

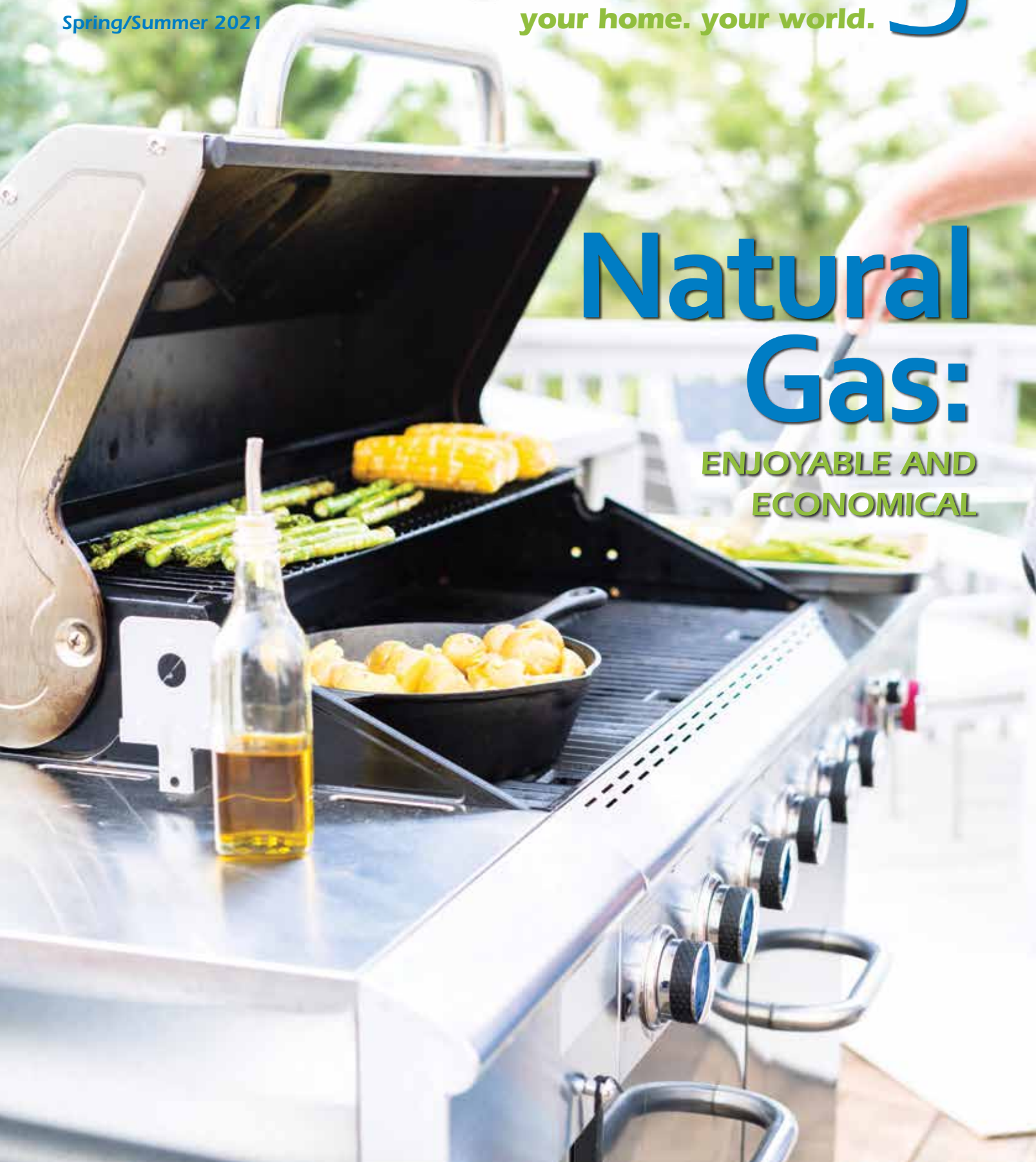
naturalLiving

Spring/Summer 2021

your home. your world.

Natural Gas:

ENJOYABLE AND
ECONOMICAL



INSIDE

08

FEATURES

08 A backyard oasis

Natural gas brings convenience and comfort to outdoor living spaces.



12

IN EVERY ISSUE

naturalNews

03 Making every day Earth Day

Natural gas plays a vital role in helping to preserve the universe.

naturalChoice

07 On demand

Tankless water heaters save money and space.

naturallyFit

12 It's trending

Calm environments and expanding office space are top focus for 2021 home design.

naturallyBetter

14 Keeping the lights on

Natural gas generators offer power when it is needed most.

naturallyGood

16 Recipes

Grilled Shrimp With Mango Salsa & Soaked Quinoa
Grilled Skirt Steak And Veggies With Guacamole

naturalLiving is a free publication brought to you by Energy Solutions Center, published in cooperation with PRISM Media Group.

naturalLiving is published twice annually by PRISM Media Group, 8951 Cypress Waters Blvd., Suite 160, Dallas, TX 75019. Visit PRISM Media Group at prismmediagroup.com. No part of this publication may be reprinted without permission. Copyright 2021 Energy Solutions Center.

