

Winter 2021 | Volume 4, Issue 4

Editor's Note

We have been through some gut-wrenching challenges over the past several years. It is time we take account to maintain some semblance of sanity to promote hope and happiness going into 2021. What a difference a year makes, is an understatement. We have gone through the most emotional time in our collective history:

- Global pandemic continues to devastate families, communities and stretch medical personnel to the breaking point;
- Challenge of remote work and the double challenge of virtual teaching with too many students without computer access;
- Election that divided a nation; and challenged the continuation of a democracy as we know it; and,
- Unprecedented fires destroyed communities across the west and floods battered southern coasts.

It has been, indeed, a cruel time and yet it has also been a time of grace. Grace, you may ask.

- Neighbors who hardly knew each other found ways to support and care for the elderly and alone around them;
- Families put aside smart phones and computer games to talk with each other, do puzzles, play games, and try new recipes;
- Virtual meetings, church services and gatherings promoted unique ways to collaborate, converse, and come together;
- Issues that had been ignored or swept aside become fodder for thoughtful discourse among the thoughtful;
- Volunteer poll workers worked carefully to ensure an election process really worked—despite the threats and intimidation;
- Endless efforts of doctors, researchers, and other medical practitioners to develop vaccines in less than year to fight COVID-19 virus and its variants; and
- Experiment of a unique republic that started in 1776, continuing to shine its beacon of light to the world.

As we move into 2021, there is hope. I believe in our better angels. I believe in our ability to pivot, to create, to innovate, and to reclaim what matters for all of us in this amazingly diverse and complex world. Coming together is the first order.

"Do things for people not because of who they are or what they do in return, but because of who you are."

- Marilyn Semonick

These are some inspiring thoughts borrowed from a friend and long-time colleague, Eileen McDargh. Eileen is world recognized expert on resilience building, a master facilitator, keynote speaker, author and executive coach. You can learn more about her at <https://www.eileenmcdargh.com>.

UPCOMING EVENTS

- » **Webinar: Keeping Your Residents and Staff Safe - Protecting against COVID and its Variants**

February 23, 2021

2:00 - 3:00 pm EST

bit.ly/Feb23CleanAir

- » **2021 NAHRO Online Washington Conference**

March 2-4, 2021

- » **NLIHC Virtual Housing Policy Forum 2021**

March 30-31, 2021

- » **2021 PHADA Annual Convention & Exhibition**

May 16-19, 2021

San Antonio, TX

- » **2021 NAHRO Summer Symposium**

Date TBD

Location TBD

- » **NAHRO's 2021 National Conference & Exhibition**

October 7-9, 2021

Phoenix, AZ

The Fog of COVID and Multifamily (MF) Property Owner's Liability

We are in unprecedented times, for multifamily property owners. Owners are facing resident and staff concerns over COVID, now more than ever. Among the questions are the liability risks of preventing COVID-19 infections on their premises and the possibility of being held liable for a residents, staff, vendors, and visitors being injured resulting from infection.



The question of liability comes down to a few key factors: the directness of a owners' control over an area and the management staff's preparation, along with foreseeable or forewarned risks.

What do MF owners control?

An owners' control over an area within a property determines to what extent an owner is liable for harm that occurs in that space. Where an owner is responsible for construction and maintenance, said owner is also responsible for preventable harm that occurs in those areas.

For common areas, such as entrance foyers, shared bathrooms, and traffic ways, an owner's liability is clear. Less clear is what responsibility an owner has for resident-occupied spaces. We know when harm comes through maintenance issues such as a broken water pipe, even within a resident's space, liability falls on the owner.

However, coronavirus is most likely to spread not through maintenance faults, but through the risky behaviors of people. Can owners force residents to wear masks or ban private gatherings for residential residents? The safest course of action for owners, in legal terms, would be to communicate with residents and encourage them to adhere to medical and government (CDC and state) guidelines.

As owner's control over common areas is well-established and undivided, one way of protecting residents from infection—and owners from liability—is to close or limit access to common areas when possible. In residential buildings, this could mean closing community rooms, computer rooms, while thoroughly cleaning indispensable shared spaces such as lobbies and elevators. In a MF property, limiting access to common spaces may involve removing some or all tables in a community activity room and spacing the remaining ones out to keep residents at least six feet apart.

Another way to help protect owners from liability is through a liability waiver. A liability waiver is a simple, familiar, and cost-effective first step that businesses and owners can take to protect against potential liability for exposure claims.

