex and difficult. So different analysts can assign wildly divergent scores to the environmental goodness of a given company.

Individual investors should remember that annual expenses on sustainable ETFs charge an average 0.34% to invest in U.S. stocks, according to Morningstar—more than 10 times the cheapest index funds. In that sense, ESG funds are Wall Street's latest way to take something old, call it new and jack up the price.

Greenness is largely in the eye of the beholder. Fees always put investors in the red.

Carbon Copy?

BlackRock's new U.S. Carbon Transition Readiness ETF's top holdings are highly similar to those of index funds that don't share its 'sustainable' mission.

iShares Core S&P 500 ETF iShares Russell 1000 ETF BlackRock U.S. Carbon Transition Readiness ETF

	6.00% AAPL	5.39	5.20
	5.53 MSFT	4.91	4.87
	4.09 AMZN	3.62	3.40
	2.09 FB	1.87	2.11
	1.94 GOOGL	1.74	2.01
	1.87 GOOG	1.69	1.92
	1.60 TSLA	1.43	1.55
	1.45 BRKB	1.28	1.26
	1.31 JPM	1.17	1.17
	1.19 INJ	1.07	1.17 MDT

Note: As of April 15

Source: iShares

ALEX NABAUM

EXCHANGE



In February, millions were left without power for days. In Houston, Victor Zelaya, above left, fired up a barbecue grill; others lined up to fill empty propane tanks

How to Fix The Texas Power Market

Continued from page B1

"All eyes are on Texas, and they should be, as it relates to electricity-market reforms," said Curt Morgan, chief executive of Vistra Corp., the largest power generator in Texas. "If they just put a Band-Aid on a mortal wound...we're not going to make it."

Patrick Woodson, active in the Texas power market since its inception, saw his electricity retail firm, ATG Clean Energy Holdings Inc., crushed that week. "This market works really well most of the time," he said. But when it fails, "it is a failure of Texas-size proportions."

Many of those who did turn huge profits played in a different market altogether. Natural-gas suppliers were able to parlay a shortage of the fuel for power plants into a bonanza.

The biggest losers of all were Texas residents, roughly two-thirds of whom lost power. Millions were left in the dark for days, with some resorting to burning furniture in their homes to stay warm. At least 111 died of related causes, such as carbon-monoxide poisoning and hypothermia, according to the Texas Department of State Health Services, which estimates the number could still change.

Fixing the market promises to be as complex as it is costly. The challenge facing Texas Gov. Greg Abbott and state lawmakers is how to make the state's deregulated power market more reliable, while limiting added costs that would make its electricity more expensive.

Texas operates the nation's only pure "energy only" electricity market, one in which producers are paid just for the power they sell, not the ability to deliver whenever watts are needed. All other deregulated electricity markets in the U.S. offer power generators some form of payment for being ready to produce power, to ensure the market has sufficient capacity to reliably provide an essential resource.

For most of the past two decades, the Texas approach worked. It helped the Lone Star State keep wholesale power prices for much of the past two years at less than \$30 per megawatt-hour on average, well below most other regional power markets.

But a Texas grid that valued inexpensive power over reliability failed spectacularly during February's winter storm and frigid temperatures, leading not only to crushingly high electricity prices, but power and water shortages that virtually shut down the state's economy, and frozen pipes that caused widespread property damage.

Many now agree that the Texas power market needs more guardrails to ensure it can perform consistently, no matter the conditions. That will

likely come at a price. Texas lawmakers are advancing legislation to winterize the state's power plants with taxpayer assistance. It remains unclear how much that would cost, and many market participants believe that step alone wouldn't be enough to fix the system.

Some are pressing for changes to the design of the market itself, structuring it to better compensate power plants that can respond quickly when demand surges. That could necessitate payments to conventional power plants to operate on standby, or a new pricing structure to help them compete against lower-cost wind and solar farms. Both options would introduce new costs into the market.

Most Texans are insulated against electricity price spikes because they pay fixed rates for power. It is likely, though, that rates will increase over the long term as retailers absorb the costs of the storm and the state considers borrowing billions of dollars to help address those companies' financial burdens.

"I believe our system works, but we've got to rebalance it," said Kelly Hancock, a Republican state senator from the Fort Worth suburbs who is chairman of the body's Business and Commerce Committee. He said there needs to be more investment in electricity generation, such as natural-gas power plants or batteries, that can be dispatched when needed.

The sentiment is bipartisan. "We have a highly efficient but highly fragile electricity market," said Rep. Rafael Anchia, a Democrat from Dallas. "I think the 14 million Texans who were without water and the 4.5 million who were without power...would be willing to pay a little more for reliability."

Warren Buffett's Berkshire Hathaway Inc. has pitched an \$8.3 billion plan to backstop the Texas market by building power plants that would run only during electricity emergencies. Competitors have criticized the proposal, which would guarantee a return for the conglomerate, as anathema to Texas' free-market power system.

Across the country, electricity markets try to strike a balance between reliability and affordability, offering a continuum of options between one pole and the other. For years, Texas has fallen squarely on the side of affordability.

Though it hadn't fully broken down before February's freeze, the Texas market had been straining as a rapid build-out of wind and solar farms pushed power prices to record lows and created more volatility by changing power generation patterns. The growth of renewable energy and low-cost natural gas helped keep the average price that Texans paid for retail electricity below most states, according to federal data.

Texas deregulated its electricity market in 2002, replacing century-old monopolies with competition among power generators and retailers. State regulators tinkered with the market design a decade later, tripling the price cap to \$9,000 per megawatt-hour—by far the highest

price in any market in the U.S. The Texas Public Utility Commission said the higher price cap, available when demand is high, would provide more incentive for companies to build new power plants to relieve supply crunches.

Since then, the Texas power market has fundamentally changed. Wind farms have spread quickly across the state to generate an abundance of inexpensive power, growing from providing 9% of the electricity in 2012 to 22.8% in 2020. Solar farms are multiplying, too, stepping in to produce power on hot, sunny days when demand is high. That has left fewer hours when coal- and gas-fired plants are needed, eroding their revenue and squeezing margins.

The Texas market was designed to deliver windfall profits to generators during periods of scarcity by

coal-fired plants to collect larger and more consistent revenues, giving them more money for winterization and other reliability measures.

Many renewable-energy developers, who have turned Texas into the nation's top wind-power state, lost hundreds of millions of dollars during the storm, forced to buy power on the spot market, when their turbines froze up, to fulfill obligations. At \$9,000 a megawatt-hour, many were walloped.

Multinational power company RWE AG said "plant outages and regulatory intervention forced us to purchase electricity at absurd prices," and estimated it made losses of \$476 million, or €400 million, during the week.

Electric retailers—companies that purchase wholesale power and sell it to customers—are equally

It also is expected to trigger litigation from electricity retailers, utility companies, residents and businesses who suffered the fallout.

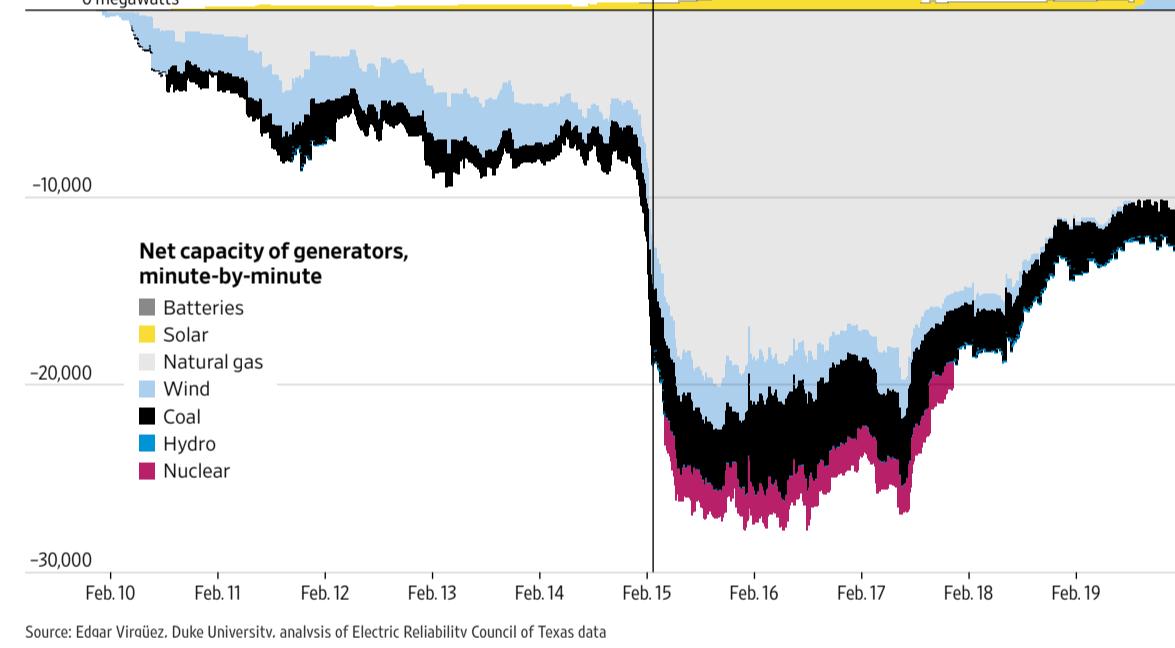
"The market was killing people in their homes, and I have lost faith in it, and every decision we made at that point forward was to get the lights on," commissioner Arthur C. D'Andrea told the Texas Senate. A couple of days later, Mr. Abbott, the governor, asked for and received his resignation.

Before February, the market had hit peak prices twice—for three hours in 2019 and 13 hours in 2011. The setting of sky-high prices for days devastated some large customers.

Shane Cawood, director of operations at Hartman Income REIT Management, which manages 60 properties in Texas, said the electricity bill for one of its Dallas

Lost Power

As a winter storm blanketed Texas, more than two hundred electricity generators shut down. Net change in generating capacity from before the storm.



allowing power prices to surge. But the state's four dominant power producers—Vistra, Exelon Corp., NRG Energy Inc. and Calpine Corp., which generate half of Texas' electricity—collectively lost an estimated \$2.5 billion to \$4 billion during the freeze.

Many were unable to operate during the cold conditions because their equipment froze, or because they couldn't secure the natural gas needed to fuel power plants. Some say they paid exorbitant amounts for natural gas on the spot market, while others were forced to buy the limited expensive electricity available to meet contractual obligations.

For Vistra, February's subfreezing temperatures crippled natural-gas producers and suppliers, driving up the cost of fuel and limiting the amount available for its plants. Near Dallas, Vistra shut down a large gas-fired plant when its pipeline supplier said it didn't have enough fuel.

Instead of running at full steam, Vistra's gas plants ran at about 70% capacity, putting it at risk of breaching its contractual obligations to deliver power. The company had to make up the difference by purchasing replacement power on the spot market for \$9,000 a megawatt-hour.

One of the company's coal plants east of Waco had the potential to make big profits. Fueling it typically costs about \$7 a megawatt-hour, giving it a wide profit margin when electricity prices surge. But piles of coal froze, making them impossible to pulverize and burn, taking the 1,800-megawatt plant offline. Vistra drew replacement power from several of its gas plants, which cost roughly \$2,500 a megawatt-hour to fuel as gas prices surged.

Mr. Morgan, the CEO, said the failure highlighted the difficulty of maintaining grid reliability in a market that has become less lucrative and more volatile. He is pushing for market changes that could reduce the \$9,000 a megawatt-hour price cap, while enabling gas- and

unhappy. Three have sought bankruptcy protection. Many more are in the process of winding down their business, including ATG.

Created in 2019 by Mr. Woodson, the Texas market veteran, ATG signed up 34,000 customers. His break-even price was about \$50 per megawatt-hour. If he could secure electricity for less, he made money.

Heading into February, he had locked in electricity prices for 100% of the electricity he anticipated needing. As temperatures began to drop further than forecast, his customers' demand doubled, and he needed to secure more electricity.

On Sunday, Feb. 14, he bid \$4,000 per megawatt-hour for electricity on Monday. He was stunned when his bid was rejected as too low. The market cleared at \$7,000. "Oh, no," he recalled thinking to himself. "This is bad." To cover his customers' soaring electricity demand, he bought power on Monday and lost \$8 million. The worst was yet to come.

On Monday, Feb. 15, the Public Utility Commission ordered prices to go to the maximum level of \$9,000 a megawatt-hour and stay there for the duration of the emergency, in what was ultimately an unsuccessful attempt to bring more electricity to the grid.

He couldn't pass those higher costs on to his fixed-rate customers. His losses topped \$10 million a day the following Tuesday and Wednesday, an enormous sum for a firm whose revenue for all of 2020 was \$16 million. By midweek, his line of credit was shot and his company crushed.

In March, he began laying off employees and was discussing options with his creditors. "The business will incur large losses. The creditors will incur losses. And me and all of my investors will sustain 100% losses," he said.

The utility commission's decision to intervene in the market during the height of the crisis and set the rates at the \$9,000 maximum for days has led to a political backlash.

high-rises for the first two days of the freeze was \$609,000—more than it spent on electricity for all of its properties in February the year before.

He estimates the final utility bill or all its properties during the weeklong freeze will be \$5 million to \$10 million more than usual, and will be passed on to tenants.

"Our tenants just came out of a full year of a Covid economy, and they are just barely making it by," he said. "This could be the last straw."

The grid's failure also landed on people like Johanna Yale, a semiretired 64-year-old commercial muralist whose husband died last year. The electricity in her Houston home went off on Feb. 15, leaving her shivering under blankets and huddling with her dogs for warmth. When the power came back on, water from a burst pipe in her attic started cascading down, leaving an inch-deep pool in her living room and kitchen.

The water damage and resulting mold destroyed her home, where she had lived since 2005. The interior of her house has since been stripped to the studs. Everything is either in a dumpster or a temporary storage pod on her lawn.

So far, the cost to remove the water and tear out walls and floors is \$60,000—a total set to rise once rebuilding and replacing lost items is included. Although she has insurance, the out-of-pocket expenses are growing.

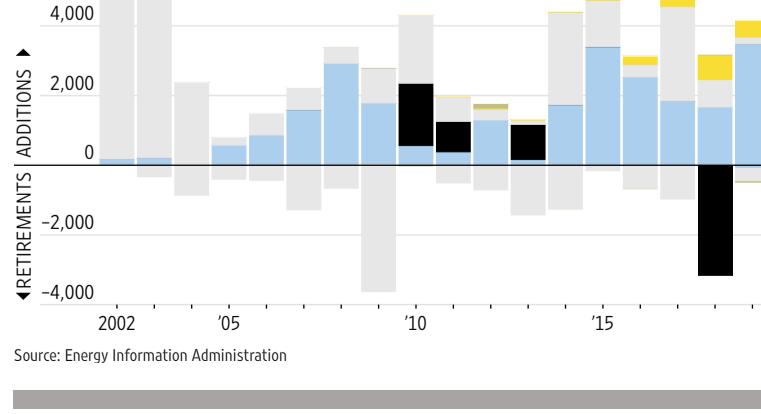
"If I didn't have money from life insurance from when my husband passed away, I'd be out of money by now," she said.

More than a month after the freeze, she is living in an extended-stay hotel that is only half open, because it also suffered broken pipes and water damage.

"Why does everything have to be either California or Texas?" she said. "Why does it have to be either so expensive you can't afford to live there or so cheap there is no safety built in?"

Renewables Surge

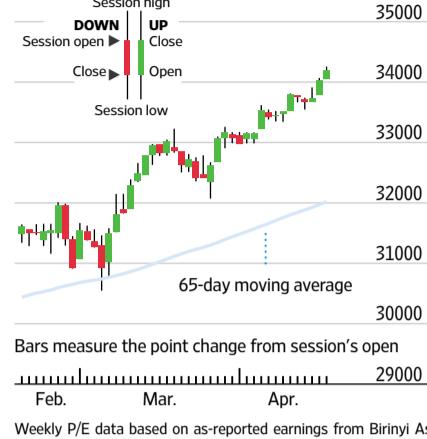
Texas' power grid has added a lot of new wind and solar generation, but not much new natural gas, coal or nuclear in recent years.



MARKETS DIGEST

Dow Jones Industrial Average

Last Year ago
34200.67
 ▲ 164.68
 P/E estimate * 21.02 20.61
 or 0.48%
 Dividend yield 1.74 2.73
 All-time high 34200.67, 04/16/21
 Current divisor 0.15198707565833



Bars measure the point change from session's open

Weekly P/E data based on as-reported earnings from Birinyi Associates Inc. *Based on Nasdaq-100 Index

S&P 500 Index

Last Year ago
4185.47
 ▲ 15.05
 P/E estimate * 23.82 20.75
 or 0.36%
 Dividend yield 1.39 2.13
 All-time high 4185.47, 04/16/21



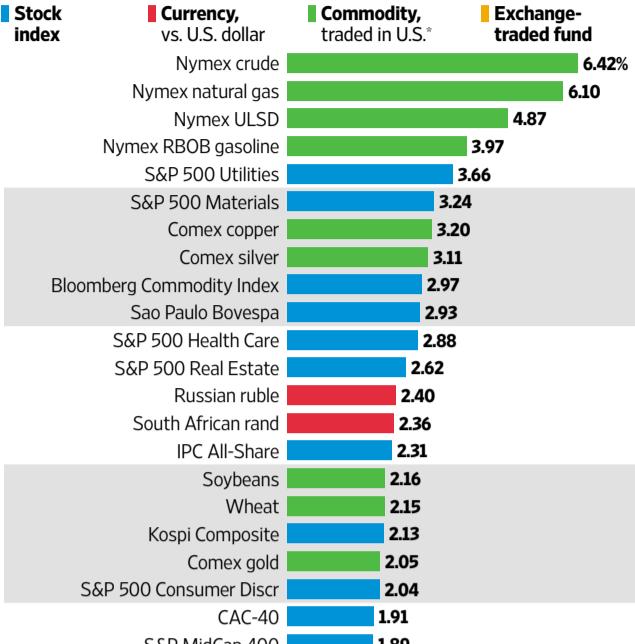
Nasdaq Composite Index

Last Year ago
14052.34
 ▲ 13.58
 P/E estimate * 30.51 25.77
 or 0.10%
 Dividend yield * 0.71 1.00
 All-time high: 14095.47, 02/12/21



Track the Markets: Winners and Losers

A look at how selected global stock indexes, bond ETFs, currencies and commodities performed around the world for the week.



Major U.S. Stock-Market Indexes

	High	Low	Latest Close	Net chg	% chg	52-Week High	Low	% chg	YTD % chg	3-yr. ann.
Dow Jones										
Industrial Average	34256.75	34058.16	34200.67	164.68	▲ 0.48	34200.67	23018.88	41.1	11.7	11.6
Transportation Avg	15081.22	14884.09	14919.55	-10.45	-0.07	14969.58	7761.00	81.2	19.3	12.0
Utility Average	927.06	918.63	923.71	6.52	▲ 0.71	923.71	744.49	12.1	6.8	10.1
Total Stock Market	43795.22	43572.80	43735.05	125.07	▲ 0.29	43735.05	27478.69	51.6	11.5	16.3
Barron's 400	1005.95	996.94	1004.09	7.15	▲ 0.72	1004.09	557.81	71.7	17.8	11.6

Nasdaq Stock Market

Nasdaq Composite	14062.50	13977.05	14052.34	13.58	▲ 0.10	14095.47	8263.23	62.5	9.0	25.2
Nasdaq-100	14050.38	13966.54	14041.91	15.72	▲ 0.11	14041.91	8403.00	59.0	9.0	28.1

	High	Low	Latest Close	Net chg	% chg	52-Week High	Low	% chg	YTD % chg	3-yr. ann.
S&P										
500 Index	4191.31	4170.75	4185.47	15.05	▲ 0.36	4185.47	2736.56	45.6	11.4	16.1
MidCap 400	2727.46	2706.79	2721.08	20.80	▲ 0.77	2721.08	1490.58	74.3	18.0	12.7

	High	Low	Latest Close	Net chg	% chg	52-Week High	Low	% chg	YTD % chg	3-yr. ann.
Other Indexes										
Russell 2000	2273.15	2251.73	2262.67	5.60	▲ 0.25	2360.17	1185.09	84.1	14.6	13.1
NYSE Composite	16207.10	16116.85	16186.29	69.45	▲ 0.43	16186.29	10706.44	44.4	11.4	8.6
Value Line	663.38	659.70	662.21	2.51	▲ 0.38	662.21	368.54	71.6	16.4	5.9
NYSE Arca Biotech	5573.16	5518.60	5549.74	-1.93	-0.03	5319.77	5021.50	7.1	-3.3	6.5
NYSE Arca Pharma	708.84	700.69	707.91	7.22	▲ 1.03	725.03	613.07	9.3	2.7	9.9
KBW Bank	124.12	122.27	123.01	0.57	▲ 0.46	124.01	62.74	75.7	25.6	4.9
PHLX® Gold/Silver	150.05	148.11	149.16	1.01	▲ 0.68	161.14	104.28	43.0	3.4	21.1
PHLX® Oil Service	53.24	51.67	51.91	-0.64	-1.22	63.89	25.80	98.5	17.1	-29.9
PHLX® Semiconductor	3275.59	3248.46	3253.08	-18.25	-0.56	3305.43	1588.70	90.7	16.4	34.7
Cboe Volatility	16.88	16.05	16.25	-0.32	-1.93	45.41	16.25	-57.4	-28.6	-0.6

\$Nasdaq PHLX

Sources: FactSet; Dow Jones Market Data

*Primary market NYSE, NYSE American NYSE Arca only. **(TRIN) A comparison of the number of advancing and declining issues with the volume of shares rising and falling. An Arms of less than 1 indicates buying demand; above 1 indicates selling pressure.

†Has traded fewer than 65 days

‡Common stocks priced at \$2 a share or more with an average volume over 65 trading days of at least 5,000 shares

§Traded front-month contracts

**Continuous front-month contracts

Sources: FactSet (stock indexes, bond ETFs, commodities), Tullett Prebon (currencies).

THE WALL STREET JOURNAL

International Stock Indexes

Region/Country	Index	Close	Net chg	Latest % chg	YTD % chg
World	MSCI ACWI	704.94	2.92	▲ 0.42	9.1
	MSCI ACWI ex-USA	348.16	2.06	▲ 0.59	7.2
	MSCI World	2953.35	11.60	▲ 0.39	9.8
	MSCI Emerging Markets	1348.69	7.60	▲ 0.57	4.4
Americas	MSCI AC Americas	1626.00	4.83	▲ 0.30	10.8
Canada	S&P/TSX Comp	19351.32	29.40	▲ 0.15	11.0
Latin Amer.	MSCI EM Latin America	2405.10	10.247	▲ 0.43	-1.9
Brazil	Sao Paulo Bovespa	121113.93	413.26	▲ 0.34	1.8
Chile	Santiago IPSA	3396.76	31.33	▲ 0.93	18.9
Mexico	S&P/BMV IPC	48726.98	212.88	▲ 0.44	10.6
EMEA	Stoxx Europe 600	442.49	3.94	▲ 0.90	10.9
Eurozone	Euro Stoxx	444.38	4.17	▲ 0.95	11.8
Belgium	3978.43	36.95	▲ 0.94	9.9	
Denmark	OMX Copenhagen 20	1519.21	14.29	▲ 0.95	3.7
France	CAC 40	6287.07	52.93	▲ 0.85	13.3
Germany	DAX	15459.75	204.42	▲ 1.34	12.7
Israel	Tel Aviv	1631.97	8.9
Italy	FTSE MIB	24744.38	215.69	▲ 0.88	11.3
Netherlands	AEX	716.80	3.00	▲ 0.42	14.8
Russia	RTS Index	1497.05	22.20	▲ 1.51	7.9
South Africa	FTSE/JSE All-Share	68698.78	875.69	▲ 1.29	15.6
Spain	IBEX 35	8613.50	41.90	▲ 0.49	6.7
Sweden	OMX Stockholm	921.13	13.29	▲ 0.46	19.9
Switzerland	Swiss Market	11262.97	64.27		

MARKET DATA

Futures Contracts

Metal & Petroleum Futures

Contract Open High hilo Low Settle Chg interest

Copper-High (CME)-25,000 lbs.; \$ per lb.

Open 4,2350 4,2395 4,1800 -0,0505 1,437

April 4,2315 4,2495 4,1655 4,1730 -0,0520 94,891

Gold (CMX)-100 troy oz.; \$ per troy oz.

Open 1770,40 1779,50 1770,10 1779,00 13,60 3,448

May 1764,20 1783,50 1759,70 1779,30 13,50 1,676

June 1764,80 1784,70 1760,30 1780,20 13,40 390,956

Aug 1766,20 1786,20 1763,20 1782,20 13,40 39,547

Oct 1768,70 1786,80 1765,80 1784,20 13,40 12,819

Dec 1768,40 1790,30 1767,10 1786,30 13,40 20,465

Palladium (NYM)-50 troy oz.; \$ per troy oz.

Open ... 2769,40 35,30 35,30 10,609

June 2725,00 2787,50 ... 2725,00 2774,70 35,30 61,537

Platinum (NYM)-50 troy oz.; \$ per troy oz.

Open 1202,80 1203,10 1202,80 1206,20 8,40 183

July 1199,60 1212,90 1192,30 1208,70 8,50 61,537

Silver (CMX)-5,000 troy oz.; \$ per troy oz.

Open 26,099 25,940 26,380 26,105 0,141 85,874

Crude Oil, Light Sweet (NYM)-1,000 bbls.; \$ per bbl.

May 63,32 63,88 62,83 63,13 -0,33 76,968

June 63,35 63,94 62,88 63,19 -0,32 445,823

July 63,31 63,82 62,81 63,09 -0,31 259,717

Aug 63,04 63,52 62,57 62,81 -0,30 135,478

Sept 62,59 63,07 62,17 62,38 -0,29 160,185

Dec 61,02 61,56 60,70 60,85 -0,30 305,180

NY Harbor ULSD (NYM)-42,000 gal.; \$ per gal.

May 1,8963 1,9094 1,8868 1,8957 -0,0032 74,561

June 1,8934 1,9109 1,8883 1,8975 -0,0029 93,000

Gasoline-NY RBOB (NYM)-42,000 gal.; \$ per gal.

May 2,0518 2,0622 2,0364 2,0399 -0,0119 72,386

June 2,0517 2,0627 2,0385 2,0426 -0,0100 109,142

Natural Gas (NYM)-10,000 MMBtu-\$ per MMBtu.

May 2,663 2,700 2,658 2,680 -0,02 121,903

June 2,734 2,765 2,729 2,754 -0,04 155,978

July 2,808 2,841 2,805 2,829 -0,02 183,986

Aug 2,836 2,866 2,832 2,858 -0,06 66,976

Sept 2,820 2,851 2,817 2,843 -0,02 103,437

Oct 2,836 2,869 2,833 2,862 -0,02 128,306

Agriculture Futures

Corn (CBT)-5,000 bu.; cents per bu.

May 590,50 594,75 583,25 585,50 -4,50 354,032

July 577,50 581,75 571,50 573,75 -3,00 678,176

Oats (CBT)-5,000 bu.; cents per bu.

May 382,75 384,00 380,75 380,75 -1,25 1,511

July 381,00 384,00 380,75 381,00 -7,75 2,087

Soybeans (CBT)-5,000 bu.; cents per bu.

May 1419,00 1437,75 1418,00 1432,35 15,00 193,639

July 1410,50 1430,00 1410,50 1422,50 11,50 305,807

Soybean Meal (CBT)-100 tons; \$ per ton.

May 400,30 408,40 399,50 402,20 .30 72,356

July 404,60 412,60 403,80 406,40 -10 167,647

Soybean Oil (CBT)-60,000 bbls.; cents per lb.

May 54,95 56,46 54,86 56,33 1,44 75,512

July 52,92 54,38 52,78 54,24 1,37 188,687

Rough Rice (CBT)-2,000 cwt.; \$ per cwt.

May 13,07 13,07 12,88 12,88 -17 5,445

July 13,35 13,35 13,16 13,17 -17 2,678

Wheat (CBT)-5,000 bu.; cents per bu.

May 652,50 659,75 648,25 652,50 -1,25 68,942

July 654,50 660,75 649,50 655,00 -50 210,755

Wheat (KC)-5,000 bu.; cents per bu.

May 607,75 61,00 601,00 609,25 1,50 40,185

July 615,25 623,25 608,50 615,20 1,00 109,559

Cattle-Feeder (CME)-50,000 lbs.; cents per lb.

April 140,200 140,325 139,735 139,625 -425 1,764

Aug 155,350 156,200 153,875 154,550 -1,00 19,183

Cattle-Live (CME)-40,000 lbs.; cents per lb.

April 122,000 122,000 120,700 120,850 -750 7,861

June 119,950 120,150 119,000 119,175 -475 143,772

Currency Futures

Japanese Yen (CME)-¥12,500,000; \$ per 100Y

April 9,201 9,207 .9178 .9192 -.0011 283

June 9,201 9,213 .9182 .9197 -.0011 164,333

Canadian Dollar (CME)-CAD 100,000; \$ per CAD

April .8001 .8003 .7963 .7999 .0024 130

June .7973 .8005 .7963 .8000 .0024 163,783

British Pound (CME)-£62,500; \$ per £

April 1,3760 1,3841 1,3717 1,3835 .0046 383

June 1,3788 1,3852 1,3718 1,3837 .0046 149,965

Swiss Franc (CME)-CHF 125,000; \$ per CHF

June 1,0859 1,0910 1,0844 1,0887 .0022 42,670

Sept 1,0928 1,0936 1,0873 1,0914 .0022 163

Australian Dollar (CME)-AUD 100,000; \$ per AUD

April .7743 .7759 .7725 .7733 -.0021 147

June .7754 .7761 .7726 .7735 -.0021 133,869

Mexican Peso (CME)-MXN 100,000; \$ per MXN

April .05002 .05022 .05002 .05020 .00014 42

June .04984 .04996 .04970 .04991 .00014 139,971

Euro (CME)-€125,000; \$ per €

April 1,1969 1,1994 1,1952 1,1979 .0004 1,456

June 1,1980 1,2009 1,1965 1,1993 .0003 645,102

High-yield issues with the biggest price increases...

Largest 100 exchange-traded funds, latest session

Friday, April 16, 2021

ETF Symbol Closing Chg Chg YTD

IShSelectDividend DLY 0,62 22,4

iSharesCore USA ESGU 0,95 27,8

iSharesCore MinUSA USTW 0,54 6,4

iSharesCore MSCI USM MTUM 17,49 -0,70 8,5

iSharesCore MSCI USQual QUAL 127,58 0,47 9,8

iSharesCore MSCI USVal VLUU 104,88 0,21 20

iSharesGold IAU 16,91 0,54 -0,6

iSharesBoxx SlnvGrCpBd LOD 13,01 -0,68 -5,1

iSharesHedgeYield HYG 87,30 -0,21 -0,1

iShares3Y TreasuryBd EMB 111,22 -0,32 -4,0

iShares7Y TreasuryBd EBF 108,59 -0,14 -1,4

iSharesCore Dividend MBB 108,59 -0,26 1,2

iSharesCore Dividend MBD 108,59 -0,26 1,2

BIGGEST 1,000 STOCKS

How to Read the Stock Tables

The following explanations apply to NYSE, NYSE Arca, NYSE American and Nasdaq Stock Market listed securities. Prices are composite quotations that include primary market trades as well as trades reported by Nasdaq BX (formerly Boston), Chicago Stock Exchange, Cboe, National and Nasdaq ISE. The list comprises the 1,000 largest companies based on market capitalization. Underlined quotations are those stocks with large changes in volume compared with the issue's average trading volume. Boldfaced quotations highlight those issues whose price changed by 5% or more if their previous closing price was \$2 or higher.

Footnotes:
 1-New 52-week high.
 1-New 52-week low.
 dd—Indicates loss in the most recent four quarters.
 FD—First day of trading.
 t—NYSE bankruptcy.

h—Does not meet continued listing standards.
 v—Trading halted on primary market, being reorganized or assumed by such companies.
 q—Temporary exemption from Nasdaq requirements.
 t—NYSE bankruptcy.

Stock tables reflect composite regular trading as of 4 p.m. and changes in the closing prices from 4 p.m. the previous day.

Friday, April 16, 2021

A B C

	YTD % Chg	52-Week Hi	Lo Stock	Yld Sym %	PE	Last Net Chg
ABB	2.1 14	33.38	0.45	16.73 102.20	54.91	CIBC 0.74 14 97.77
ACM	dd 67.05	-0.25		8.12 113.95	75.88	CanAmRwy 1.32 114.00
AES	2.1471	26.83	0.10	28.37 127.73	50.84	CapitolOne 1.32 116.00
AFL	2.5 18	54.53	0.62	14.27 69.29	145.45	CardinalHealth 1.04 120.00
AGC	0.4 12	47.48	0.58	23.24 24.22	15.46	CarMax 1.26 23.92
AKAM	0.2 44	47.48	0.45	12.12 47.20	10.00	CAE 1.26 23.92
AKAMt	1.50 20.50	11.41	AGNC Inv	39.48 59.81	20.80	Carlyle 1.26 23.92
ANSS	75 373.93	-0.69		37.59 136.54	61.23	CarMax 1.26 23.92
ANX	1.18 18	29.95	0.20	24.79 30.63	11.31	CarivalGlobal 1.26 23.92
APT	6.9 29	33.44	0.25	16.33 42.48	12.93	CenterGlobal 1.26 23.92
APP	0.4 12	47.48	0.45	23.59 25.77	9.44	Carnival 1.26 23.92
APP	0.4 12	47.48	0.45	24.79 30.63	11.31	Carnival 1.26 23.92
APP	0.4 12	47.48	0.45	23.59 25.77	9.44	Carnival 1.26 23.92
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APP	0.4 12	47.48	0.45	23.59 25.77	9.44	Carnival 1.26 23.92
APP	0.4 12	47.48	0.45</td			

MARKETS



Coinbase underscored flagging demand for new issues, closing Friday at \$342, down from its IPO opening price Wednesday of \$381.

Stocks End Week at Fresh Highs

BY JOE WALLACE
AND PAUL VIGNA

The Dow Jones Industrial Average and S&P 500 inched higher and set fresh records Friday amid another volley of blue-chip earnings and more signs of economic growth.

The blue-chip index rose 164.68 points, or 0.5%, to 34,200.67, its third straight day

of gains. The S&P 500 rose 15.05 points, or 0.4%, to 4,185.47. The indexes set their 21st and 23rd, respectively, closing highs of 2021. The Nasdaq Composite spent much of the day in the red but closed higher as well, up 13.58 points, or 0.1%, to 14,052.34. It is only 0.3% below its February record.

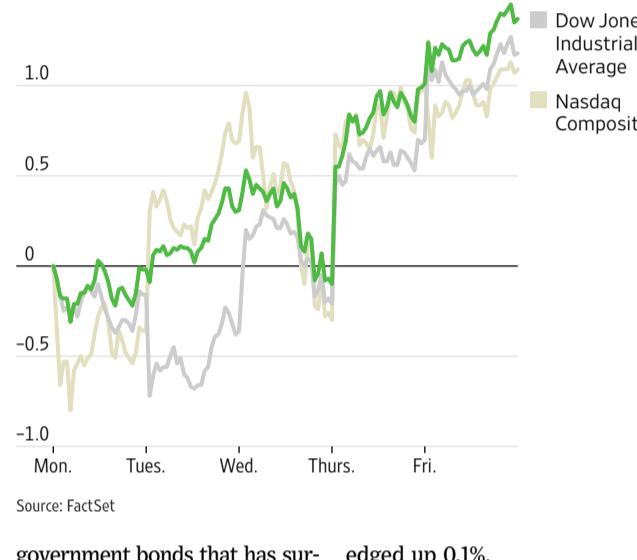
For the week, the Dow gained 1.2% and the S&P 500 rose 1.4%; both have advanced four weeks in a row. The Nasdaq put in its third straight weekly gain, up 1.1%.