PRISM Media Group

President: Ray Larson

Editorial Director: Stephanie Anderson Forest

Production Manager: Rachael Daniel

Graphic Designer: Nancy Kekich

Contributing Writers: Georgeann H. Ikuma,
Tonya McMurray, Monica Stavish Skaggs



For advertising information
contact Barbara Stinson:
bstinson@esccenter.org



Please recycle this magazine after you read it.

Making every day Earth Day

Natural gas plays a vital role in helping to preserve the universe.

By Georgeann H. Ikuma

aving the way for a pollution-free planet began nearly 51 years ago. On April 22, 1970, 20 million Americans — 10% of the U.S. population at the time — took to the streets to protest environmental deterioration and demand a new way to preserve the world, according to earthday.org. Now, more than a half-century later, 1 billion people participate in Earth Day activities to celebrate nature and remind everyone of the importance of protecting the planet.

Public gatherings recognizing this year's Earth Day have been downsized due to the Covid-19 pandemic, but the push to create a cleaner and healthier environment remains strong. The 2021 theme of Earth Day — taking place April 22 — is “Restore our Earth.”

In the decades before the first Earth Day, Americans were consuming vast amounts of leaded gas, and a variety of industries expelled

“Now, \$1 billion people participate in Earth Day activities to celebrate nature and remind everyone of the importance of protecting the planet.”

— earthday.org

smoke and other pollutants with little regard, or even knowledge, of their dire consequences. Until this point, mainstream America remained mostly oblivious to environmental concerns and how a polluted environment threatens human health.

The inception of Earth Day provided a voice for this environmental consciousness, according to earthday.org. By the end of 1970, significant changes were underway. The first Earth Day led to the creation of the U.S. Environmental Protection Agency in December 1970 and the passage of other first-of-their-kind environmental laws, including the National Environmental Education Act, the Occupational Safety and Health Act, and the Clean Air Act.

CAUSE FOR CELEBRATION

Today, Earth Day finds the United States much better off environmentally, and natural gas has played a significant role in its improvement.

“Natural gas has many qualities that make it an efficient, relatively clean-burning and economical energy source,” according to the U.S. Energy Information Administration. Unlike other fossil fuels, natural gas does not release ash residue or sulfur oxides, and only produces small amounts of nitrogen oxides and carbon dioxide. This makes natural gas an effective and safe alternative for industrial and residential use, electricity generation and transportation fuel for vehicles. Because of this, natural gas is less a factor in environmental hazards such as smog (composed primarily of carbon monoxide and nitrogen oxides) and climate change.

The U.S. Department of Energy analyses indicates that every 10,000 U.S. homes powered with



The theme of this year's Earth Day, which takes place April 22, is “Restore the Earth.” Clean-burning natural gas plays a significant role in helping to preserve the environment.





natural gas instead of coal avoid annual emissions of 1,900 tons of nitrogen oxides, 3,900 tons of sulfur dioxide and 5,200 tons of particulates. Reductions in these emissions translate into public health benefits, as these pollutants have been linked with problems such as asthma, bronchitis, lung cancer and heart disease for hundreds of thousands of Americans, according to the Union of Concerned Scientists. This national nonprofit organization uses rigorous, independent science to solve the planet's problems.

According to a recent EPA report, since 2005, national greenhouse gas emissions have fallen by 10%, and power sector emissions have fallen by 27% — even as our economy grew by 25%. Providing 29% of the country's energy, natural gas heats about half of the country's homes, where carbon emissions have declined more than any other nation in the world.

"Our report highlights declining emissions trends since 2005, showing that the U.S. is reducing GHG emissions while still being able to grow a robust economy," said EPA Administrator Andrew Wheeler. "While there was a small rise in emissions due to weather

"Every 10,000 U.S. homes powered with natural gas instead of coal avoid the annual emissions of 1,900 tons of nitrogen oxides, 3,900 tons of sulfur dioxide and 5,200 tons of particulates."

— U.S. Department of Energy

and increased energy demand from the prior year in this report, based on preliminary data, we expect next year's [2021] report to show that the long-term downward trend will continue."

FROM RELIABILITY TO RESTORATION

The Earth continues to reap the benefits of natural gas every day. Natural gas is critical to meeting America's surging energy needs now and for the foreseeable future. And, according to the EIA, there is enough natural gas in North America to last throughout this century. ■

SITE VERSUS SOURCE: AND THE WINNER IS ... NATURAL GAS.

The choice between natural gas and electricity for heating and other uses in a home affects both overall energy efficiency and the environment. Although efficiency ratings for home appliances can make it seem as if electric appliances are more efficient than those using natural gas, that is not necessarily the case. According to researchers from the National Institute of Standards and Technology, consumers wanting to operate their homes more efficiently should choose natural gas over electricity.