Foreseeable and Forewarned Risks

A risk which could be foreseen by a reasonable person is a risk for which an owner can be held liable. As an example, an owner can reasonably anticipate, human nature being what it is, that crime might occur in a heavily trafficked public space. Installing security cameras and appointing guards is a reasonable response to a reasonably foreseen risk. But even a risk not foreseen as likely but which an owner is warned about can be a source of liability, such as HUD, Federal (CDC), and State or county notices related to COVID.

But even a risk not foreseen as likely but which an owner is warned about can be a source of liability, such as HUD, Federal (CDC), and State or county notices related to COVID. If, for example, an owner is warned that a scam artist is using a community party room to separate residents from their money, but does nothing, the owner may be liable for failing to act and for creating the impression, in the minds of residents, that the scammer's behavior was legitimate and endorsed by property management. With coronavirus, the warnings have been so frequent and so strident that no one can claim not to have known the risk. Any owner who fails to act and warn residents is risking not only a lawsuit but also the lives and

Making the Right Moves

The right move, both in business and legal terms, is to do all in your power to limit access to common spaces and maintain lines of communication encouraging residents and their customers to reduce their risk. Even if you avoid a lawsuit, because the source of COVID-19 can be difficult to pin down, your portfolio will suffer if your properties are known as a coronavirus hot spot.

Making the right moves includes:

- 1. Communicate with residents.** Protect yourself from potential liability arising from the pandemic by showing you are always acting as a "reasonable and prudent" residential property owner and operator. It is imperative to begin the process by creating a communications channel with your residents – use email, website or written notices delivered to resident premises. Contact residents working remotely to establish that communications link, and to agree on the best way to communicate during the crisis. Update residents frequently on status of the building including to: 1) clarify the and services; 2) explain that the building's maintenance services are not equipped to perform decontamination or extraordinary disinfecting of the premises and that residents should review and institute procedures for those requirements; 3) inform residents of new technology you plan to install to mitigate or kill pathogens, reducing the potential for infection; and 4) establish building access procedures.
- 2. Comply with all laws/regulations.** Remind residents regularly that you will always comply with city, county, State and Federal laws, rules, and regulations regarding access to commercial properties, and, if the government declares that the building must be shut down, you will shut it down. Work with your attorney regarding "essential services" that are exempt. Determine which of your employees qualify as offering essential services, according to the attorney.
- 3. Document! Document! Document!** Have a consistent Incident Report procedure in place with your management and maintenance team to handle COVID-19 cases in your buildings. Train your people to prepare a detailed written report including: 1) which resident is reporting the issue, 2) who the people are, 3) when it occurred, 4) what happened, 5) what steps you, the property owner, are taking to disinfect the affected areas of the building, and 6) what initiatives are you investing in to prevent future occurrences, including the use technology for pathogen eradication. Retain copies of the Incident Reports, remedial measures and send copies to your attorney. Providing peace of mind to residents and staff with dividends.
- 4. Know what is covered/what is not in your insurance policies.** Business interruption insurance policies should be reviewed for coverage. Unfortunately, most carriers do not address circumstances involving COVID. First, do you have an insurable loss that will give you access to your business interruption coverage? Second, is there an exception in your policy that the COVID-19 disaster falls under?

Unfortunately, we are in uncertain waters. A key problem is that for a business interruption claim, insurers are looking for physical damage such as fire or hurricane damage to the building. Have an attorney who specializes in insurance coverage matters review your policy to make this determination.

To mitigate the risk of lawsuits relating to the 2019 novel coronavirus disease ([COVID-19](#)) exposure, some states have new legislation or executive orders giving businesses immunity from liability for claims related to COVID-19. Even without such protections, there are steps property owners and owners can take to limit the risk of liability for COVID-19 related claims.

Business owners, including property owners and owners, want to safely resume business operations as the economy opens up in the midst of the 2019 novel coronavirus disease (COVID-19) pandemic. To safely open, business owners are looking for broader liability protections, and states are responding through the enactment of state legislation and executive orders. Protections vary by Industry, for example:

- **Healthcare.** In California, hospitals and healthcare professionals have no liability absent a willful act or omission ([Cal. Gov't. Code § 8659](#)).
- **Adult Care.** In New York, nursing homes are provided the same liability protection as offered to healthcare facilities ([N.Y. Pub. Health Law §§ 3080 to 3082](#)).
- **Hospitality.** In Nevada, **Senate Bill 4** protects hospitality businesses, including hotels and casinos, and employees.