The long, steady rise for U.S. equities this year is itself a sign that the march can continue, said LPL Financial strategist Ryan Detrick. Since 1950, when the S&P 500 was up between 5% and 10% in the first quarter, it was up for the next three quarters nearly 90% of the time, he said, with the average gain about 12%. The index gained 5.8% in the first quarter.

"Think about it, we don't want things to get too hot," he said. The current trajectory "tends to suggest the market will continue to have an upward bias."

A strong start to earnings season from banks and other financial companies has combined with data showing the economy is growing at a rapid clip to propel stocks higher this week. Adding to the momentum: A drop in yields on U.S.

Index performance this week



government bonds that has surprised some investors in its size and speed.

Despite that, the S&P 500's financial sector rose just 0.7% on the week. Morgan Stanley fell \$2.23, or 2.8%, to \$78.59 on Friday even after the investment bank said profit more than doubled in the first quarter, becoming the latest Wall Street firm to report a blowout start to the year. Citizens Financial Group, Bank of New York Mellon, PNC Financial Services Group and State Street also posted quarterly results.

Data out Friday showing the Chinese economy grew at a record rate of 18.3% in the first quarter will add to optimism about the U.S.'s economic prospects, said Remi Olu-Pitan, multiasset fund manager at U.K. investment firm Schroders. "Maybe we should notch up our expectations a bit in the U.S. and even in Europe," she said.

Asian indexes rose on the back of the data. China's Shanghai Composite Index climbed 0.8%, and Japan's Nikkei 225

edged up 0.1%. While the S&P 500 has gained in nine of the past 12 sessions, that masks some of the weakness under the surface, said Frank Cappelleri, the executive director at brokerage Instinet. Tech stocks have lost ground and some of the more speculative trades that drove the market earlier have also faltered. "The thing the market has been able to do is put on blinders to underperforming areas and let the leaders dictate," he said.

One sign of flagging demand has come in the market for new issues. Shares of Coinbase Global rose 31% in their first day of trading on Wednesday, but that was marked against their reference price. The stock is down from its opening trading price of \$381, closing Friday at \$342. On Thursday, shares of AppLovin fell 19% and TuSimple Holdings fell 4% on their first day of trading. Both fell Friday as well.

Meanwhile, comments from the Securities and Exchange

Commission concerning one of the hottest bets on Wall Street, special-purpose acquisition companies, has resulted in a slowdown in new SPAC issues and lower prices.

Investors being so sanguine also suggests that they may not be accurately pricing in market risk, said Jason Brady, the president and chief executive of Thornburg Investment Management.

Stocks ran up ahead of an economic recovery in anticipation of it, he said. Now that it is seemingly here, stocks are still rising. That could leave investors vulnerable to not just bad news, but even a lack of good news, he said. Rising bond yields. any pandemic-related setbacks, labor shortages or even disappointing economic growth isn't priced in right now, he said.

"Obviously, it's been a great ride, but it's going to be a rocky ride," Mr. Brady said.

The yield on 10-year Treasury notes rose to 1.571%, up from 1.531% Thursday. But it still saw its largest one-week decline since June, falling from 1.664% at the end of last week.

Yields move in the opposite direction to bond prices. Rising yields injected volatility into the stock market in the first quarter by knocking shares of large technology companies.

Daniel Morris, chief market strategist at BNP Paribas Asset Management, said falling yields call into question some aspects of the "reflation trade," in which investors bought stocks that stood to gain from a burst of inflation and economic activity.

Yields have fallen because the Federal Reserve has started to convince investors that it won't bump up interest rates to ward off higher inflation, Mr. Morris said.

Turkey Set to Ban Crypto Payments

BY JARED MALSIN
AND CAITLIN OSTROFF

Bitcoin's Turkish lira value

600 thousand lira

Turkey will ban the use of cryptocurrencies as a form of payment following months of economic turbulence that spurred locals to swap the local currency for bitcoin and foreign currencies.

Turkey's central bank said Friday that cryptocurrencies are excessively volatile and can be used for illegal activities. The bank also said crypto assets are "neither subject to any regulation and supervision mechanisms nor a central regulatory authority."

The move against bitcoin use comes amid a global rally in cryptocurrencies. Bitcoin, ether and dogecoin hit record highs this week. The U.S. listing of crypto exchange operator Coinbase Global Inc. drew increased appetite among individual investors around the world to buy and sell cryptocurrencies.

Cryptocurrencies such as bitcoin, which are independent of central banks and created by so-called computer miners, are seen as a threat to government issued currencies. China keeps a tight leash on bitcoin trading. Nigerian officials said recently that the increasing use of bitcoin could erode the value of the local currency, the naira. Locals there have struggled to gain access to foreign currencies, turning to the black market or bitcoin, according to traders.

In Turkey, use of cryptocurrencies has added appeal after the lira fell sharply in recent weeks. President Recep Tayyip Erdogan abruptly fired the country's central bank governor in March.

Bitcoin prices have more than doubled this year in dollar terms. The rise has been even greater in lira terms. On Friday, one bitcoin bought nearly half a million lira, according to CoinDesk, from 215,000 lira at the start of the year.

"The government doesn't want money outflow outside of Turkey. They're trying to define what a cryptocurrency is right now. They do not want to actually treat it as a currency," said Turan Sert, an Istanbul-based researcher on decentralized finance and blockchain.

Because bitcoin can be exchanged between two people without the involvement of a central bank, it is nearly impossible for the government to police transactions, said Chris Bendiksen, head of research at London-based asset-management firm CoinShares.

The most the government would be able to do is track transactions when people go to swap cryptocurrencies for lira at exchanges. The policy will likely drive those trades underground, limiting the government's visibility, he added.

The Turkish ban goes into effect on April 30.



a report by Turkey's Information and Communication Technologies Authority.

Turkey has long maintained tight controls on methods of online payment, banning PayPal Holdings Inc. in 2016.

Ozgur Guneri, the chief executive of cryptocurrency exchange BtcTurk, said the new regulations would have a limited impact on his business because most cryptocurrency users in Turkey used the assets to store value, rather than make payments.

"From the user's perspective they can continue to buy, sell or hold cryptocurrencies through cryptocurrency platforms," he said. "I don't see it as a long-term problem."

The new regulation bans the flow of money from payment companies to cryptocurrency exchanges, meaning that users will still be able to exchange cryptocurrency through banks, a move that grants the government more visibility into the use of crypto assets. It will also limit the use of cryptocurrency in everyday life, experts say.

"The government doesn't want money outflow outside of Turkey. They're trying to define what a cryptocurrency is right now. They do not want to actually treat it as a currency," said Turan Sert, an Istanbul-based researcher on decentralized finance and blockchain.

Because bitcoin can be exchanged between two people without the involvement of a central bank, it is nearly impossible for the government to police transactions, said Chris Bendiksen, head of research at London-based asset-management firm CoinShares.

The most the government would be able to do is track transactions when people go to swap cryptocurrencies for lira at exchanges. The policy will likely drive those trades underground, limiting the government's visibility, he added.

The Turkish ban goes into effect on April 30.

Morgan Stanley Sees Record

Continued from page B1

repay its margin loans. The remainder of the Archegos losses came when the bank closed out smaller positions the fund had that weren't subject to margin calls, Chief Executive James Gorman said on a conference call with analysts Friday.

While those positions weren't especially problematic for the bank, Mr. Gorman said, it chose not to take the risk that they could later sour and lead to bigger losses. "I regard that decision as necessary and money well spent," he said. "We didn't want this thing to be lingering."

Archegos losses notwithstanding, Morgan Stanley rounded out an all-time great first quarter from the nation's big banks. Asset prices rallied, millions of investors traded stocks with abandon and scores of technology and special-purpose acquisition companies listed their shares publicly, creating an optimal environment for banks' Wall Street divisions. On Wednesday, Morgan Stanley rival Goldman Sachs Group Inc. posted record quarterly revenue and net income.

Morgan Stanley on Friday reported quarterly profit of \$4.1 billion, or \$2.19 a share, on revenue of \$15.7 billion. That

beat the consensus estimates of analysts polled by FactSet by a wide margin, thanks in part to the \$5.8 billion it generated in stock- and bond-trading revenue, a 29% increase over last year's first quarter.

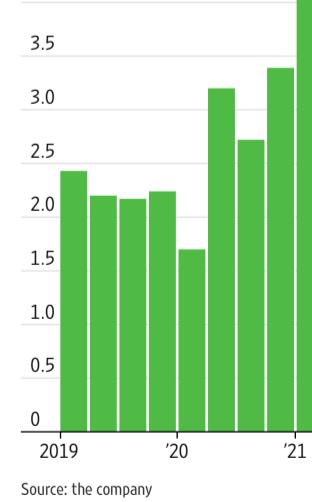
Morgan Stanley's E*Trade business also benefited from the burst of trading activity among individual investors. The number of retail-trading clients at Morgan Stanley increased 7% from the end of 2020 to 7.2 million, and the average daily number of retail trades the company handled for the quarter exceeded 1.6 million.

Revenue at Morgan Stanley's wealth-management division, which includes E*Trade, increased 47% to roughly \$6 billion. The firm attracted a record \$105 billion in net new assets, thanks to a 6% increase in both assets in accounts overseen by Morgan Stanley financial advisers and in assets on its do-it-yourself investing platforms such as E*Trade.

In the early days of 2021, small-time investors who traded tips on internet forums like Reddit's WallStreetBets catapulted shares in GameStop Corp. and other meme stocks to new heights. E*Trade handled more than 2 million trades on a few different days in February, Jonathan Pruzan, Morgan Stanley's finance chief, said in an interview. But activity has cooled since.

Investment banking fees more than doubled to \$2.6 billion. Morgan Stanley earned a record \$1.5 billion in revenue from arranging initial public offerings and stock offerings,

Morgan Stanley's quarterly net income



and its revenue from advising on deals rose by a third to \$480 million.

It was Morgan Stanley's obligation to an investment-banking client that prevented it from acting sooner to avoid losses on Archegos, Mr. Gorman said.

During the last week of March, the bank had a lead role arranging a sale of stock for ViacomCBS, a company in which Archegos held a large stake. Morgan Stanley waited until that offering closed before it liquidated Archegos' holdings of ViacomCBS, ceding first-mover advantage to Archegos' other lenders. Still, Morgan Stanley's losses paled in comparison to the \$4.7 billion hit that Credit Suisse Group AG booked related to the Archegos meltdown.

Galaxy Digital began as an investment-management firm but has since expanded into more financial services, including investment banking and trading. On Monday, it filed a submission with the Securities and Exchange Commission for a bitcoin-focused exchange-traded fund.

Ex-Goldman Official Tapped For Chairman of Bitcoin Firm

BY PAUL VIGNA

Galaxy Digital Holdings Ltd., a bitcoin-focused firm offering banking and institutional services, named former Goldman Sachs Group Inc. executive Michael Daffey as its chairman ahead of a planned U.S. stock offering later this year.

Mr. Daffey, 54 years old, succeeds founder Michael Novogratz, who will remain chief executive.

Mr. Daffey was most recently the chairman of Goldman's global markets division, which generated more than 40% of the firm's overall revenue in the first quarter. His last day was March 31.

The appointment is Galaxy's latest maneuver as it prepares to make a public stock offering in the U.S. later this year. Its shares are already listed on the Toronto Stock Exchange. In March, it named Alex Ioffe as chief financial officer; Mr. Ioffe previously held the same position at Virtu Financial Inc.

Galaxy Digital began as an investment-management firm but has since expanded into more financial services, including investment banking and trading. On Monday, it filed a submission with the Securities and Exchange Commission for a bitcoin-focused exchange-traded fund.

"We are trying to build a 21st-century, customer-focused merchant bank," Mr. Novogratz said, referring to the kind of bank that caters to commercial clients and high-net-worth investors.

Like others in the crypto sector, Galaxy has seen its operations flourish amid a boom in the price of bitcoin and other cryptocurrencies. At the end of March, its assets under management had risen to \$1.28 billion, from \$356 mil-

lion a year earlier. Though the company hasn't reported its full financial results for the first quarter, it posted a profit of \$335.7 million for the fourth quarter of 2020, versus a loss of \$31.2 million a year earlier.

Such numbers have Galaxy and others in the crypto space eyeing the public equities market. Cryptocurrency exchange Coinbase Global Inc., which has also seen exponential growth, fetched an \$85 billion valuation on Wednesday in its stock-mar-

ket debut. There are only a handful of other U.S. publicly traded companies in the sector, including Riot Blockchain Inc. and Marathon Digital Holdings Inc.

"There's a dearth of good, public equities in the crypto space," Mr. Novogratz said. "I think you'll see other companies try to fill out that portfolio."

Mr. Daffey, an Australian, started at Goldman in 1994. He became a managing director after six years and a partner after two more. He became chairman of the global markets division in 2020, managing some of the company's most important hedge-fund clients.

Messrs. Daffey and Novogratz worked together at Goldman in Asia in the 1990s. Mr. Novogratz later worked at Fortress Investment Group before founding Galaxy in 2017.

Mr. Daffey said he started paying attention to bitcoin in March 2020 as the coronavirus pandemic surged. The topic became one he heard about from clients daily, he said, and that got his attention. "It reminds me of Wall Street 20 years ago," he said.

He was circumspect about how he will handle his new job, which he doesn't officially begin until Sept. 1. "This is a great, new next chapter for me. I have a lot to learn," he said.

HEARD ON THE STREET

FINANCIAL ANALYSIS & COMMENTARY



Taxing marijuana too heavily can drive customers away from legal options, depressing revenue for states.

States Should Resist the Urge To Get Too High on Pot Taxes

New York's 13% levy on legal cannabis sales should help it avoid the mistakes of states like California, whose hefty taxes help underground dealers

This year will be the first that New Yorkers can legally light up a joint on April 20, the unofficial marijuana holiday known as 4/20. It will still take time to persuade them to buy supplies from a licensed seller rather than an illegal dealer, but a reasonable cannabis tax rate should help.

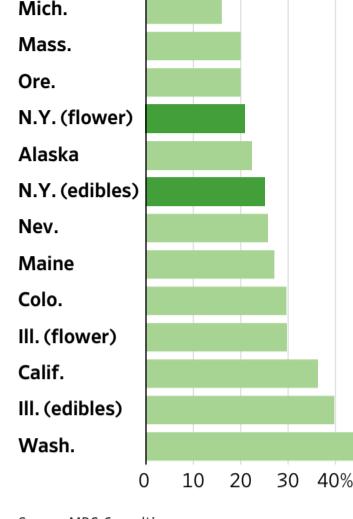
New York is one of several U.S.

states that have recently gone legal. New Mexico, New Jersey and Virginia all signed or approved adult-use pot laws this year. Based on the latest tally from the Marijuana Policy Project, 18 states have now legalized recreational cannabis across the U.S. and 36 let citizens use the drug for medical reasons.

New York Gov. Andrew Cuomo

says the marijuana industry could eventually generate \$350 million in annual taxes for the state. That is a modest sum for New York, which raised \$81 billion in levies overall in the 2020 fiscal year. But if the governor's estimate is right, pot will become a bigger source of tax revenue than alcohol, which generated \$260 million last year. This is

Effective tax rate on cannabis



Source: MPG Consulting

have a 21% effective tax rate for the dried flower that is smoked in a joint and 25% on more potent edibles like cannabis-laced gummy bears, according to MPG. These are well below levels in Washington, which has the highest effective tax rate in the U.S. at 47%.

New York's approach should help it to avoid the mistakes made by early pioneers. California went legal back in 2018, but around three-quarters of marijuana sales still take place in its vibrant underground market. California's steep 36% effective tax rate and the legal industry's higher operating costs mean that aboveboard cannabis is far more expensive than what can be bought illicitly. A report by BDS Analytics found the markup on legal cannabis is as high as 77%.

California may have a particular problem. Underground dealers in the state can be serious operators. Law enforcement means they often have store fronts, offer home delivery and may have customer relationships that stretch back decades.

In most states, the good news for investors in listed U.S. cannabis growers such as Curaleaf and Green Thumb Industries is that legal sellers should eventually find it easier to compete. As a state's cannabis market matures, increased supply tends to reduce prices and the markup on legal pot. Even if licensed sellers will never undercut drug dealers completely, consumers may decide that it is worth paying a small premium for products that have been through safety checks and are on the right side of the law.

Precedents offer reassurance here. When alcohol prohibition ended in the 1930s, it took around four years for the legal market to absorb syndicated bootleggers' business, according to Ulrich Boesen, a senior policy analyst at the Tax Foundation. The Canadian cannabis market seems to be developing on a similar time scale. By the fourth quarter of 2020—two years after legalization—licensed operators sold 56% of all adult-use cannabis, official economic data shows.

The ultimate goal of New York's tax authorities, in a rare alignment of interests with investors, is to put old-school cannabis dealers out of business. It will take time, but the state is on the right track.

—Carol Ryan

Chip Shortage Hasn't Hit Big Tech—Yet

Apple, Microsoft, Amazon, Google and Facebook could still feel effects down the road

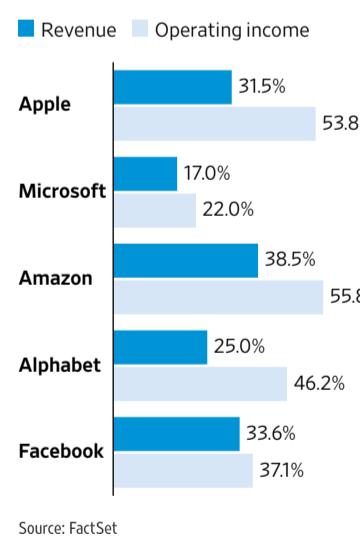
The world's largest tech companies effectively run on chips. But their prowess offers them some protection from the semiconductor production shortage plaguing other industries, at least for now.

Just how much protection will become apparent in the coming slew of first-quarter earnings reports. Apple, Microsoft, Amazon.com, Facebook and Google-parent Alphabet are very different businesses, but to one degree or another all sell their own devices packed with processors, from smartphones to smart speakers to virtual-reality headsets. And they all run vast networks of giant data centers to deliver cloud software, e-commerce and social-networking services along with movies, TV shows and videogames.

But the chip production shortage plaguing industries like autos isn't expected to register much in big tech's results for the March quarter. The five aforementioned companies are all expected to post strong double-digit growth in both revenue and operating income for the quarter relative to the same period last year, according to FactSet. In fact, the five are expected to increase revenue by an average of 29%.

The clout of the world's tech giants generally puts them first in line with manufacturers of chips and other critical components. And chips like the central processors for smartphones, PCs and data centers command much higher prices than many of the chips that go into cars. As a result, chip makers give priority to production of these higher-end chips.

Still, with the chip production shortage now expected to last into next year, big tech's risk of exposure remains. That is particularly the case for Apple, which derived 82% of its revenue over the last four quarters from hardware products. The company is reportedly cutting back production on some Mac and iPad lines due to the shortage. Microsoft was already



Source: FactSet

dealing with sharp production constraints for its new Xbox videogame consoles in the December quarter, and those devices remain widely out of stock as of mid-April.

Tech companies including Apple, Google and Amazon also design their own in-house processors for products and data centers. But those chips still require foundry capacity at manufacturers such as Taiwan Semiconductor Manufacturing and Samsung. Intel is getting into the foundry game as well, with plans to build two new chip fabrication facilities in Arizona dedicated to the effort. But new chip fabs take two to three years to build. TSMC said in its own first-quarter report Thursday that some of its major new facilities won't be up and running until 2023, leaving Chief Executive C.C. Wei to predict that "this year and next year, I still expect the capacity tightening will continue." That's a long time for the world's tech titans to float above the fray.

—Dan Gallagher

OVERHEARD

The \$100 million delicatessen is the talk of Wall Street. But why be salty about it?

As an example of wild speculation in markets, hedge-fund manager David Einhorn flagged the case of Hometown International in a recent letter to his investors. Hometown, owner of a single deli in Paulsboro, N.J., recently attained a market value in excess of \$100 million, despite booking just over \$35,000 in combined sales over the past two years.

That tops the per-store value of even the highest-flying restaurant stocks—Chipotle Mexican Grill has a market value of around \$43 billion, which puts its 2,768 locations at about \$16 million apiece. Of course, those locations generated an average of \$2.2 million in sales in 2020.

But Hometown International will have a chance to grow into its lofty valuation. It could expand into new product sales like cigarettes or lottery tickets—two categories not mentioned in its annual report with the Securities and Exchange Commission. And with just one location in the Philadelphia suburbs, expansion opportunities abound, from Perth Amboy to Piscataway. That is to say nothing of the "international" arm promised in its name.

Besides, Hometown shares were down sharply on Friday morning, slicing that valuation to just \$80 million. Deep value is just around the corner in the Garden State.

\$100 million is a lot of bread for a suburban delicatessen.



Luxury car makers' pricing power has been a short-term boon for Benz.

Daimler's Smooth Ride May Not Extend to EVs

The road is unusually clear for luxury-car makers today, but there is traffic ahead.

Daimler reported a first-quarter operating profit of about €5.7 billion, equivalent to about \$6.8 billion, early Friday—it's highest quarterly number in at least 15 years—thanks to a high-octane performance from its Mercedes-Benz car division. The company reported key numbers ahead of full quarterly results next week.

The report continues the trend set by a very strong final quarter of 2020 for all of Germany's car makers. Customer demand has bounced back from last year's pandemic-related shutdowns much faster than vehicle production and manufacturers' fixed costs. As a result, car makers have far more pricing power over consumers than usual in an industry better known for overproduction.

The German players have the added benefit of big businesses in China, where the post-Covid recovery is looking firmly entrenched. The widely reported shortage in auto chips also seems to be affecting them less than

it is Detroit. That could change in the second quarter, but if it does that might simply extend the current period of undersupply and higher vehicle prices to the manufacturers' advantage.

This gives investors good short-

term reasons to own Daimler stock, which rose about 3% Friday, as well as its peers BMW and Volkswagen. But the horizon is clouded by the emergence of electric-vehicle technology. Mercedes's profits are driven by the brand's most pollutive sport-utility vehicles and top-end sedans, not by the EVs it needs to sell in increasing numbers to satisfy regulators and compete with a new breed of U.S. and Chinese competitors such as Tesla, NIO and XPeng.

On Thursday evening, after months of teasers, Mercedes took the camouflage off its new flagship EQS model, a high-end electric sedan that it is pitching as the EV equivalent of its top-of-the-range S-class. This is the start of a multiyear push that will test consumers' appetite for prestige EVs designed by the inventor of the gasoline engine.

Investors seem confident that Daimler will make the transition without much grating of gears—even that it will thrive. After roughly tripling since last year's lows, its market value is now equivalent to almost half of its annual revenue. At the same time, Tesla and EV startups such as Lucid Motors are raising billions of dollars of capital based on valuations that assume they will take market share away from the likes of Mercedes.

As the road gets more congested, there are bound to be disappointments—and probably some crashes.

—Stephen Wilmot



Whitman's Grass
The poet found a humble symbol for the power of democracy **C3**

REVIEW

THE WALL STREET JOURNAL.

The Age of Acrimony
Political tribalism
in a disrupted America,
1865-1915 **Books C7**



CULTURE | SCIENCE | POLITICS | HUMOR

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JON KRAUSE

The Airline Safety Revolution

No commercial airline in the U.S. has had a fatal crash since 2009. Here's the story of the industry insiders who came together to build new systems and to allay the worst fears of air travelers.

By Andy Pasztor

O

ver the past 12 years, U.S. airlines have accomplished an astonishing feat: carrying more than eight billion passengers without a fatal crash.

Such numbers were once unimaginable, even among the most optimistic safety experts. But now, pilots for domestic carriers can expect to go through an entire career without experiencing a single engine malfunction or failure. Official statistics show that in recent years, the riskiest part of any airline trip in the U.S. is when aircraft wheels are on the ground, on runways or taxiways.

The achievements stem from a sweeping safety reassessment—a virtual revolution in thinking—sparked by a small band of senior federal regulators, top industry executives and pilots-union leaders after a series of high-profile fatal crashes in the mid-1990s. To combat common industry hazards, they teamed up to launch voluntary incident reporting programs with carriers sharing data and no punishment for airlines or aviators when mistakes were uncovered.

The pioneers bucked deep-seated doubts from some insiders and outright opposition from pilots' groups worried about disciplinary blowback. By the end of the 1990s, the Federal Aviation Administration, plane maker Boeing Co., labor representatives and the largest U.S. airline trade association all endorsed the unified, data-driven safety agenda. Together, they devised steps to make it happen.

Their approach was simple in its fundamentals but wickedly difficult to implement at the start, requiring unprecedented levels of trust among the participants. During the early stages, representatives of pilots and carriers grudgingly agreed to share information with each other, as well as with the government, regarding budding hazards and near-crashes. Tentative cooperation was dependent on FAA pledges that good-faith mistakes and procedural violations wouldn't result in enforcement actions.

The results have been remarkable. In 1996, before the safety reboot began, U.S. carriers had a fatal accident rate of roughly one crash for every two million departures. That year alone, more than 350 people died in domestic airline accidents, including 230 in the infamous fuel-tank explosion on TWA Flight 800 that sucked scores of passengers out of the fractured fuselage. Within 10 years, the fatal accident rate had been reduced by more than 80%, beating a goal set by a White House commission.

Today's travelers are benefiting from another decade-plus of improved safety for U.S. carriers, and the fatality rate has been driven down to one for every 120 million departures. (The single passenger death in the past dozen years was from an engine fan blade coming apart during a 2018 flight.) Yet neither the scope nor the significance of the underlying changes, expanded year after year with little fanfare, is generally recognized by the flying public.

"The magnitude of the improvement has far exceeded my expectations," said Randy Babbitt, head of the FAA from 2009 to 2011. Please turn to the next page

Mr. Pasztor, who is writing a book about the history of air safety, recently retired from The Wall Street Journal, where he had covered aviation since the 1990s.

Inside

RELIGION

In Islamic thought, the relationship between God and goodness is a theological question with important social repercussions. **C4**



Octopus Minds

Does the marine creature's peculiar eight-armed thinking help to explain our own brains? **C4**

FOOD

Scientists are on the verge of isolating a taste that gives food a satisfying richness. **C5**



WEEKEND CONFIDENTIAL

Rhodes Scholar Jory Fleming is challenging assumptions about autism. **C6**



REVIEW

The Airline Industry's Long Path to Safer Skies

Continued from the prior page

who previously championed many of the early advances as president of North America's largest pilots union. The payoff turned out to be so dramatic overall, he added, "It's almost like buying a lottery ticket for 10 bucks and winning the jackpot."

Leaps in technology played a role, dramatically enhancing jet engine reliability over many years. Electrical and other aircraft systems became more durable and trouble-free due to upgraded designs and components. Improvements in cockpit automation provided stronger safeguards against crew errors, while increasingly sophisticated ground-based simulators made aviator training more rigorous and realistic.

But other factors produced the greatest progress. Overseas, where new-generation aircraft proliferated but voluntary reporting wasn't embraced, safety numbers have improved but to nowhere near the degree among American carriers. The astonishing safety record in the U.S. stems most of all from a sustained commitment to what was at first a controversial idea. Together, government and industry experts extracted safety lessons by analyzing huge volumes of flight data and combing through tens of thousands of detailed reports filed annually by pilots and, eventually, mechanics and air-traffic controllers. Responses led to voluntary industry improvements, rather than mandatory government regulations.

Recently, Boeing's 737 MAX jet debacle has partly overshadowed the results of this safety revolution. Two MAX crashes less than five months apart in 2018 and 2019 created a crisis for the Chicago-based plane maker and rekindled public fears about commercial aviation. But those accidents involved overseas carriers and primarily foreign victims, leaving the safety record of domestic airlines intact.

The safety shift in the U.S. began after a series of airborne tragedies leading up to the peak in 1996. Accidents in 1994 involving widely used Boeing and McDonnell Douglas jets operated by USAir, as well as two smaller turboprop aircraft, took 252 lives altogether. Then in December

takes made over and over, but nobody talked about them" until it was too late, according to Mr. Babbitt, who was then president of the Air Line Pilots Association.

High-level safety officials from Boeing, union chiefs at the pilots association and leaders of the U.S. industry's main trade group sketched out a startling trend. If accident rates remained the same while global passenger traffic continued growing at projected rates, on average there would be at least one major jet crash a week by 2015, producing hundreds of fatalities somewhere around the globe.

So the principals set about developing new tactics to counter incipient dangers long before they turned into headline-grabbing tragedies. Ultimately, mechanics and air-traffic controllers embraced similar self-reporting programs. "It was an incredible breakthrough," according to Ray Valeika, former head of engineering and maintenance at Delta. "We actually patted people on the back" for divulging mistakes. "But if management found it and you didn't tell us," he added, "then you could lose your job."

Early successes revealed common pilot errors, such as veering from assigned altitudes due to distractions or failing to properly position wing flaps and other flight-control surfaces for takeoffs. Some solutions were as simple as having the flight crew physically point to cockpit computers—which control altitude changes, for instance—while both pilots double-checked out loud that the correct information had been entered.

Voluntary revisions to internal airline rules proved faster and less obtrusive than changes imposed by regulators. The new strategies coincided with recommendations of the blue-ribbon White House commission, led by then-Vice President Al Gore. The commission's 1997 report supported the concept of voluntary data sharing, endorsing industry-government partnerships to better coordinate information by "seeking to replace confrontation with cooperation."

Airlines later developed more complex solutions to prevent dangerous piloting errors in which planes approached runways too fast, descended too rapidly or landed too far down runways to brake safely. Strict self-imposed rules by carriers required crews to abandon approaches under such conditions, leaving enough time to safely climb away from the field.

The promise of the approach was best summed up by Nick Sabatini, the FAA's top safety official from 2001 to 2009, who would reassure audiences at safety conferences: "The data will set you free." He urged greater reliance on information gleaned from routinely downloading and examining incident details from flight-data recorders. As the efforts gained momentum, airlines could compare themselves with competitors or the entire industry.

Predictably, there were squabbles and threats to scale back or end voluntary reporting. Delta, for example, temporarily pulled out of voluntary arrangements, contending the FAA was reneging on promises to forego en-



Above, investigators examine an engine on which a fan blade fractured in flight on a Southwest Airlines plane in 2018, causing the only passenger fatality aboard a U.S. airline in the past 12 years. Left, part of the wreckage of TWA Flight 800's crash in 1996.

forcement cases. Some high-ranking FAA officials who succeeded Mr. Sabatini angered pilots by complaining that voluntary, non-punitive reporting agreements sometimes amounted to a "get out of jail free" card for careless aviators.

Such programs take time to build, "but one false step can really bring them down in a day," Gabriel Acosta, global head of operational safety for the leading international airline trade group, told a conference last month.

Despite stumbles, collaborative arrangements survived and thrived. Delta rejoined the partnership after a couple of years, and participants got better at meeting the challenges of handling an avalanche of data. Over time, the efforts turned into ever more sophisticated data-collection and dissemination programs. The focus continued to be the pinpointing of accident precursors—such as inappropriate pilot responses to engine problems, or loss of control caused by unusual maneuvers.

Part of the industry's motivation was self-preservation. A lone jumbo jet crash with mass fatalities, according to industry estimates, can amount to a financial hit of nearly \$1 billion, including insurance payouts, additional legal liabilities, lost business and reputational damage.

In 2006, the data-driven method publicly demonstrated its value following the deadly crash of a Comair commuter plane trying to take off from the wrong runway at Lexington, Ky. The FAA scrubbed various databases to evaluate the extent of comparable hazards elsewhere. After analyz-

ing years of pilot reports of similar runway confusion at other fields, the agency ordered improved signs, better tarmac markings and extra pilot warnings to prevent crews from inadvertently lining up for departure on an incorrect or dangerously short strip.

As the number of accidents dwindled, however, each one sparked more public scrutiny. In February 2009, distracted and inadequately trained pilots of a Colgan Air turboprop failed to recover from a stall approaching the Buffalo, N.Y., airport. The otherwise perfectly functioning aircraft plunged to the ground, killing 50 people.

That was the last deadly U.S. accident until April 2018, when a fan blade on a Southwest Airlines Co. jet ruptured at 32,000 feet. The engine's front cover was blown off and shrapnel punctured the fuselage; the plane landed safely but a passenger seated by a window sustained fatal injuries. There have been no fatalities on U.S. carriers since then.

Both accidents, nine years apart, prompted intense publicity, congressional criticism and a flurry of regulatory action. But throughout the period, a second industry-government safety push was intensifying. Safety experts further expanded data

sharing by combining detailed written reports from pilots with radar information from air-traffic control and other data. This entailed analyzing information from tens of millions of flights and many more radar tracks, spanning multiple years.

As this follow-up initiative launched, "there was a high degree of skepticism that it would ever succeed," says Hassan Shahidi, president and chief executive of the Flight Safety Foundation, a global, nonprofit advocacy group. He was previously at Mitre Corp., which oversees the storehouse of voluntary safety information submitted by airlines and their employees. The common refrain from both industry and labor, Mr. Shahidi recalled, was "we will give you 24 months." By then, "we need to have a few examples of actually identifying and mitigating risks."

Soon enough, the stepped-up data analysis prompted changes to questionable flight paths that sometimes brought jetliners dangerously close to hilltops on approaches to

Oakland, Calif. The result was new approach procedures and more accurate topographical data loaded into the collision-warning systems on planes.

All told, the FAA has established a total of 10 separate, voluntary reporting or data-sharing programs, covering everyone from airport workers to FAA engineers to technicians who maintain the agency's traffic-control equipment. Voluntary changes adopted in the U.S. include, among other things, more extensive pilot training to understand warning signs when flight-control computers are set improperly or when airplanes are approaching an incorrect runway, how to adjust engine settings to prevent internal ice buildup and using cockpit radars more effectively to avoid turbulence in clear weather. Over the years, airlines also have refined data systems to help spot troublesome engine reliability trends earlier and alleviate hazards posed by pilot fatigue.

From Europe to Asia to Latin America, Mr. Shahidi said "everybody is now trying to copy the U.S."

Recently, however, some red flags have appeared. Airlines and independent safety experts have warned that the manual flying skills of many pilots are eroding, primarily because most crews rely on autopilots for all but a few minutes of each trip. Experts believe that overreliance on autopilots

can reduce the hand-eye coordination of pilots and their confidence in the unlikely event that automated systems go haywire.

For all its usefulness, data sharing remains vulnerable to abuse. Last year, the Transportation Department's inspector general sharply criticized

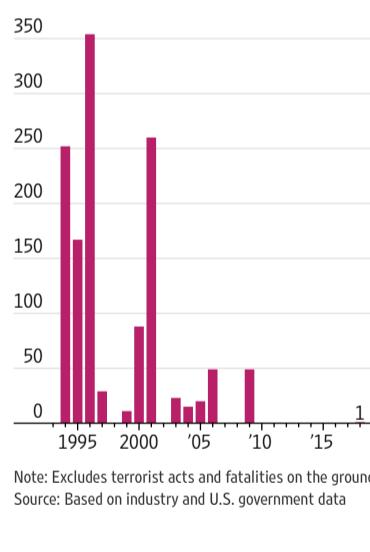
Southwest Airlines management for impeding FAA oversight. Management and agency lapses resulted in Southwest carrying roughly 17 million passengers on more than 150 jets with suspect maintenance records, the auditors found. The same report disclosed repeated hazardous landing attempts by a Southwest jet amid gale-force winds that ended with both wingtips striking a Connecticut runway in 2019. FAA investigators complained about the airline's level of cooperation. A Southwest spokeswoman said the carrier maintains a culture of

compliance and transparency with the FAA, including mechanisms to report concerns without fear of repercussions, "recognizing the safety of our operation as the most important thing we do."

Other carriers have sought to keep FAA officials from fully participating in data exchanges or probes of potentially dangerous operational slip-ups. Outside safety experts contend that excluding regulators violates the spirit of voluntary reporting and could result in creeping industry complacency.