However, to get a clear picture, the difference between site and source energy must be accounted for when look-

ing at energy performance. Failing to do so will result in an apples-to-oranges comparison that does not give an accurate picture of a home's energy consumption.

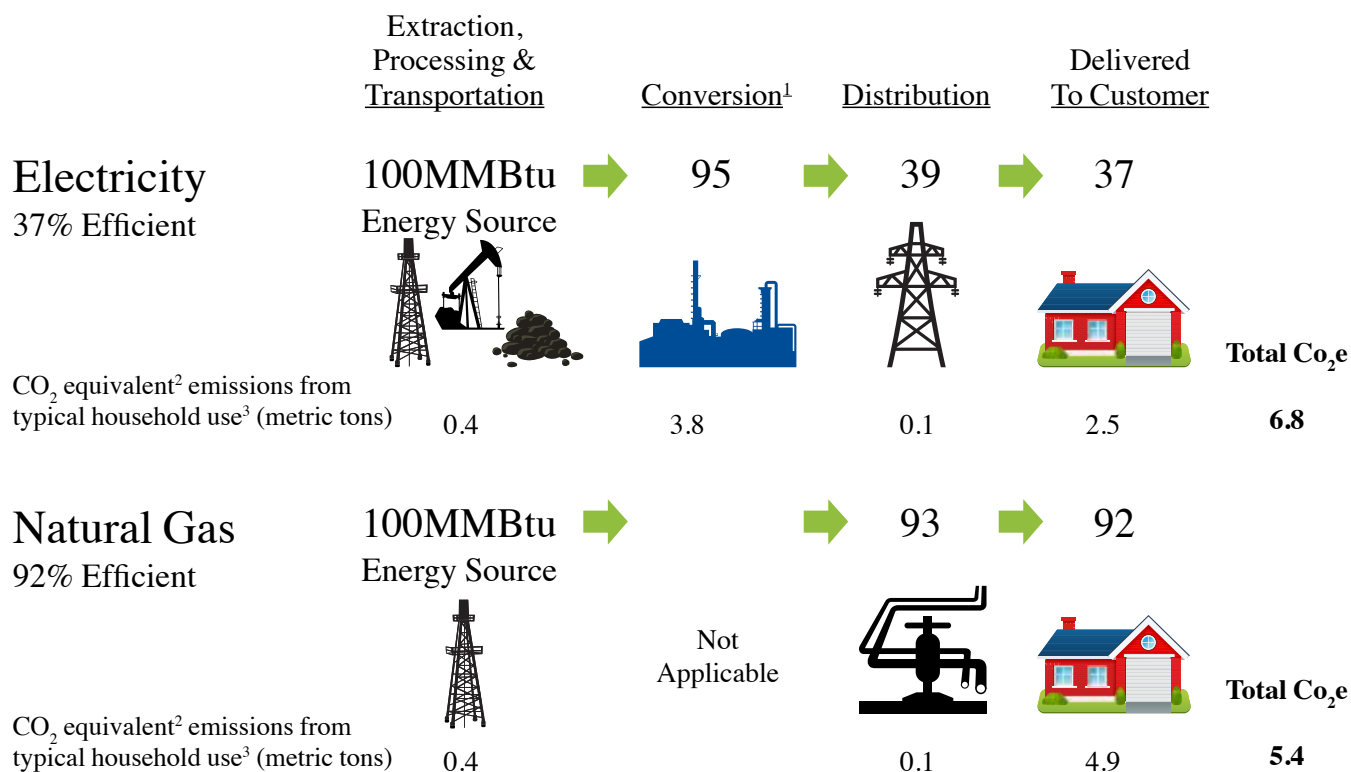
THE DEFINITION OF SAVINGS

Site energy is the amount of energy consumed in the home. Measures of site energy are based on the overall amount of energy converted to useful power.

Source energy considers the entire chain of energy production, from creation to distribution and energy usage by the consumer.

(continued on page 06)

2.5 Times More Energy Reaches the Customer with Natural Gas



1. Includes all energy inputs, including renewable sources — based on actual fuel mix in 2018

2. Includes greenhouse gas impact from unburned methane

3. Energy consumed in space and water heating, clothes drying, and cooking

NOTE: This full-fuel-cycle examines all impacts from the energy sources through consumption

SOURCE: ENERGY ANALYSIS, AMERICAN GAS ASSOCIATION, OCT. 1, 2020.



Please recycle this magazine after you read it.

SITE VERSUS SOURCE: AND THE WINNER IS ... NATURAL GAS. (CONTINUED FROM PAGE 05)

According to the U.S. Environmental Protection Agency, when source energy is considered, more than 92% of the natural gas that enters the pipeline reaches the home, compared to only 37% for electricity. Natural gas is far superior in terms of cost and overall efficiency while also being environmentally friendly.