It is too soon to determine how the courts will interpret COVID-19 social distancing and government shutdowns of private property as being casualty events within the language of the insurance policy. COVID case law is still evolving.

Content recognition goes to Ron Derven, Contributing Editor to Development Magazine and author on real estate topics for The New York Times and the Law offices of Phillips, Gerstein & Channen, LLP for their sage contributions to this article.

Are You Leaving Money on the Table?

179D History and Benefit

The section 179D tax deduction was originally passed by Congress as part of the Energy Policy Act of 2005 in direct response to broader energy usage and independence concerns. According to data released by the U.S. Department of Energy, buildings are responsible for 73 percent of all electricity consumption in the U.S., with about half of that coming from commercial buildings.

To curb this trend and encourage broader energy efficiency, section 179D allows qualifying building owners and businesses to receive an up to \$1.80 per square foot tax deduction for their energy-efficient buildings placed into service during all open tax years. The look back period is typically three years. Any accrued tax deductions from these buildings can be carried-back two tax years or can be carried-forward for up to 20 years. Eligible activities include lighting, HVAC and building envelope and energy upgrades in buildings with four stories or higher and at least 40,000 square feet of energy retrofits.

Chicago Housing Authority - Danita Childers, Senior Director of Revenue and Partnerships, (left), Michael Gurgone, Chief Investment Officer and Treasurer; and AHA CEO Eugene Jones, Jr. (former CHA CEO), display the savings from a tax incentive program that encouraged energy efficiency.



179D Update

179D was made permanent as part of the 2021 Federal Omnibus Bill. This new certainty will allow government building owners to add enabling contract to contracting and integrate the 179D allocation process to their building programs. The maximum 179D deduction of \$1.80/sq.ft. will increase annually with inflation. The ASHRAE 90.1 reference standard used in certifying the project will also be updated to the standard in effect two years prior to the start of construction. The retroactive opportunity for 179D remains for projects completed during calendar years 2018, 2019, and 2020. **DO NOT LEAVE MONEY ON THE TABLE** during major energy efficiency rehab of your buildings. The Boston Housing Authority and Chicago Housing Authority have received rebates from 179D. New York City Housing Authority is also under contract related to the extensive ongoing rehab work. PHAs repositioning to RAD and private ownership may be eligible for 100 percent of a 179D rebate. If you have questions or help to determine eligibility or to quantify the potential opportunity for savings for your agency contact William J. Volker at Efficiency Energy, LLC, www.wesavegreen.com, 2101 L Street NW, Suite 800, Washington, DC 20037, 720-201-6856 cell or 202-776-7709 office wvolker@wesavegreen.com.

Watts Hot Marketplace

Keeping Your Residents and Staff Safe - Protecting Against COVID and its Variants



Tuesday February 23, 2021
2:00 – 3:00 PM EST

REGISTER NOW

COVID-19 is tough, but ultraviolet light is tougher. UV-C light has been helping eradicate flu viruses and allergens including mold on surfaces and in water for over 40 years. Now, research shows UV-C light can destroy the outer protein coating of the Coronavirus, leading to virus inactivation.

The vaccines are promising; however, they will not be the total answer without the continued efforts of PPEs and social distance. Future-proofing our buildings against these threats will help prevent shut-downs and major outbreaks. "The COVID-19 crisis reminds us how underprepared the world is to detect and respond to emerging infectious diseases. We must make smart investments now to simultaneously navigate COVID-19 and prepare for future pandemics." <https://www.mckinsey.com/industries/public-and-social-sector/our-insights/not-the-last-pandemic-investing-now-to-reimagine-public-health-systems>.

UV-C light solutions have been subjected to extensive clinical trials, peer reviews and track the CDC guidelines. The system uses patented UV-C treatment technology. Air is quietly drawn into a sealed UV-C air chamber with fans and filters. The air is treated and then returned to the room, creating a healthier environment, 24/7.

While the COVID liability case law is still evolving among states, UV-C technology is a science-centric proactive strategy to create healthier building environments, providing peace of mind to residents and staff alike.