Despite the sterling record of U.S. airlines, FAA chief Steve Dickson has stressed the need to expand voluntary reporting to include the design and manufacture of jetliners in order to shore up public confidence in the wake of the 737 MAX tragedies. "I don't think that you ever stop trying to earn the trust of the public," he told reporters in September after personally test-flying the revamped MAX.

"No matter what we have done in the past, or what we are doing now," he said "that's never going to be good enough."



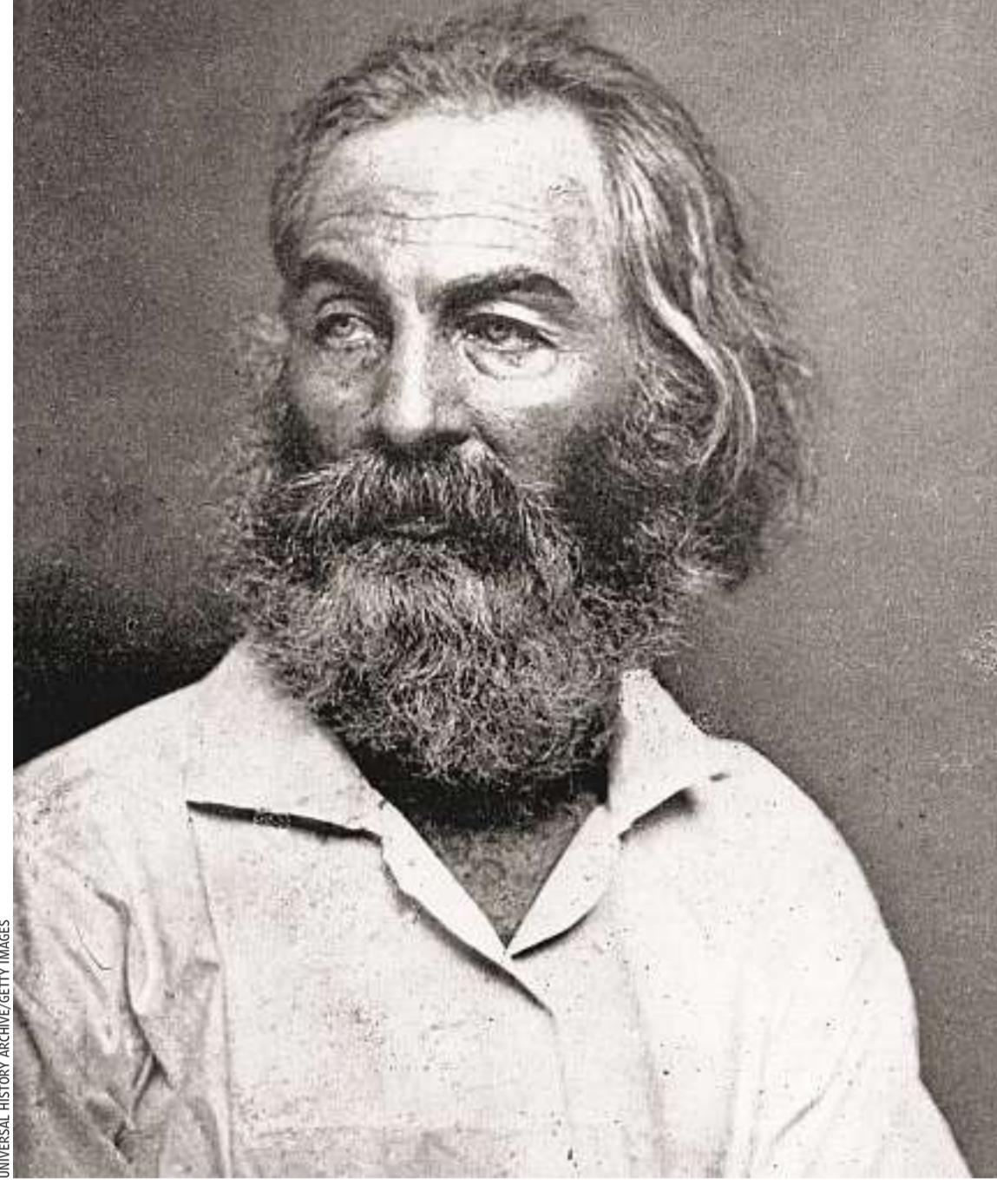
1995, an American Airlines jet slammed into a mountain while approaching Cali, Colombia, killing 151 people. A ValuJet aircraft caught fire and plummeted into the Florida Everglades five months later, with 110 deaths. Two more fatalities stemmed from an engine failure on a Delta Air Lines MD-88 taking off from Pensacola, Fla.

Regulators and industry players recognized that changes were essential. "We were seeing the same mis-



Travelers crisscross a JFK Airport terminal in New York City on a typically busy Wednesday in 2017.

REVIEW



UNIVERSAL HISTORY ARCHIVE/GETTY IMAGES

BY MARK EDMUNDSON

When Walt Whitman began conceiving his great volume of poetry, "Leaves of Grass," in the 1850s, American democracy was in serious danger over the issue of slavery. As we celebrate National Poetry Month this month, the problems facing our democracy are different, but Whitman still has a great deal to teach us about democratic life, because he saw that we are perpetually in danger of succumbing to two antidemocratic forces. The first is hatred between Americans, which Whitman saw erupt into civil war in 1861.

The second danger lies in the hunger for kings. The European literature and culture that preceded Whitman and surrounded him when he wrote "Leaves of Grass" was largely what he called "feudal": It revolved around the elect, the special, the few. Whitman understood human fascination with kings and aristocrats, and he sometimes tried to debunk it. But mostly he asked his readers to shift their interest away from feudalism to the beauties of democracy and the challenge of sustaining and expanding it.

This challenge is what inspired him to find his central poetic image for democracy, the grass: "A child said, What is the grass? fetching it to me with full hands." Whitman says that he can't and won't offer a

What Whitman Knew About Democracy

For the great American poet, the peculiar qualities of grass suggested a way to resolve the tension between the individual and the group.

literal answer to the question. Instead he spins into an astonishing array of "guesses." The grass "is the flag of my disposition, out of hopeful green stuff woven"; it's "the handkerchief of the Lord...Bearing the owner's name somewhere in the corners, that we may see and remark and say Whose?"

To Whitman, "the grass is itself a child...the produced babe of the vegetation." "Tenderly will I use you, curling grass," he writes. "It may be that you are from old people and from women, and from offspring

taken soon out of their mothers' laps/And here you are the mothers' laps." He offers one metaphor for the grass after another, and one feels that he could go on forever.

But mainly Whitman's grass signifies American equality: "I guess it is a uniform hieroglyphic,/And it means,/Sprouting alike in broad zones and narrow zones,/Growing among black folks as among white,/Kanuck, Tuckahoe, Congressman, Cuff,/I give them the same, I receive them the same."

Whatever our race and origin, whatever our station in

From 'Song of Myself' by Walt Whitman

A child said What is the grass? fetching it to me with full hands; How could I answer the child? I do not know what it is any more than he.

I guess it must be the flag of my disposition, out of hopeful green stuff woven.

Or I guess it is the handkerchief of the Lord, A scented gift and remembrancer designedly dropt, Bearing the owner's name somewhere in the corners, that we may see and remark, and say Whose?

Or I guess the grass is itself a child, the produced babe of the vegetation.

Or I guess it is a uniform hieroglyphic, And it means, Sprouting alike in broad zones and narrow zones, Growing among black folks as among white, Kanuck, Tuckahoe, Congressman, Cuff, I give them the same, I receive them the same.

life, we're all blades of grass. But by joining together we become part of a resplendent field of green, stretching gloriously on every side.

Whitman found a magnificent metaphor for democratic America and its people. Like snowflakes, no two grass blades are alike. Each one has its own being, a certain kind of chlorophyll-based

An 1862 photograph of Walt Whitman.

individuality. Yet step back and you'll

see that the blades are all more like

each other than not.

Americans, too, are at least as much alike as we are different, and probably more so. America is where we can be ourselves and yet share deep kinship with our neighbors.

And who are our neighbors? Kanuck, Congressman, Tuckahoe, Cuff—Canadian, legislator, Virginia planter, Black man, all of the teeming blades of grass that we see around us.

When you stand back far enough,

you can't see any of the individual blades, but look closer and there

they are—vibrant and unique, no two alike. We say "e pluribus unum," from many

one. But who could have envisioned what

that would look like and how it would feel before Whitman came along?

The grass is Whitman's answer to the

problem that bedeviled his contemporary

Ralph Waldo Emerson:

how to resolve the ten-

sion between the indi-

vidual and the group.

Emerson is sometimes hopeful that

the two can cohere. When you speak

your deep and true thoughts, no

matter how controversial, he be-

lieved that in time the mass of men

and women will come around to you.

Each will say, "this is my music, this

is myself," Emerson says in "The

American Scholar." But mostly he is

skeptical, believing that society is al-

most inevitably the enemy of genius

and individuality.

Whitman's image of the grass

suggests that the one and the many

can merge, and that discovery allows

him to imagine a world without sig-

nificant hierarchy. Can any one blade

of grass be all that much more im-

portant than any other? When you

make the grass the national flag, as it were, you get to love and appreciate all the people who surround you. You become part of a community of equals. You can feel at home.

In "Leaves of Grass," soon after he offers his master metaphor Whitman rises up to view American democracy from overhead. The poem's famous catalogues of people doing what they do every day are quite simple: "On the piazza walk five friendly matrons with twined arms;/ The crew of the fish-smack pack repeated layers of halibut in the hold,/ The Missourian crosses the plains, totting his wares and his cattle,/ The fare-collector goes through the train—he gives notice by the jingling of loose change."

This is your family, these are your sisters and brothers, Whitman effectively says. In general, we walk the streets with a sense of isolation. But if we can move away from our addictions to hierarchy and exclusive individuality, and embrace Whitman's trope of the grass, our experience of day-to-day life can be different. We

can look at those we pass and say not "That is another" but "That too is me. That too I am." Or so Whitman hopes.

Of course, the benefits that Whitman promises do not come for free, or simply by reading his poem. We've got to meet his vision halfway, by being amiable, friendly, humane and nonhierarchical. This repudiation of

hierarchy is not so easy; it's not clear that even Whitman himself pulls it off. Isn't he trying to be a great poet, the first truly American bard? But his effort matters. He knew that democracy is always vulnerable, that the best hope for human happiness could disappear from the earth. But Whitman would not let that happen without a fight.

Mr. Edmundson is a professor of English at the University of Virginia. This essay is adapted from his new book "Song of Ourselves: Walt Whitman and the Fight for Democracy," published this week by Harvard University Press.



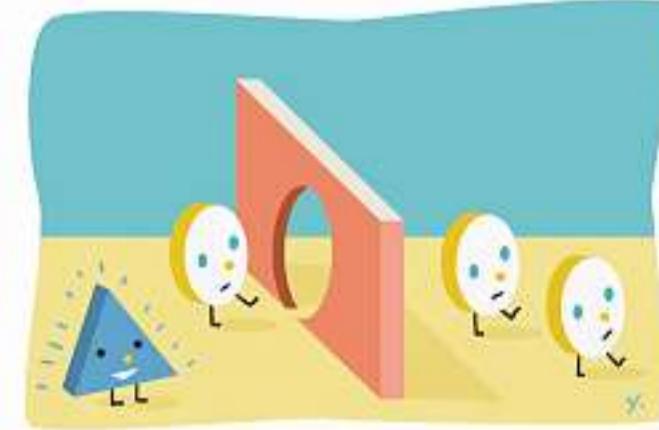
WORD ON THE STREET

BEN ZIMMER

The Idea In the Middle of The NFT Sensation

THE LATEST INTERNET TREND is uniting such disparate worlds as art, sports, music and gaming in an investment frenzy: "non-fungible tokens," or "NFTs" for short.

NFTs are a kind of digital as-



collectibles or music albums. Even a tweet can be monetized with an NFT: Twitter founder Jack Dorsey auctioned off his first post to the site for \$2.9 million.

In the three initials that make up the name, the N for "non" and the T for "token" are straightforward enough, but what about that F for "fungible"? It takes a term long known in economics and updates it for 21st-century digital natives.

What makes NFTs special is that each one represents something unique, and not interchangeable with anything—in other words, not "fungible." That distinguishes them from cryptocurrencies like bitcoin, which are fungible—interchangeable—even though they use the same block-

chain technology as NFTs.

"Fungible" goes back to the Latin word "fungibilis" meaning "useful," in turn from the verb "fungi" meaning "to perform."

The same root gives us such words as "function" and "perfunctory." (Even though it looks like "fungus" and its plural "fungi," there's no etymological connection; "fungus" has a different Latin root.)

One use of the Latin verb was in the phrase "fungi vice," meaning "to take the place of."

(Somewhat like "vice versa" means "the other way around.")

That usage led to the classification of "res fungibles," or things

that can be readily interchanged with similar things. In English,

"fungible" entered legal and fi-

nancial circles in the 17th cen-

tury for contracted goods that could be replaced by equivalents without breaking the contract, such as a quantity of grain that could be substituted with an equal amount of similar grain.

The earliest example for "fungible" given by the Oxford English Dictionary is from a 1649 treatise by the British political theorist Anthony Ascham, "Of the Confusions and Revolutions of Government." In a passage on the value of money, Ascham

wrote, "Take away this fungible instrument from the service of our necessities, and how shall we exercise our Charity?"

If some things are categorized as "fungible," then it follows that everything else is "non-fungible." Such a divide began appearing in the

mid-19th century, as in the 1855 book "An Introduction to the

Study of Jurisprudence" by the German jurist Anton Friedrich Justus Thibaut, which explains

that a "very important division

of things is that into fungible

and not fungible."

A few decades later, in 1884, the American legal scholar Henry Taylor

Terry expanded on the dichotomy between "fungible and

non-fungible things."

Fast-forward to four years

ago, when crypto aficionados started applying blockchain technology to create unique digital collectibles, like little cartoon cats known as CryptoKitties. With the terminology for such assets in flux, Pierre Entremont of the Paris-based venture firm Frst tweeted on Aug. 26, 2017, "Request for Protocol: a framework to tokenize assets and create non-fungible tokens. Highly needed from legal and conceptual standpoints."

Independently, Dieter Shirley, co-founder of the Canadian studio Dapper Labs (creator of CryptoKitties), was hatching just such a protocol to standardize assets on the Ethereum blockchain. Mr. Shirley's draft for a "Non-Fungible Token Standard," dated Sept. 22, 2017, introduced the now-standard lingo of NFTs.

Mr. Shirley told me by email that he "spent quite a bit of time trying to find better terms to use." The initialism "NFT," he figured, would at least provide "a term that wasn't quite so unwieldy to use in conversation." It has certainly been a boon to headline writers, who can report on the latest in NFTs without worrying about the intricacies of fungibility.

JAMES YANG

Fungible

set that results from using the technology that powers cryptocurrency to make unique tokens, each with its own identification that can't be replicated. They serve as a kind of deed proving ownership for original editions of various digital artifacts—whether works of art, sports

REVIEW

MIND & MATTER

ALISON GOPNIK

The Many Minds of the Octopus



CEPHALOPODS are having a moment. An octopus stars in a documentary nominated for an Academy Award ("My Octopus Teacher"). Octos, as scuba-diving philosopher Peter Godfrey Smith calls them, also play a leading role in his marvelous new book "Metazoa," alongside a supporting cast of corals, sponges, sharks and crabs. (I like Mr. Godfrey-Smith's plural, which avoids the tiresome debate over Latin and Greek endings).

Part of the allure of the octos is that they are both very smart, probably the smartest of invertebrates, and extremely weird. The intelligence and weirdness may be connected and can perhaps teach us something about those other intelligent, weird animals we call homo sapiens.

Smart birds and mammals tend to have long lives and an especially long, protected childhood. Crows and chimps put a lot of work into taking care of their helpless babies. But, sadly and strangely, the intelligent octos only live for a year and don't really have a childhood at all. They die soon after reproducing and, like the spider heroine of "Charlotte's Web," don't even live to see the next generation grow up, let alone to look after them.

Smart birds and mammals also keep their neurons in one place—their brains. But octos split them up. They have over 500 million neurons altogether, about as many as dogs. But there are as many neurons altogether in their eight arms as in their heads. The arms seem able to act as independent agents, waving and wandering, exploring and sensing the world around them—even reaching out to the occasional diving philosopher or filmmaker. Mr. Godfrey-Smith's book has a fascinating discussion of how it must feel to have this sort of split consciousness, nine selves all inhabiting the same body.

I think there might be a link between these two strange facts of octopus life. I've previously argued that childhood and intelligence are correlated because of what computer scientists call the "explore-exploit" trade-off. It's very difficult to design a single



TOMASZ WALENTA

system that's curious and imaginative—that is, good at exploring—and at the same time, efficient and effective—or good at exploiting. Childhood gives animals a chance to explore and learn first; then when they grow up, they can exploit what they've learned to get things done.

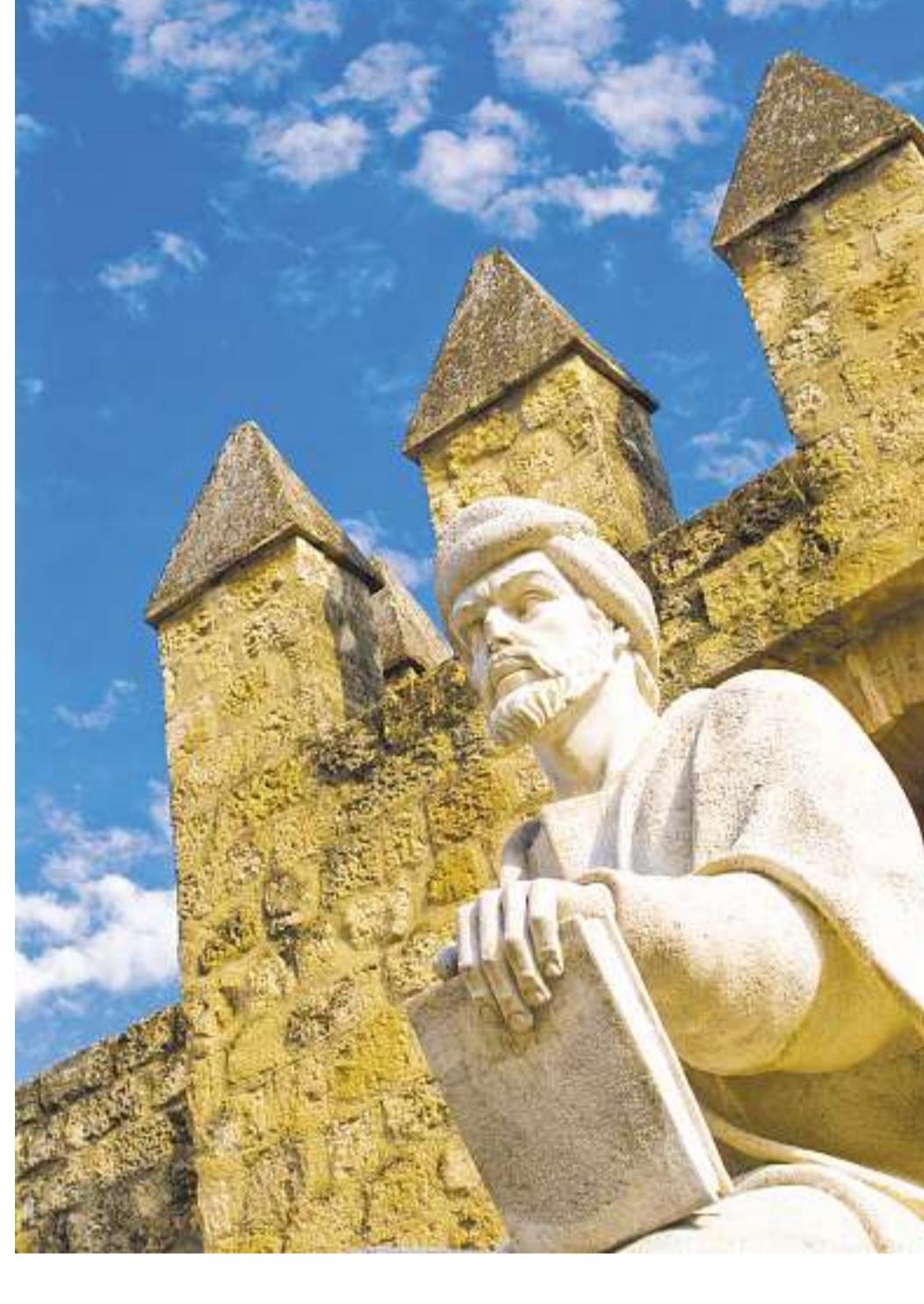
Childhood isn't the only way to solve the explore-exploit problem. Bees, who, like octos, are smart but short-lived, use a division of labor, with scouts who explore and workers who exploit. But octos are much more solitary than bees.

The evolutionary path that led to the octos diverged from the human one hundreds of millions of years ago, before the first animal crawled out of the sea. They must have developed a different way to solve the explore-exploit dilemma. Perhaps their eight-plus-one brains serve the same function as the different phases of human development, or the different varieties of bees. The playful, exploratory arms can come under the control of the brain when it's time to act—to mate, feed or flee. The head might feel kind of like a preschool teacher on an outing, trying to corral eight wandering children and to get them to their destination. (Imagine if your arms were as contrary as your 2-year-old!)

We grown-up humans may not be so different. Human adults are "neotropical apes," which means we retain more childhood characteristics than our primate relatives do. We keep our brains in our heads, but neuroscience and everyday experience suggest that we too have divided selves. My grown-up, efficient prefrontal cortex keeps my wandering, exploratory inner child in line. Or tries to, anyway.

Where Islam And Reason Meet

A medieval debate about God's relationship to goodness can help explain today's conflicts over religion and society in the Islamic world.



By MUSTAFA AKYOL

The Western public has become accustomed to hearing certain kinds of unsettling news from parts of the Muslim world. Pakistani Islamists hunt some innocent person for "blasphemy." The Iranian regime makes a Christian convert rot in jail for "apostasy." Saudi Arabia gives brutal corporal punishments to liberal activists, whose only "crime" is to offend God—or at least those who rule in His name.

All these laws look oppressive to most non-Muslims. Many Muslims feel the same way, which is why many prefer secular governments, keeping their faith personal and communal. Some call for a major reform within Islam. A small but growing minority, who lose all faith, become ex-Muslims.

Yet for zealous guardians of the Sharia, or Islamic law, modern responses to such verdicts carry no weight. They believe that a much higher authority, God, is on their side, somehow never doubting whether they are on His side. Calls for reform make them even more defiant, since they are only able to see the opinions of outsiders as whims and seductions.

As a Muslim who has been engaging with these issues for more than two decades, I have sadly observed the growing ethical gap between rigid, Sharia-minded conservatives and the modern world. I have also come to realize that this deadlock won't be overcome by endlessly wrestling over what exactly the Qur'an or the Prophet Muhammad said on this or that matter. Such discussions about the textual sources of the Sharia are important, but there is an even more important layer that lies beneath. This is *kalam*, or Islamic theology, and especially a mostly forgotten dispute in that theology over the meaning of *husn* and *qubh*, literally, "beauty" and "ugliness," or "good" and "bad."

Muslims began to discuss this matter in the 8th century, a cen-

tury after the Prophet, as they were trying to make sense of their faith and the empire they were establishing in its name. All agreed that God commands what is good, such as helping a person in need, and prohibits what is bad, such as murder. But a puzzling question soon arose: Does God command or prohibit things because they are inherently good and bad? Or are things good and bad simply because God decreed so?

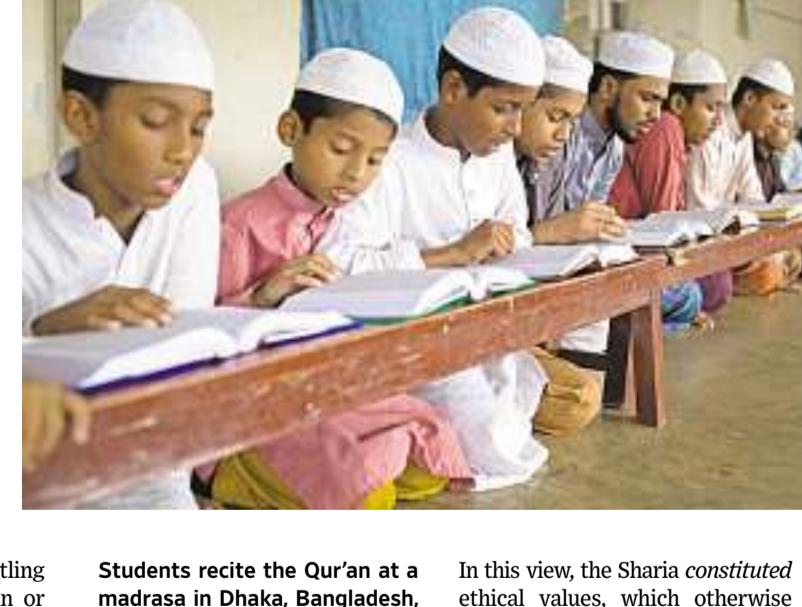
Students of Western philosophy may find the question familiar, because the first person to pose it was the Greek philosopher Socrates, in his famous dialogue with Euthyphro. The question became known as the Euthyphro dilemma, and it presented two options to any theology.

The first is "ethical objectivism," meaning that God's commandments are based on objective

A statue of the 12th-century Islamic philosopher Averroes in Cordoba, Spain.

lian philosophers such as Ibn Rushd (d. 1198), also known as Averroes. In their view, the Sharia indicated ethical values that could be known by humans through reason and conscience. When there was a conflict between ethical values and the Sharia, the latter could be reinterpreted.

In contrast, divine command theory was championed by the theological school called the Ash'arites. They believed that acts are good or bad simply because God says so. "Lying is wrong, since [God] declares it to be wrong," declared the founder of the school, al-Ash'ari (d. 936). "[But] if He were to command it, there would be no argument to the contrary."



Students recite the Qur'an at a madrasa in Dhaka, Bangladesh, 2018.

ethical principles that we humans can understand. The second is "divine command theory," meaning that God commands whatever He wills and ethical principles follow His will, not the other way around.

In early Islam, ethical objectivism was championed first by the theological school called the Mu'tazilites and later by Aristotle.

mand theory became the dominant religious mind-set.

Was this victory because Ash'arism was more true to the heart of Islam, the Qur'an? Not really, because the Qur'an offers a stronger basis for ethical objectivism. It often simply commands believers to act justly, without further explanation, implying that people have an innate sense of it. It also speaks of goodness as *ma'ruf*, or "the known"—known by reason, not necessarily by revelation.

The real advantage of Ash'arism was in something else: Its usefulness to the despotic rulers who dominated medieval Islam. Unlike the Mu'tazilites, who were skeptical of power, the Ash'arites sang the praises of "obedience to the rulers." Unsurprisingly, the rulers upheld them, forming an alliance between the state and religious scholars that political scientist Ahmet Kuru highlights in his notable 2019 book, "Islam, Authoritarianism and Underdevelopment."

Ash'arism's grip on Islam was criticized decades ago by the

Are things inherently good or bad, or simply because God decreed so?

prominent Pakistani scholar Fazlurrahman Malik, whose liberal reformist views were condemned by militants in his country. "The standard dogma of Sunni theology," he observed, rested on "a patent denial of faith in the intellectual and moral powers of man." Humans were considered "incapable of knowing anything true or doing anything good without being commanded on authority." The consequence was an insular worldview and a literalist jurisprudence that "did not allow further growth and development."

Yet the world has grown and developed in the past few centuries. Modernity brought new thinking not just about science and technology but also about ethical values such as freedom of conscience and equality before the law. Could Muslims accept these insights?

An interesting test case was the Muslim reaction to the greatest moral progress in modern history, the abolition of slavery. When the idea, and the pressure, came to the Muslim world from Britain in the mid-19th century, Islamic liberals embraced it and even found inspiration in the Qur'an's moral call for "freeing a neck." But Islamic traditionalists strongly objected. First, because no moral wisdom could ever come from the infidels. Second, because the Sharia, which had mitigated but also justified slavery, could never change. No wonder slavery legally continued in Saudi Arabia until 1962 and in Mauritania until 1981.

It is worth noting that Western powers such as Britain came to Muslims with humane ideals such as abolition but also with inhumane agendas such as colonialism. They even used ideals as a pretext for colonialism.

As many Muslims remember today, France brutalized Algeria for 130 years while claiming to "civilize" it. This grim history has been a big part of the problem. Yet there is also the other side of the coin: Islamists have used anti-colonialism as their own pretext for rejecting modern standards of human rights and justifying their own brutalities.

The way forward for Islamic thought lies in revisiting the Islamic Euthyphro dilemma and correcting a wrong theological turn taken almost a millennium ago. Only then can Islamic civilization again embrace universalism, which was the secret of its long Golden Age from the 8th to the 13th centuries. With the help of reason, the Sharia can be interpreted to support humanity's perennial quest for freedom and justice—as I believe it was meant to do—instead of being used as a bulwark against them.

This essay is adapted from Mr. Akyol's new book, "Reopening Muslim Minds: A Return to Reason, Freedom and Tolerance," published by St. Martin's. He is a senior fellow on Islam and modernity at the Cato Institute.

REVIEW

By ROB DUNN AND MONICA SANCHEZ

In 1907, while enjoying a bowl of soup made with dashi broth and kombu seaweed, the Japanese chemist Kikunae Ikeda had an insight that would change the culinary world. He noticed a taste that wasn't sweet, salty, sour or bitter. Ikeda gave this hard-to-describe savory taste a name—umami—and went on to identify the specific amino acid that triggered it.

Scientists in Europe and the U.S. remained skeptical about whether umami really was a taste until a receptor for it was discovered on the tongue almost a century later, in 2000. Today, it is taken for granted by most scientists and chefs, but interest is now growing in another taste first detected in Japan.

The newer taste, kokumi, is even harder to describe than umami, but it is potentially just as important for understanding how and why we enjoy food. In Japanese, the term *koku* describes foods that have the kind of mouthful "thickness" often imparted by fats—what English speakers might describe as rich. "It feels like a physical sensation," says the culinary scientist Joshua Evans.

It works "by coating the mouth and becoming more intense and being extended in time." When asked what foods have *koku*, Japanese food experts list wild boar, adult wasps, duck eggs and aged sake, as well as long-simmered and fermented dishes.

Koku reflects a sensory experience most closely allied with touch, influenced by aromas and textures. Adding the Japanese suffix *-mi*, meaning taste, highlights the specific taste detected by the tongue. The precise nature of *kokumi* remains the subject of great debate among sensory scientists and chefs, in part because it can't be detected on the palate on its own; rather, it modifies other tastes and flavors.

The earliest *kokumi* research focused on the contribution of garlic to foods. In 1990, Japanese scientist Yoichi Ueda discovered that if he added diluted garlic to two types of soups, people eating them would describe having more sensations associated with *kokumi*. Subsequent research isolated amino acids in the garlic that seemed to cause the effect, including glutathione.

A Japanese lab claims to have identified the taste receptor triggered by glutathione, and scientists elsewhere have discovered that glutathione and other compounds appear to trigger *kokumi* in yeasts and in other foods. These include long-cooked meats such as chicken in chicken broth; some cheeses, such as Blue Shropshire, Gouda and Parmesan; and fermented foods like beer, soy sauce and fish paste.

Some sensory scientists remain skeptical. Paul Breslin, a nutritional sciences professor at Rutgers University, contends that the term *kokumi* will be difficult to understand and use "until the scientific and nonscientific community can agree both on its definition and on the prototypical eliciting stimuli"—that is to say, until we know more.

For all the uncertainty, *kokumi* has two potentially important implications. The first relates to our understanding of human evolution; the second, human health—especially efforts to create foods with



ROBERT NEUBECKER

Is Kokumi the Next Taste Sensation?

Chefs and scientists are investigating a new flavor from Japan that promises richness without fat and may find an official place on our palate.

fewer calories but more flavor. In both cases, *kokumi* may provide a kind of missing link.

Our own research suggests that one key to the adoption of fire by humans, and the invention and adoption of fermentation, was the flavor of cooked and fermented foods. It is known that humans (as well as dogs, gorillas and chimpanzees) prefer cooked foods over raw foods. Humans also tend to prefer

We might picture an ancient human ancestor holding up a piece of meat that has been cooked on the fire, pleased by its aromas but also by the rich mouthfeel of its *kokumi*. Our ancestors didn't have to be able to give *kokumi* a name or know its chemical sources to enjoy it.

Chef-researchers employed by top restaurants, such as Nabila Rodríguez Valerón at Copenhagen's award-winning Alchemist, are now eagerly experimenting with the ways in which *kokumi* could be featured in modern meals to make foods that taste rich but are low in fat. A recent study by Ciaraán Forde at the Clinical Nutrition Research Center in Singapore discovered that if the amino acid associated with *kokumi* is added to beef broth, particularly in combination with umami flavors, consumers perceive the broth to be richer and to have more calories.

Many traditional recipes from cultures around the world appear to already take advantage of this *kokumi* effect. For example, adding onion and garlic to soup stock to give it a fuller, deeper flavor. Often recipes start with a step in which chopped onions are soaked in fat or oil, in effect amplifying the flavors of those fats and oils. *Kokumi* is a taste that asks us to think of food holistically.

If the history of umami is any indication, the market will decide

on *kokumi*'s importance before scientists and chefs come to full agreement. After Ikeda discovered umami, he went on to figure out how to produce a substance that triggered the taste: monosodium glutamate, or MSG. He patented the production, and long before scientists accepted his discovery, MSG was sold around the world to add the umami taste to foods. (The company he started, Ajinomoto Co., Inc., now employs tens of thousands of people).

A similar pattern may already be under way with *kokumi*. To this point, three companies, Ajinomoto itself and the food and flavor companies Kerry and Biospringer, have released *kokumi* powders that they say add the pleasing *kokumi* effect without adding calories. You can try them and judge for yourself.

Kokumi is unlikely to be the last new taste that we discover. Around the world, scientists have leads on many others. Our mouths remain full of mysteries, allowing us to experience surprises and delights each time we eat.

Dr. Dunn is a professor of applied ecology at North Carolina State University, and Ms. Sanchez is a medical anthropologist. This essay is adapted from their new book, "Delicious: The Evolution of Flavor and How It Made Us Human," published by Princeton University Press.

EXHIBIT

Vane Endeavors

ANY SELF-RESPECTING FARMER can raise a wet finger to find out how the wind is blowing. Though weathervanes have been around for millennia, they have always been more decorative than practical, writes Robert Shaw in the new book "American Weathervanes: The Art of the Winds" (Rizzoli Electa), published to accompany an exhibition opening in June at the American Folk Art Museum in New York.

The book surveys four centuries of vanes by American craftsmen, in the shape of dragons, eagles, angels, champion racehorses, foxes, witches, snakes and cows. Even the Founding Fathers got into the act: In 1787, George Washington, in a pacific mood, asked a vane maker to create a gilded dove with an olive branch in its mouth.

During the Gilded Age, vane-making reached new heights—and sizes. Around 1874, the Curlew Bay social club in Seaville, N.J., topped its barn with a nearly



Above, the weathervane of the Curlew Bay club, in the shape of its namesake bird. Left, a weathervane from Boston, ca. 1910.