"Although electric appliances such as water heaters, stoves and clothes dryers may use less site energy than natural gas appliances, this disadvantage is more than offset by the greater energy efficiency of the overall natural gas production and delivery system," said Brendan O'Brien, senior manager, energy analysis, American Gas Association. "The higher efficiency and lower price of natural gas relative to other energy forms result in annual utility energy bills for the gas home that are roughly 52% lower than the comparable all-electric home energy bills."

A HOUSEHOLD EXAMPLE

According to AGA's Energy Gas report, comparing appliances in terms of source energy has a significant effect on electricity and has a small impact on fossil fuels like natural gas. So what difference does this make?

A typical gas tank water heater has an efficiency level of 82%.

In comparison, a typical electric tank water heater has an efficiency level of 95%.

So, in terms of site energy, the electric tank has an efficiency level about 16% better than that of the gas tank. But if you factor in source energy:

- The same gas tank has a "source efficiency" of about 74%.
- The same electric tank has a "source efficiency" of roughly 35%.

So, the electric tank is half as efficient in terms of source energy and, in turn, environmental impact. If source versus site differences are not accounted for, comparisons between electric heating and natural gas heating won't add up.

According to an AGA energy analysis report, the 2019 U.S. representative average unit cost for residential gas was \$10.13 per million British thermal units (MMBtu) versus \$38.83 per MMBtu for electricity. Based on these energy prices and energy consumption levels, residential natural gas customers realize annual energy savings of about \$982 relative to electricity customers. ■

Full-Fuel-Cycle Impacts from Energy Consumption in a Typical Home

Electric Home



6.8 metric tons CO₂e*

Full-Fuel-Cycle Energy Consumption: 125 MMBtu/yr
 Site Energy Consumption: 49 MMBtu/yr
Total Annual Energy Cost: \$1,853

Natural Gas Home



5.4 metric tons CO₂e*

Full-Fuel-Cycle Energy Consumption: 94 MMBtu/yr
 Site Energy Consumption: 84 MMBtu/yr
Total Annual Energy Cost: \$907

*Based on a 2,000 square-foot home in an average climate, using national average energy prices. Analysis includes the following only: space heating, water heating, cooking and clothes drying. Home meets 2013 International Energy Conservation Code standards.

SOURCE: ENERGY ANALYSIS, AMERICAN GAS ASSOCIATION, OCT. 1, 2020.

On demand

Tankless water heaters save money and space.

By Monica Stavish Skaggs

Enjoying that hot shower while the dishwasher and washing machine are operating is a reality with today's energy-efficient tankless water heaters. Natural gas tankless water heaters deliver a continuous supply of hot water to a household.

With conventional water heaters, homeowners often spread out different tasks that require hot water to allow time for the heater to recover. A typical tank can deliver lots of hot water at once, but it can also run out quickly. That can create an abrupt end to showering or lack of proper temperatures for laundry or the dishwasher. With a properly sized tankless system, water is heated as it is distributed, meaning it won't run out of hot water.

And while it's great to indulge in that luxuriating shower, consumers conscious of the environment can be guilt-free because tankless water heaters provide energy savings. They are also more compact and mount on a wall, taking up less space than bulky conventional storage water heaters.

"High efficiency and eco-friendly condensing tankless technology can reduce energy consumption by 20% to 40% and significantly reduce greenhouse gas emissions," said Brian Fenske, director of commercial sales, Navien Inc.

Tankless water heaters are called demand-type or instantaneous water heaters. They instantly heat the water for as long as there is a demand for hot water. This eliminates the added cost of keeping 40 to 50 gallons of water hot in a storage tank.

While tankless water heaters' upfront cost is generally more than conventional water heaters, they usually last longer and are less expensive to operate. The initial cost to install a tankless water heater can be \$2,000 to \$3,000, but most last up to 20 years. According to the U.S. Department of Energy, that compares to the average life span of 10 to 15 years for conventional water heaters.

"Tankless water heaters have much longer component and parts

"High efficiency and eco-friendly condensing tankless technology can reduce energy consumption by 20% to 40% and significantly reduce greenhouse gas emissions."

**— Brian Fenske, director of commercial sales,
Navien Inc.**



PHOTO COURTESY OF NAVIEN INC.

Navien Inc.'s tankless water heaters offer reliable, space-saving design and flexibility. They are compact and can be mounted on a wall, taking up less space than conventional storage water heaters.

warranties than conventional water heaters. Like all equipment, they should be maintained and supplied with acceptable water quality and have regularly scheduled or required service," Fenske said.

Replaceable parts can extend the life of tankless water heaters by several years. At the same time, they save money because they don't produce the same standby energy losses associated with conventional water heaters.

(continued on page 15)

Outdoor living spaces have evolved from the simple patio to cozy spaces that include fireplaces, stereo systems and TVs.



A backyard oasis

Natural gas brings convenience and comfort to outdoor living spaces.

By Tonya McMurray

Stay-at-home orders, social distancing and a global pandemic's realities have sparked increased interest in outdoor living spaces.