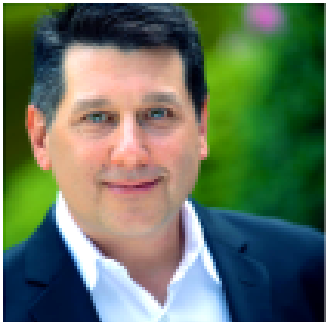
The UV Angel Environmental System is used in hospitals, including St. Jude's Children's Hospital, and many other public and commercial facilities, e.g., McDonald's restaurants. We are introducing the technology to PHAs and MF owners.

This webinar will explore the science of ultraviolet light. You will learn how you can protect indoor resident common areas and PHA offices by disinfecting and sanitizing with the UVAngel air filtration system. Register to learn how the affordable UVAngel system improve the safety of your residents and office staff.

Key Topics

- What is UV Light?
- What Are the Health and Safety Benefits?
- How Can I Improve Resident and Office Staff Safety?
- How do I Install and Maintain My UV-C Light System?
- COVID Liability

Presenters



Alan Watts
Managing Partner

Clean Air USA



Dr. Linda Lee, MBA
Chief Medical
Affairs & Science Officer

 **UVANGEL**



Dick Santangelo P.E.
President & CEO


APOLLO
Engineering Solutions

For more information about the UV Angel Webinar Series, contact Dick Santangelo, P.E. at 703-627-7161 or Mike Nail at 301-639-3767.

“Always On”

Hardening Your Assets – Are You Prepared?

The hallmark of the term system hardening originated in the IT world. System hardening is the process of configuring an asset in line with security best practices to reduce its vulnerability to cyberattacks. The process involves reducing the attack surface of the asset by disabling unnecessary services, user accounts, and ports. The purpose of system hardening is simple, reduce vulnerability to attacks.



Outside the IT world, building asset vulnerability is often addressed through resiliency strategies. We learned hard lessons for events such as Hurricane Michael, Superstorm Sandy, electrical blackouts, CA fires, blizzards, Flint MI water contamination, shootings at workplaces or schools, etc. Whenever and wherever a natural or manmade disaster wreaks havoc in the world, sustainability and building resilience, resilient design, becomes the topic of conversation amongst architects, builders, and contractors. Yet the two, while important, are not synonymous.

A newsfeed populated with catastrophic images of death and destruction reminds us that while green buildings is certainly important, LEED and LEED certification do not matter if a building becomes uninhabitable due to flooding, earthquake or some natural or manmade disaster. This is where building resilience comes into play. Like the walls of a castle or the resilience of the Joshua Tree, if we can control the environment within the walls, we can keep occupants safe and maintain the ability to absorb, recover from, and more successfully adapt to adverse events.

Over the past two and a half decades, sustainability has evolved into a noble buzzword and active green movement ranging from conservation to resource efficacy to global warming to climate change to biodiversity. In essence, sustainability is all about protecting nature and the environment from human endeavors. However, who protects us from Mother Nature? That is the heart of resilience building.

Fast forward to 2021, we find ourselves ravaged by a new threat from Mother Nature. In the fight to beat back the COVID threat, we have developed vaccines; however, true to her capability, Mother Nature develops variants. Can vaccines alone protect us? The experts appear to say no. We are advised to continue wearing masks, social distance until we see the infection numbers, and deaths significantly reduced. We are essentially told to continue wearing barriers that protect us from airborne contaminants.

Unfortunately, even after the infectious numbers and deaths are reduced, is the battle over? A recent McKinsey and Company article entitled "*Not the last pandemic: Investing now to reimagine public-health systems*". The article states that the COVID-19 crisis reminds us how underprepared the world is to detect and respond to emerging infectious diseases. We must make smart investments now to simultaneously navigate COVID-19 and prepare for future pandemics. The article can be found in its entirety at <https://www.mckinsey.com/industries/public-and-social-sector/our-insights/not-the-last-pandemic-investing-now-to-reimagine-public-health-systems>

McKinsey and Company describe the five areas that such a program might cover: building "always on" response systems, strengthening mechanisms for detecting infectious diseases, integrating efforts to prevent outbreaks, developing healthcare systems that can handle surges while maintaining the provision of essential services, and accelerating R&D for diagnostics, therapeutics, and vaccines. While rebuilding our medical and healthcare response systems our current pandemic response leaves us vulnerable to major disruptions to our business, healthcare education and overall safety.

What are the performance expectations from a hardened asset? If resilience provides ability to withstand intense natural and manmade disasters, then hardening an asset expands the list of natural and manmade disasters that we can anticipate. We want to enhance our ability to prepare and plan for, absorb, recover from, and more successfully adapt to adverse events related natural and manmade disasters. We need to expand anticipated threats to include and pathogen infections.