8-foot-wide vane in the shape of its namesake bird (above). In the 1890s, to crown the latest version of New York's Madison Square Garden, the famous sculptor Augustus Saint-Gaudens created a 14½-foot-tall weathervane of the nude goddess Diana, made of hollow copper and gold leaf, to replace an earlier, heavier version. At a svelte 700 pounds, the revised Diana swiveled beautifully. —Peter Saenger

HISTORICALLY SPEAKING

AMANDA FOREMAN

The Tragic Cost Of Historical Vandalism



TWENTY YEARS AGO

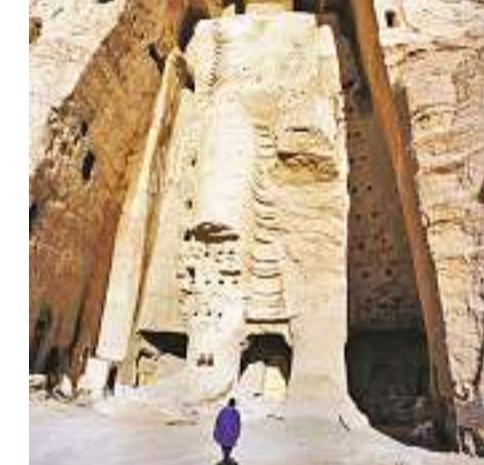
this spring, the Taliban completed their obliteration of Afghanistan's 1,500-year-old Buddhas of Bamiyan. The colossal stone sculptures had survived major assaults in the 17th and 18th centuries by the Mughal emperor Aurangzeb and the Persian king Nader Afshar. Lacking sufficient firepower, both gave up after partly defacing the monuments.

The Taliban's methodical destruction recalled the calculated brutality of ancient days. By the time the Romans were finished with Carthage in 146 B.C., the entire city had been reduced to rubble. They were given a taste of their own medicine in 455 A.D. by Genseric, King of the Vandals, who stripped Rome bare in two weeks of systematic looting and destruction.

Like other vanquished cities, Rome's buildings became a source of free material. Emperor Constant II of Byzantium blithely stole the Pantheon's copper roofing in the mid-seventh century; a millennium later, Pope Urban VIII appropriated its bronze girders for Bernini's baldacchino over the high altar in St. Peter's Basilica.

When not dismantled, ancient buildings might be repurposed by new owners. Thus Hagia Sophia Cathedral became a mosque after the Ottomans captured Constantinople, and St. Radegund's Priory was turned into Jesus College at Cambridge University on the orders of King Henry VII.

The idea that a country's ancient heritage forms part of its cultural identity took hold in the wake of the French Revolution. Incensed by the Jacobins' pillaging of churches, Henri Gregoire, the Constitutional Bishop of Blois, coined the term *vandalism*. His protest inspired the novelist Victor Hugo's efforts to save Notre Dame. But



A Buddha of Bamiyan in 1997.

the architect chosen for the restoration, Eugène Emmanuel Viollet-le-Duc, added his own touches to the building, including the central spire that fell when the cathedral's roof burned in 2019, spurring controversy over what to restore. Viollet-le-Duc's own interpolations set off a fierce debate, led by the English art critic John Ruskin, about what constitutes proper historical preservation.

Ruskin inspired people to rethink society's relationship with the past. There was uproar in England in 1883 when the London and South Western Railway tried to justify building a rail-track alongside Stonehenge, claiming the ancient site was unused.

Public opinion in the U.S., when aroused, could be equally determined. The first preservation society was started in the 1850s by Ann Pamela Cunningham of South Carolina. Despite being disabled by a riding accident, Cunningham initiated a successful campaign to save George Washington's Mount Vernon from ruin.

But developers have a way of getting what they want. Not even modernist architect Philip Johnson protesting in front of New York's Penn Station was able to save the McKim, Mead & White masterpiece in 1963. Two years later, fearing that the world's architectural treasures were being squandered, retired army colonel James Gray founded the International Fund for Monuments (now the World Monuments Fund). Without the WMF's campaign in 1996, the deteriorating south side of Ellis Island, gateway for 12 million immigrants, might have been lost to history.

The fight never ends. I still miss the magnificent beaux-arts interior of the old Rizzoli Bookstore on 57th Street in Manhattan. The 109-year-old building was torn down in 2014. Nothing like it will ever be seen again.



The Poirot Files
A 'life' of
Agatha Christie's
great detective CII

BOOKS

THE WALL STREET JOURNAL.

Coffeehouse Days
Billy Wilder
on assignment in
Berlin and Vienna C9



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Saturday/Sunday, April 17 - 18, 2021 | C7

Rough, Rowdy, Rancorous

The portrait of a time—not so unlike our own—when partisan discord dominated American life.



'NURSING OUR INFANT INDUSTRIES' Economic disruptors of the American 1880s, including, at center, Pennsylvania congressman William D. Kelley, an advocate of tariffs on iron and steel.

The Age of Acrimony

By Jon Grinspan
Bloomsbury, 364 pages, \$30

By MICHAEL BARONE

ELECTION AFTER election decided by the narrowest of margins. Divided government, with one party holding the presidency and the other holding one or both houses of Congress most of the time. Citizens voting straight party tickets and politicians voting straight party lines, with opponents not even speaking to each other. This picture of polarized partisan parity is a familiar and fair description—or indictment—of American politics today.

But it's not, as many suggest, unique in American history. On the contrary, the generation following the Civil War saw a political culture of strong partisanship combined with bitterly contested elections. Most of us remember the long list of Republican presidents in the three decades after the war, but during most of those years Democrats had majorities in the House. Almost all presidential elections were narrowly decided. Between 1874 and 1894 only one candidate won an absolute majority of the popular vote—and he was declared the loser by a commission set up to resolve a dispute over electoral votes. In only five of those 20 years did one party control the presidency and both houses of Congress.

So it's hard not to see echoes of our current politics in historian Jon Grinspan's chronicle of this rambunctious period. "The Age of Acrimony" isn't a detailed narrative of the era's political struggles or a political-science thesis with tables and graphs. The wondrous profusion of technological innovation and economic growth of the late 19th century is touched on, but without the robotic denunciations of "robber barons" that permeate so many historians' accounts. Mr. Grinspan's focus is on practical politics, which in this period meant mass politics—the highest rates of voter turnout and mass participation in the nation's history.

Mr. Grinspan, a curator at the Smithsonian's National Museum of American History, draws on its archives and store of artifacts to give readers a sense of what it was like to be part of "the vast, stomping political campaigns that dominated popular culture." In big cities and courthouse towns men would "light stinking oil torches, don shimmering uniforms, burn effigies, roll floats, push coffins (with the names of rival politicians scribbled on their sides), sing serenades, build bonfires, light fireworks," he writes. They would argue in saloons or "shoot their revolvers in the air, or barbecue hogs for celebrations, or heave brickbats from their roofs into teeming rallies of the other party." Gunfire, he says, was reported at every election in Philadelphia between 1870 and 1900.

At a time when other nations restricted voting to those with property, or had no elections at all, men in America's young democracy "could smell, taste, and feel democracy pulsating all around them," Mr. Grinspan observes. There was an exuberance in all this, but also notes of melancholy and desperation. In "The Virgin Vote" (2016), Mr. Grinspan described how, in the antebellum politics of the 1840s and 1850s, young men escorted by older men and cheered on by young women made a ceremony of casting their first, "virgin" vote. But his subjects in "The Age of Acrimony" are in a different frame of mind: They are intensely aware that some 600,000 men died in the Civil War. The war may have marked a "new birth of freedom," in Abraham Lincoln's phrase, but it also cast a shadow over electoral politics.

Indeed, the divisions between the two parties were largely driven by different attitudes toward the war, and both parties had reason to be defensive. Democrats had tended to oppose the Civil War and the abolition of slavery, with most Southern Democrats fighting for the Confederacy and many supporting the postwar terrorism of the Ku Klux Klan. Republicans, for their part, had won the 1860 election with only 40% of the popular vote and zero support in the slave states. By the mid-1870s, their postwar Reconstruction policy—stationing federal troops in the South to enforce equal rights for blacks—was widely unpopular,

plagued by armed attacks on blacks by Ku Klux Klan members and others and murders and lynchings tolerated or encouraged by local white officials. Mr. Grinspan's portrait of New York Sen. Roscoe Conkling, a "Stalwart" Republican disparaged by intellectual elites Northern and Southern as corrupt, gives him due credit as a principled supporter of civil rights and Reconstruction into the 1880s, when most of his fellow party members were setting aside their convictions in the face of criticism from intellectuals like George William Curtis and Henry Adams.

Mr. Grinspan doesn't focus on all the political worthies of the period.

the "frustration of crafting baubles for the rich nurtured a commitment to protecting working people," Mr. Grinspan writes. At age 19 he somehow snagged a meeting with President Andrew Jackson and was soon giving populist speeches in Boston and hobnobbing with the eminent (and partisan Democratic) historian George Bancroft. After switching from Jackson's Democrats to the new Republican Party in the 1850s, he became close to Abraham Lincoln. He was elected to the House in 1860 from a west Philadelphia district and served until his death in 1890—the longest-serving House member for his last 14 years.

Mr. Grinspan reconstructs Kelley's career from his frequent letters to his wife Carrie and his intellectually prodigious daughter Florence and from his correspondence with Frederick Douglass and Susan B. Anthony. He vowed to make his voice "the chief channel" for Anthony's women's suffrage petitions to Congress and debated with Douglass over whether to throw off "the shackles of party." Like many American politicians of the era, he traveled widely. We follow him as he dodges bullets from a black rights' opponent in Mobile, Ala., in 1867 and travels west to witness the golden spike being driven in to finish the Transcontinental Railroad in the Utah Territory in 1869.

Kelley was a faithful Republican in a partisan era, a strong tariff sup-

Please turn to page C8

THE LITERARY EVENT OF THE SEASON

"BLAKE BAILEY'S COMPREHENSIVE LIFE OF PHILIP ROTH—
TO TELL IT OUTRIGHT—IS A NARRATIVE MASTERWORK."

—CYNTHIA OZICK, NEW YORK TIMES BOOK REVIEW

"BAILEY IS INDUSTRIOUS, RIGOROUS, AND UNCOWED."

—DAVID REMNICK, THE NEW YORKER

"AS DYNAMIC AND GRIPPING AS ANY OF
ROTH'S OWN FICTIONS."

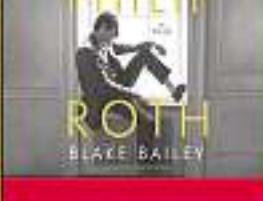
—PUBLISHERS WEEKLY (★ STARRED REVIEW)

"SUPERLATIVE."

—CLAIRE LOWDON, TIMES OF LONDON

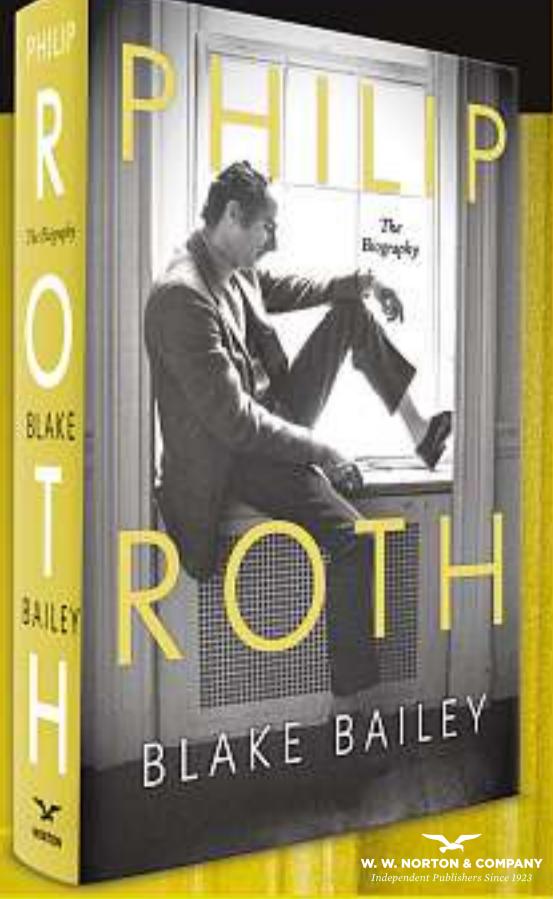
"WHAT A STORY."

—JAMES PARKER, THE ATLANTIC



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"These are times in which a genius would wish to live. It is not in the still calm of life . . . that great characters are formed." —ABIGAIL ADAMS



FIVE BEST ON REVOLUTIONARY WOMEN

Stephanie Dray

The author, most recently, of 'The Women of Chateau Lafayette'

Founding Mothers

By Cokie Roberts (2004)

1 "It's safe to say that most of the men who wrote the Declaration of Independence and the Constitution, fought the Revolution, and formed the government couldn't have done it without the women." So begins "Founding Mothers," Cokie Roberts's entertaining exploration of the lives of well-known patriots like Abigail Adams and Martha Washington, as well as more obscure women of valor such as Sybil Ludington, Deborah Sampson and Elizabeth Freeman. Here are the women entrepreneurs, writers and activists of our fight for independence. After the war, these founding mothers wrote the rule book on etiquette for a young republic. To underscore the rejection of the traditional finery of monarchs, Lucy Knox chose a suit of brown broadcloth for George Washington to wear at his inauguration. And at her Friday-night receptions, Martha Washington, with Abigail Adams seated at her right, struck a democratic but formal note by welcoming all "properly" clothed persons to partake of ice cream and lemonade. The women who "raised our nation" may have gone mostly uncelebrated, but as George Washington wrote to one, "I think you ladies are in the number of the best Patriots America can boast."

A Woman's Dilemma

By Rosemarie Zagarri (1995)

2 Mercy Otis Warren—one of America's earliest playwrights—once warned, "the thorns, the thistles, and the briers, in the field of politics seldom permit the soil to produce anything . . . but ruin to the adventurer." Yet adventure she did, treading where no American woman had trod before. Rosemarie Zagarri's biography reminds us that while Revolutionary-era women like Martha Washington, Abigail Adams and Betsy Ross are better known, Warren outstripped them all in accomplishment. Warren, who corresponded with the likes of John Adams and Alexander Hamilton, would go on to publish political works in her own name and a three-volume scholarly history of the revolution. To Ms. Zagarri, it was "one of the earliest and most accurate histories of the independence movement," one that conveys "a sense of grandeur, intellectual ambitiousness and moral integrity that impresses even today."

MUSEUM OF FINE ARTS, BOSTON

INTELLECTUAL ADVENTURER Mercy Otis Warren (ca. 1763) by John Singleton Copley.

"A Woman's Dilemma" gives the reader a glimpse into one woman's struggle to exercise her intellect without falling afoul of the standards of respectability for women at the time.

The Hemingses of Monticello

By Annette Gordon-Reed (2008)

3 Annette Gordon-Reed's work illuminates the experiences of enslaved Revolutionary-era women, reminding us that the daily lives of people living in bondage on Thomas Jefferson's plantations varied greatly. Jefferson favored the Hemings family, many of whom were the mixed-race offspring of his father-in-law, John Wayles,

and the enslaved Elizabeth Hemings. Within the system of slavery, the Hemingses occupied positions of trust and authority. Of the family matriarch, Elizabeth, we learn that she "began life when America was still a colonial possession. She lived through the Revolution in the home of one of the men who helped make it and died during the formative years of the American Republic." Elizabeth may have died unknown, but her daughter Sally is widely known as the mother of Jefferson's enslaved children, including a daughter named Harriet who was permitted to "run away" with Jefferson's financial assistance. Ms. Gordon-Reed draws vivid portraits of these women, whose lives and fates would otherwise have been lost to history.

"The same spirit that impelled the annually pregnant Lucy to follow Henry Knox through the Revolution's army camps also drove her mirror opposite, Peggy, to support [Benedict] Arnold's betrayal of America." Indeed, Ms. Stuart makes the case that if Peggy did not mastermind the betrayal, she enabled it by renewing a correspondence with her old friend the British spymaster John André. By contrasting the spirited Lucy, who insisted on marrying a patriot, with the sophisticated Peggy, whose acceptance of Benedict Arnold's proposal appears to have been more calculating, Ms. Stuart paints a fascinating picture of Revolutionary-era women who made their own choices and lived with the consequences.

America's Age of Acrimony'

Continued from page C7

porter—hence the nickname—from a state that produced iron, steel and locomotives. Like three presidents (Polk, Fillmore, McKinley), he chaired the House Ways and Means Committee. He sponsored the 15th Amendment guaranteeing blacks the right to vote, and he enjoyed the enthusiastic support of Philadelphia blacks.

But after the 1876 election—when, in the highest turnout in U.S. history (81% of eligible voters), Democrat Samuel Tilden won a majority of the popular vote (though Rutherford Hayes was brokered into the presidency)—Kelley lost faith in Reconstruction. As Mr. Grinspan writes: "Reconstruction was killed by political violence in the South and by the millions of White voters nationwide who gave up on it." The course of Kelley's career shows idealism being converted into party loyalty and the continuing tension between the two.

Inevitably, partisan feelings faded as the war became more distant. "Fireworks reached a new scale in 1884," Mr. Grinspan reports, but by 1892 marching clubs and boisterous parades and partisan taunts were becoming less common. A rising generation with no memories of the Civil War felt that politics could only be reformed if it "could be made dull enough that all the fun of 'racket

and rocket' fell away." Balloting changed too: The old ballots, produced by the parties and cast in public view, were replaced between 1888 and 1893 by so-called Australian ballots: These were printed by the states and cast in the privacy of voting booths.

But the quiet wouldn't last long. The disillusion with the two-party system that was voiced by sniffling patrician Yankees like Henry Adams and Francis Parkman—they found it vulgar and disdained the black and immigrant masses whose votes any politician must seek—was outshouted by loud and violent demands not for reform but for revolution. American elites were chilled by the 1871 Paris Commune and by its echo in the 1886 Haymarket Square riot in Chicago, where the federal government built armories and stationed troops

in nearby Fort Sheridan to quell outbreaks of labor unrest. The change was personified, Mr. Grinspan notes, by Florence Kelley's "intellectual war with capitalism, democracy, and her family's complicity in both." She spent the 1880s studying child labor at Cornell University, then learning German and marrying a Russian exile in Zurich and collaborating with Karl Marx's old partner Friedrich Engels.

This new agitation, in its turn, seemed to add to the danger of disorder arising from an excess of popular democracy. The late historian Robert Wiebe, in "The Search for Order: 1877-1920," documented how American professions and corporations became more nationally organized in the decades around 1900, and political campaigns followed a parallel course. As Civil War loyalties faded, Democrats in 1890 and Republicans in 1894 won landslides in congressional elections. In the 1896 election, William Jennings Bryan, the Democratic nominee, took his "free silver" message to the public:

Breaking an old taboo, he delivered 500 speeches to more than a million people. Meanwhile, Republican William McKinley spoke to half a million transported on trains to his front porch in Canton, Ohio.

McKinley's campaign was a professional one, Mr. Grinspan notes, aided by "huge teams of party professionals" and run by coal and iron millionaire Mark Hanna and 31-year-old Charles Dawes, the first Budget Bureau director and Calvin Coolidge's vice president in the 1920s. The press was professionalized too. Newspapers were traditionally party organs, faithful to the politicians who subsidized them, but new

mass-circulation newspapers financed by advertisers followed the lead of ambitious young publishers like Joseph Pulitzer and William Randolph Hearst. These press barons were faithful only to their own instincts—and to their own political careers (Pulitzer served

workers' indifference to socialism.

Electoral politics by the 1910s had been reformed and professionalized, "leaving an electorate that was wealthier, whiter, older, and more likely to be native-born," Mr. Grinspan writes. "A new political culture had been born: one

that had been cleaned and calmed, stifled and squelched," with voter turnout plummeting below 60%.

That's not all bad, Mr. Grinspan argues. "America managed to avoid the brutal mass politics that ravaged much of the world in the twentieth century."

But perhaps we're going back to something "Pig Iron" would have found familiar. Turnout has been rising, sharply, to 66% in 2020. Straight-ticket voting is as strong as

NATIONAL MUSEUM OF AMERICAN HISTORY



AFFRONTED 1789 to 1889: The Progress of Time by Victor Gillam.

in the Missouri legislature; Hearst was elected to Congress and nearly elected governor of New York) and causes.

The result of these changes, eventually, was a politics that was less agitated and accessible to ordinary people and more susceptible to the influence of wealthy moguls and articulate intellectuals. What "Pig Iron" Kelley would make of it is hard to say. His daughter Florence, based in Chicago's Hull House and New York's Henry Street Settlement, became a national reformer, pushing for child-labor restrictions and founding the National Consumer League. She was puzzled at American

it has been since that time; partisan rancor seems at record levels; and both parties behave like enemies in a cultural civil war, fighting it out on social media rather than torchlight parades. Where will it all end? To judge by Mr. Grinspan's account, only when old causes and divisions are replaced by those of new generations—after another decade or two of acrimony.

Mr. Barone is senior political analyst for the Washington Examiner and the author of "How America's Political Parties Change (And How They Don't)."

BOOKS

'It was hell at the time, but after it was all over, it was wonderful.' —BILLY WILDER

Kaffeehaus Confidential

Billy Wilder on Assignment

Edited by Noah Isenberg
Princeton, 212 pages, \$24.95

By JEREMY McCARTER

EARLY IN "Irma la Douce" Jack Lemmon says that he wasn't cut out for a life of crime. "There you go," a friend replies, "selling yourself short."

For Billy Wilder, who co-wrote and directed that film, morality couldn't be divided into neat fields of black and white. Life was richer, stranger and much, much funnier than that. This worldview, which informs every sordid, glorious frame of "Double Indemnity" and the rest of the Wilder classics, seems to have been present from the start. He spent his boyhood in a hotel run by his father in Kraków. Barely tall enough to wield a pool cue, he used it to hustle the clientele. When punishment arrived, he showed a precocious gift for talking his way out of it. A friend liked to say that Wilder had been cooking up alibis since his birth, an event he claimed not to have attended.

At 18, an age when less spirited contemporaries were contenting themselves with campus pranks, Wilder found an arena that gave full scope to his gifts for brazenness, invention and verbal sorcery: journalism. From 1925 to 1930, he wrote dozens of freelance stories for newspapers in Vienna and Berlin, the cities where he spent most of his teens and 20s. A selection of those essays, profiles and reviews now appears, for the first time in English, in "Billy Wilder on Assignment." The editor, Noah Isenberg (a professor at the University of Texas at Austin whose previous books include a study of Weimar cinema), argues that his Hollywood triumphs are "in many ways an outgrowth of his stint as a reporter." No doubt the lively cynicism of these pieces will be familiar if you know Wilder's movies. In one essay, he proposed that schools teach the "art of swindling," so that lying "would no longer be the privilege of the few who have a natural predisposition in this arena."

It's funny—charming, even—to learn that such a worldly-wise observer of humanity started his journalism career on a naive note. Fresh out of high school, he wrote to the editors of Die Bühne, one of Vienna's tabloids, in hopes of becoming a correspondent. Apparently he thought it could be his ticket to America, land of his dreams. The request went nowhere, but soon enough they offered him a job writing short pieces and crossword puzzles anyway. Take it as a testament to his charm and persistence, not (as he later claimed) the result of his having walked in on the theater critic making love to his secretary.

In Hollywood, Wilder's habit of fidgeting and pacing would unnerve



WILDER OATS Drawing of the cub reporter; Wilder (right) with Paul Whiteman; poster for the Wilder-scripted film 'People on Sunday'; a critic's aisle-seat ticket.

his co-writers. But in Vienna, where he only got paid when he got published, boundless energy was a tool of survival. Nobody could score an interview with Asta Nielsen, a leading film actress of the era, who was then in town doing a play. So Wilder talked his way past the stage door attendant and into her dressing room.

The same smiling persistence got him close to the bandleader Paul Whiteman, then at the peak of his popularity. The book includes an amazing photo of Wilder, smirking and striking a pose, with Whiteman and his band. The musicians were amused by this boyish European who knew so much about their songs—Wilder learned his first English phrases by listening to jazz records—and the affection was mutual. When he wrote a story about the band's arrival in Vienna, Wilder included a tribute to Whiteman's "splendid, peerless, divine, superb mustache. . . . That is the mustache of the future."

When the band left for Berlin, Whiteman invited him to come along. He even seems to have paid the youngster's way. Wilder's glowing review of the band's Berlin show led to a great deal of ethical hand-wringing, since it appeared that money and access had bought positive coverage. Just kidding: In the world of Weimar tabloids, nobody cared.

In 1926, Berlin was racy and word-drunk—all that a hustling 20-year-old freelancer could desire. So Wilder decided to stay. It was easy to find comrades among the writers and artists at Romanisches Café; it was hard to get a job, despite Berlin publishing more newspapers than any other city in the world. He was broke and morose, reduced to cutting cigarettes in half, when a friend proposed a way of paying the bills that even Wilder considered outlandish: being a dancer for hire at a fancy hotel.

He spent two strange, sweaty months twirling ladies around the Eden Hotel, then turned the experience into four sparkling columns for a Berlin tabloid. They show that he already had a sharp eye and a flair for words, as when he described the dance floor as "one single mass of flesh, quivering in rhythm like aspic." And it's delightful to watch him seek bigger tips, upgrading his beauty routine—he was like a shark in pomade—and deploying pretty lies. ("Oh, it's a pleasure to be able to dance with my dear Madame.") The whole adventure unfolds in a mood of casual irony. In short: It feels like a Billy Wilder movie. (There's even a structural similarity to his films: The series opens with the protagonist—i.e., Wilder—reflecting on his adventure, then it rewinds to the beginning of the story,

just like in "Sunset Boulevard" and "Double Indemnity.")

Mr. Isenberg seems to recognize how good the series is. He gives it pride of place at the front of the volume. Funny, vivid moments pop up in the pages that follow, as when

His account of working as a taxi-dancer in a fancy Berlin hotel unfolds in a mood of casual irony—just like a Billy Wilder movie.

Wilder describes his encounter with the opera giant Feodor Chaliapin, who wears "a warm little wool jacket over the world's most expensive bass voice." (The adept translation is by Shelley Frisch.) Yet in spite of running scarcely 200 pages, the book feels padded. A whole section is devoted to Wilder's reviews, which offer surprisingly little insight into plays and movies. They aren't even much fun to read.

The book's limitations are really Wilder's limitations, and those are understandable enough: If 21-year-olds had mature styles and polished critical lenses, what hope would there be for the rest of us? Besides, journalism had plenty of competition for his time

and focus. In the late 1920s, Berlin was second only to Hollywood in film production. Wilder was enthralled by the movies: the glamour, the spectacle, the chance for riches. Within two years, he had earned his first solo screenwriting credit, "Der Teufelsreporter" ("Hell of a Reporter"), a film that turned the facts of his journalistic life into a wild adventure. By 1930, when he and some friends made a docudrama about life in Berlin, he was crossing over to filmmaking for good.

Because he spent a couple of years straddling those worlds, foreshadowing abounds in this book. His future mentor Ernst Lubitsch turns up in a story; decades before "Sunset Boulevard," so do Erich von Stroheim and Gloria Swanson. Mr. Isenberg makes dutiful note of these connections. All very interesting, but the book's main appeal is independent of what came after. The brightest moments here let you watch a little more of the human comedy through Billy Wilder's eyes. Few saw it as clearly he did or had more fun writing it down. Reflecting much later on his months at the Eden Hotel, he said, "I wasn't the best dancer, but I had the best dialogue."

Mr. McCarter is the co-author, with Lin-Manuel Miranda and Quiara Alegría Hudes, of the forthcoming "In the Heights: Finding Home."

How He Got That Story

The Powerful and the Damned

By Lionel Barber
W.H. Allen, 462 pages, \$24.95

By TUNKU VARADARAJAN

THE FACT THAT "The Powerful and the Damned" is self-serving and egotistical doesn't mean that it is not an enjoyable book, at times quite delicious. Its author, Lionel Barber, was editor of the Financial Times from 2005 to 2020, his longevity at the helm bettered only by one other editor in that fine newspaper's history. The book is a memoir of Mr. Barber's time as boss, and like many English editors of his generation, he is rarely unassuming.

An illustration: In his last flourish as editor, Mr. Barber interviews Angela Merkel, who came to power—he informs us—"three weeks after I took over as FT editor." A canny Merkel aide tells Mr. Barber that it was this "symmetry" that "ultimately persuaded" the German chancellor to sit down for an unscripted session with him. Mr. Barber swallows the flattery.

A blurb on the dust jacket from Tony Blair declares that the book is "fascinating" and offers "extraordinary insight." This is a bit rich, you

might think, given that there are 35 entries for the former British prime minister in its index. But kudos to Mr. Barber for getting a man who features so heavily in his book to offer up his gushing praise for it. Who says the politician-editor relationship can't be symbiotic?

This method—symbiosis, in which two beings interact to mutual advantage—is one that Mr. Barber has perfected. By its operation, the public figure gets his placement in the FT—often in the shop window of a dedicated interview—and Mr. Barber gets his coveted story. As editor of one of the two best global business newspapers (the other is in your hands or on your screen), he targeted the world's political and business leaders for attention. These potentates are "accustomed to wrapping themselves in protective bubbles."

Mr. Barber kvells that he was able to "puncture" these bubbles and engage "up close and personal" with the world's heaviest hitters "thanks to my position and the prestige of the FT."

Mr. Barber subtitled his book "Private Diaries in Turbulent Times," yet it isn't a diary in an original sense, being instead a faux-journal reconstituted from his "extensive notes of interviews, conversations, and encounters." From an amusing (but inescapable) perspective, this could be said to be a book about Mr. Barber's nonstop hobnobbing. The Daily Mail—a British tabloid with whose editor he tussled—once described him as "a weapons-grade social climber and name-dropper extraordinaire." Mr. Barber, in a winning show of self-deprecation, cites this barb in his book, but a

kinder way to describe him would be as a world-class schmoozer.

Lucky to have downloaded the text, I searched for "lunch," "dinner," and "breakfast"—activities that Mr. Barber engages in on a trencherman's scale in pursuit of material for stories. The first word—lunch—appears 94 times in 430 pages (or once every 4½ pages). Dinner features in 63 references, and breakfast—surprisingly, given its fabled power quotient—in only 37. But the advantage

Editing a newspaper requires all sorts of skills, not least the ability to schmooze with the right people.

of all this intimacy with consequential men and women—some of it, of course, austere and non-alimentary—is that Mr. Barber is privy to thoughts, gestures and vignettes that might otherwise never be revealed.

The fruits of such proximity can be exquisite. Some examples: Tim Geithner, the U.S. Treasury secretary, says privately that Angela Merkel was the only world leader during the financial crisis of 2008 who was "numerate." A senior Syrian official in Damascus asks Mr. Barber whether he agrees that "George W. Bush deliberately caused the financial crisis, just like the invasion of Iraq." Nigel Lawson, formerly Britain's chancellor of the exchequer, berates Mr. Barber. "I am surprised," Mr. Lawson says, "that you were unable to agree to my

suggestion of a complimentary subscription to FT online." He goes on to say that he reads the FT "at no charge, in the library of the House of Lords," which is why he has never paid for a subscription, "nor will I ever do so."

In a cozy setting in Jerusalem, Mr. Barber observes Mr. Blair get miffed when a photographer—there to take his portrait—remarks that the former prime minister has large hands. On another occasion, Prince Andrew—the queen's second son—invites Mr. Barber to Buckingham Palace for a tête-à-tête on how to improve the prince's image. "Stop doing real-estate business with Kazakhs," advises Mr. Barber.

After a meal with Boris Johnson in 2013—at which the then-mayor of London, on a jihad against emissions, excuses himself early in order to cycle home—Mr. Barber spies him outside "folding his bike and disappearing into a gas-guzzling taxi." At a dinner for Xi Jinping at Buckingham Palace two years later, the Duke of Edinburgh accosts Mr. Barber and asks, "Haven't you just been taken over by the Chinese?" The FT had, in fact, been purchased by Nikkei Inc. "Yes, Sir," says Mr. Barber. "But not by the Chinese. The Japanese!" In 2017, in the Oval Office, Donald Trump takes Mr. Barber to an adjoining room to show him a portrait. "Do you know who that is?" asks Mr. Trump. "Yes, Sir, it's Teddy Roosevelt," replies Mr. Barber, who writes that the president looked "deflated."

Mr. Barber is no stylist. His writing, often jaunty, is seldom elegant. When he's appointed editor of the FT in 2005, "the news flashes through the newsroom like wildfire."

Elsewhere he tells us that "a financial bubble is like a train of thrill seekers on a downhill stretch with no breaks." He describes Hank Paulson, George W. Bush's Treasury secretary, as "one tough hombre."

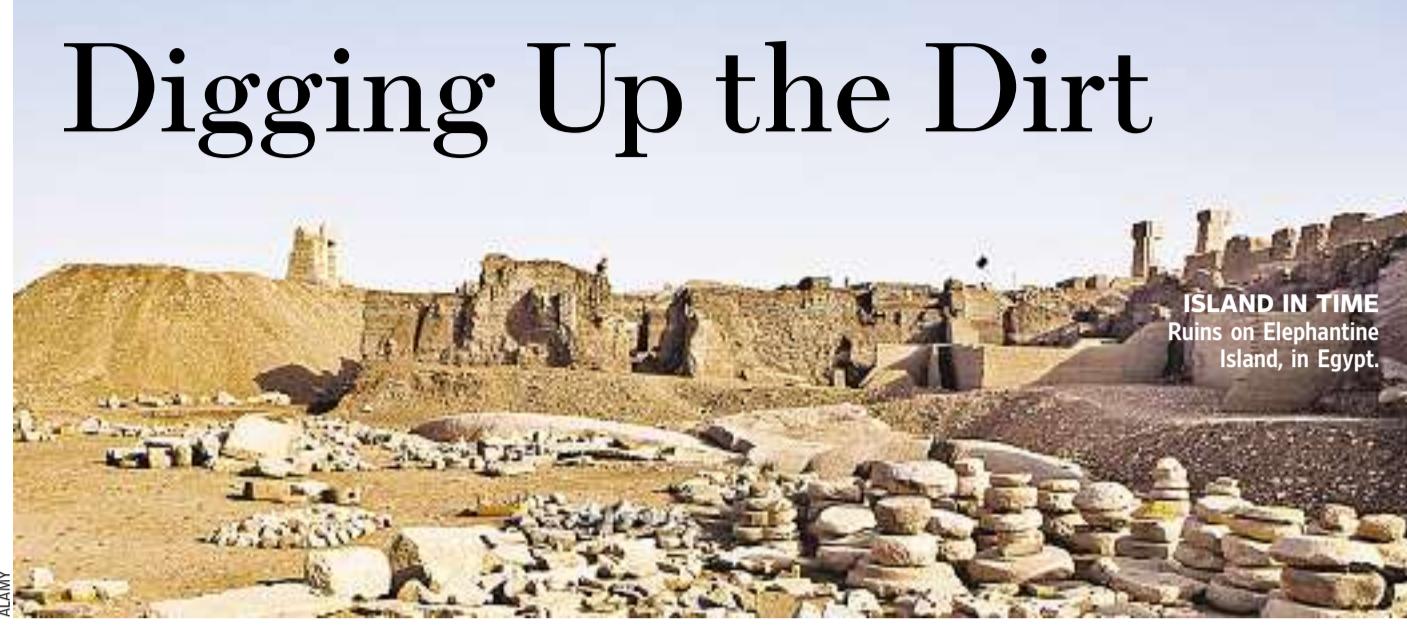
The most attractive parts of "The Powerful and the Damned"—apart from the recherché gossip—are those where Mr. Barber professes guilt for not doing as well as he should have done as an editor. "A failure of the imagination" is how he later described his newspaper's performance in the run-up to the financial crisis. He offers a mea culpa, also, for the coverage of Brexit in the FT, which misread Britain's mood and threw its weight almost recklessly behind the Remain-in-Europe campaign. Mr. Barber's Manichaean message, he says, was: "Vote Great Britain, not Little England." The newspaper also failed to account for the possibility of a Trump win in the 2016 presidential elections. In this, of course, Mr. Barber's FT was not alone. Nor was he an outlier in his distaste for Mr. Trump. "Sopranos over the Potomac," he writes.