"People are at home far more than ever and are interested in expanding their living space to provide more options for the family," said Emily McGee, director of communications, Hearth, Patio and Barbecue Association (HPBA). "We are hearing from our members that they are seeing an increase in demand for outdoor products, especially grills and outdoor heating devices such as heaters, fire pits and fire tables."

With more time at home, many homeowners turned their focus to home improvements, said Kathy Rogers, category director, Hearth & Home Technologies Inc.

"Outdoor spaces have been growing in popularity in the last 10 years," she said. "Given the current situation, the desire for expanding the outdoor space has really become a strong focus. Homeowners are finally getting to the remodeling projects they've been putting off, and that includes the outdoor space."

The National Association of Realtors reports that outdoor entertaining upgrades can add significant value to the home and provide people with a large return on their investment.

"Outdoor is truly an expansion of the home," Rogers said. "It adds square footage as well as equity for a fairly small investment. With today's environment, it provides a relaxing space for families and close friends to gather. It truly creates a space to escape all the pressures society is currently facing."

BUILDING THE OUTDOOR ROOM

The first step to creating an outdoor living space is to decide what elements to add.

"We believe that creating more usable living space is of interest because it allows for more activities, whether it is grilling a meal, watching a sporting event on TV or even socially-distanced get-togethers," McGee said. "It is critical that the homeowner really consider exactly what the space will be used for and the amount of room available before making purchases. Will this be an outdoor kitchen? Do you want this to be a place to hang out and even work? Watch TV? Have a few neighbors over while staying more than 6 feet apart?"

Many consumers turn to natural gas to fuel their outdoor living spaces, banking on the comfort and convenience of a reliable, clean



"We are hearing from our members that they are seeing an increase in demand for outdoor products, especially grills and outdoor heating devices such as heaters, fire pits and fire tables."

— Emily McGee, director of communications,
Hearth, Patio and Barbecue Association



Please recycle this magazine after you read it.



Fire pits and fireplaces come in a variety of styles and add both heat and ambiance to outdoor spaces.

fuel source. Natural gas is both affordable and environmentally friendly.

Natural gas grills are a popular addition to outdoor living spaces. Whether modestly sized and freestanding or large, permanent structures, natural gas grills provide an always-ready cooking appliance. With more precise temperature controls than propane or charcoal grills, natural gas grills produce more consistent cooking results and take the guesswork out of outdoor cooking.

Gas grills ignite quickly without the long warmup time required for charcoal grills, and the fuel supply is always available. Unlike propane grills, there's no chance of a tank being low or running out during a cookout. Because natural gas grills connect directly to the home's existing natural gas line, the fuel is always available and ready to go.

SETTING THE MOOD

Outdoor fireplaces and fire pits combine the timeless appeal of a crackling fire with the latest natural gas technology's convenience and safety. Because there are no sparks or hot embers flying about, gas fire pits and fireplaces are safer and can be located almost anywhere—even close to patio furniture or wood decks. There is no hassle of gathering or buying wood or trying to start the fire. And, there is no need to clean out ashes after enjoying a cozy evening fire.

Many homeowners also choose to add patio heaters, which can generally warm a 12- to 20-foot area and help take the chill out of early spring or crisp fall nights. Heaters can be permanently installed in-ground, deck mounted or hung from a roofline. Other heaters are freestanding and portable to allow for greater flexibility in use.

Gas-fueled lights and tiki torches are other popular features for outdoor living spaces. Lights can be mounted on exterior walls, porch ceilings or on lamp posts. Light sensors and timers can help reduce fuel use by ensuring that lights are only on when needed.

Whether enclosed or with open flames, outdoor lighting fueled by natural gas offers a reliable light source, even during a power outage. And, while bugs flock to electric lighting, natural gas lighting does not tend to attract insects.

Finishing touches can include movie screens, speakers and surround sound systems, privacy screens, organic gardens and other decorative features.

Outdoor living spaces offer versatility and an inviting, entertaining way to enjoy your home. Whether you have a small patio with a grill or a larger outdoor living space, you can count on natural gas to bring comfort, convenience and ambiance to all your outdoor gatherings. ■

“Given the current situation, the desire for expanding the outdoor space has really become a strong focus. Homeowners are finally getting to the remodeling projects they’ve been putting off, and that includes the outdoor space.”

**— Kathy Rogers, category director,
Hearth & Home Technologies Inc.**

A GREAT PARTNERSHIP: COST-EFFECTIVE CSST OFFERS FLEXIBILITY FOR CONNECTING GAS

Homeowners creating outdoor living spaces will find that corrugated stainless steel tubing, or CSST, offers a safe, cost-effective and convenient solution for connecting a variety of outdoor appliances to natural gas lines.

CSST is a flexible, stainless steel pipe covered in yellow or black plastic coating that comes in long coils that can be easily routed in various configurations. The product eliminates the need for cutting and threading. Unlike steel pipes, which require a joint anytime elevation or direction changes, CSST needs joints only at connection points.