Can *hardening* assets be done at a reasonable cost, making resilient buildings a valued proposition? The short answer is yes, if we can fully identify the threat, and the threat design is integrated into a value proposition of proven technology backed by research, safety, occupants' peace-of-mind, reduction of lost workdays, asset longevity, loss mitigation, liability risk and higher property appraisal values.

As building resilience continues to expand to address the multitude of threats, we face in the 21st century, the discussion of how construction practices need to change will expand. Builders will need to pay much closer attention to their selection of building materials, building design, pathogen technology (e.g., ultraviolet light technology) and cyberattack defense mechanisms. Multifamily owners, tribal entities, housing authorities will need to understand what performance features are going to be important to the building's purpose, so they can prepare themselves to meet the changing demands of the next 25 years.

To be successful, we must change our thinking from "**In Case of Emergency-Break Glass**" to "**Always On**". Outbreak response is most effective when it uses mechanisms that are always deployed and operating. "When the time to act has come, the time to plan has passed."

Looking for Greater Comfort and Energy Savings – Consider Phase Change Materials

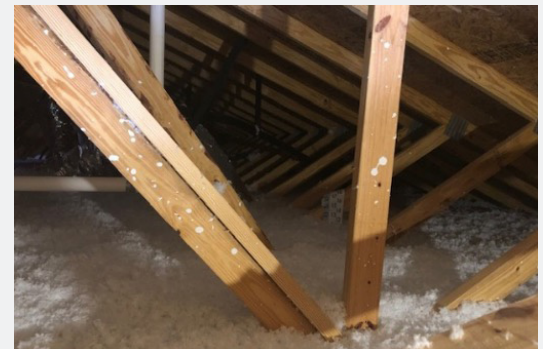
Phase change materials (PCM) are redefining building envelop technology in the building and construction industry. PCM provide efficiency, resiliency, and comfort to building worldwide using economical and innovative use of thermal energy storage. PCM can absorb heat, hold it until it is needed and release the heat when the temperature in a room falls below a desire temperature level.

Two years ago, I installed PCM in my Florida home. The house is a 2,000 SF, single story masonry block home. I immediately realized a greater comfort level, keeping room temperature at a constant level and overall savings of 20 percent in energy cost savings. PCM was laid directly on the ceiling board and covered with blown insulation. I anticipate that the PCM with installation will pay for itself in under 3.5 years. Buildings in more colder climates can expect higher savings.



Science behind PCM

PCM mats are a building product built around a fundamental property of nature: The natural tendency of materials to absorb heat when they melt (phase change from solid to liquid/gel) and to release heat when they solidify (phase change from liquid/gel to solid). When these phase change materials are placed in quantity into the structure and/or envelope of a building, they will naturally absorb heat or air condition the building during the day and release heat at night. As the phase change material transitions from solid/liquid or liquid/solid, it maintains the same temperature until complete transition has occurred. By incorporating phase change materials that will change its phase at standard building temperatures, Phase change material provides a unique strategy for keeping buildings at desired temperature with little need for heating or air conditioning.



Phase change materials can be integrated into the wall, roof, ceiling, attic, and floor assemblies of new or rehabbed buildings helping impact overall R-value and thermal performance of the building envelope. This impact is unique compared fiberglass insulation, which only blocks or slow down heat flow. By changing the delta-T between indoor and outer wall temperatures, a significant reduction in building heat flux is achieved since phase change materials “stores” energy passing through the assembly, instead of slowing the flow of energy.

Phase change materials can also be installed over ceiling tiles or into interior partitions to help alleviate internal load concerns. Case studies have shown that applying phase change materials over ceiling tiles of high internal load buildings can contribute to double digit energy savings.

Phase change technology has been used for years in limited quantity within the building sector with much success from a performance perspective, however, most phase change technologies have been met with significant barriers to mainstream adoption because of these factors:

- Cost of material
 - Fire testing Issues
 - Environmental impacts of material sourcing
-

Technology Improvements

Improved technology within the last 10 years of phase change material formulation addresses these issues and roofing and building envelop design engineers and contractors are taking notice. The phase change materials market size is virtually limitless, containing at a minimum, all new and existing (Rehab) buildings worldwide. In addition, because of the significant impact that phase change materials have on building energy efficiency, it is estimated that the total impact of adding phase change materials into all U.S. buildings would cause a saving of over 9.5 Quads of energy or 10% of the total U.S. energy consumption. This amount exceeds all overseas oil imports.