When they meet for an interview, says Mr. Barber, "Trump cannot resist reminding people that his election victory, like Brexit, made chumps out of the mainstream media." It is to Mr. Barber's credit that he fesses up to having been a chump when he needs to do so. A braggart he may be, and unquestionably in love with himself, but he's never delusional.

Mr. Varadarajan, a Journal contributor, is a fellow at the American Enterprise Institute and at New York University Law School's Classical Liberal Institute.

BOOKS

'We cover up the horror of death and loss...with almost any sort of explanation, as if we had to justify the very fate which had maimed us.' —IRIS MURDOCH



ALAMY

Antiquities

By Cynthia Ozick
Knopf, 179 pages, \$21

By HELLER MCALPIN

THE NARRATOR of Cynthia Ozick's seventh novel is neither Jewish nor intellectual—a significant departure from her usual characters. Nor is he worldly, witty, well-read or astute. But Ms. Ozick is of course all of the above, and this slim but by no means slight narrative is as cunning and rich as anything she's written.

"Antiquities" is about an excavation of the past by a man not insightful enough to fully understand what he has unearthed and revealed. Lloyd Wilkinson Petrie is a cultural relic, a stodgy retired lawyer who in 1949 resides, with the six other elderly surviving trustees of the Temple Academy for Boys, in converted apartments in their former Westchester County boarding school, which closed 34 years earlier.

"Antiquities" consists of Petrie's attempt to write about a salient experience from his school days: his idolatrous relationship with a mysterious classmate, a boy whose foreign name, Ben-Zion Elefantin, strange accent, and skeletal appearance subjected him to ridicule from the other students. Petrie's association with Elefantin, initially over chess, rendered him an outcast, too.

Petrie's recollections of his schoolboy infatuation are deeply entangled with memories of his father, who died when he was 10—the same year Elefantin came to the Academy, though Petrie doesn't mention this confluence explicitly. He discovers that his upstanding father, too, had suffered an infatuation—with "ancient times"—which caused him to briefly abandon his new wife and position at the family law firm for a fling

with a different life: work on the excavation of the Great Pyramid of Giza in Egypt, run by renowned archaeologist (and historical figure) Sir William Matthew Flinders Petrie, whom he believed to be a cousin.

Sorting through the rubble of both infatuations is heavy labor for Petrie, even many decades later. He notes in a moment of rare self-awareness that "it is as if I must excavate, as in a desert, what lies far below and has no wish to emerge—to wit, my boyhood emotions."

Cynthia Ozick's narrator is a man who wants to set down history without confronting the past.

Ms. Ozick has created a character who, unlike herself, is unconscious of the reverberations of the words he chooses. The lonely, friendless widower writes of his "racking affections" for Elefantin and what, in a lonely childhood in which physical contact must have been a rarity, he considers their "intimacy." He repeatedly mentions their bare knees touching on the climactic day when Elefantin mesmerized him with a tale of his family's ancient origins, part of an outcast Jewish sect whose history on the Nile, he claims, was omitted from the Torah by "falsifying scholars."

Even as an old man, Petrie doesn't know what to make of these "frenzied murmurings of two agitated boys prone and under a spell." Is it, he wonders, "a liar's screed, an invention? An apparition's fevered pedantry? And who knows such things, this garble of history and foreign babbles? Not I. Nor am I a man of imagination," he writes.

Petrie's inbred xenophobia and anti-Semitism snake through "Antiquities" like a toxic river, presenting a rare view in Ms. Ozick's work of such bigotry seen from the opposite shore. He is at pains to make clear that Temple Academy is named for the Temple family, cousins of Henry James, as opposed to "something unpleasantly synagogal." About the "satirical or otherwise jesting comments on the Hebrew character" sprinkled throughout the Academy's official history, he writes with complete tone-deafness: "There is always, I believe, a kernel of truth in these commonplace disparagements."

His memoir is riddled with such disparagements. The Academy's charter, he tells us, is tainted by "some clever Shylock's statutory legerdemain." Four years after World War II, Petrie writes: "There are some who even today decline to forgive President Roosevelt for, as they say, putting Americans at risk for the sake of saving the Jews." (It comes as no surprise to learn he voted against Roosevelt four times.) He adds, appallingly: "The newspapers are rife with grotesque tales of camps and ovens; one hardly knows what to believe."

As the denigrations mount, the insecurity and jealousy driving them become increasingly apparent. At one point an accomplished Jewish classmate—a distinguished New York judge whose son, unlike Petrie's, is also successful—offers Petrie a favor, in gratitude for the fact that young Lloyd never mocked him. Petrie's peevish reaction: "That is how these people are, their overflowing sentimentalism," he writes, and adds, "It is true that I never called him Hebe; but I thought it. And sometimes, I admonish myself, I still think it."

Petrie is an antique, a fossil—and an all-too-recognizable bigot who has internalized the anti-Semitism of his upbringing and

sees his inherited social status threatened by usurpers. Much as Ms. Ozick's brainy feminist lawyer, Ruth Puttermesser of "The Puttermesser Papers," is "no more cutting than a butterknife," Petrie is a Petri dish of repressed emotions and ugly resentments.

Although he's no wordsmith, Petrie, like Ms. Ozick, is driven by the challenge of getting things right on paper. But sorely frustrated by his inability to do so, he rails at his flailing attempts and despairs that his "cowardly memoir" is "of no more import than some wild pestilential growth."

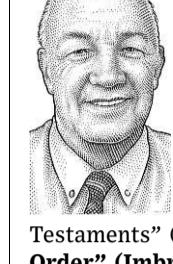
Petrie's evasiveness brings to mind a scene in "Dictation," a playful story from Ms. Ozick's 2008 collection of the same name, in which Joseph Conrad and Henry James (Ms. Ozick's enduring touchstone) debate whether "the novelist stands confessed in his works," as Conrad believes, or "the artist multiplies his confessions, thereby concealing his inmost self," as James insists. In "Antiquities," Ms. Ozick's stifled memoirist realizes that he is in danger of revealing more of himself than he is comfortable with, and backs off.

But what about Ms. Ozick? What does she reveal about herself in her 21st book? For starters, she is still compelled by the perplexities of history, and still devoted to literature as a cause. More important, at nearly 93, her lifelong concerns with mortality and loneliness remain central. "I think incessantly of death, of oblivion, how nothing lasts, not even memory when the one who remembers is gone," Ms. Ozick's narrator writes. Then he reconsiders: "Too many reflections on death contaminate life. And should not each man live every day as if he were immortal?"

McAlpin reviews books regularly for the Journal, NPR.org and the Christian Science Monitor.

SCIENCE FICTION

TOM SHIPPEY

Crusaders In the Crescent City

FEAR OF A NEW American theocracy has been a motif in sci-fi since Robert Heinlein's story collection "Revolt in 2100," published in 1953. More recently, we have the dystopian vision of Margaret Atwood's "Handmaid's Tale" (1985) and its sequel, "The Testaments" (2019). Brett Riley's "Lord of Order" (Imbrifex, 433 pages, \$27) offers another take on the idea.

In Mr. Riley's telling, America has been taken over by the Bright Crusade, a well-organized group of Christian fundamentalists committed to purifying the country. The new regime's conquest is enabled by a great Purge, powered by a bio-engineered plague and a simultaneous "Godwave"—presumably some kind of electro-magnetic pulse, which knocks the planes out of the sky, shorts out all computers, puts an end to civilization.

Mr. Riley's focus is deliberately narrow, extending only to New Orleans. This is not the victorious Crusaders' favorite city; to them it is a "cesspool of sin," controlled only with

difficulty by the local "lord of order," Gabriel Troy.

It is a nest of Catholics as well, and some Crusaders, Troy included, are reluctant to turn their fire on fellow Christians, of whatever communion. But New Orleans has something else in its favor as a site of divine cleansing: its geography. The city is set in a bowl surrounded by levees all too easily breached. If the faint of heart will not use fire, let flood do their task for them! But first, ensure that all the Troubles—as the enemies of the Bright Crusade have been branded—are gathered in place.

The inner conflict of the story, then, is one of loyalties: loyalty to the city and the citizens, or loyalty to the revolution? And like so many revolutions, "the Crusade eats its young." The conflict is worked out in great detail, on real-life streets and locations which must be familiar to many.

One has to wonder, nevertheless, what in the present world might create such a future upheaval? Ms. Atwood's explanation for her imagined "Gilead" was an infertility plague leading to total control of sex and reproduction. Mr. Riley's "Crusade" seems to be a reaction against the inhumanity of the digital world, plus the old Puritan urge toward Prohibition: Sin should not just be condemned, it must be made impossible.

It's an odd combination, for even determined Puritans still love their smartphones. Still, a scenario is what you make of it, and Mr. Riley, an experienced screenwriter, knows how to keep the action rolling, over all doubts or traditional sci-fi objections.

Trauma, Dysfunction & Old-Fashioned Love

WHITHER the love story? Even before critic Vivian Gornick delivered its eulogy in the 1997 collection "The End of the Novel of Love," romantic love had lost its relevance in so-called serious literary fiction, supplanted as a theme by trauma and so mostly found only in commercial writing or else in the unpoliced outer boroughs of young-adult fiction, fantasy and of course the paperback romance.

But the trend toward disenchantment has had one important exception, and that is when romantic love carries a political message. So, for instance, the kind of exquisitely sentimental writing that would be outmoded in other circumstances is a feature of gay love stories like André Aciman's "Call Me By Your Name" and Garth Greenwell's "Cleanness," where it stands in defiance against repressive sexual taboos, or in Sally Rooney's millennial romance "Normal People," where it counteracts the emptiness of late capitalism.

"Open Water" (Black Cat, 166 pages, \$16), a heralded debut novel by British-Ghanaian writer Caleb Azumah Nelson, fits in this mold, depicting a passionate love affair that is also a celebration of Blackness and a solution, of a sort, to the burdens of social oppression. Mr. Nelson's nameless couple are both black private-school alumni in London making their way in the arts—he as a photographer, she as a dancer.

Narrated in the second person from the man's perspective, the story tells of their immediate intimacy ("I met this woman and she wasn't a stranger," he explains), edging from an intense platonic friendship toward the frightening plunge into a committed relationship.

The main obstacle between them, we read, is the self-hatred that comes from being treated as a "Black body, container, vessel, property"—someone, as a few scenes portray, always under threat of police violence. The gaze of a loved one is a different kind of surveillance, and nearly as unnerving: "It is one thing to be looked at, and another to be seen." Mr. Nelson presents love as a form of "pure expression," untroubled by self-consciousness, and likens it to the feeling located in the cultural sanctuaries—basketball courts, barbershops and dance floors—where Black people are finally free to be themselves.

On one hand, then, "Open Water" is an exceptionally topical novel, its academic vocabulary ("plunder," "gaze," "Black body") and its intellectual referents—writer Zadie Smith, director Barry Jenkins, African-American studies scholar Saidiya Hartman—tying it closely to the political moment in ways that will reverberate deeply for some readers and, for others, simply convey information. But there is also something universal about the ragged vulnerability the love affair accesses in Mr. Nelson's

writing, and in his willingness to portray naked, often weepy, emotion. Everyone has experienced these things and yet in literary fiction scarcity has made them precious.

One of the many trauma-genres that have taken the place of the traditional love story is the dysfunctional family drama, of which Jessica Winter's

"The Fourth Child" (Harper, 338 pages, \$26.99) is an accomplished and rewarding

THIS WEEK**Open Water**

By Caleb Azumah Nelson

The Fourth Child

By Jessica Winter

Aviary

By Deirdre McNamer

example. The novel is about Jane and Pat Brennan, who live with their three kids in a small town outside Buffalo, NY, and its plot turns on Jane's abrupt decision to adopt a child from Romania. The toddler, named Mirela, turns out to be what psychiatrists call "unattached"—she endured so much abuse and neglect as a baby that she distrusts normal expressions of love and oscillates between sullen taciturnity and wild outbursts of misbehavior. Her impossible temper shreds the already fraying family bonds, and the novel explores the

evolving ways the women of the household—Jane, Mirela, and Jane's oldest daughter, Lauren—come to understand the connection between love and suffering.

For Jane, a devoted Catholic and fervent anti-abortion activist, love is best experienced as a kind of "saintly pain," such as the persecuted early Christians endured for their devotion to God. (Loving her small-minded, bullying husband, she thinks, is like "loving her enemy.") Lauren, raised in the climate of sacrificial self-punishment, can never quite disambiguate attraction from cruelty. Ms. Winter imposes a nice, deliberate pace on the interwoven stories. Lauren's is a standard coming-of-age tale, complete with early '90s cultural nostalgia and a creepy high-school drama teacher, but it meshes in interesting ways with Jane's spiritual propulsion toward self-destructive transcendence.

The complexities are blunted somewhat by a facile ending related to the anti-abortion protests that is easy to see coming. But where "The Fourth Child" lives most vehemently is in the character of its problem child, Mirela. To her credit, Ms. Winter has done nothing to soften Mirela's broken edges, and her rages and demands seem somehow bigger and more real than the world that surrounds her. She is the ultimate sacrifice that Jane desired but never bargained for,

the child who will not be loved whom she must love even so.

A fire in a Montana senior residence called Pheasant Run triggers the action in Deirdre McNamer's "Aviary" (Milkweed, 292 pages, \$24). Originating in the apartment of the building's hated property manager, it may have been an accident or an act of arson. More sinister, the property manager has disappeared along with one of the octogenarian residents. Rotating between the viewpoints of an eccentric cast—the retirees, a teenage pariah who hides from bullies in the building's basement, a fire inspector with "exceptional olfactory gifts"—Ms. McNamer unfolds the mystery of the crime while developing a dark, at times comic, portrait of the "final aloneness" of old age.

This is, on one level, an infuriating cautionary tale about the opportunities available to those willing to fleece aging Boomers. ("There is big money to divest them of, and the so-called entrepreneurs are going to make sure they do.") What makes the elderly so vulnerable, the novel suggests, is not mental or physical weakness so much as world-weariness. The residents at Pheasant Run are acutely aware of the world's indifference to them. They no longer work. Their great love affairs are behind them. Why should they fight back? But by the end of this underdog novel, Ms. McNamer has developed poignant reasons that they do.

BOOKS

'I like an audience, I must confess. I am vain, you see. I am puffed up with conceit. I like to say, "See how clever is Hercule Poirot!"' —FROM 'DEATH ON THE NILE'

The Mind and the Mustache

Agatha Christie's Poirot

By Mark Aldridge
Harper, 488 pages, \$29.99

By CHRISTOPH IRMSCHER

I'M NOT A Frenchman—I am a Belgian," protests Hercule Poirot. The greatest detective in the world is where he most assuredly doesn't want to be—supine in the dentist's chair in Mr. Morley's office at 58, Queen Charlotte Street in London. And now, after poking around in his helpless patient's mouth ("just a couple of fillings"), the meddling Mr. Morley has made things worse by getting Poirot's nationality wrong. The response is as indignant as it is immediate, although, muffled by wads of cotton, M. Poirot's words come out sounding more like: "I ah nah a Frahah—I ah-hah a Benyon." As Agatha Christie's narrator acidly observes, "Few men are heroes to themselves at the moment of visiting their dentist."

The scene, recounted in Mark Aldridge's "Agatha Christie's Poirot," takes place at the beginning of Christie's 1940

novel "One, Two, Buckle My Shoe" (published as "The Patriotic Murders" in the United States). One suspects a man like Poirot, who does not take affronts lightly, might feel a twinge of satisfaction upon learning, later that day, that Mr. Morley has been murdered. Yet Poirot the consummate professional doesn't rest until he has hunted down the culprit, whose blasé defense ("there are other dentists") he angrily rejects: "We are all human beings." This is Hercule Poirot in a nutshell: at once arrogant and sympathetic, vain and vulnerable, a dandified snob deeply attuned to the problems of other people.

"One, Two, Buckle My Shoe," Christie's 19th novel starring Poirot, wasn't universally appreciated. One reader wrote complaining that Poirot had become insufferable. Of course he was insufferable, agreed Christie. "Most public men are who have lived too long." But she couldn't let Poirot retire either, "not while he is my chief source of income!" As so often in statements about her work, Christie was deliberately misleading. Her little Belgian detective had been a bit obnoxious from the very beginning. Leave it to Mr. Aldridge, a lecturer on film and television at Solent University in England and the author of a previous book on a related topic, "Agatha Christie on Screen" (2016), to deliver the details. His new, fact-filled compendium, which tracks Poirot's career from Christie's first published novel, "The Mysterious Affair at Styles," to Kenneth Branagh's as yet unreleased version of "Death on the Nile," will tell you that, in 1920, Hercule Poirot leapt (or rather limped)

into Christie's fictional universe fully formed. When we first encounter him, the retired Belgian sleuth already looks the way he would for the next hundred years: nattily dressed, his eyes turning green as a cat's when he is excited, the soon-to-be-famous mustache attached stiffly to his egg-shaped head (the limp disappeared from future novels). No Hercules by a long shot, despite his grand first name, Poirot clocks in at barely five feet, four inches—an obvious problem given his hankering for tall, flamboyant, and slightly criminal women.

Even as the novels that starred him piled up, Poirot's French-inflected English did not get better; inwardly and outwardly he remained, in the words of one suspect, "a blarsted foreigner." In fact, Poirot's Belgianness made him less predictable, less easily categorizable, than if he had been simply French. And while he had some likely literary precursors—from Edgar Allan Poe's Auguste Dupin to Hercule Flambeau, the master criminal in G.K. Chesterton's Father Brown stories—none were as constant a provocation as Christie's Poirot. Openly disdainful of the obtuseness of the English, "Papa Poirot," thanks to his superior "little cells of grey," handily solved their crimes because they couldn't be trusted to do that on their own. "Why did I ever invent this detestable, bombastic, tiresome little creature?" sighed Christie in a 1937 article for the Daily Mail.

Why indeed? "Agatha Christie's Poirot," a one-stop guide to all things Poirot, an exhaustive catalog of all manifestations of

the little Belgian in any conceivable medium, from novel to story to radio play to movie to graphic novel to computer game, provides us with a beautifully succinct answer: Hercule Poirot is less a person than a principle. When, in the 1940s, he began his slow exodus from Christie's work, he easily transitioned first to the radio and then to the big and

The greatest English writer of mystery stories required, for her most enduringly popular sleuth, an outsider: neat, prickly and decidedly foreign.

the small screens, a development Christie grudgingly accepted. A touching photograph included in Mr. Aldridge's book shows a frail Dame Agatha after the premiere of Sidney Lumet's "Murder on the Orient Express" (1974), greeting Queen Elizabeth II.

Expertly summarizing Christie's novels, Mr. Aldridge is always careful not to disclose their endings, which yields some artfully wrought sentences tiptoeing around the secrets they can't share—an effective strategy that will inspire readers to turn to Poirot novels they don't yet know or no longer remember. It seems that Mr. Aldridge learned his lesson from a funny incident he relates:

When Nancy Spain of the Daily Express reviewed Christie's "Dead Man's Folly" (1956), she also revealed the identity of

the murderer, prompting a chagrined reader, the appropriately named Mrs. Stalker of Uxbridge, to issue a stern warning: "Write out 200 times 'I promise not to do it again' or accept a challenge to a duel." The newspaper responded in style: "Nancy Spain accepts. And chooses a pistol." No word on whether the duel took place.

"Agatha Christie's Poirot" is packed with such stories as well as excellent excerpts from contemporary reviews of Christie's novels. A gifted storyteller familiar with everything Christie ever wrote, Mr. Aldridge knows even more than he lets on, occasionally placing, as if he were himself a crime writer, little textual clues only true Christie devotees will recognize. About the story "The Dream," for example, he notes that it contains a plot element bound to disappoint "feline friendly readers"—a sly reference to a passage in which the normally infallible Poirot notes that, in the absence of a sill or parapet, a certain upstairs window would not

have been accessible even to a cat (Christie, a dog lover, was clearly out of her depth here).

But while Mr. Aldridge will readily tell us when one of Christie's works does not meet his standards, he remains democratically mum on the greatest of all questions, one that typically divides Poirot fans: Which actor has portrayed him best? When even the differences in facial hair styles are so immense—from the bat-in-flight hovering under Ian Holm's nose, to Albert Finney's twirly-tipped triangle of fuzz, to Peter Ustinov's avuncular moss, to David Suchet's lacquered filigree, to the hairy tidal wave splashed over Kenneth Branagh's face—the choice comes down entirely to personal preference. In Mr. Aldridge's perceptive assessment, "the character of Poirot is bigger than one man, perhaps even bigger than his creator."

Indeed, Poirot, in all his campy splendor, has easily outlived even the sometimes disappointingly conventional views of his author ("Life is so hard without SERVANTS!" she wrote in the 1950s). A full century after he was created, Hercule Poirot, small in size but powerful in impact, remains the perfect embodiment of the impossible, inextinguishable hope, shared by readers everywhere, that all problems can be solved, that, at least for the spell of a novel, this cockamamie world, subjected to dispassionate, intelligent scrutiny, will make sense again.

Mr. Irmscher is director of the Wells Scholars Program at Indiana University Bloomington.

Heroic Stories in Hard Times


CHILDREN'S BOOKS

MEGHAN COX GURDON

Covid-era care-givers, roadside foragers, neglected and preyed-upon children—each with a lesson in how to cope with adversity.



AS AN ART FORM, the picture book is inexhaustibly elastic. There is no situation so complicated or esoteric that a picture book can't accommodate it. Last week, this column was all birds and butterflies; this week, a selection of more sobering themes.

In "Keeping the City Going" (Atheneum, 32 pages, \$17.99), Brian Floca pays elegant tribute to the men and women who went out to work during the Covid-19 lockdown while the rest of the country hunkered indoors. Set in Brooklyn, this forthcoming picture book returns us to the early days of the pandemic, when crowded public spaces became deserted, busy thoroughfares went silent, and children who would otherwise have been at school looked out from windows at home on a world made strange. "The voice of the city is low, and the streets are almost empty," the young narrator tells us here. "Almost, but not entirely. There are still some people out on the streets, driving this and that, heading from here to there."

Mr. Floca, whose picture book "Locomotive" won the 2014 Caldecott Medal, has a fondness for vehicles, and in these careful ink-and-watercolor pictures he shows 4- to 8-year-olds the modes of transport that proved so useful (see below): delivery bikes, taxis and buses; ambulances, big rigs and bakery vans; pallet jacks, steel dollies and hand trucks. Amid the machinery are masked human figures—hospital workers, mail carriers, police officers—who kept working. At once a statement of gratitude and a time capsule—at least, let's hope so—"Keeping the City Going" exudes the feeling of patriotic common cause that prevailed during those first extraordinary months.

Andrea Wang captures a different kind of emotional resonance in "Watercress" (Neal Porter, 32 pages, \$18.99), a poignant picture book illustrated by Jason Chin. For the story, Ms. Wang drew on painful memories of her Ohio girlhood, when her Chinese-born parents sometimes obliged her to help pick wild edible greens.

In Mr. Chin's sun-washed watercolor paintings, we see a girl—perhaps the author—with her brother and parents in an old red Pontiac trunk.

dling past cornfields. "Look!" the children's mother cries, her eyes "as sharp as the tip of a dragon's claw." There's watercress growing in the watery ditch between road and field and soon parents and children are shoeless in the mud, collecting the plants. We feel the girl's embarrassment: "A car passes by and I duck my head hoping it's no one I know."

THIS WEEK
Keeping the City Going

By Brian Floca

Watercress

By Andrea Wang
Illustrated by Jason Chin

The Big Bad Wolf in My House

By Valérie Fontaine
Illustrated by Nathalie Dion

Tough Like Mum

By Lana Button
Illustrated by Carmen Mok

a table in China. "During the Great Famine," the mother says, "we ate anything we could find." On the facing page, we see the same family sitting in the same place, famished and exhausted, but the boy is gone: "It was still not enough."

Alongside the girl in the book, we are swept with sorrow and tenderness. She tells us: "I look from my uncle's hollow face to the watercress on the table and I am ashamed of being ashamed of my family." This moment is likely to spark conversation of a most important kind. Children often don't understand why their parents act as they do; parents often forget to explain. "Watercress" reminds us of the importance of filling in those gaps.

Poverty, parental dysfunction, domestic violence—they're not inviting subjects, but there are times when a child may feel validation and relief in reading about them. Valérie Fontaine uses a familiar fairytale villain to striking effect in "The Big Bad Wolf in My House" (Groundwood, 30 pages, \$18.95), a picture book for 4- to 8-year-olds translated from the French by Shelley Tanaka. "He batted his eyelashes and purred like a pussycat in front of my mother," a young girl tells us of her new stepfather. "But he looked at me with cold eyes and sharp teeth."

In her illustrations, Nathalie Dion makes great use of proportion as the big bad wolf reveals his brutal nature: He casts a looming shadow over the small child; the force of his howling ripples her mother's long hair. Later the girl's body seems to form a question mark as she examines the "finger marks" that the wolf has left on her skinny arm. As in fairy tales, the device of the wolf will help young readers keep a bit of emotional distance—and the book does end on a note of hope—but this is powerful stuff.

The same is true for Lana Button's "Tough Like Mum" (Tundra, 32 pages, \$18.99), illustrated with naive pictures by Carmen Mok. Here is a case not of outright cruelty but of scarcity and dysfunction. Waking in bed with her mother, a little girl named Kim gets up for school. There's no milk, so she eats her cereal dry and prepares a frugal lunch. Her mother, who was supposed to have signed a field-trip form, refuses to get up: "No matter how much I shake, she won't uncurl. Don't start on me, Kim!"

So the girl goes to school—hatless in the cold and lacking the form that everyone else's mother has signed—and covers her feelings by trying to act tough and unemotional, like her mum. When Kim gets home, it falls to her to retrieve the situation, and she manages to engage her mother, even making her laugh. It's not fair that as the child she must also act the parent. But sometimes, alas, that's how it is.

BOOKS

'At last the sacred influence / Of light appears, and from the walls of Heav'n / Shoots far into the bosom of dim Night / A glimmering dawn.' —JOHN MILTON

Finding God in the Details

Genesis

By Guido Tonelli
FSG, 223 pages, \$26

By ANDREW CRUMNEY

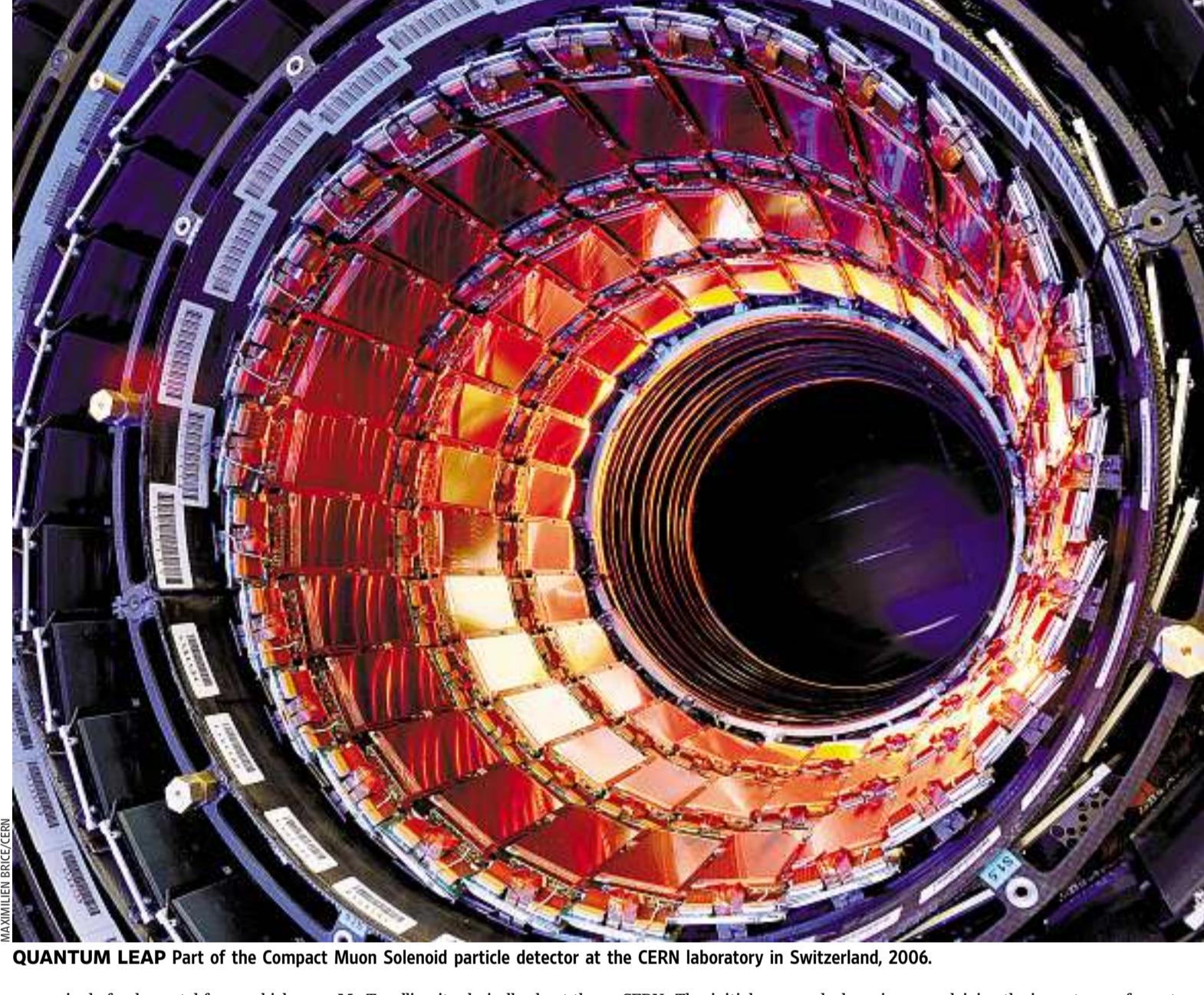
THREE YEARS AGO, the Italian physicist Guido Tonelli was in Sicily to give a talk about the origin of the universe. Also on the bill was a Jesuit theologian who spoke about the Book of Genesis. The theologian, we are told, pointed out that the biblical account "is in fact two books, written in different eras and by many different hands." Unsurprisingly, commentators continued to see inconsistencies. How, for instance, could there be days before there was a sun? Many preferred to interpret the days flexibly, as does Mr. Tonelli. In "Genesis: The Story of How Everything Began"—Mr. Tonelli's own take on the creation story, a scientific summary of 13.8 billion years of cosmic history—the author divides the seven "days" into very unequal time steps, from the big bang to the appearance of planets able to support life.

An obvious first question is: What came before the big bang? There are three answers that physicists generally choose from. One, prominently advocated by Stephen Hawking, is that the question is meaningless: There was no time before. Another answer suggests that our universe might be a temporary phase in an infinite process—a bubble in eternal chaos, or the mirror image of an endlessly receding past. The third, most honest and least heard, is: Nobody knows.

Mr. Tonelli prefers the first answer. "In the beginning was the void," he affirms, though this void was not empty. Albert Einstein's theory of relativity tells us that space can have energy, and Werner Heisenberg's uncertainty principle allows for the spontaneous appearance of particles. We may not know where the void came from, but scientists can describe how it grew.

The mathematical theory of an expanding universe was worked out in the first half of the 20th century by a number of people. Mr. Tonelli focuses on the Belgian priest Georges Lemaître, whose pyrotechnic "primeval atom" was rather different from the element-forming model of the physicist George Gamow and others. Lemaître's theory led to the name "big bang" and, more important, explained why stars are made almost entirely from hydrogen and helium. The appearance of these two atomic elements was the culmination of a process that fills the first three days of Mr. Tonelli's cosmic week—but in actual time took mere seconds.

That brief but eventful period is of greatest professional interest to the author, who played an important role in the discovery of the Higgs boson in 2012. The existence of the particle had been hypothesized decades earlier as a way of explaining what went on during the first moments after the big bang. Initially, it is assumed, there



MAXIMILIEN BRICE/CERN
QUANTUM LEAP Part of the Compact Muon Solenoid particle detector at the CERN laboratory in Switzerland, 2006.

was a single fundamental force, which very quickly split into the four we know today: gravity, electromagnetism, and the strong and weak forces of nuclear physics. When these four forces were unified, they would have been carried by a single type of particle, but as temperatures fell in the

A scientific creation story that breaks 13.8 billion years of cosmic history into seven 'days'—albeit of very unequal time steps.

expanding universe, different kinds of particles emerged. The Higgs boson played a crucial role in that process, effectively binding to some particles, making them heavy, but not to others. The particles that carry the strong and weak forces are heavy, only working over subatomic distances, while electromagnetism is carried by photons—the particles that light is made of—and can extend over unlimited distances.

Mr. Tonelli writes lyrically about the "delicate touch" of the Higgs boson, whose appearance "one hundredth of a billionth of a second after the Big Bang" inaugurated the second of his metaphorical days. What happened during the first was inflation—an incredibly rapid expansion whose evidence is seen in microwave radiation reaching us from the universe's farthest visible limit. The uniform temperature of that radiation must have been caused by very fast growth, but the particle that drove the process, termed the "inflaton," has yet to be discovered. The most powerful particle accelerator in the world today—the Large Hadron Collider at the multinational CERN laboratory on the Swiss-French border—can create, for a brief moment and in a very small space, the conditions of "day two," able to stir the Higgs boson from "that equilibrium in which it has rested now for billions of years." To reach even further back will require something substantially bigger and more powerful.

"If we want a new machine to be up and running in 2035-40," Mr. Tonelli writes, "we need to act right now." Plans are under way for "a collider 100 kilometres in length" to be built at

CERN. The initial proposal alone involved more than 1,300 physicists and engineers belonging to some 150 institutions. Digging the tunnel will cost €9 billion (nearly \$11 billion); making the equipment will add another €15 billion. There will be salaries to pay—not to mention a hefty electricity bill. For anyone steering such gargantuan projects, and needing to convince governments to pay up, skillful PR is as important as clever theorizing or precision engineering.

"Genesis" shows this public-oriented approach to advantage. The style, tone and difficulty-level of the book are what one might expect in a lecture aimed at a general audience. All that's missing are the PowerPoint slides. There are interesting digressions into other cultural areas—Greek myth, Renaissance art and so on—sometimes to illustrate important technical ideas such as symmetry, or merely as pleasant asides. Word origins are another humanistic sweetener, though I didn't feel I needed to be told that the discoverer of cosmic inflation coined the word "from the Latin *inflate*, to inflate, which was already commonplace in economics to describe a steep rise in prices." Still, if a large part of one's professional life involves

explaining the importance of quantum-field theory to politicians, any connection to the inside of their wallets will bolster real-world relevance.

Cramming billions of years into a couple of hundred pages inevitably means that much must be left out, especially when half of the book covers only a few seconds. Readers wishing to know more can, of course, find very many books that go deeper. "Genesis" is no better or worse than most of those: It summarizes the current standard models of fundamental particles and cosmic evolution pleasantly and elegantly. For science itself, the bar is higher. As Mr. Tonelli writes, "it is not enough that [a theory] happens to be elegant and enjoys a considerable popularity." There also needs to be evidence—and the most exciting kind shows theoretical models to be wrong rather than right. What researchers hope for is the unexpected. What funders prefer is to know the outcome in advance. It's a paradox that top-level scientists like Mr. Tonelli negotiate with aplomb.

Mr. Crumey is the author, most recently, of "The Great Chain of Unbeing."