"Whether you're above ground or below ground, you can go from your meter or manifold all the way to the appliance with no joints other than the fitting at the meter or manifold and the fitting at the appliance," said Bob Torbin, director of codes and standards, Omega Flex Inc. "CSST eliminates intermediate joints and makes it faster and less expensive to install.

"CSST also lends itself to underground installation," he continued. "It allows a lot of creativity in where you place your outdoor appliances because getting the gas piping to these locations will be just as easy as running an underground wire."

INCREASED SAFETY

CSST also offers increased safety and reduced maintenance for homeowners with less risk of leaks, fire, corrosion or breaks common in more traditional rigid steel pipe, Torbin said.

"If you can eliminate or minimize joints, you have fewer leak sites," he said. "CSST is made entirely of corrosion-resistant materials. It will reduce long-term maintenance and eliminate potential leaks through corrosion and aging."

Because CSST is flexible, it is also highly resilient and can reduce the risk of damage during earthquakes, hurricanes or other disasters that might cause buildings or the ground to shift.

"When the building moves, the CSST tends to stretch rather than break where steel pipe threaded joints can break," Torbin said. "In the long run, CSST is less prone to fail."

GREATER FLEXIBILITY

CSST is more cost-effective and allows homeowners to add gas piping with minimal damage to lawns or homes, he said. CSST is also compatible with various safety and convenience features, including automatic shut-offs, quick connect outlets and high efficiency and smart gas appliances.

"CSST allows you to create an infrastructure that is easy to install, is low maintenance and can give you flexibility," he said. "Depending on how big your outdoor use is going to be, you can set up as simple or as complex an arrangement as you need with relatively low cost and fast installation. I see CSST and outdoor lifestyles as a great partnership with consumer features, smart technologies and innovative, adaptable piping systems." ■



Corrugated Stainless Steel Tubing, or CSST, is an ideal match for outdoor rooms because its flexibility allows it to be installed in a variety of configurations to meet design needs.

PHOTO COURTESY OF OMEGA FLEX INC.





It's trending

Calm environments and expanding office space are top focus for 2021 home design.

By Tonya McMurray

Design trends for spring 2021 have been greatly influenced by nearly a year of a global pandemic that has kept people at home, according to design professionals.

The American Society of Interior Designers (ASID) reports that home design is increasingly focused on creating more defined office space, workstations and e-learning spaces. In addition, homeowners are focused on increasing technology within the home, enhancing outdoor living spaces and improving air quality.

New research from the National Kitchen & Bath Association (NKBA) indicates that design trends will also focus on simplicity and an increased need for human interaction, information access and a connection to nature.

HGTV Canada, a home design and DIY television producer, predicts a focus on multifunctional spaces and a desire for more "calming Zen room ideas."

"After a year that guided many of us to spend more time at home, the new year is an opportunity to bring comfort and creativity to our living spaces."

— HGTV Canada



PHOTO COURTESY OF LOVEYOURLANDSCAPE.ORG/LAMBERT LANDSCAPE CO. IN DALLAS, TEXAS



Outdoor living spaces and the use of natural gas design elements are two key trends for spring and summer 2021 .

“Home design is increasingly focused on creating more defined office space, workstations and e-learning spaces. In addition, homeowners are focused on increasing technology within the home, enhancing outdoor living spaces and improving air quality.”
— American Society of Interior Designers

“After a year that guided many of us to spend more time at home, the new year is an opportunity to bring comfort and creativity to our living spaces,” according to HGTV Canada.

ADDING FUNCTIONALITY AND SIMPLICITY

NBKA's Living Impacts Design research — a comprehensive study examining outside influences on kitchen and bath design for the next three years — indicated that 87% of homeowners are looking for multifunctional space within the kitchen that will allow for a variety of activities, including meal preparation, entertaining, working from home and distance learning.

NBKA reported that emerging design trends include open kitchen layouts, larger kitchen islands and upgraded appliances. Natural gas ranges, cooktops and ovens fit well into consumers' quest for more simplicity, offering professional-level controllable heat and a cost of about half as much as cooking with electricity.

The Living Impacts Design research also showed that homeowners are interested in creating living spaces that include open floor plans, larger windows to increase natural lighting and raw materials such as bamboo, stone and live plants.

A RELAXING SPACE

Creating a more simplified and calm living environment is an emerging trend, according to HGTV Canada. Homeowners are looking to enjoy more relaxed time at home, whether in front of a cozy natural gas fireplace or an outdoor room with natural gas grills, lights and fire pits. HGTV Canada reports that 2021 designs will focus more on neutral colors and open spaces that amplify natural light.

Trends in color choices also reflect the desire for calm as well as a sense of hope and optimism, according to the Pantone® Fashion Color Trend Report for spring and summer 2021. The Pantone Color Institute's color experts report that trending colors feature a blend of floral hues that combine comfort and relaxation with energy and determination. Pantone's trending colors include a warm marigold, optimistic yellow, a serene cerulean blue, a watery aqua and floral tones of pink, orange, red and green. ■





Keeping the lights on

Natural gas generators offer power when it is needed most.