The cost savings for using phase change materials occurs in multiple ways. The primarily savings is the reduction in heating and cooling costs, because of storing heat lost to the outdoors (winter) or penetrating the inside (summer) and releasing it to the cooling interior or outdoors later. Such a stabilization in temperature can reduce HVAC run times. Secondary savings occur in commercial and industrial buildings due to peak load reductions and shifting. This results in a reduction in demand charges by in some test cases up to 99%. Other cost savings can occur because of reduction in insulation R-value depths in wall assemblies designed above code levels, and reduction in HVAC equipment sizing.

For multifamily buildings, PCM can significantly affect:

- **Energy Savings** – reducing HVAC energy use using technology that requires ZERO daily or ongoing maintenance.
 - **Demand Management** – stored thermal energy when power is cheap and save when it is expensive.
 - **Temperature Management** – your building, property and residents within your budget parameters.
 - **Comfort and resilience** – a brilliant passive solution to maintaining comfort, production, and protection to downtime 24/7.
-

Improved Pricing

Improving price points have come down significantly, so such endeavor would not only be feasible but can be accomplished with a return of investment of (usually) less than 7 years without government subsidies. The Federal government and in particular the General Services Administration (GSA) are looking at the use phase change materials in Federal buildings. According to GSA, PCMs can help maintain comfortable building temperatures while reducing annual energy consumption throughout the US. The technology under evaluation promises to address the environmental impacts of material sourcing typically associated with PCMs by substituting less expensive and safer inorganic materials for the more costly volatile and harmful organic materials used in earlier generations of this technology.

Many PCMs are made from mineral based, nonflammable temperature control solutions for applications as low as Ultra Cold -70°C [-94°F] needs and High Temperature 78°C [172°F] needs. The higher performance, quality materials are made from naturally occurring raw matters easily and immediately procured anywhere in the world and unlike many other PCMs, you want to be sure it is a Class one fire rated material WITHOUT the need for chemical fire retardants. PCM is worth consideration for multifamily rehab projects going through repositioning. Using PCM to rehab the building envelope may be eligible for a 179D rebate, offsetting material and installation costs. New construction is especially accommodating to the installation of PCM in wall and ceilings. For more PCM information contact Dick Santangelo at 703-627-7161 or wattshotnewsletter@gmail.com.

NOAA Temperature Outlook – Winter 2021

Short-Term Weather Brief

- **February's temperature pattern will be split between a colder West and milder East.**
- **Some colder air could spill into the eastern states at times.**

The temperature pattern in February is expected to split the nation with the coldest conditions in the West as the East stays milder.

Above-average temperatures are most likely from parts of the South into the Ohio Valley and Northeast in February, according to the latest update from The Weather Company, an IBM Business. Temperatures are expected to be below average overall during the month from the Southwest into portions of the northern Rockies and northern Plains. While the forecast is for milder-than-average temperatures to dominate the eastern states overall in February, there could still be periods of colder weather, based on the expected large-scale weather pattern. The proximity of colder air in western Canada increases the chance of a colder February in parts of the West.

This is the first winter in a decade with sustained downstream blocking (negative North Atlantic Oscillation), which, combined with the La Niña forcing, may allow for a few chunks of colder air from western Canada to move southeastward across the major population centers of the eastern U.S.



EIA Short-Term Energy Outlook

- The January short-term energy outlook (STEO) remains subject to heightened levels of uncertainty because responses to COVID-19 continue to evolve. Reduced economic activity and changes to consumer behavior in response to the COVID-19 pandemic caused energy demand and supply to decline in 2020. The ongoing pandemic and the success of vaccination programs will continue to affect energy use.
- Economic assumptions are among the most important drivers of the U.S. Energy Information Administration's (EIA) forecasts. EIA's U.S. macroeconomic assumptions are based on forecasts by IHS Markit and EIA's global economic assumptions are based on forecasts from Oxford Economics. After falling by 3.5% in 2020, IHS Markit forecasts that U.S. real gross domestic product (GDP) will increase by 4.2% in 2021 and 3.8% in 2022. Rising GDP contributes to EIA's forecast of rising total energy use in the United States during 2021 and 2022. After falling by 7.8% in 2020, EIA forecasts that total U.S. energy consumption will rise by 2.6% in 2021 and by 2.5% in 2022, reaching 97.3 quadrillion British thermal units (quads), 3.0 quads less than in 2019.