Bestselling Books | Week Ended April 10

With data from NPD BookScan

Hardcover Nonfiction

TITLE AUTHOR / PUBLISHER	THIS WEEK	LAST WEEK
The Hill We Climb Amanda Gorman/Viking	1	1
The Women of the Bible Speak Shannon Bream/Broadside	2	2
Broken Horses Brandi Carlile/Crown	3	New
Woman Evolve Sarah Jakes Roberts/Thomas Nelson	4	New
Vibrant Stacie Stephenson/BenBella	5	—

TITLE AUTHOR / PUBLISHER	THIS WEEK	LAST WEEK
Finding Freedom Erin French/Celadon	6	New
Fault Lines Voddie T. Baucham/Salem	7	New
The Code Breaker Walter Isaacson/Simon & Schuster	8	7
The Light of Days Judy Batalion/Morrow	9	New
Broken (In the Best Possible Way) Jenny Lawson/Holt	10	New

Nonfiction E-Books

TITLE AUTHOR / PUBLISHER	THIS WEEK	LAST WEEK
The Body Bill Bryson/Doubleday	1	—
Killers of the Flower Moon David Grann/Doubleday	2	—
Lives of the Stoics Ryan Holiday & Stephen Hanselman/Portfolio	3	—
Quittless Alinka Rutkowska et al./Leaders Press	4	—
Beautiful Things Hunter Biden/Gallery	5	New
Broken (In the Best Possible Way) Jenny Lawson/Holt	6	New
The Light of Days Judy Batalion/Morrow	7	New
The Dionne Quintuplets Sarah Miller/Schwartz & Wade	8	—
Lidia's Italian-American Kitchen Lidia Matticchio Bastianich/Knopf	9	—
The God Equation Michio Kaku/Doubleday	10	New

TITLE AUTHOR / PUBLISHER	THIS WEEK	LAST WEEK
The Hill We Climb Amanda Gorman/Viking	1	1
The Women of the Bible Speak Shannon Bream/Broadside	2	2
Broken Horses Brandi Carlile/Crown	3	New
Woman Evolve Sarah Jakes Roberts/Thomas Nelson	4	New
Finding Freedom Erin French/Celadon	5	New
Vibrant Stacie Stephenson/BenBella	6	—
Fault Lines Voddie T. Baucham/Salem	7	New
Faucian Bargain Steve Deace /Post Hill	8	New
Broken (In the Best Possible Way) Jenny Lawson/Holt	9	New
The Light of Days Judy Batalion/Morrow	10	New

Hardcover Fiction

TITLE AUTHOR / PUBLISHER	THIS WEEK	LAST WEEK
Dog Man: Mothering Heights Dav Pilkey/Graphix	1	1
Rowley Jefferson's...Spooky Stories Jeff Kinney/Abrams	2	2
The Four Winds Kristin Hannah/St. Martin's	3	—
Oh, the Places You'll Go! Dr. Seuss/Random House Young Readers	4	—
Broken (In the Best Possible Way) Jenny Lawson/Holt	5	—

Fiction E-Books

TITLE AUTHOR / PUBLISHER	THIS WEEK	LAST WEEK
Bloodline Will Wight/Hidden Gnome	1	New
The Four Winds Kristin Hannah/St. Martin's	2	3
Jailbait Lani Lynn Vale/Lani Lynn Vale	3	New
Good Company Cynthia D'Ariix Sweeney/Ecco	4	New
The Midnight Library Matt Haig/Viking	5	9
Win Harlan Coben/Grand Central	6	6
Forever in Cape May Jennifer Probst/Montlake	7	New
There There Tommy Orange/Knopf	8	—
What the Devil Knows C.S. Harris/Berkley	9	New
The Red Book James Patterson & David Ellis/Little, Brown	10	1

Methodology

NPD BookScan gathers point-of-sale book data from more than 16,000 locations across the U.S., representing about 85% of the nation's book sales. Print-book data providers include all major bookstores, web retailers and food stores. E-book data providers include all major e-book retailers. Free e-books and those selling for less than 99 cents are excluded. The fiction and nonfiction combined lists include aggregated sales for all book formats (except audio books, bundles, boxed sets and foreign language editions) and feature a combination of adult, young adult and juvenile titles. The hardcover fiction and nonfiction lists also encompass a mix of adult, young adult and juvenile titles while the business list features only adult hardcover titles. Refer questions to Teresa.Vozzo@wsj.com.

Hardcover Business

TITLE AUTHOR / PUBLISHER	THIS WEEK	LAST WEEK
Atomic Habits James Clear/Avery	1	2
Soundtracks Jon Acuff/Baker	2	New
Get Good With Money Tiffany Aliche/Rodale	3	1
People Strategy Jack Altman/Wiley	4	New
Think Again Adam Grant/Viking	5	3
Resilient Seveth Wilson/Wiley	6	New
Huddle Brooke Baldwin/Harper Business	7	New
Redefining Financial Literacy Cindy Couyoumjian & R.F. George/Greenleaf	8	New
StrengthsFinder 2.0 Tom Rath/Gallup	9	6
Dare to Lead Brené Brown/Random House	10	8

REVIEW

ICONS

Aristocrats, Vagabonds And Clowns

Acclaimed British composer Thomas Adès finds inspiration in the elegant, ambiguous paintings of Watteau.

By J.S. MARCUS

The 18th-century French artist Jean-Antoine Watteau was a master of the fête galante, a genre of painting that depicts small and elegant gatherings in outdoor settings. For British composer and conductor Thomas Adès, Watteau's clowns and costumed vagabonds, often mingling with dapper aristocrats, offer a kind of self-recognition he couldn't find in the religious scenes and mythological subjects preferred by so many other Old Masters. Watteau's paintings are "filled with musicians, actors, layabouts and other people like me," Mr. Adès says.

Mr. Adès, 50, made a loud splash with "Powder Her Face," his 1995 opera about a sexually adventurous duchess. His subsequent operas have been based on sources as diverse as Shakespeare's "The Tempest" and a 1960s Mexican movie. Along with his steady output of orchestral and chamber works, they have made him one of the world's most performed composers of contemporary classical music.

His music is rhythmically innovative but historically minded, often accompanied by musical and literary allusions. Mr. Adès, who divides his time between Los Angeles and his native London, has spent much of the pandemic putting the finishing touches on a three-part ballet based on Dante's "Divine Comedy," set for a premier this fall at London's Royal Opera

House.

Though Mr. Adès was always drawn to music—he says learning to play the piano predates his first memories—he was also surrounded by art from an early age. His mother, art historian Dawn Adès, is a scholar of Surrealism, and the painter Francis Bacon was a family friend. Bacon's ability to paint "figuratively without illustration," he says, has guided him in his free-flowing approach to melody and harmony.

After growing up "saturated" in the 20th-century avant-garde beloved by his mother, he didn't get to know the historical core of European art until college. He was later introduced to Watteau's work by his friend Philip Hensher, a British novelist who wrote the libretto for "Powder Her Face." Mr. Adès's first string quartet, "Arcadiana" (1994),

was inspired in part by Watteau's "Pilgrimage to the Isle of Cythera" (1717), a signature work in the Louvre's collection, whose "wonderful and deliberate ambiguity" he reveres.

The painting depicts a cluster of amorous couples cowering among flying cupids and a statue of Venus. No one is quite sure if the couples are on their way to Cythera, regarded in antiquity as the birthplace of the goddess of love, or about to leave it, and critics have interpreted the work as both a

timeless evocation of pleasure and a wistful depiction of a passing fancy.

Mr. Adès seeks out Watteau's works when he travels, and he is especially fond of the circa 1715 painting "La Perspective (View through the Trees in the Park of Pierre Crozat)," at the Museum of Fine Arts in Boston. In this uncanny fête galante, couples gather in a clearing in the shadow of soaring, almost sinister foliage, with a view of something unknown beckoning just beyond. Mr. Adès regards the work's "great hole," as he

calls the foliage gap, as shedding light on the conductor's profession and the composer's vocation. "When you're conducting, you're a conduit between the audience and a mysterious place where the composer's music came from."

Mr. Adès's pieces often include musical quotations and allusions. "The Tempest" cites Watteau's contemporary, the French Baroque composer François Couperin, and his new Dante ballet refers to Franz Liszt. Watteau

calls the foliage gap, as shedding light on the conductor's profession and the composer's vocation. "When you're conducting, you're a conduit between the audience and a mysterious place where the composer's music came from."

Jean-Antoine Watteau, 'La Perspective (View through the Trees in the Park of Pierre Crozat)', ca. 1715.

did something similar: In another of Mr. Adès's favorites, "The Attractions of Life" (ca. 1718-19) in London's Wallace Collection, the artist makes references to the Italian Baroque painter Francesco Albani and the 17th-century Flemish painters David Teniers and Peter Paul Rubens.

Guillaume Faroult, curator of 18th-century French painting at the Louvre, says Watteau scholars are still looking for new information about the artist, whose thin biographical trail does not include a single letter or direct personal document. In his recent book about Watteau's impact on French art, "Painter of Love: Erotic Imagery in 18th-Century France," Mr. Faroult presents new research about Watteau's ties to Parisian libertine circles, which included freethinkers as well as advocates of free love. He says that a colloquium devoted to the artist in Paris this fall will be a venue for scholars to present new theories about Watteau's friends and collectors.

Mr. Adès says that several decades of looking at Watteau's work has given him insights into the artist's nature. "He was incredibly funny but could be very difficult. And he was very melancholy," he says. "I do now feel like I know Watteau very well."



Watteau's 'The Attractions of Life', ca. 1718-19.

MASTERPIECE | 'THE LOTOS-EATERS' (1832), BY ALFRED LORD TENNYSON

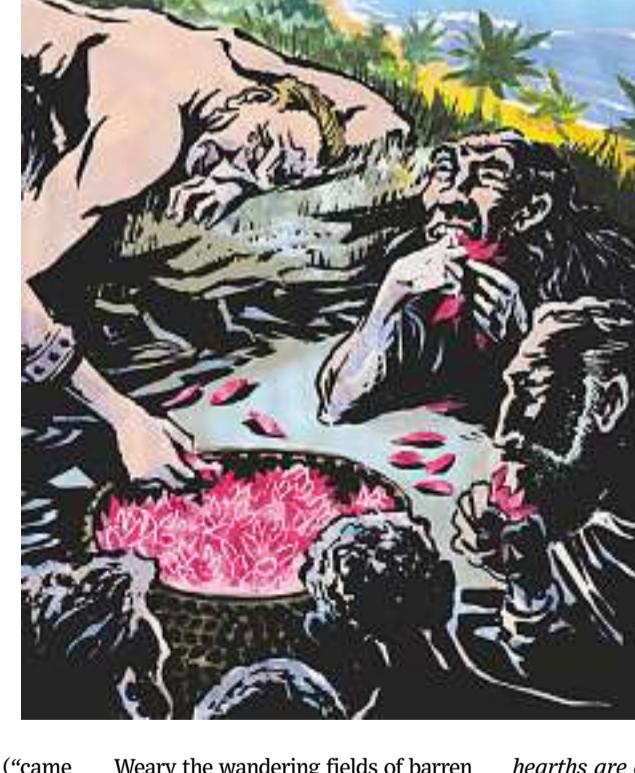
Siren Song Of the Idle Life

By BARTON SWAIM

ELECTIONS, POLICY DEBATES, legal feuds, riots, scandals, wars, rumors of wars—will any of it matter a thousand years from now? Does any of it matter now? Alfred Lord Tennyson's poem "The Lotos-Eaters" doesn't offer answers. Rather it offers a glimpse of what it might look like to conclude that earthly toil is no longer worth it. I've read the poem two or three times a year since 1999, when I first encountered it. Neither the quandaries of middle age nor the follies of each day's headlines have lessened its relevance.

The poem, published in 1832 when the poet was 23 years old, begins as a ballad depicting the episode in Book IX of the "Odyssey" in which Odysseus and his men arrive on an island where the inhabitants subsist on a diet of lotus-tree fruit. (Tennyson opts for the less common transliteration of the Greek, *lotos*.) When some of Odysseus' men eat the fruit, they fall into a trance and decide to give up the work of finding their way home.

Tennyson uses the episode as a kind of metaphor for complete resignation: the feeling that maybe it's better to surrender, disengage from the world and its troubles, and live mainly for rest and mindless pleasure.



Weary the wandering fields of barren foam." At last one man pronounces, "We will return no more;" And all at once they sang, "Our island home Is far beyond the wave; we will no longer roam." What follows is an eight-stanza "choric song" in which the men sing of their hopelessness and sole desire: "Give us long rest or death, dark death, or dreamful ease." The ordered Spenserian stanzas of the opening break down into something much looser, with iambic lines of various length and rhymes in haphazard

sequence, sometimes three or four in succession. Tennyson's gift for lyricism was unequalled, and here it conveys a languid, intoxicated rhapsody.

The meditations of the men range from plaintive indictments of their life circumstances ("All things are taken from us, and become / Portions and parcels of the dreadful past") to semicoherent arguments for giving up and never returning:

all hath suffer'd change;

For surely now our household

hearths are cold,

Our sons inherit us: our looks are strange;

And we should come like ghosts to trouble joy.

A decade after its first publication, Tennyson republished "The Lotos-Eaters" and heavily revised the eighth and last section of the choric song, turning short, buoyant lines into long, windy ones of hexameters and heptameters. Modern critics generally prefer the earlier version, calling the later one "ponderous" and the like, but Tennyson knew what he was doing. The song's final section

has the mariners sounding, compared to the foregoing verses, fully delirious. "Let us swear an oath, and keep it with an equal mind, / In the hollow Lotos-land to live and lie reclined / On the hills like gods together, careless of mankind."

Those gods, the sailors complain, enjoy human anguish as if it were music:

they find a music centred in a doleful song
Steaming up, a lamentation and an ancient tale of wrong,

Like a tale of little meaning tho' the words are strong.

In Homer's version, Odysseus forces his unwilling men back to the ship. Tennyson's rendering is more ambiguous; the song ends and we never hear the story's end.

At about the time he wrote "The Lotos-Eaters," Tennyson also wrote to a friend, William Brookfield, in part to scold him for his opium addiction. "What are you about—musing, and brooding and dreaming and opiumating yourself out of this life and into the next? Awake, arise or be for ever fallen" (the latter phrase a line from "Paradise Lost").

Odysseus' men, munching on the narcotic fruit, make valid points and make them beautifully: "There is confusion worse than death, / Trouble on trouble, pain on pain, / Long labour unto aged breath." But they have also given in to idleness, despair and ingratitude—none of which can make a man happy. Up, mariners. Back to the boat.

Mr. Swaim is an editorial-page writer for the Journal.

CHRISTOPHER SERRA



Frozen Feats
Mail-order pizzas that redefine
reheatable cuisine **D8**

FASHION | FOOD | DESIGN | TRAVEL | GEAR

OFF DUTY

THE WALL STREET JOURNAL.

Exercise Extravagance
Running gear
that might
exhaust your
wallet **D3**

Saturday/Sunday, April 17 - 18, 2021 | **D1**

Husqvarna's
Autonomous Automower
is easy as set it and
forget it.



How Does Your Robo Grow?

Achieve garden greatness with new high-tech, autonomous gear

BY RACHEL WOLFE

WHENEVER THE WEATHER permits, Britt Wood drinks his morning coffee on his patio, proudly watching his little guy mow his lawn. No, he doesn't have a particularly diligent son. Mr. Wood, the CEO of the National Association of Landscape Professionals, recently purchased an autonomous robot that drives around his South Riding, Va., yard, quietly munching each blade of grass down to the ideal 2½-inch height.

"It makes life a little easier," said Mr. Wood of the convenient, "pet-like" robot. "Once you get one of these, your lawn never looks better."

If 2020 was the year that many grew dependent on their backyards as a safe outdoor refuge, then 2021 might be the year they figure out how to spend less time maintaining their go-to retreats. One appealing solution: Upgrade the way you nurture your corner of nature with techy new tools—from robots that cut down weeds to sprinkler systems that rejig their run time depending on impending weather.

Anything that lets Americans enjoy more stress-free hours outside is good news: 25% of homeowners overhauled their gardens in 2020 and 19% plan to tackle an outdoor improvement project in 2021, according to a December 2020 survey by tool manufacturer Craftsman.

Here, our guide to the gear that might leave your neighbors wondering how you've gotten your garden so trim and tidy.

Turn to D9 for high-tech tools
to tend your yard.



The Tertill
Weeding Robot
runs on sunshine.

Craftsman's
Cordless 2-in-1
Hedge Trimmer and
Grass Shear is light
enough to use one-
handedly.

BETH HOEKEL

Inside



MAKE ME A MATCH
Designers are coordinating dresses and
table dressing as we entertain again **D2**



PIE FOR ALL
An Arabic tart recipe and a meditation on
the debate over appropriating flavors **D7**



CHANDELIER ON THE CHEAP
Why vintage sparklers—conveniently out
of vogue—are bargains now **D4**



WONDER WHEELS
Dan Neil on the Bugatti Chiron Pur Sport,
a frankly immodest ride **D11**

STYLE & FASHION



GUILLERMO CASASUS

TABLE, SET, MATCH
A photo illustration
that takes the art of 'table
dressing' to an extreme (print
by Hill House Home).

Social Chameleon

After a year of isolation, entertaining at home is finally possible, and some women are rising to the occasion by matching their outfits to their table settings. Designers are zealously catering to the trend.

By CHLOE MALLE

Last fall, when hosting Rosh Hashana dinner at her farmhouse in South Delhi, India, Cecile D'Ascoli wore a patterned cerulean silk dress. The look was from the eponymous line of womenswear and home linens that Ms. D'Ascoli owns with her husband, designer Peter D'Ascoli, and it elegantly complemented the print placemats, tablecloth and napkins—wares from a recent collaboration with Casa Cabana—that she used for the occasion. Like the dress, these jewel-toned tabletop accessories were inspired by caravan trade routes of the Eurasian Steppe. "It came from the same inspiration but was a different design so it worked perfectly," said Ms. D'Ascoli of her

High-Holidays ensemble.

D'Ascoli, which is based in Faridabad, India, is one of a raft of fashion brands offering suites of homeware, and particularly tableware, that are not only analogous to their ready-to-wear options but in many cases feature the same prints and colors. This trend—we'll call it "table dressing"—has been percolating for several years, with e-commerce hubs such as MatchesFashion and Moda Operandi investing increasingly in homewares that parallel their fashion offerings.

However, a year that most of us spent at home—glued to social media—accelerated table dressing's popularity. "The trend of photographing yourself with your table...is a highly curated affair," said Peter D'Ascoli. For evidence, just turn to Instagram. Paula Sutton

(@hillhousevintage), who posts stylized bucolic scenes from her Norfolk, England, cottage, has matched her pink gingham Love-ShackFancy frock with the marigold checks of her ruffled tablecloth. And earlier this spring, Cambridgeshire, England-based influ-

'Photographing yourself with your table is a highly curated affair.'

encer Alice Naylor-Leyland shared a photo in which her silky blue column dress echoed the shades of her table's hydrangea bouquets and patterned plates.

As rising temperatures and vac-

cination numbers make the prospect of hosting small gatherings a reality, table dressing's IRL appeal continues to grow. The scope for synchronization is expanding, too. You can pair Edie Parker's vermillion acrylic coasters with the brand's Cherry Bomb earrings; set the table with La DoubleJ's pineapple-motif plates while wearing the line's parallel-print crepe de chine swing dress; or coordinate Off-White's arrow-logo-emblazoned bomber with its logo-patterned table runner.

For her part, Ms. D'Ascoli advises table-dressing novices to avoid precise matching and aim for more nuanced dialogue between prints. "I would never wear the same dress as my tablecloth," said Ms. D'Ascoli. "I prefer to coordinate, but not match."

For Heather Taylor, founder of the Los Angeles-based label Heather Taylor Home that sells gingham table linens, table dressing is about "matching a feeling." Sure, that sounds pretty abstract, but Ms. Taylor, who often hosts in her backyard in Laurel Canyon, has concretely mastered the trend: Last summer, she collaborated with West Coast boho brand Döen on a range of check dresses that matched her tablecloths. And this May, the brand Clare V. will unveil a collection of vibrant checked purses and apparel inspired by Ms. Taylor's summer suite of gridded linens.

Table dressing isn't merely a product of isolation or the Instagram age—fashion and interior design have historically often reflected each other. Around the turn of the 20th century, Frank Lloyd Wright designed modernist dresses for clients to complement their new homes, and Gloria Vanderbilt's patchwork housecoat deliberately accentuated her famous quilt-pattered bedroom.

Even if you lack the aesthetic prowess of Ms. Vanderbilt, you should turn to your wardrobe for tabletop inspiration, suggested Nell Diamond, founder of Hill House Home, a brand that sells crisp bedding and the cult-favorite Nap Dress. "Taste and style that works for you should consistently work for you, from your dress to your tabletop," said Ms. Diamond, who come June will drop new Nap Dress patterns and coordinating table linens—a Hill House Home *Gesamtkunstwerk*, if you will.

Of course, your décor can inspire your fashion sensibilities as well. Ms. Diamond has noticed that customers who might be reluctant to bedeck their ponytails with bows seem to test the trend with Hill House's pre-tied satin bow napkin rings. "Once they get that bow in their life, they think, maybe I'll try one in my hair," she said. "I call them our gateway bow."

Like Ms. D'Ascoli, Ms. Diamond recommends trying complementary colors rather than exactly matching your Nap Dress to your napkin. For example, she suggests pairing Hill House Home's newly released bubble-gum stripe dress with botanical table linens in deep pinks and reds. "[Coordinating] your outfit with the tablescape allows you to curate the whole mood and transport yourself," she said. "It allows people to daydream a bit more."

TASTEFUL TEAMS / COMPLEMENTARY DRESSES AND TABLE SETTINGS THAT WILL ASSURE DINNER GUESTS YOU'VE GOT IT TOGETHER



SWEET SYNERGY
Pineapples symbolize hospitality, so a dress and dessert plates bearing the fruit will doubly demonstrate your graciousness. Dress, \$855, Plates, \$340 for 6, [ladoublej.com](#)



PARALLEL FLORALS
There's Gatsby-esque decadence in hosting cocktail hour and matching your embroidered napkins to your dress. Dress, \$598, Napkins, \$98 for 4, [toryburch.com](#)



SUBTLY IN SYNC
If you quail at 'matchy matchy,' try D'Ascoli's printed Taraz dress and imprecisely paired linens. D'Ascoli Dress, \$571, [matchesfashion.com](#); D'Ascoli Placemat, \$90, Napkins, \$84 for 4, [cabanamagazine.com](#)

A Call to Charms

While quirky plastic charm bracelets are resonating with the TikTok set, traditional takes on the sentimental accessory are surging too



YOU'RE IN LUCK
Charms for all tastes and budgets. From left: Charm, \$154, [catbirdnyc.com](#); Charm, \$1,885, [retrovai.com](#); Charm, \$2,800, [prounisjewelry.com](#); Charm, \$1,080, [marlolaz.com](#); Charm, \$1,900, [sidneygarber.com](#); Charm, \$795, [foundrae.com](#); Charm, \$290, [rondeljewelry.com](#); Charm, \$1,980, Bracelet, \$2,300, [mociun.com](#)

MAGIC 8-BALLS, fluorescent mushrooms and hot dogs squiggled with mustard—these are just a few of the standout candy-colored beads on Ian Charms's wildly irreverent takes on the charm bracelet (pictured, below). Musician Dua Lipa and YouTuber Emma Chamberlain are fans, and DIY versions are cropping up all over TikTok. Social media has been an ideal vehicle for customers to discover the jewelry, said designer Lisa Sahakian. "Ian Charms stands out because it's fun and weird...Its chaotic, mis-matchy vibe meets the tone of today."

The allure of charms long predates the TikTok generation. Amulets were used as prehistoric versions, but the most recognizable presentation—a linked bracelet with personal keepsakes, like the one pictured at left—can be traced to the Victorian era, explained jewelry historian Anna Rasche. Queen Victoria wore one string with multicolored enamel hearts, each containing a lock of an offspring's hair. Key to the charm bracelet's enduring appeal, said Russell Whitmore, owner of Brooklyn antique jewelry store Eric Basin, is that it prizes sentimentality and identity over trendiness. That's the pull for actress Debi Mazar. "I have all kinds of charms, from religious protection to New York City fire hydrants, Spanish fans, Italian buildings, Cuban coffee pots, cancan dancers,

rocket ships...and a 1964 subway token—the year I was born," said Ms. Mazar, who has made bracelets for her daughters and traces her own fondness back to her mom and grandma. "[Their charms] all had a meaning and I've always loved a good story."

No matter the bauble—whether Retrouvai's decadent diamond good-luck charms, understated pearls from Rondel or Ian Charms' playful ceramic beads—it's the symbolism of charm bracelets that's resonating now. "When the world is out of control, it can be a comfort to have something you love and long for—a place, person, sense of protection—made manifest in a beautiful, tangible object," said Ms. Rasche. Brands like Foundrae, whose 18k-gold charms borrow cues from ancient motifs, take that mission to heart. "I look for a symbol that has a meaning," said co-founder Beth Bugdaycay. "It's more than jewelry." Foundrae's bestselling charm category amid the pandemic? One called "Resilience." —Fiorella Valdesolo



STRIKE IT KITSCH
Bracelet, \$70, [iancharms.com](#)

STYLE & FASHION

BY JACOB GALLAGHER

MY RUNNING clothes are dreadful. For years, I've run in \$20 polyester shorts purchased at an outlet, a cotton T-shirt of forgotten origin that smells permanently like B.O. and chintzy white cotton socks. I'm not a marathoner, but I clock around 20 to 30 miles a week. It's a respectable routine, but lately I've felt that my clothes are far from respectable.

In recent years, a clutch of labels selling pricey running gear with a high-design sensibility has invaded the exercise-clothing market. Primarily established by actual runners, these brands include District Vision, a 5-year-old Los Angeles outfit that began peddling futuristic \$200-plus sunglasses with pastel lenses, but has since moved into tailored \$125 high-neck sweatshirts and nipped \$75 shorts. Tracksmith out of Boston takes a retro approach, selling old-school \$65 singlets and \$88 polos in moisture-wicking mesh. Satisfy, a Paris label, occupies the highest price bracket and offers the most progressive-looking gear, such as a \$387 leopard windbreaker and a \$200 tie-dyed merino wool T-shirt.

Spending big on gear could trigger guilt if you ponder quitting.

On any given day I'll see devoted runners trotting along in this conspicuously costly gear, making me feel a bit inadequate in my pedestrian get-up. And so I decided to call up a few stylish runners and ask them whether such investment gear is worth it. Most of them directly correlated cost and quality. Carl Maynard, 35, a photographer in Washington, D.C., who runs around 50 miles a week, has invested heavily in District Vision and Tracksmith gear. For him it was a simple calculation: He could either continue to spend around \$35 every couple of months when his Nike shirt or shorts wore thin, or he could plop down a few hundred now and be set for a while. He is convinced that gear like District Vision's \$225 waterproof jacket and Tracksmith's \$72 Italian-fabric half-tights will last through years of runs.

To dedicated runners, it only makes sense to invest in their most time-consuming pursuit. Austin Lord, 31, a retail employee in Chicago who is training for the October Chicago Marathon, calculates the cost per wear for items like his \$100 green-and-black Satisfy T-shirt. If he runs in it several times a week, he feels it's worth the price. There is also a psychological advantage to spending more on your given hobby. While some people pay for expensive gym memberships to kick-start their exercise plan, others buy a week's supply of trim \$68 recycled polyester shorts from cult fitness label Outdoor Voices. The financial commitment proves you're serious about running and could trigger guilt if you consider dropping the routine week in.

These refined running labels can also motivate runners by positioning the sport as cool. Daniel Diaz, 29, who works in ad sales in New York and has run seven marathons, noted that track gear has not always been marketed as something to get excited about. When he first started running in high school, a sports-store employee told him to "just worry about the comfort," not how something looks. Today, mainstream brands often follow that ethos, placing function and frugality over looks. The drab basicness of their clothes has opened a door for aspirational brands like Satisfy, whose website features gritty photos of tattooed runners bounding through craggy trails in the brand's minimalist clothes. These labels make running look like a tantalizingly stylish activity.

Mr. Diaz knows that he's literally buying into an edgy image, but if it makes mile seven more bearable for him, perhaps

Pricey, slickly designed running clothes have sprinted into the workout-wear market. Is it worth shelling out hundreds of dollars for something destined to be drenched in sweat?



JAMES BOST

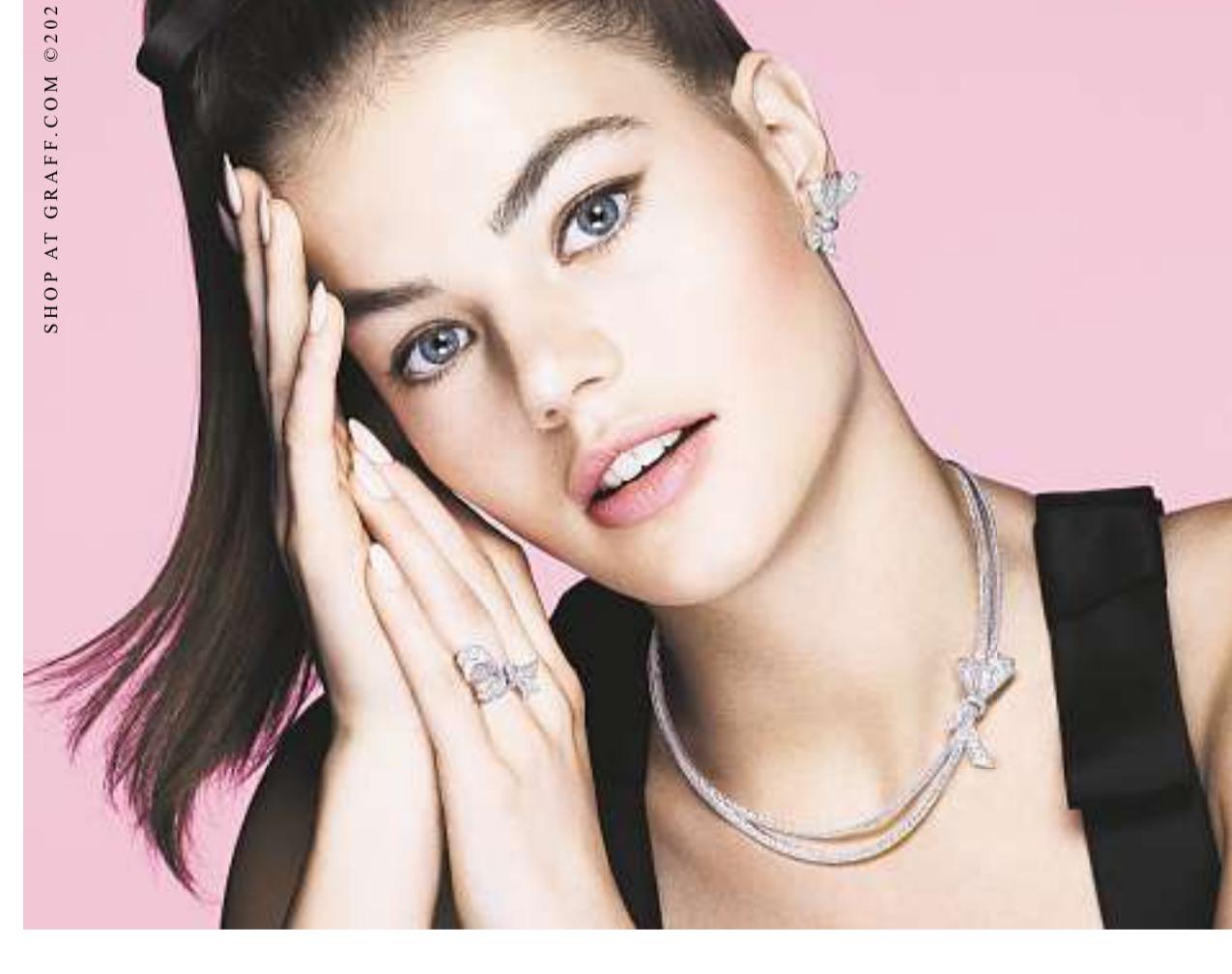
STEP IT UP / PREMIUM RUNNING PIECES

 Trippy Tank Recycled cotton that's been hypnotically hand-dyed. T-shirt, \$90, satisfyrunning.com	 A Better Basic Ventilated and moisture-wicking. Shirt, \$85, reigningchamp.com	 Prize for the Eyes Feather-light frames outfitted with rosy lenses. Sunglasses, \$250, districtvision.com	 Pop-y Pullover Bulk-free wind protection in an unmissable neon hue. Top, \$175, soarrunning.com
 Retro Runners Vintage-inspired but made in modern mesh. Shorts, \$65, tracksmith.com	 Minimalist Midlayer Japanese textiles cut into a sleek shape. Top, \$225, districtvision.com		

it's worth it. Runners have long used mental tricks to get themselves going—I have friends who claim subpar music playlists have ruined their mile times. It makes sense that feeling confident about your look may up your pace. As Mr. Lord said, "It's that old adage of just look good, feel good."

These elite brands offer clothes that runners consider fine-tuned for their sport. My bargain-basement mesh shorts are lightweight enough, but they lack pockets and bunch up weirdly after a few miles. Meanwhile the Tracksmith shorts favored by Brian Schroy, 32, who works for a nonprofit in Boulder, Colo., and runs as many as 90 miles a week, have pockets for energy gels (carbohydrates in goo form, popular with runners), are cut for maximum, bunch-free mobility and have a built-in underwear liner. As he sees it, the authenticity and thoughtfulness of these for-runners-by-runners brands makes the gear better.

Still, there's a limit to how much most runners will spend. Those I interviewed felt that Satisfy's \$219 shorts and \$120 T-shirts were worth the price, but they wouldn't pay any more for gear. I'd feel distracted by the thought of sweating in something that expensive, though I do plan to purchase some \$60 moisture-wicking T-shirts. They will be worth it, merely by ensuring I don't stink so much every single morning.



GRAFF

TILDA'S BOW

DESIGN & DECORATING



MAGNUS MARDING / TRUNK ARCHIVE

A MATTER OF LIFE AND DÉCOR / MICHELLE SLATALLA



In Praise of Out-of-Vogue, Dime-a-Dozen Chandeliers

WHEN I WAS growing up, my mother's chandelier was her most beloved belonging and the reason my brothers were not allowed in the living room.

The chandelier was a nine-armed confection of crystal and bronze that was the birthplace of everything that sparkles. When the sun hit it just right, the lead-crystal pendalogues refracted candy-color rainbows on the walls that my Dennis the Menace brothers snuck in to lick.

April was the season for chandelier cleaning, a team sport in which my parents excelled. The two-day event involved painstakingly cleaning each crystal with rubbing alcohol and Q-tips. Then my mother, the team captain, would instruct my father in the proper technique for rehanging the crystal with a special pair of surgical tweezers.

This month, as I remember that happy, twinkly springtime ritual, I wonder why classic chandeliers have lost their luster. It's true: Nobody wants a grandma chandelier (I can't believe we're even calling them) anymore. Even as the

millennials have championed every other vintage-furnishings trend imaginable—from spindle beds to cross-stitching—they have passed over the chandelier.

"The new generation wants nothing to do with crystal chandeliers," said Michael Lombardo, a Philadelphia chandelier restorer who specializes in cleaning, installing and repairing crystal fixtures.

"Is it because it takes two days to clean one?" I asked.

"No, I can clean one in two hours," he said, adding that cleaning fees for "a basic dining-room fixture" generally range from \$300 to \$500. "But I tell people don't use Windex because any ammonia-based product will cause the crystals' pins to oxidize and get brittle and break." (Instead, mix 1/4 cup rubbing alcohol with 1/4 cup of water—and spray it on a cleaning rag, not directly on the crystals.)

"There's nothing prettier than that sparkle of a clean chandelier," Mr. Lombardo said. "But I go to the same houses year after year, with chandeliers passed down from grandmothers, and when my clients

decide eventually to downsize, they say, 'I want to give the chandelier to my daughter or my son when I move, but they don't want it. They want something modern.'"

It's true. Nowadays, you can buy a circa-1880 French five-arm chandelier with 36 hand-cut crystals for \$275 at antiques site RubyLane. Or

Nowadays, you can buy a circa-1880 French five-arm chandelier with 36 hand-cut crystals for \$275.

over at Etsy, a six-light brass and crystal chandelier (circa 1940) which has been rewired for \$440. Or—can this even be true?—an eight-light, crystal-swagged Victorian chandelier with glass hurricane shades for \$350 on Chairish.