By Monica Stavish Skaggs

There's nothing like peace of mind. As more of us work and study from home due to the COVID-19 pandemic, it's more important than ever to know that the power will stay on.

Equipping your home with the stability and security that come with a standby natural gas generator ensures that life will not be disrupted should an emergency occur.

"Our lives have become dependent on power. Nearly every aspect of our lives, particularly at home, is filled with things that require electricity. That's why the benefits of having a natural gas generator are numerous."

**— Nash Whitney, director of sales,
energy management and utility programs,
Generac Power Systems**

"Our lives have become dependent on power. Nearly every aspect of our lives, particularly at home, is filled with things that require electricity," said Nash Whitney, director of sales, energy management and utility programs, Generac Power Systems. "That's why the benefits of having a natural gas generator are numerous."

A generator will help keep the lights on and appliances working during a power outage. For millions of home-based businesses, maintaining power can be invaluable. In more extreme situations, a generator will maintain power during a hurricane or tornado and can even protect the lives of children, the elderly or someone with medical issues that require power.

Generators that use natural gas to create electricity have several benefits over those powered by diesel or gasoline. In the event of a hurricane or other natural disaster, natural gas can be easier to access because it is carried underground.

While gasoline generators are a good product to have on hand for providing power to hand-tools, lights and smaller appliances, they can pose some challenges during a large-scale outage. For example, if all the

lights go out in a storm, someone has to go to the garage and power up the gasoline generator and run extension cords to the appliances. Also, portable generators often sit unused for extended periods of time and may not work in an emergency.

POWER WHEN YOU NEED IT MOST

Besides their reliability, today's natural gas generator can sense the outage, then automatically start and transfer the home's electrical loads. These generators can be sized and equipped to handle specific loads such as refrigerators and heating, ventilation and air conditioning (HVAC) systems or even support an entire home.

"This is an important aspect to consider when deciding on what type and size of generator to install," Whitney said. "For instance, a generator that is sized to handle a home that has a five-ton HVAC system, water heater, two refrigerators and several kilowatts of lighting and plug load will be a different model than one sized for backing-up a refrigerator and lighting only."

Generac offers a range of natural gas generators. The Guardian 22kW air-cooled system and the new 24kW machine are considered whole-home generators, capable of backing up the average American home. The Generac PowerPact 75 kW system can handle essentials such as lights, furnaces and refrigerators.

When deciding which appliances to back up, homeowners should consider their budget, anticipated use and criticality of specific systems or appliances. Each situation is unique, Whitney said.

"Making these decisions in California, where frequent public safety power shut-off (PSPS) events occur that leave millions without power for days or weeks is much different from making these decisions in East Texas, where frequent nuisance outages can occur for only a couple of hours at a time," he said.

Prices for natural gas generators chiefly depend upon size and in-



Natural gas generators, like the above from Generac Power Systems, help keep the lights on and appliances working during a power outage.

PHOTO COURTESY OF GENERAC POWER SYSTEMS

stallation. Larger generators that can provide power to more loads are generally more expensive than smaller generators that can only back up smaller loads. Complicated installations that involve extended natural gas or propane lines or trenching electrical cables can be more costly than installing generators closer to main breaker panels. A certified installation dealer can provide more information.

Natural gas generators are permanently installed and operate off the home's natural gas service. They are hard-wired into the home's electrical system via an automatic transfer switch and become a permanent fixture that offers resale value to the home.

Homeowners are advised to do the research and decide what's best for their situation, Whitney said.

"It's better to have more power than you need and be able to use it when you need it than not have enough power when you need it most." ■

(continued from page 07)

Evolving technology adds another benefit to tankless water heaters. For example, many Navien models come with Wi-Fi connectivity called NaviLink™. This module makes it easy to communicate with the system anywhere internet service is accessible. Once installed, the owner down-

"Just six to eight years ago, gas tankless water heater sales accounted for 7% to 9% of gas residential tank sales. In 2021, the percentage is expected to rise to 23% to 25% of the market share. The benefits make it clear why tankless water heaters are high on consumers' lists."

— Fenske

loads a free app onto their smartphone or tablet. This allows them to turn the unit on or off, change the water temperature, monitor system status and perform other functions in the palm of their hand.

"These smart home options for tankless water heaters are growing in popularity, in terms of market share," Fenske said. "Just six to eight years ago, gas tankless water heater sales accounted for 7% to 9% of gas residential tank sales. In 2021, the percentage is expected to rise to 23% to 25% of the market share. The benefits make it clear why tankless water heaters are high on consumers' lists."