Oil

- EIA forecasts Brent crude oil spot prices to average \$53 per barrel (b) in both 2021 and 2022 compared with an average of \$42/b in 2020.
- U.S. regular gasoline retail prices averaged \$2.18 per gallon (gal) in 2020, compared with an average of \$2.60/gal in 2019. EIA forecasts motor gasoline prices to average \$2.40/gal in 2021 and \$2.42/gal in 2022. U.S. diesel fuel prices averaged \$2.55/gal in 2020, compared with \$3.06/gal in 2019, and EIA forecasts them to average \$2.71/gal in 2021 and \$2.74/gal in 2022.
- EIA estimates that U.S. crude oil production fell from the 2019 record level of 12.2 million b/d to 11.3 million b/d in 2020. EIA expects that annual average production will fall to 11.1 million b/d in 2021 before rising to 11.5 million b/d in 2022.

Natural Gas

- Henry Hub natural gas spot prices averaged \$2.03 per million British thermal units (MMBtu) in 2020. EIA expects Henry Hub prices will rise to an annual average of \$3.01/MMBtu in 2021, limiting natural gas use for power generation amid reduced natural gas production. EIA forecasts Henry Hub prices will rise to an average of \$3.27/MMBtu in 2022.
- EIA estimates that U.S. natural gas consumption averaged 83.1 billion cubic feet per day (Bcf/d) in 2020, down 2.5% from 2019. EIA expects that natural gas consumption will decline by 2.8% in 2021 and by 2.1% in 2022. Most of the decline in natural gas consumption results from less natural gas use in the power sector, which EIA forecasts to decline because of rising natural gas prices. These declines are partly offset by rising natural gas use in other sectors.

Electricity

- EIA forecasts that total consumption of electricity in the United States will increase by 1.5% in 2021 after falling by 4.0% in 2020. The pandemic affected electricity consumption in the commercial and industrial sectors in 2020. EIA estimates retail sales of electricity to the two sectors fell by 6.0% and 7.9%, respectively. EIA expects commercial electricity use in 2021 to rise by 0.9% and industrial electricity use to rise by 1.2%. Social distancing guidelines have caused people to spend more time at home, resulting in increased residential electricity use. In 2020, retail sales of electricity to the residential sector were 1.3% higher despite a mild winter earlier in the year. EIA expects residential electricity use will rise by 2.4% in 2021 as colder winter weather leads to more heating demand. Total forecast electricity consumption in 2022 will rise by 1.7%.
- EIA expects the share of U.S. electric power sector generation from natural gas will decline from 39% in 2020 to 36% in 2021 and 34% in 2022 in response to higher natural gas fuel costs and increased generation from renewable energy sources. Coal's forecast share of electricity generation will rise from 20% in 2020 to 22% in 2021 and 24% in 2022, which is close to its share in 2019. Electricity generation from renewable energy sources will rise from 20% in 2020 to 21% in 2021 and 23% in 2022. The nuclear share of U.S. generation will decline from 21% in 2020 to 20% in 2021 and 19% in 2022.

Coal

- EIA estimates that total U.S. coal production decreased by 24% to 537 million short tons (MMst) in 2020. This decline largely reflected lower demand for coal from the electric power sector and the coal export market. After declining by 11.1% in 2020, EIA forecasts that total energy-related carbon dioxide (CO₂) emissions will increase by 4.7% in 2021 and by 3.2% in 2022. Even with growth over the next two years, forecast CO₂ emissions in 2022 remain 3.9% lower than 2019 levels. Energy-related CO₂ emissions are sensitive to changes in weather, economic growth, energy prices, and fuel mix.

Renewable Energy

- During the next two years, EIA expects electricity generation capacity from renewable energy sources to continue growing. Although EIA expects both wind and solar capacity growth, solar capacity grows at a faster rate in the forecast. Based on EIA survey data, large-scale solar capacity growth in gigawatts (GW) will exceed wind growth for the first time in 2021.

GHG Emissions

- After declining by 11.1% in 2020, EIA forecasts that total energy-related carbon dioxide (CO₂) emissions will increase by 4.7% in 2021 and by 3.2% in 2022. Even with growth over the next two years, forecast CO₂ emissions in 2022 remain 3.9% lower than 2019 levels. Energy-related CO₂ emissions are sensitive to changes in weather, economic growth, energy prices, and fuel mix.