I called Noel Fahden, Chairish's vice president of merchandising, to confirm that there hadn't been a pricing mistake.

"Buying the parts—bronze, crystal prisms, etched bobeches [candle collars]—would probably cost more," I said. "I can't believe it."

"Believe it," she said. "Honestly, those traditional chandeliers were more popular 10 years ago, when the style influence was a traditional, feminine, Parisian apartment. Now one of the big movements is the mixing of styles. So if you're buying a spindle bed, it might be lacquered in a bright color. Or you might want to pair a spindle bed with a midcentury light fixture, like a brass Sputnik style, or an interesting flushmount that looks like a Murano-glass flower."

Another factor that has dimmed the popularity of chandeliers is the transition to LED lighting. The incandescent bulbs that power vintage chandeliers are having a hard time competing with long-lived, energy-efficient LED bulbs, said Prof. Joseph Rey-Barreau, an associate professor in the College of Design at the University of Kentucky who studies trends in lighting design.

"Fifteen years ago, LED bulbs were weird-looking and could give

off a very blue shade of light, but now they look like regular bulbs and can reproduce whatever color of light you like, from warm to cool," Prof. Rey-Barreau said.

"That's a convincing argument," I said. "I guess you've replaced all your incandescent fixtures with LED lights?"

"Well, no, it's almost embarrassing for me to say, but at home all of our reading lamps are still incandescent," Prof. Rey-Barreau said. "We have dimmers everywhere, on every table lamp, every floor lamp—I love dimming—and incandescent bulbs have a smooth dimming capability that LEDs cannot match."

"You need dim lighting for a dinner party, too," I said, starting to sound like I was a spokeswoman for the National Chandelier Association. But truthfully? There's nothing better than the golden glow from a chandelier to improve the quality of conversation and the complexions of the guests at the table.

"That's one reason chandeliers have been around since the Renaissance and are never going to go away," Prof. Rey-Barreau said, arguing that the fixtures are far from dead.

When it comes to lighting, he said, there will always be a market for embracing the past. "There are lighting companies with fixtures in their catalogs that are decades old," he said.

"So there's a market for new grandma-style chandeliers as well as old ones?" I asked.

"Yes, because builders and contractors tend to be conservative because 'traditional' design is a safe choice" when it comes to resale, Prof. Rey-Barreau said.

Of course, not all "traditional" design is good design.

"Some chandeliers out there are horrible," said Dallas interior designer Jan Showers, who goes on buying trips to Paris to find good ones. "When you go shopping for them, look for ones with bronze fittings. Otherwise they can look cheap."

Also, you need to know how to display a chandelier in its most flattering light.

"Don't hang it too low," Ms. Showers said. "It needs to hang at least 7 feet above the floor, and if it's over a dining room table, it needs to hang 35 inches above the top of the table."

A chandelier looks best if you let it take center stage. When Ms. Showers designed a room for a Dallas decorators' show house last year, she had it painted in four coats with a high gloss in a color—Benjamin Moore Wythe Blue—that enhanced the glimmer of the crystals on the chandelier, she said. "The light created a beautiful sheen on the walls."

It's probably a good thing my parents didn't use high-gloss paint. Prism rainbows on lacquer would have been too much for my brothers to resist.

Instant Picnics for The Picky—No Packing Required

Now you can commission cushy custom al fresco events for a party of two or 250 with all the plates, blankets, cushions (and even drumsticks) you need

LET'S BE HONEST, while a blanket unfurled beneath a leafy tree is the stuff of romantic movies, the DIY picnic plays out more like reality TV. "It sounds really casual," said Jamie Stewart, founder of Picnic PopUp in Nashville, "but when you actually go to do it [yourself], it can be a frustrating experience."

Now, however, a new branch of the event-planning industry that focuses on bespoke picnics is making the fairy tale possible, from bucolic tête à tête in Portland, Ore., to afternoon teas in Houston.

Last September, Manhattanites Bailey LaMarca and Stephen Zamora, whose trip to Capri was scuttled by the pandemic, booked an oceanside picnic with Destination Haus in Montauk, N.Y. The couple brought in locally made lobster rolls and chilled Wölffer Estate pinot gris. For its part, Destination Haus supplied the beachy tableaux, a nautical-pillow haven surrounded by lanterns, blue glass chargers on woven place mats and perky yellow Craspedia flowers in vases. "It was a glimmer of light in a dark year," said Mr. Zamora, who plans to make picnicking a summer tradition and has already booked one for August.

Destination Haus's Carlyn Vellante and sister Kendra expanded their art and home-decor business into picnic planning last summer. Their mission: to give diners in the Hamptons an alternative to the humdrum



TWIST OF FÊTE Above: A birthday setup for 14 in Del Mar, Calif., by Little Picnic & Co. Right: Destination Haus planned a pillow-perch bachelorette party at the lighthouse in Montauk, N.Y.

experience of takeout and the excruciating waits for socially distanced outdoor seating. Business boomed. The sisters planned as many as three picnics per night through October in 2020. And demand is unwavering for the 2021 season. "We're already double-booked our dates," said Ms. Vellante.

Most setups (with cleanups) cost \$100-\$200 per guest and include wedding-worthy tabletop décor, enough pillows and throw rugs to make a nest, plus floral arrangements.

While provisions aren't always included in the price, partnerships with food vendors make delectables such as charcuterie and caviar available for an upcharge. Little Picnic & Co., in San Diego, does brunch with pastries, macarons and a petite red-velvet layer cake topped with fresh flowers and gold foil. Picnic PopUp brings in dishes from Rare Bird, the restaurant in Nashville hotel Noelle, and sometimes offers al fresco meals on its skyline-view rooftop. Houston's Picnics in the City hosts Picnic + Yoga at Le Méridien hotel, where avocado toast fills bellies after a bendy workout.

Lockdown may have given picnic-planning a shot in the arm, but casual luxury has found a spot on the blanket, and it's not budging. —Yelena Moroz Alpert



ADVENTURE & TRAVEL

THAT'S DEBATABLE

Should You Go to a Disney Park Right Now?

A steadfast fan finds that the Happiest Place on Earth delivers the ultimate escapism during the pandemic, while a skeptic, predictably, scoffs at the idea



MICKEY MASK A Magic Kingdom 'cast member' welcomes visitors.

MATT STROSHANE

YES **THE STRETCH** of I-95 from Pennsylvania to Florida is a long, unlovely drive. But as soon as I was fully vaccinated, it was the first road trip I wanted to take. Destination: Orlando. I've been a devoted Walt Disney World fan for the last decade. I've made the trek once a year. Many key moments in my life have unfolded in the vicinity of Cinderella's Castle—I answered my phone to receive my first job offer while exiting the monorail; I watched friends get married at Epcot; I ran half marathons around all four parks. So, while I can understand why not everyone would race to the country's most popular amusement park during a pandemic, I was tired of waiting. I needed a jolt of whimsy. At the end of March, my partner and I opted to drive three days rather than fly, eager to avoid crowded airports. But after making the first trip outside of our neighborhood in a year, I was in my happy place. I never once regretted it.

Let's be clear: Disney World—which reopened in July, limiting capacity to 25% and later ticking up to 35%—is not an entirely carefree-zone. Visitors must wear an approved face mask and get a temperature check before passing through park gates. Ride vehicles are limited to one or two parties (if you've ever wanted an entire Pirates of the Caribbean boat to yourself, this is your chance). Hand-sanitizer stations are everywhere, as well as my new favorite, hand-washing stations. Most

meals and snacks must be ordered via the My Disney Experience app, to ensure distance between visitors and food-services employees. As an added benefit, guests are eligible for free Covid-19 testing care of the Florida Division of Emergency Management, outside resort gates, with on-site registration and speedy results (sometimes within the hour).

If you're expecting to breeze through the ride lines because of the reduced capacity, think again. Admittedly, we arrived smack in the middle of spring break so attendance was especially high. But with a number of corridors, restaurants and shows still closed, visitors simply have fewer options. We waited 70 minutes to board our little boat for It's a Small World. It was in that line, with the calliope version of "Chim Chim Cher-ee" on loop in the background, that I witnessed my first (of many) toddler meltdowns that sweltering day. The kid standing next to me was sobbing through his tiny mask. I asked his mother if the mask rule was a dealbreaker. She said it was no different than having to wear one all day in preschool. Later, I met Laura Koscho, a travel agent from Virginia, and her 7-year-old daughter Scarlett. Did the lack of parades and limited interaction with characters disappoint Scarlett? Not really. Her favorite character, Daisy, had applauded her dress earlier, and that alone, said Ms. Koscho, was worth the trip. They're planning to go back this fall.

—Annemarie Dooling

NO **THE VIRUS WILL** slowly burn itself out, as viruses do. In time I will emerge from my San Francisco home, dazed and blinking. I'll ask myself: Well, girl, you survived a global pandemic. You're vaccinated. What will you do next?

I'm not going to Disneyland. The Anaheim, Calif., park and its satellite, Disney California Adventure, are scheduled to reopen April 30, at limited capacity and only to state residents. Tickets went on sale at 8 a.m. Pacific Time on April 15 and were snapped up quickly. A toe-in-the-water program in March and April called "A Touch of Disney"—basically the chance to stroll around the California Adventure property, with no rides open, for \$75 a person—actually sold out. Clearly, my fellow Americans crave escapism.

I get it. We've all been to hell and, if we were lucky, back. Fun is important, and everyone could use some. But after nearly 13 months in strict, unrelenting lockdown, I'm looking forward to some pretty simple pleasures. Pedicures. Shopping. Hot yoga. Inviting my neighbors over for a drink. Visiting my dad. Hugging my away-at-college son for the first time since December 2019. Thrill rides, costumed characters, mouse ears and—ugh—crowds? None of these things make my post-pandemic wish list.

If you're a Disneyphile, I salute your optimism and receptivity. I'm actually a bit jealous.

I adored Disneyland as a kid. I have memories of going there with my eighth-grade class, running around with my friends, getting sunburned and laughing as hard as I've ever laughed in my life. I remember spending a birthday there in my early 20s and, later, introducing my son to the joys of Pirates of the Caribbean and Space Mountain.

But at some point in my adulthood, the place started to seem small and shabby; its twinkly fairytales-are-real message grating and naive. In the best of times, Disney fans' inclination to cope with real America by escaping into fake America strikes me as weird. Now it feels indecent.

I can't imagine being able to ignore the past year and embrace the fantasy—even for a few hours—that everything is magical and OK.

I would like to be a person who could float past glittering tableaux of singing animatronic children and not think that when a microbe can roar to life in Wuhan, China, and in a matter of days find its way to Snohomish County, Wash., 6,000 miles away, it is indeed a small, small world.

I have no idea what it would take to get me into "Happiest Place on Earth" mode, whether such a state of mind exists for me anymore, or that it even should. I'd like to be carefree, but Disney isn't going to get me there. —Lauren Lipton

The New Rules of Amusement

A few tips from a Magic Kingdom connoisseur on navigating the Disney parks during Covid times—and avoiding meltdowns

Buy a Park Hopper pass, your best chance to see all four parks now that each visit requires a park reservation as well as a ticket. Individual reservations to both Hollywood Studios and Magic Kingdom are booked many days through the spring, but the Park Hopper pass lets you visit a second park after 2 p.m., whether you have a reservation to that park or not. It's definitely a good deal. disneyworld.disney.go.com



Download and get comfortable with the My Disney Experience app ahead of time.

You'll be doing everything via this app, from checking your itinerary and making reservations, to ordering food. Because mobile ordering is mandatory at most quick service restaurants, to avoid waiting in a crowd outside the eatery door, use the My Disney Experience app meal scheduler. You can order meals to go and snacks to pick up at a specific time, when you know you'll be at a nearby attraction.

Try a mask chain, and a second mask. On hot days when you're removing your mask to eat and drink, or take photos, you're bound to drop one on the floor.

In Florida, book one of the Epcot resort hotels, such as the Yacht and Beach Clubs, or the Swan or Dolphin hotels. Each offers several ways to reach the parks—like the Friendship boats and the Skyliner. And you're a short walk away to two resorts. Otherwise, you'll have to rely on the shuttle bus, or drive your own car to the parking lot.

Head to the parks later to miss the crowds and hottest hours. With fireworks shows on hold, visitors with young children tend to head out early.

Scope out the festivals. While shows and parades aren't happening

GOOF OFF Clockwise: Disney's Yacht Club Resort; complimentary boats ferry guests to the parks; Disney's Beach Club Resort.



right now, the parks are hosting a number of festivals, including Earth Month at the Animal Kingdom (until April 24), the Epcot International Flower & Garden Festival (through July 5) and the Epcot Food & Wine Festival (starting July 15).

Snap a photo of your parking spot before walking to the gates. Trams have been discontinued during the pandemic, and you'll be walking from the lot to park gates, with no tram driver to announce your pickup location. —A.D.



MATT STROSHANE, YACHT CLUB; CATIE MCCABE, BOAT

ADVENTURE & TRAVEL



SPIROS HALARIS

TRAVELER'S TALE / KIRSTIN VALDEZ QUADE ON LOVE, LOSS AND TREASURE TROVES IN SANTA FE, N.M.



The Museum of My Memories

LIKE EVERYONE ELSE, I've spent a chunk of the pandemic fantasizing about all the things I'll do when this is all over. Visit family. Travel. Over and over I find myself longing for museums.

My love affair started early. I have happy memories of spending the day with my aunt at the Natural History Museum in Albuquerque when I was about five. Predictably, I was mostly drawn to the dinosaurs. Later, because money was tight, my mother would regu-

larly use museums as free babysitting, a fact she hates being reminded of. When we lived in Salt Lake City, she'd leave my little sister and me at the **Utah Natural History Museum**, where, if you dropped coins down the throat of a T-Rex, he'd bellow, "Feed me money," or the Hansen Planetarium, or when we moved again, the **Arizona Historical Society**, where my favorite exhibit was a fake copper mine.

But the first museums I loved

were the ones right down the road from my grandmother's home in Santa Fe, N.M. When I was a child, the grounds felt like an extension of my grandmother's trees, part of the domain I was allowed to roam. In 1960 when my grandfather built the house among the piñon where my mother was raised, the roads were still dirt and there were two museums a short walk away: the Wheelwright Museum of the American Indian and the Museum of International Folk Art. In 1961,

the Museum of Indian Arts and Culture opened too. Now, the neighborhood is fancy. There are more houses, the roads are paved. The Museum of Spanish Colonial Art joined the others, plus the Santa Fe Botanical Gardens and a café. The area has been rebranded as Museum Hill.

When I was about 10, my grandmother and I spent an afternoon at the Wheelwright Museum of the American Indian. The museum was nearly empty and we walked through the quiet galleries filled with finely patterned baskets, silver jewelry and intricately painted Pueblo pottery. We were nearly ready to go when we came upon a Navajo docent demonstrating weaving on an upright loom. She invited me to try. I sat on the floor before the frame, pulled the wool between the taut rows of warp, thumping the weft firmly into place with the wooden comb. I loved the precision, the rhythm, the way the rug grew incrementally up the loom.

My grandmother is not especially patient—I don't know that I've ever seen her watch a television show all the way through or read a book—and she was always bustling around or cooking. Yet, that day, she sat quietly on a chair doing nothing at all while the sun streamed in the window and I wove happily into the afternoon.

I adored the Folk Art museum, with its crowded and brightly colored displays. The walls were covered in the vivid fabric art of the Panamanian molas, intricate cut-paper silhouettes, astonishing masks. It was, to my child's eye, a museum of toys: dolls and puppets and santos from around the world, each with a clear personality; carved wooden animals, porcupines and pigs and parrots; dancing skeletons and painted calavaras, devils and creatures and monsters. I especially loved the vast miniature clay town of Acatlan, with churches and cactuses and market carts piled with fruits—tiny, busy everyday life.

Summers during high school and college, I'd walk the grounds after the museums closed with Volky, my aunt's malamute/wolf mix. Volky was the absolute best

and best-behaved dog I've ever known, and she'd trot beside me, gazing alertly all around with her one blue eye and one brown. She was beloved in the neighborhood, frequently taken for walks by neighbors. She was even an item of note on the tram tour that passed my grandmother's house.

For several years, on Thursdays at sunset in the amphitheater, Volky and I would watch the storyteller Joe Hayes perform tales from the local Hispanic, Native American and Anglo traditions. Once, during a coyote tale, Volky howled, right on cue. When the coyote in the story howled again, so did Volky.

Each evening, Volky and I would pace the gravel labyrinth on the museum grounds in the heavy

The strange frozen nature of the pandemic has, for now, allowed me to put off true understanding of what we have lost.

golden light. Above us rose Atalaya Mountain, piñon-dotted and glowing pink. Sometimes my grandmother would join us, walking with his head down and hands clasped behind his back, telling jokes.

So much has changed in the past year. My grandparents became sick with Covid-19. The fragile balance of caregiving crumbled. My grandfather died. My grandmother is now in a nursing facility and, as she declines, it's difficult to reach her. That home, the one constant in my peripatetic life and more familiar to me than any place on earth, no longer exists as it was. The strange frozen nature of the pandemic has, for now, allowed me to put off true understanding of what we have lost. I miss my grandparents, and I miss that home, which soon, very soon, will only exist for me as a kind of museum of memories.

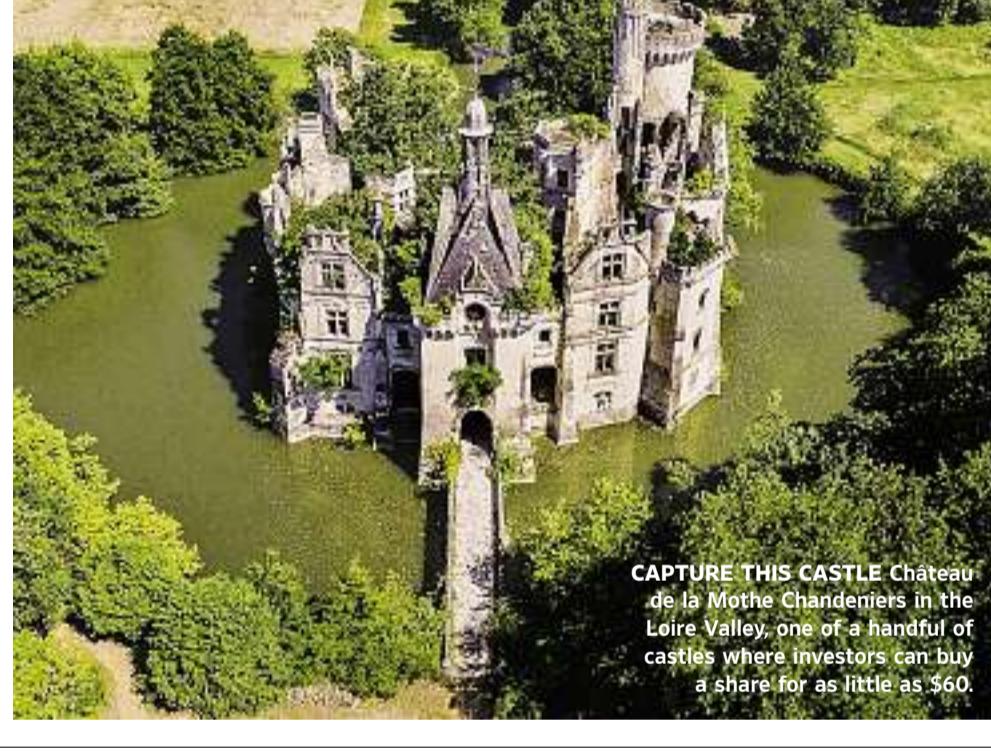
Kirstin Valdez Quade is the author of 'The Five Wounds' and 'Night at the Fiestas' (W.W. Norton).

Your Moat or Mine?

To help preserve historic castles, invest in their upkeep—and then go visit

BY CHRISTIAN L. WRIGHT

A FORTRESS with mysterious history and fabulous grounds, far from the woes of your subdivision, might seem just the thing for summer holidays. Of course, an ancient château costs a king's ransom to buy and even more to maintain. But now, those without huge bags of cash stashed away can get a foot in the heavy, 5-inch-thick oak door by buying a little piece of the fantasy. By selling shares, decorative titles or annual memberships, historic preservation groups in places from France to Scotland to New Hampshire make it possible to invest in the restoration of an old pile and ponder dropping by, too. Here, some courtly possibilities:



CAPTURE THIS CASTLE Château de la Mothe Chandéniers in the Loire Valley, one of a handful of castles where investors can buy a share for as little as \$60.

The Medieval Touch
The Landmark Trust is a non-profit preservation society that operates a network of unusual manses, estates, forts and cottages peppering the English countryside, with a few in Scotland, Wales and Italy. Most are available for overnight accommodations. Revenue goes to rehabbing historic buildings, such as a four-story 1830 tower in southwest England (Clavell Tower

in Dorset) and Elizabeth and Robert Browning's family home on a little street in Florence (Casa Guidi). The trust also offers two levels of membership; dues feed into the common pot that supports the renovation and management of its many properties as well as current projects, like saving a medieval manor house in Yorkshire.

Cost About \$66 for an annual Friend membership;

about \$1,380 for a Patron. **Perks** Friends get preferred booking at the properties, invitations to help with restoration "parties" on the trust's sites and a free Landmark Trust handbook. Patrons get the above plus invitations to see restorers at work and end results, advance booking at newly designated Landmark properties and a seat at the Director's annual lunch for patrons. landmarktrust.org.uk



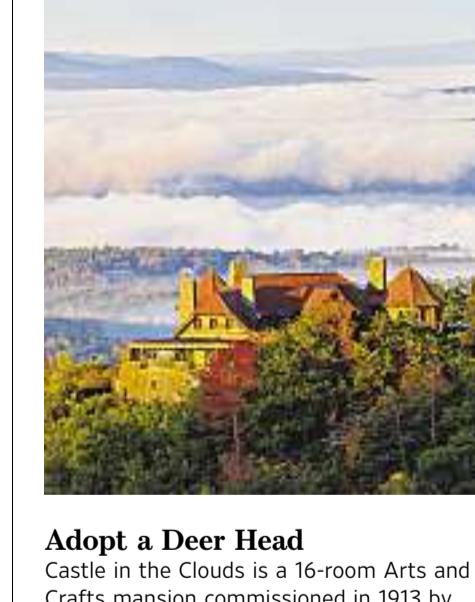
POETIC LICENSE Casa Guidi, Elizabeth and Robert Browning's former home in Florence. Revenue from guest stays helps pay for its preservation.

Save a French Castle

Founded in 2014 by two French friends who met in business school, Dartagnans lets you buy a share in a French castle—and daydream about visiting it one day. The crowdfunding platform has seduced 150,000 investors in 157 countries, built up 20,000 Instagram followers, and gone a long way toward salvaging overgrown piles and "supporting local heritage" across the republic. Have a look at Château de la Mothe Chandéniers, a 13th-century behemoth in the Loire Valley: in two months, Dartagnans raised about \$1.8 million, pulled it from the brink, opened parts of it to the public and embarked on an ambitious restoration. Current projects include Château de Vibrac, a crumbling stone ruin in Cognac, and Château Jumilhac, a turreted compound in the Dordogne.

Cost From about \$60 a share.

Perks Depending on the project, things like free admission for life, your name inscribed with co-châtelaines or co-lords on a fresco, a plot of garden, voting rights at annual meetings and the chance to help with on-site restoration projects. dartagnans.fr



Adopt a Deer Head

Castle in the Clouds is a 16-room Arts and Crafts mansion commissioned in 1913 by Toni Plant, a shoe manufacturer, and his wife Olive, in the mountains of Moultonborough, N.H. Restoration of the house, outbuildings (the Carriage House is a restaurant due to reopen in May), and grounds began in 2006 and is about halfway to completion. To help, you can temporarily adopt an artifact—say, an oil painting by William Paskell, a deer head or a pair of bronze pull-up rings that hang in the original owner's dressing room.

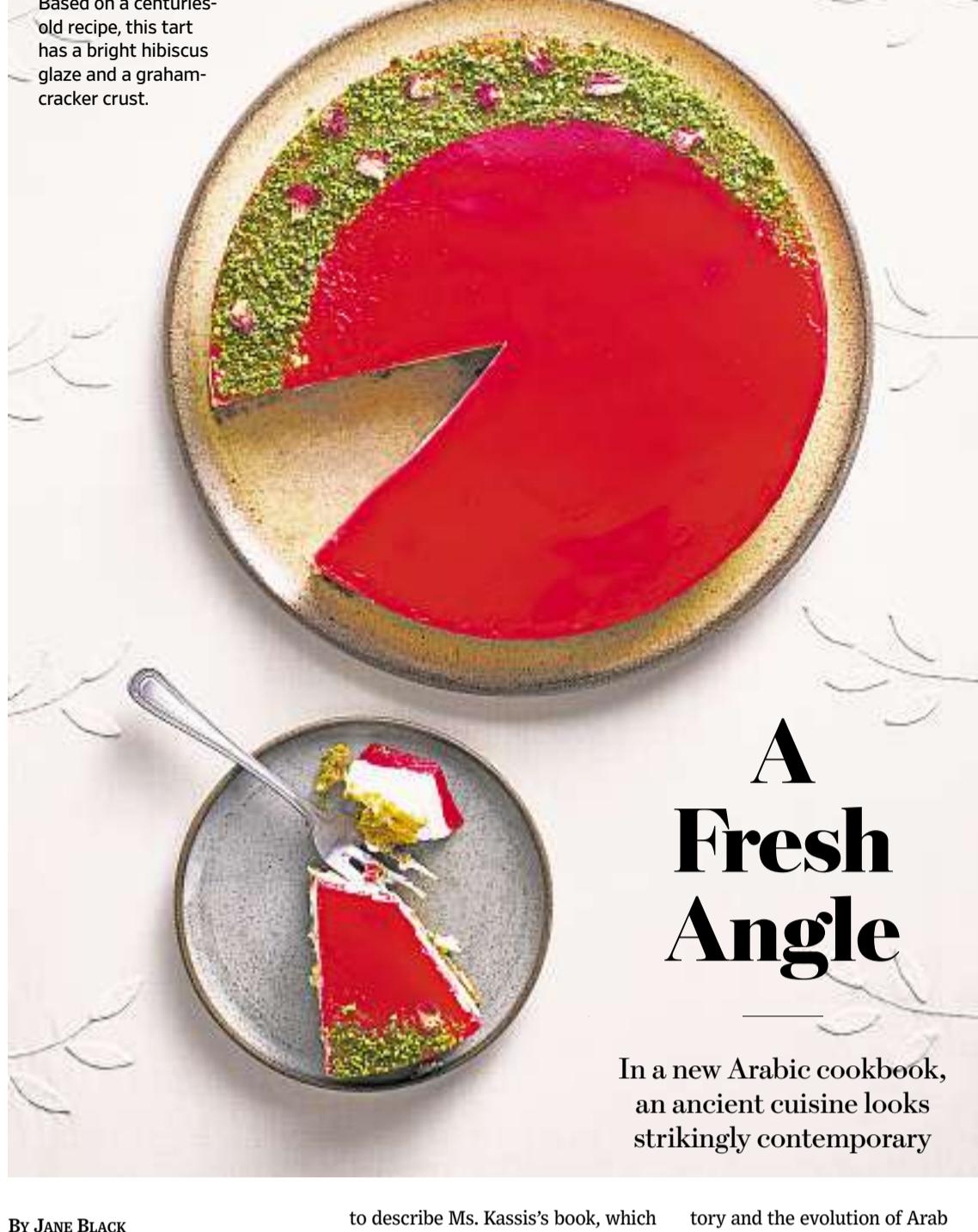
Cost From \$50 (tax deductible).

Perks These range from getting your name on the castle's website (for the lowest-level contribution) to the yearlong adoption of an artifact and two tickets to the museum (for \$1,000). castleintheclouds.org

EATING & DRINKING

STILL AS SWEET

Based on a centuries-old recipe, this tart has a bright hibiscus glaze and a graham-cracker crust.



A Fresh Angle

In a new Arabic cookbook, an ancient cuisine looks strikingly contemporary

DAN PEREZ

BY JANE BLACK

I WAS 23 years old the first time I tasted sticky toffee pudding. An American in London working for the BBC, I was pulling overnight shifts and, on my days off, blearily exploring the city alone. One raw, gray day, I ducked into a pub and decided cake smothered in toffee sauce was just the thing to brighten my outlook. The steaming pudding turned out to be tooth-achingly sweet, but its power to comfort, even coddle, was undeniable. The Brits don't call it nursery food for nothing.

The truth is I always liked the idea of sticky toffee pudding better than the real thing. So I was intrigued to find an adaptation in a new cookbook on Arab cuisine, "The Arabesque Table" (Phaidon). Its author, Reem Kassis, also discovered sticky toffee pudding during a stint in London. Her version adds creamy tahini to the cake and replaces some of the sugar in the toffee sauce with a dollop of bright date molasses and more tahini. It's a grown-up, refreshing twist on the British classic that nevertheless preserves the childlike pleasures of the original.

Refreshing is also the best word

to describe Ms. Kassis's book, which arrives in an era when the food world is engaged in a furious, often infuriating debate about who "owns" certain foods and even who has the right to cook them. Is fried chicken a Southern dish or an African American one? Can a white chef who studied in Thailand put himself forward as an expert on Thai food? For that matter, is it wrong for a Pal-

tory and the evolution of Arab dishes, suggesting another, richer approach to understanding food. "No cuisine is a straight line stretching infinitely back in time," she writes in her introduction. "If there is one thing I want this book to convey, it is that we are always moving forward, learning from others, adapting and evolving."

This is true of so many dishes



These recipes illustrate the beauty of change—and the lie that any recipe is truly authentic for more than a moment in time.

estinian writer to mess with sticky toffee pudding—or an American one to declare that version an improvement on the original?

Ms. Kassis is not uninterested in where those lines should fall. Her previous book, "The Palestinian Table," was her effort to record, and define as Palestinian, dishes she grew up eating that are often referred to hazily as Middle Eastern or sometimes, incorrectly, as Israeli. In contrast, "The Arabesque Table" zooms out, examining both the his-

whose history we think we know. Steamed milk puddings such as Italy's panna cotta or French blanc mange, Ms. Kassis points out, have roots in Arab milk puddings called muhallabiye, recorded as far back as the 10th-century cookbook Kitab al-Tabikh (though early versions also included meat, sheep's tail fat and bread). Meanwhile, many of the ingredients of maqlubeh, the classic Palestinian upside-down rice dish, are not even native to the Levant. Eggplants arrived from Asia and to-

matoes were not widely used in Palestinian cooking until the 19th century. "Does that make maqlubeh any less Palestinian? Absolutely not," Ms. Kassis told me. "Food can be crucial to a national identity even as we recognize the cross-cultural journey it took to get there."

Many cookbooks explore how history has shaped world cuisines. But Ms. Kassis does not limit herself to the impacts of invasions, migrations, economic exchange and natural disasters. She puts a personal stamp on Arabic classics and Arabic twists on Western dishes she learned to cook in London and in Philadelphia, where she now lives. Turning the pages, you see food evolving in almost real-time.

Recipes of this kind appear throughout the book, but the best examples can be found among its desserts. There's the sticky toffee pudding, plus a New York-style cheesecake temptingly flavored with tahini and topped with chocolate ganache and sesame seeds. I was also intrigued by two adaptations of muhallabiye. The first comes in the form of a stunning tart, topped with a shiny hibiscus glaze and a swoosh of chopped pistachios and rose petals. The creamy base, thickened with

cornstarch and flavored with rose water, sits on a graham cracker base. The second, served in a cocktail glass, gives the custard an infusion of fresh mint and a sprinkling of chocolate crumbs.

Ms. Kassis adapts other dishes to fit the rhythms of contemporary life. Take ma'moul. The bite-size semolina cakes, stuffed with dates or nuts, are usually served around the holidays, when families gather and can pitch in to make the delicate and labor-intensive sweets. Ms. Kassis's version, a single cake scored in a diamond pattern to mimic the original, is far quicker to make.

These recipes illustrate the beauty of change—and the lie that any recipe is truly authentic for more than a moment in time. Which is just as well. The flow and exchange of ideas and techniques only continues to accelerate. "Before, it took invasions, occupations or centuries of trade to alter a local cuisine," Ms. Kassis said. "Today, you can have a Palestinian living in the U.S. making Korean food, or a Chinese in Australia experimenting with za'atar and pomegranate molasses and spreading the word on social media. The exchange happens faster and is much more fluid than before."

PRO MOVE / INTEL FROM AN EX LINE COOK

Ssam As It Ever Was

This streamlined take on a Korean feast retains the sense of occasion that makes it so special

ONE OF THE MOST memorable meals I had during my last trip to Seoul took place in the neighborhood Yeon-nam Dong, where I visited my grandparents nearly every summer as a child. The area had drastically transformed in the 14 years since my last visit: The streets lined with hip restaurants and filled with stylish young people were a far cry from the sleepy spot I knew as a child, where the coolest local options were a stationery shop and a video store. Still, I managed to reorient myself and also reconnect with relatives I hadn't seen in a decade-plus over a spread of samgyupsal-gui (grilled pork belly).

Traditionally, samgyupsal-gui is ordered in quantities generous enough for a proper feast, with lettuce leaves or steamed cabbage provided for wrapping up the meat and conveying it to the mouth. The word for those vegetables and that way of eating, ssam, translates as wrap, and any number of other greens can be used for that purpose, too, from perilla leaves to soy sauce-pickled garlic leaves.

Back home in Brooklyn, I chased after this happy, hands-on eating experience, scaling it down to serve two, and for that a pork chop works perfectly. In my tiny

kitchen I opt for stovetop searing in a cast-iron skillet to get the beautiful brown crust imparted by the stone grill some Korean restaurants use.

This dish calls for more assembling than actual cooking, so you can really focus on getting the pork chop just right via flipping and basting with the fat rendered out of the meat itself. Much of the seasoning comes at the end. The condiment ssamjang, a combination of doenjang (fermented soybean paste) and gochujang (fermented chile paste), brings savory flavor and a hint of heat. Ssamjang sometimes gets its balancing sweetness from sugar, but here, instead, I use a little honey and rice vinegar, staples in my pantry that make the sauce more complex as well as sweet. Slices of raw jalapeño and garlic bring oomph to each bite, and individual diners can decide for themselves just how much.

Assembled at the table, this dish is inherently social. The recipe at right retains the interactivity and intimacy of that reunion meal with my family in Seoul. But it brings it home, reflecting how my husband and I live here, now, with ingredients I always have on hand.

—Eleanore Park

Pork Chop Ssam

Total Time 50 minutes Serves 2

- 1 (1 pound, 1 1/4-inch thick) bone-in pork chop
- 5 scallions, thinly sliced on bias
- 2 teaspoons grapeseed oil or other neutral oil
- Salt and white pepper
- 3/2 tablespoons sesame oil
- 1/2 teaspoons gochugaru or other red chile flakes
- 1 teaspoon sesame seeds
- Flaky salt
- 2 teaspoons honey
- 2 teaspoons rice vinegar
- 2 tablespoons doenjang
- 2 tablespoons gochujang
- 1/2 teaspoon fish sauce
- 1 teaspoon fresh lime juice
- 1 medium head lettuce, such as red leaf lettuce, leaves separated
- 1 clove garlic, thinly sliced
- 1 jalapeño, thinly sliced, for serving
- Sliced radishes, for serving
- 1/2 cup kimchi, for serving
- Cooked rice, for serving

1. Let pork chop sit at room temperature at least 20 minutes. Fill a small bowl with ice water. Add scallions and soak until they begin to curl, at least 20 minutes.
2. Set a large cast-iron or other heavy skillet over medium-high heat. Add oil. Season pork chop with salt and white pepper. Once oil is hot and shimmering, lay pork chop into skillet and cook until
3. Drain scallions and pat dry. In a



PACKAGE DEAL Diners assemble their own lettuce wraps at the table.