When considering a tankless water heater, homeowners should contact a reputable installer for more information about their unique needs. It's advisable to first consider what unit capacity will meet the hot water requirements of the home. Other important factors include location of the tankless appliance, size of unit and how it will be vented, which can all affect service and cost. A reliable installer can offer advice on how to reduce costs while gaining the best hot water delivery. ■



GRILLED SHRIMP WITH MANGO SALSA & SOAKED QUINOA

INGREDIENTS FOR QUINOA

1 cup quinoa
4 cups pure water
1½ cups chicken broth or water

INGREDIENTS FOR SHRIMP

1 pound wild-caught shrimp raw
¼ teaspoon salt
¼ teaspoon pepper
¼ cup extra virgin olive oil or avocado oil
2 teaspoons lime zest
1 teaspoon lime juice

INGREDIENTS FOR PINEAPPLE, MANAGO AND AVOCADO SALSA

¼ cup extra virgin olive oil or avocado oil
1 tablespoons lime juice
1 teaspoon raw honey
¼ teaspoon sea salt

1 avocado peeled and cubed into ½" pieces
1 mango peeled and cubed into ½" pieces
1 cup pineapple chopped into ½" pieces
1 tablespoon fresh cilantro finely chopped

INGREDIENTS FOR GARNISH

1 tablespoon green onion finely chopped (optional)

DIRECTIONS

- 1 The night before, combine quinoa and 4 cups water in a medium-sized pot. Let sit, covered overnight or for up to 24 hours.
- 2 The next day, combine all shrimp ingredients in a

container with a lid. Let sit for 15 minutes.

- 3 Drain and rinse quinoa well under running water. Add back to medium-sized pot with broth.
- 4 Bring quinoa to a boil, then reduce heat and simmer for 15 minutes with lid on, until all liquid is absorbed. Let sit for 5 minutes.
- 5 In a medium-sized bowl, combine these salsa ingredients: olive oil, lime juice, salt and honey. Whisk vigorously.
- 6 Remove ¾ of this marinade, and reserve. Leave the rest in the bowl. Add cubed avocado, mango, pineapple and cilantro. Mix well and set aside.



- 7 Heat grill pan or grill. Cook shrimp for 2 to 3 minutes per side, or until pink.
- 8 Fluff quinoa with fork. Add reserved marinade, and combine.
- 9 To assemble, layer quinoa on plate. Add salsa. Top with shrimp. Garnish with additional cilantro and green onion.

SOURCE: TRADITIONALCOOKING SCHOOL.COM

PHOTO COURTESY OF TRADITIONALCOOKINGSCHOOL.COM

GRILLED SKIRT STEAK AND VEGGIES WITH GUACAMOLE

INGREDIENTS FOR GUACAMOLE

3 avocados peeled and diced
Juice of half a lime
½ cup traditional Pico de Gallo
1½ teaspoons chopped garlic
1 teaspoon olive oil
½ teaspoon Serrano chili minced (optional)
Sea salt to taste

- 1 Prepare guacamole ahead; squeeze lime juice over diced avocados. Add traditional Pico de Gallo, garlic, oil, sea salt and gently toss.

INGREDIENTS FOR STEAK

1 lb skirt steak
½ cup extra virgin olive oil
3 tablespoons freshly squeezed lime juice
3 tablespoons red wine vinegar
2 cloves garlic minced
1 teaspoon chili powder
2 teaspoons onion powder

⅓-¼ teaspoon cayenne pepper (depending on how much kick you want!)
1 teaspoon sea salt
½ teaspoon pepper

INGREDIENTS FOR VEGGIES

Olive oil
6 green onions, greens trimmed (leave three inches of greens above white onion)
1 small zucchini, diced
1 small bunch asparagus spears, trimmed and cut into 1-inch pieces
1 cob off corn removed (use sharp knife to 'shave' kernels off cob, omit corn if living grain free)
½ cup cherry tomatoes cut in half

DIRECTIONS FOR STEAK

- 1 Combine lime juice, olive oil, garlic and dried spices in a

glass baking dish. Whisk.

- 2 Place skirt steak in a dish, pour marinade over steak, turning to coat both sides. Place covered, in fridge for at least three hours or as long as overnight. The longer, the better!
- 3 When you are ready to cook steak, preheat grill to 400 degrees and prepare vegetables. Discard marinade and sprinkle steaks with sea salt and pepper to taste. Set aside while you start searing veggies.
- 4 Grill steaks at 400 degrees, 3 minutes per side.

DIRECTIONS FOR VEGGIES

- 1 Heat a cast iron pan on high heat. When pan is hot, add olive oil, coating the bottom of pan. When pan and oil are hot, add onions and



- sear for 3 minutes, stirring occasionally.
- 2 Add diced zucchini, cut asparagus and corn to pan. (This is when you want to add steaks to grill since they only take 4-6 minutes) Stir and continue cooking till edges of vegetables turn brown, lightly salt and pepper. Turn off heat. Add cherry tomatoes and stir.

SOURCE: THEORGANICKITCHEN.ORG

PHOTO COURTESY OF THEORGANICKITCHEN.ORG