Watts Hot at HUD

President Joe Biden has selected Rep. Marcia Fudge to lead the Department of Housing and Urban Development.

Members of the U.S. Senate's Banking, Housing and Urban Affairs Committee on Thursday 2/4/21 approved Warrensville Heights Democratic Rep. Marcia Fudge's nomination to be President Joe Biden's Secretary of Housing and Urban Development. Senate Democratic Leader Chuck Schumer will bring Fudge's nomination before the full Senate soon.

WattHotNewsletter® wishes Rep. Marcia Fudge a speedy confirmation hearing in the Senate and success in the Biden Administration.

WattHotNewsletter® is also happy to welcome Dr. Charles Marshall as the Director of the Energy Center. With over 30 years of change, utilities and facilities management experience, Charles led (ATL) Hartsfield-Jackson Atlanta International Airport, to be the first U.S. airport to have its energy management system certified to the ISO 50001 standard. Charles holds several graduate degrees and certifications: doctorate, masters, and baccalaureate degrees; Certified Energy Manager; Certified Energy Auditor; Certified Lighting Efficiency Professional; Certified Building Commissioning Professional. Dr. Marshall will be a great asset to OPHVP.



PIH Notices

PIH 2020-30 - Implements of Section 209 (b) of the Economic Growth, Regulatory Relief, and Consumer Protection Act (Economic Growth Act). Guides Public Housing Agencies (PHAs) on implementing Section 209 (b) of the Economic Growth, Regulatory Relief, and Consumer Protection Act (Economic Growth Act), Public Law No: 115-174. Specifically, this notice guides the use and eligibility requirements for the Small Rural Frozen Rolling Base (SR-FRB) program. Making it easier for small PHAs to implement and finance an energy project and retain energy efficiency savings.

PIH Notice 2021-07 - Demolition and/or disposition of public housing property, eligibility for tenant protection vouchers, and associated requirements. Notice supersedes and replaces PIH Notice 2018-04. The notice is to explain application requirements to request HUD approval to demolish and/or dispose of public housing property. Notice is used with HUD's implementing regulations at 24 CFR part 970 and related rules and applies to all SAC applications, including those under review or already approved by HUD if the PHA is requesting an amendment of HUD's approval.

PIH Notice 2020-31 - Remote Video Inspections for Housing Choice Voucher Program. Notice gives public housing agencies (PHAs) guidance on conducting Housing Quality Standards (HQS) inspections using Remote Video Inspections (RVIs). In RVIs, an HQS inspector performs an HQS inspection from a remote location using video streaming technology via a person at the inspection site who serves as a proxy. The proxy follows the direction of the HQS inspector throughout the entire inspection process.

PIH 2020-34 Update to PIH Notice 2020-15, Revised Loan Limits for the Section 184 Indian Housing Loan Guarantee Program. HUD is authorized to set Section 184 maximum loan limits pursuant to 12 U.S.C. § 1715z-13a(b). HUD has recently approved an expansion request by the Choctaw Nation to expand the Section 184 program into eight counties in Arkansas. Specifically, Little River, Sevier, Polk, Scott, Howard, Montgomery, Logan, and Yell counties. These counties are now eligible for Section 184 guaranteed loans.

Tribal Entities Grants

[Energy Technology Deployment on Tribal Lands](#) Closing date 2/11/2021

The Office of Indian Energy announced up to \$15 million in new funding to deploy energy technology on tribal lands. This funding will support Indian Tribes, Alaska Native Regional Corporations and Village Corporations, Intertribal Organizations, and Tribal Energy Development Organizations. Should tribes so choose to unleash their vast undeveloped energy resources, this funding opportunity announcement (FOA) would help support those communities.

Inspection Protocol

On January 13, HUD's proposed rule (<https://bit.ly/2KBXFNO>) outlining a new physical inspection protocol was published in the Federal Register. The National Standards for the Physical Inspection of Real Estate (NSPIRE) will be the foundation for assessing the quality of housing assisted by the federal government. For several years, the Department has been evaluating various aspects of its main inspection models (HQS and UPCS) and this proposed rule is one part of the "effort across HUD to revise the way HUD-assisted housing is inspected and evaluated." Comments to the proposed rule are due **March 15, 2021**.

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