- browned on bottom, about 4 minutes. Use tongs to hold pork chop on end and sear fat cap to render fat, about 1 minute. Flip pork chop and sear reverse side until deeply browned, about 4 minutes. Use tongs to hold pork chop on end and sear fat cap 1 minute more. Lay pork chop down, tilt skillet slightly and use a large spoon to baste pork chop with fat. Continue basting until internal temperature reads 140 degrees on a meat thermometer, about 3 minutes. (Pork chop will continue to cook as it rests.) Transfer pork chop to a cutting board and let rest at least 10 minutes.
4. Divide remaining sesame oil into two small bowls. Sprinkle a pinch of flaky salt into each. Make the ssamjang: In a small bowl, whisk together honey, vinegar, doenjang, gochujang, fish sauce and lime juice.
5. Slice pork off the bone, against the grain. Place a lettuce leaf on a plate or your hand. Add a slice of cooked pork, a dab of ssamjang, seasoned scallions, a garlic slice, a jalapeño slice and a radish slice. Fold leaf, dip in seasoned sesame oil and eat. Serve with kimchi and rice.

EATING & DRINKING



CUTS ABOVE Trace started as a pop-up in Queens, N.Y. Now these pizzas are available frozen, nationwide.

TASTE DRIVE / FROZEN PIZZA

Get a Piece of These Pies

No longer a mere meal of last resort, frozen pizza now brings wood-fired flavor and artisanal ingredients home

BY GABRIELLA GERSHENSON

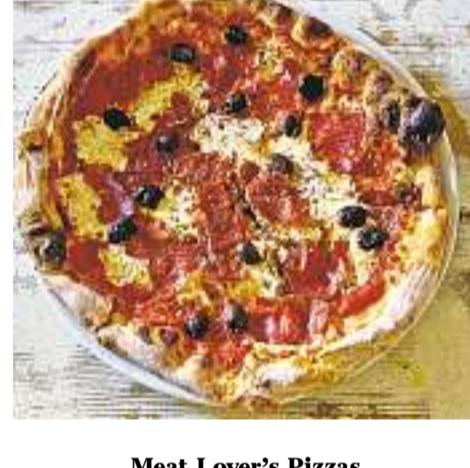
MENTION FROZEN pizza and most of us think of the utilitarian discs found in the supermarket freezer case, not wood-fired creations meticulously crafted by top pizzaioli. "If you would have told me [a year ago] I would be doing frozen pizza, I would have told you I have a bridge to sell you," said Chris Bianco, chef-owner of Pizzeria Bianco in Phoenix, Ariz., credited with some of America's best pies. But with his restaurants operating at half capacity during the pandemic, Mr. Bianco began supplementing earnings by freezing his celebrated pies and selling them nationally through the delivery site Goldbelly.

He wasn't the only pizza pro to pivot this way. Frozen pizza has grown beyond the usual grocery-store brands to include intriguing mail-order options. Between establishments like Pizzeria Bianco that ship restaurant-quality pies and new direct-to-consumer brands

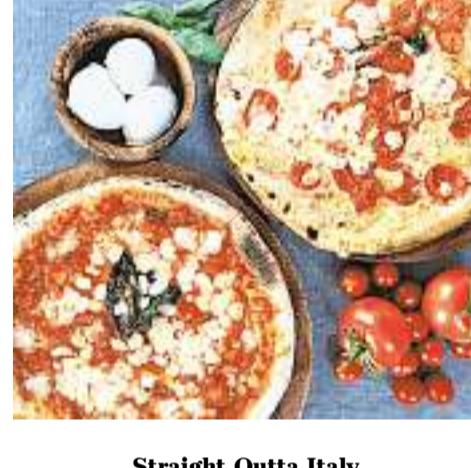
ranging in scale from micro to major, the options are diverse and enticing.

The demand was certainly there. According to the market research firm Nielsen, from March through April 2020, supermarket frozen pizza sales jumped 63.2% from the previous year. The appeal to consumers is obvious: Frozen pizza is quick, it's easy and it can appeal even to the most finicky palate. When you're cooking nearly every meal at home, those are all major wins.

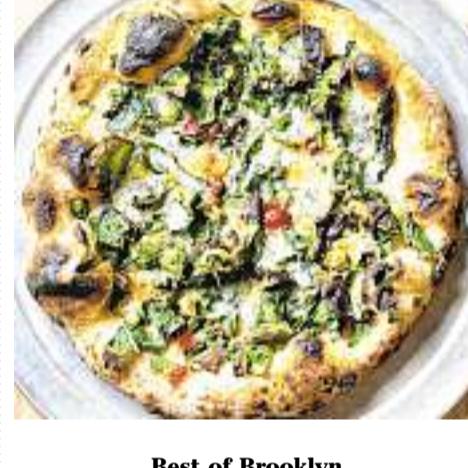
In addition to being decidedly delicious, the frozen pizzas recommended below have a few other things in common. All were shipped in insulated packs with dry ice and arrived frozen. All came with clear, simple heating directions that yielded melty cheese and appropriately crisped crusts. While most of the instructions recommend reheating the pizzas either on a baking sheet or directly on the oven rack, a grease-dripping incident smoked out this tester's kitchen; for pizzas that are crammed with rich toppings, consider sticking with the sheet. Beyond that, these pies are pretty foolproof.

**Meat Lover's Pizzas**

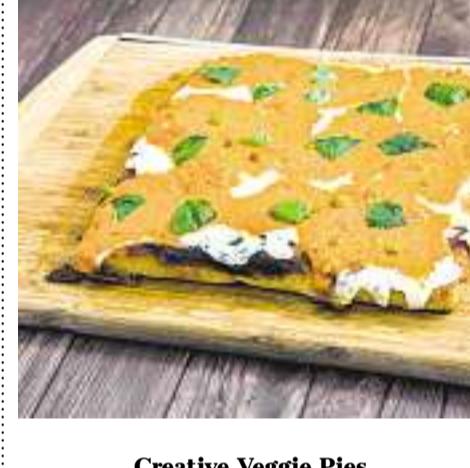
Pizzeria Bianco's Wood Fired Pizza + Sicilian Pizza four-pack (\$135, including shipping) comes with three thin-crust pizzas plus a rustic rectangular Sicilian pie and lets you choose from the restaurant's signature combinations—many of them meaty. The Wiseguy, crowned with house-smoked mozzarella, fennel sausage and roasted onions, comes with a vial of peppery Puglian olive oil to drizzle on top. The Sonny Boy (shown) marries soppressata and Gaeta olives, while the Sicilian, saturated with olive oil and topped with fontina, comes plain or with gold-standard Ezzo pepperoni. The crisp, airy crusts are crafted from organic flour, and the sauce is made from Mr. Bianco's own Bianco DiNapoli tomatoes. Vegetarians, do not despair: There are meatless options, too. goldbelly.com

**Straight Outta Italy**

Direct-to-consumer pizza peddler Talia di Napoli has shipped frozen pies from Naples, Italy, since February 2020. Founder and CEO Edouard Freda hires certified master pizzaioli to make Neapolitan-style pies by hand, using ingredients such as fine 00 flour, olive oil from Puglia, and tomato sauce and fior di latte mozzarella from Campania. "Our pizza meets all requirements of Neapolitan pizza, from ingredients to preparation," said Mr. Freda. "But the designating body does not recognize frozen pizza." The Classico 8 Pack (shown) has four Margherita and four Provolina pizzas, with smoked mozzarella and sliced tomatoes (\$110, including shipping). A very good gluten-free option uses a blend of buckwheat flour, rice flour and gluten-free wheat starch (\$108 for 6, including shipping). taliadinapoli.com

**Best of Brooklyn**

The restaurant Roberta's in Bushwick, Brooklyn, has been selling a frozen version of its lauded wood-fired pizzas for more than a decade. The brand combines a purist's eye for process and ingredients with a chef's sensibility when it comes to genius flavor combinations. The Baby Sinclair (shown), showered with kale, Calabrian chiles, sliced garlic, cheddar and Parmigiano-Reggiano, is compulsively noshable. Roberta's other frozen pie, an unimpeachable Margherita, comes topped with the classic trio of bright tomato sauce, housemade mozzarella and fresh basil. The bubbly sourdough crust is forged in a 900-degree oven before being frozen and packaged. All it takes at home is 5½ minutes at 450 degrees to produce some very fine pizza (10 for \$149, including shipping). huckberry.com

**Creative Veggie Pies**

In 2015, Natalie DeSabato started Trace as a one-woman pop-up operation in Queens, N.Y., selling square slices of highly original pizzas at local markets and breweries. Last October, she added frozen pizzas to her repertoire. Ms. DeSabato's 10-by-10-inch vegetarian pies are fun and fully loaded. The signature Falafel pizza (\$14, or \$17 for vegan) has a sesame-dotted crust topped with crumbled fava-bean falafel, halal-cart-style white sauce, smoked gouda and extra-sharp cheddar. The Vodka Flambae (shown; \$14) comes smothered in fresh mozzarella and pea-studded vodka sauce. The Bleu Dream (\$16) features Alfredo sauce thick with artichoke hearts and spinach, plus Parm, mozz and blue cheeses, and a topping of stuffed mushrooms recreated from her Aunt Susan's recipe. traceus.com

CUTTING CLASS

Shoulder Season

Get maximum value from a lamb shoulder by butchering it yourself into multiple cuts for all your springtime fêtes

SPRING AND LAMB go hand-in-hand, thanks in part to the holidays that usher in the season. For Passover it's often braised; a roast is an Easter favorite. Those observing Ramadan, this year April 12–May 12, traditionally fill their tables with whole lamb, stews, roasts and kebabs to mark the end of a month of fasting.

It's a busy season for halal butchers such as those at Salem's Market and Grill in Pittsburgh. According to proprietor Abdullah Salem, "There's nothing else like a young, halal lamb. The flavor is simply fresher."

Halal means "permissible" in Arabic, and in butchery it describes humanely slaughtered meat that adheres to Islamic dietary law. The animal must be alive, healthy and comfortable before slaughter, and not in the company of other animals. The slaughter is done in one

swift motion with a very sharp knife, by a Muslim hand (not a machine). A blessing is recited and all blood drained from the animal.

When Mr. Salem's father, who is Libyan, arrived in the U.S. in the late '70s to pursue studies at the University of Pittsburgh, meat butchered this way was hard to find. So he patronized a kosher butcher, and when he inquired about the specifics of slaughter, he was invited to the slaughterhouse to slaughter a lamb himself. Soon he was visiting once a month, and friends and neighbors were putting in requests.

"He was bringing home 12–15 lambs at a time," Mr. Salem said. "It became a hassle, so he and a friend decided to open their own meat store." Since its founding in 1983, Salem's has grown into a bustling butcher, restaurant, caterer and market. Mr. Salem has expanded and modernized the business.

He sources lamb locally, from Pennsylvania, Ohio and West Virginia. In his view, the shoulder is the choicest cut, and within that sub-primal he values the neck loin above all. At right, Mr. Salem demonstrates how to carve out that loin, great for shish kebab. You'll also get a shoulder to roast, stew or grill; bones for soups and stews; and plenty of trim to grind. —Kathleen Squires

PRO TIPS

- Check that the meat is light pink, not blood red. A proper piece of halal meat should not have any dark blood spots.
- Keep in mind that butchery is about gently following the bones and the seams, not about hacking, chopping and cutting fast and hard. Always cut as closely to the bone as possible when deboning.

► Find Mr. Salem's recipe for shish kebabs at wsj.com/food.

HOW TO BUTCHER A LAMB SHOULDER TO ROAST, GRILL AND STEW

What You'll Need

- 1 (6–8 pound) bone-in lamb shoulder
- 6- to 7-inch boning knife, semi-flexible (Mr. Salem prefers Forschner brand)



Step One

Set shoulder rib-side down, with exposed ribs facing you. Find opening between rib plate and meat, and insert knife. Cut meat from bone, peeling shoulder back with opposite hand until rib plate and shoulder separate. Reserve ribs for grinding and soup.

Step Two

With fat cap down, locate tubelike roll, or neck loin, at end of shoulder, opposite leg bone. Find the natural separation and gently cut it apart, rolling it away with opposite hand. Trim fat, cut into 1-inch cubes and reserve for kebabs.

Step Three

With shoulder fat cap down, poke to find joint connecting blade and leg bone. Make a small incision to expose blade, then scrape meat away from blade, peeling away with opposite hand. Continue until entire triangular bone is exposed.

Step Four

Slice down middle of leg bone. Scrape along bone with knife and peel away meat with opposite hand, rotating and making small cuts until entire bone is exposed and attached only at joint.

Step Five

With your hands, grab leg bone and yank bone and blade from shoulder. Reserve bone and blade for soup. Reserve meat for roasting, grilling or stew.

GEAR & GADGETS

*A Garden of Tech-y Delights***Lawn Laborers**

Set an autonomous electric mower like Husqvarna's Automower (5) to run overnight and you can sleep later the next day—and achieve a cleaner, greener cut than most push models can deliver. By giving grass a regular (even daily) trim instead of lobbing off a lot once weekly, robo mowers leave small clippings the soil can more easily reabsorb, said Frank Mariani, the owner of Mariani Landscaping in Lake Bluff, Ill. An app controls the mower's schedule, sets trimming height and, once you install the included boundary wires around your property, pings you if the robot leaves your yard in the arms of a jealous thief. Depending on the model, the mowers can chug away for up to four hours per charge, and, like Roombas, drive themselves back to their doghouse-like charging stations to juice back up. With their sensors, robo mowers are also safer than most manual counterparts. "You could practically lay your baby in front of the mower and nothing would happen," Mr. Mariani said. When choosing a mower, consider the square footage and incline of your yard. Many less-expensive, lower-powered models freeze up on hills to prevent toppling. And be warned: an automower won't give your lawn stripes of just-mowed green. (From \$1,200, [husqvarna.com](#))

Wise Waterers

Water your grass too little, and it will shrivel into straw. Too often, and you'll weaken the roots while encouraging mold and bacteria to grow. "That's where smart irrigation comes in," said Mr. Wood, who explained that smart weather-and-moisture-sensing systems outperform traditional irrigation setups—and waste less water—when it comes to keeping your garden hydrated. The Rachio 3 smart irrigation system controller, for example, automatically adjusts your watering schedule to coming weather patterns in your area. Just replace your old sprinkler controller with Rachio's using the wires from your existing setup, and use the companion app to set a watering schedule for your system's eight or 16 zones (from \$230, [rachio.com](#)). For the most strategic watering schedule possible, pair the Rachio with Weatherflow's new Tempest Weather System (8). Once you install the water bottle-sized personal weather station on a post or pole 6 feet off the ground, the device will provide a forecast via its companion app that beats the local news for accuracy. The Tempest app will even alert you to garden-wrecking weather events like frost and high winds. (\$329, [weatherflow.com](#)).

To avoid making the same deadly watering mistakes in your potted plants and container gardens, stick Ecowitt's unobtrusive Soil Moisture Sensor with Digital LCD Display (6) into the soil. The device measures root wetness to tell you via a delightful potted plant graphic on the display when it's time to water (\$30, [www.ecowitt.com](#)). Alternatively, opt for a pot that does the measuring for you. Just fill the Self-Watering Wet Pot's (1) outer glass reservoir with water, and your finicky forsythia will absorb only what it needs through the inner, terracotta pot walls (from \$34, [store.moma.org](#)).

Hedge Hairstylists

Heavy, roaring, gas-powered trimmers can seem more than mildly threatening. But new, electric variants are tame enough to let anyone become a serene topiary artist. "The [battery] tech is finally to a point where it really makes sense to use it," said Mr. Wood of the quiet, cordless models that have recently hit the market. At only 5 pounds, Craftsman's new V20 Cordless 2-In-1 Hedge



Postal Roots
Subscription services that deliver seeds, moss and more to your door


Moss of the Month
For forest-y vibes in a shady corner of your backyard or a shot of color in an austere rock garden, moss does nicely. Monthly deliveries from the forests of Arkansas give you the chance to decorate with spiky haircap, plush pillow and delicate fern mosses. (\$48 for three months, [teresaplants.com](#))

My Garden Box
Gardening is about more than just the green stuff that comes out of the dirt. While it certainly delivers live plants, like Japanese painted ferns and Crotons, this subscription plan often includes interesting containers, soil and fertilizer, tools and accessories. (\$39 a month, [mygardenbox.com](#))

Gardenuity
This quarterly box from container-gardening experts based in Dallas delivers healthy, rooted herbs and flowers, selected for your region and growing conditions. You'll also get access to Gardenuity's Grow Pro service, with on-call expert advice and weather alerts. (From \$149, [gardenuity.com](#))

Bloomin Bin
While most garden plans focus on spring and summer plots, Bloomin Bin gives you year-round, season-specific seeds and saplings in a quarterly box. Each one comes with detailed care instructions from a master gardener, and a choice of flowers or fruits/vegetables. (From \$8, [bloominbin.com](#))

Seed Bank Box
Each month, subscribers receive eight to 10 varieties of organic seeds of unusual herbs, edible flowers and vegetables along with info cards. The April box includes seeds for Thai Pink Egg Tomatoes, Carentan Leeks, and Red Fire Orach. (\$22 a month, [seedbankbox.com](#))
—Matthew Kronsberg

BACK TO BASICS / PROFESSIONAL GREEN THUMBS ON NO-TECH, TIME-HONORED PATHS TO PERFECTING YOUR PLOT



Edwina von Gal
Landscape Designer, founder of The Perfect Earth Project

If you're willing to mow higher and let your lawn look more relaxed and thicker, the grass will naturally out-compete weeds. We say that you grow to 4 inches, then cut to 3 inches. It should look tousled—like you want to flop into it.



Patricia Algara
Founding Principal of BASE Landscape Architecture

Any space, no matter the size, can be a bee-friendly, pollinator garden. Even on your balcony, a pot of flowers (bees love blue and purple) can provide them with food. Leave fresh water with stones or marbles so bees can drink without drowning.



Beronda Montgomery
Author of *Lessons from Plants*

Grow plants of the same height together, like purple coneflowers and black-eyed Susans, or companion plants that require different, complementary nutrients. These types of pairings are beneficial because they limit biological competition for access to light or nutrients.



Dan Bifano
Master Rosarian

You don't want to put roses where they don't want to grow. As in real estate, it's location, location, location. Planting in good, sandy, loamy soil that drains well (but not too well), in a sunny location with good air circulation is going to give you an exceptional rose garden.



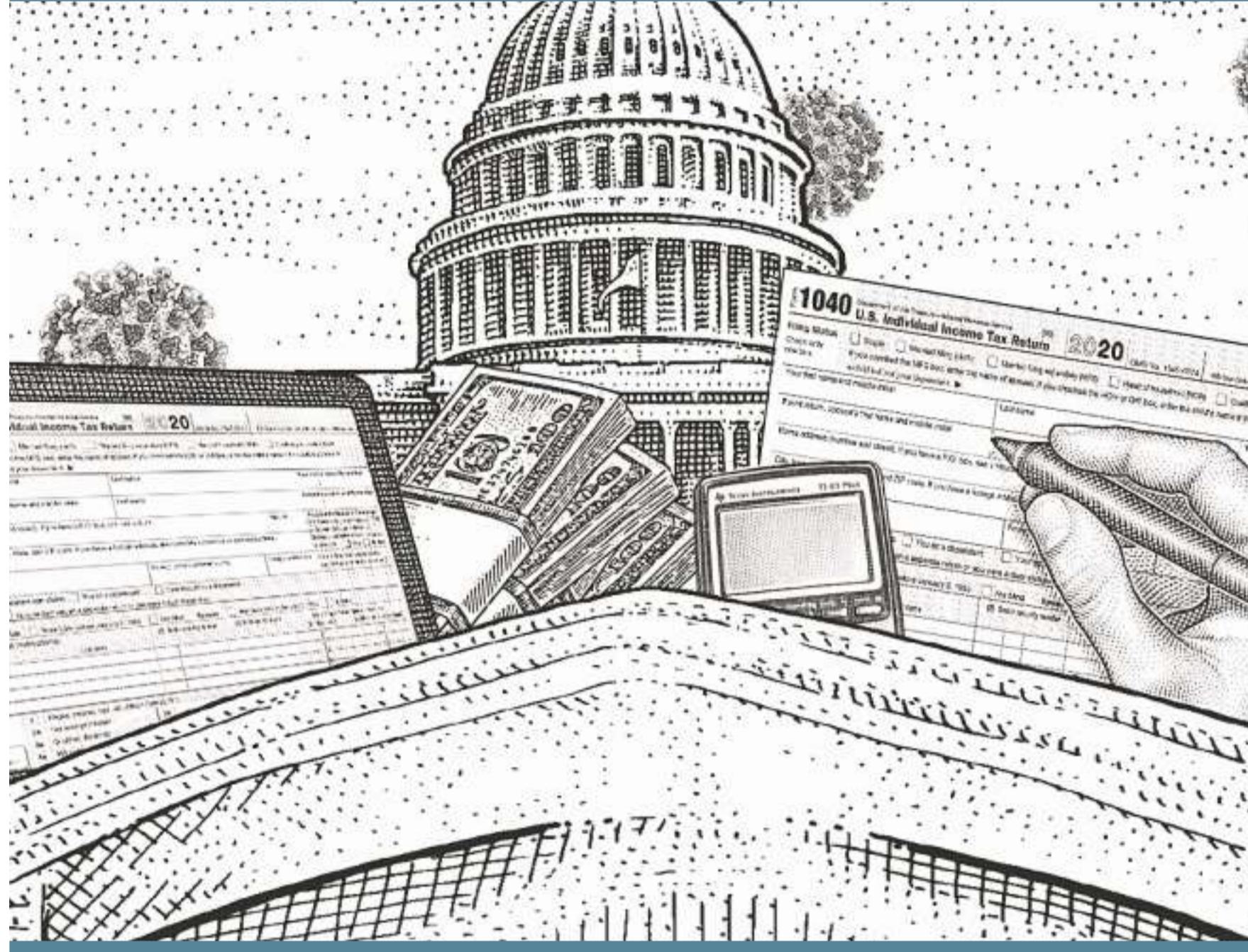
Julie Hess
Senior Horticulturist, Missouri Botanical Garden

One of the best things you can do if your area has clay soil, besides add compost, is to add calcined clay like Turface MVP. As counterintuitive as it sounds, it'll even out moisture retention, improve drainage and reduce compaction.

—M.K.

WSJ+

EXPERIENCES OFFERS EVENTS INSIGHTS



How Does the Pandemic Affect Your Tax Returns?

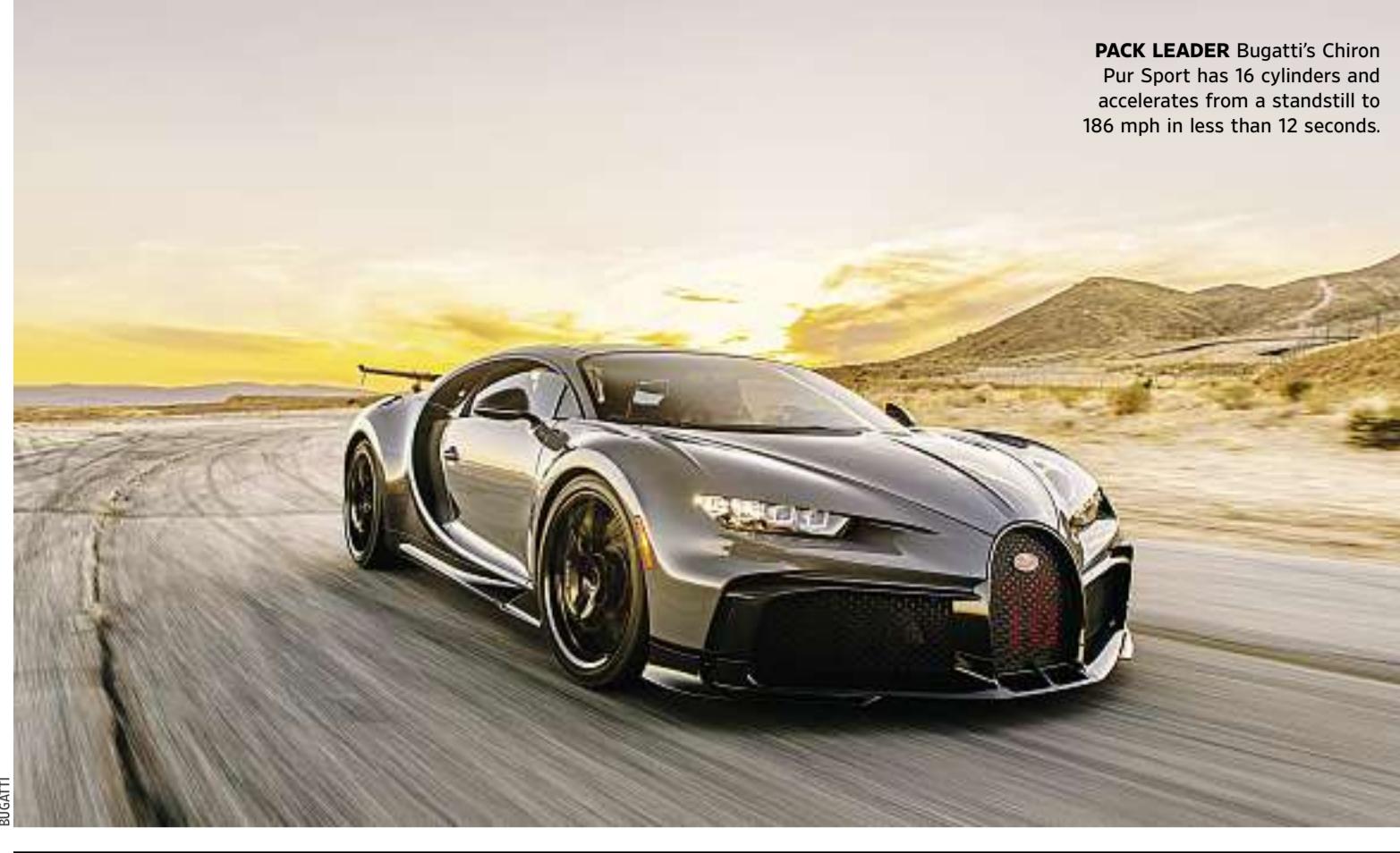
Find out in The WSJ Tax Guide 2021.

The pandemic is changing taxes for many Americans, with effects on retirement plan withdrawals, stimulus payments, flexible spending account payouts, state taxes on remote workers and more. The WSJ Tax Guide 2021 is here to walk you through tax rules new and old, with expert analysis and helpful information about what these rules mean for you.

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GEAR & GADGETS



BUGATTI

RUMBLE SEAT / DAN NEIL



Bugatti Chiron Pur Sport: All the Speed You'll Ever Need

THE TROUBLE with any Bugatti is legibility. Sure, they are fast; a modified Chiron set a series production road-car record of 304.7 mph in 2019. But the badges are so small and they go by so quickly. How are people supposed to read that?

And thus the Chiron Pur Sport's extraordinary fixed rear wing, a carbon-fiber scimitar emblazoned with the word. Also, should anyone wonder how many cylinders, the Pur Sport has "16" stenciled on its horse collar-shaped, 3D-printed grillwork—a charismatic touch drawn from the company's racing history, if a little, um, AutoZone-y, in this presentation. Maybe uncheck that box.

Whenever I encounter one of these cars in the real world, away from the auto-show stand, I am struck by their dual moral status. They are dazzling objects, scintillant with human ingenuity, sublime in craft and overwhelming in effect, like a pipe organ at point-blank range.

But the clientele? As I watched our Pur Sport tester being unloaded, I hoped it would one day become the cherished centerpiece of an aficionado's collection. But I won't be surprised if, six months from now, it is halfway up a lamp-post on Tverskaya Street and the owner's ocelot is missing.

Bugatti will build only 60 of these brilliantly engineered cod-pieces, to order, and sell them for between \$3.6 to \$5 million.

Some may yet be hazy on what a Bugatti is, or was. Founded by Ettore Bugatti in the early 20th cen-

BUGATTI CHIRON PUR SPORT



Base price \$3.6 million
Price, as tested \$3.96 million
Powetrain mid-mounted 8.0-liter W16 with dual sequential turbocharging; seven-speed dual-clutch automatic transmission; rear-biased AWD, using a torque transfer differential on the front axle and transverse differential lock on the rear.
Power/torque 1,479 hp (SAE) at 6,900 rpm/1,180 pound-feet at 2,000-6,000 rpm
Length/width/height/wheelbase 178.9/80.2/47.7/106.7 inches
Curb weight 4,340 pounds
0-60 mph <2.5 seconds
0-186 mph <12 seconds
EPA fuel economy 10/8/13 mpg
Cargo capacity 2 cubic feet

tury, in Molsheim, France, Automobiles Ettore Bugatti prospered in the decades between the world wars building and selling luxury cars and sports-racers, often to wealthy, danger-courting dilettantes.

The company we know today is a beautiful fiction, a commercial fantasy ginned up by VW Group patriarch Ferdinand Piëch. Having acquired the rights to the marque in the late 1990s, Piëch ordered his forces to build the fastest, most powerful sports car *evah*, to be brought safely into the ether of immortality by such innovations as a high-rise, strut-mounted adaptive rear wing. Piëch called it the Veyron 16.4 (2005-2015). He even rebuilt Ettore's beloved *orangerie* on the grounds in Molsheim. I've

been there. It's cool.

Introduced in 2016—to a resounding chorus of whys, admittedly—the Chiron is faster/better/badder evolution of the Veyron. He be thick, absolutely cray cray. Its immensity is engraved on its intake plenums: "1,500," as in brake-horsepower. They might have added an asterisk noting a torque output of 1,600 Newton-meters (1,180 pound-feet) from 2,000 to 6,000 rpm (emphasis added) but it would have gotten crowded.

In any event, it's all the power and torque, ever and always. Amen.

At full chat the 8.0-liter, quad-turbocharged W16 consumes 60,000 liters of air a minute and the gas tank runs dry in about 10 minutes.

How was your trip across Montana?

When the big truck from Molsheim arrived two weeks ago, I had a choice of spending the day with a Chiron Sport model or with the new, track-focused Pur Sport edition. The Sport is the fast one (top speed 261 mph). The Pur Sport is the quick one. While the latter's top speed is limited to 217 mph, it gets there horrifyingly sooner. According to the factory, the Pur Sport can accelerate from a standstill to 186 mph in less than 12 seconds, which is about as long as it takes most people to read this sentence aloud.

Well, that being the case, I told the driver, I'll take the Pur Sport. Just let me get my kidney belt.

Here I should introduce a man with the worst job in motor

sports. Jamie Morrow is a British racer and instructor based in Florida who, when tasked by the factory, rides with journalists during Bugatti test drives. Oy. In deference to Mr. Morrow and my driving privileges, I kept my honking to a minimum. To properly exercise such a car you really need to own your own country, which conveniently some customers do.

Sampling these forces on an open road, even at 50%, is aweing, humbling and it makes the next

The Chiron was already a rocket sled, so making it accelerate harder took an astonishing amount of work, and money.

fast BMW you get into feel like it's dragging an anchor. The rumble of the thing is in league with the underworld. Yet what surprises me about any Bugatti is how comfortable and tractable they are. You just happen to be going 140 mph. I wonder if the "uncanny refinement" defense holds up in court?

The Chiron was initially optimized for stability at maximum speed. The Pur Sport's calibrations are about increasing acceleration rates and what the factory euphemizes as "extreme agility." That's when the car throws your sunglasses out the window and your wife threatens to leave you if you don't stop.

Shod with four of the meatiest, mightiest, most adhesive-treaded tires I've ever seen on any car, road or race—custom-compounded Michelin Sport Cup 2 R's, 285/30 R20 in the front and 355/25 R21 at the rear—the Pur Sport's grip on Earth is like Antaeus's sandals soaked in dragstrip compound. The nominal figure is 1.6 G lateral acceleration, or almost twice the force of gravity in side-loading. I bet it's more. Between the heroic rubber and 2.5 degrees of increased negative camber, the Pur Sport responds to decisive steering inputs hard enough to move loose change from one pocket to the other.

The Chiron was already a rocket sled, so making it accelerate harder took an astonishing amount of work, and money. Bugatti spent a reported \$120 million developing the Pur Sport, much of which would have gone into overhauling and re-cogging the seven-speed dual-clutch automatic transmission. The spread of gear ratios was shortened 15%, making the Pur Sport's seventh gear ratio comparable to the Chiron's fifth gear. The felicitous repacking of gears does wonders for the car's roll-on acceleration. In sixth gear, the Pur Sport accelerates from 60 to 120 kmh (37.2-74.6 mph) in 4.4 seconds, 41% faster than the Chiron. And feel free to make your own weather. The Pur Sport's redline (6,900 rpm) is 200 rpm higher than that of the standard Chiron.

Thrusty McThrustface does sacrifice the Chiron's hydraulic actuated adaptive rear wing, to save weight. That's OK. I was never going over 200 mph anyway.

MY TECH ESSENTIALS

Peter Frampton

The rock legend on the one guitar he can't live without and the tools that helped him record his new instrumental album

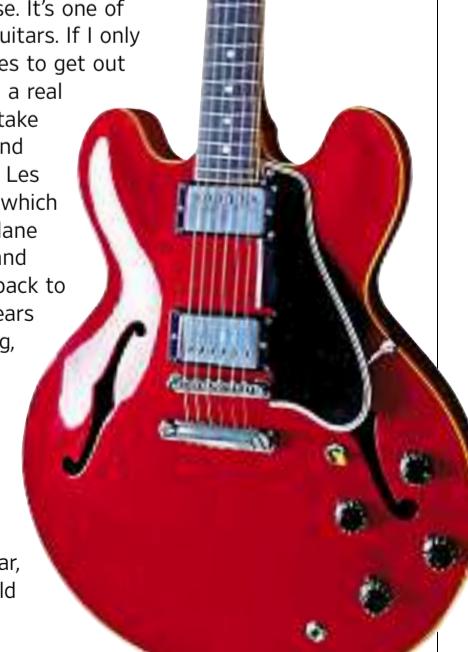
My Marshall Major III wireless headphones have become so helpful in the studio because I'm usually a one-man recording team. If you've got a headphone wire, plus a guitar that's plugged into an amp, you'll look around and realize you're all tangled up in wires.



I wanted to do some master recording in my home so I did my homework, and the **Rupert Neve Designs Portico II Channel Microphone Preamp** floored me with how great it is. I'm thinking of running my acoustic setup through it on stage, if I ever get out there again.

PETER FRAMPTON (GUITAR AND MICROPHONE); SWEETWATER SOUND (UNIVERSAL AUDIO)

My 1959 Gibson 335 never leaves my house. It's one of those special guitars. If I only had two minutes to get out of the house in a real emergency, I'd take my MacBook and that guitar. My Les Paul "Phenix"—which was lost in a plane crash in 1980 and found its way back to me about 18 years ago—is amazing, but it's for certain things. I use it a lot, obviously, but the 335 can do anything. If I were only allowed one guitar, that guitar could do it all.



I have been at the cutting edge with Eventide audio since the '70s. I have stuff they want for their museum! They recently sent me their **Rose Delay Effect Pedal** before it came out, and I loved it. I made some suggestions, because it needed to have presets, so I feel like the pedal has a lot of me in it.



We all love our iPhones and iPads, but my MacBook Pro has my life in it. I'm always putting down ideas, so it's for my creative side, too. It's a studio in a box. I plug in a **Universal Audio Apollo Twin Mk II mixer** so that I can work on music in my bedroom.

I've used my **1950s Telefunken U47 microphone** on every recording I've made since 1980. Every time I work with a new engineer, they want to try their own setup. And every time, when they try my mic, they say, "Wow. What is that?"



Edited from an interview by Jeff Slate

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cavalier jewelry