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WHEN IT MATTERS®



This is not a drill

Company owners need to pay close attention to their wellness

by Ambika Puniani Reid



We talk a lot about making sure employees' mental health and physical well-being are top of mind for every roofing company owner. But owners are people, too, and can suffer in ways that can drastically affect their health.

The Wall Street Journal recently published the article "How to survive being a 24/7 Boss," and the author, Callum Borchers, notes CEOs and company owners "will be paid handsomely but may have fewer years to enjoy earnings because the stress of the role can reduce life expectancy."

Common ailments among company leaders include stress-related heart attacks, stomach ulcers, lack of sleep and poor diets, all of which could lead to fatalities.

Borchers interviewed a handful of CEOs who seem to have unlocked the code to a less stressful life and asked them for some tips; consider the following:

- Diet and exercise are important, of course, but commit to taking regular time off to recharge. Maybe this means declining more events or meetings where your presence is not crucial.
- When a meeting gets cancelled, seize that time to do something you truly enjoy like listening to your favorite music, going to a local coffee shop or getting some fresh air.
- Prioritize sleep. There are many tech gadgets available that can help you measure how well or poorly you are sleeping so you can make adjustments as needed.
- Scale back when possible. Running a company is a marathon not a sprint. Reserve your time and energy for the issues that matter most and delegate the rest to trusted team members.

Remember that as much as you need and want your employees to be healthy physically and mentally, they need and want you to do the same.

Ambika

AMBIKA PUNIANI REID is editor of *Professional Roofing* and NRCA's vice president of communications.

CLOSE-UP



During SPRI's 42nd Annual Conference & Business Meeting Jan. 12-14 in Clearwater, Fla., members took time to give back to the community by assembling and donating 25 bicycles to local second-grade students.

Organized through Wish for Wheels,[®] an organization with a mission to give every child in need a bicycle and helmet, and sponsored by Johns Manville Roofing Systems, Denver, the bike-building activities included two competitions: one for speed and another for teams where the bike builders were blindfolded and had to follow directions from non-blindfolded team members.

After the bikes passed safety inspections, they were donated to students at a local Boys & Girls Club of America.

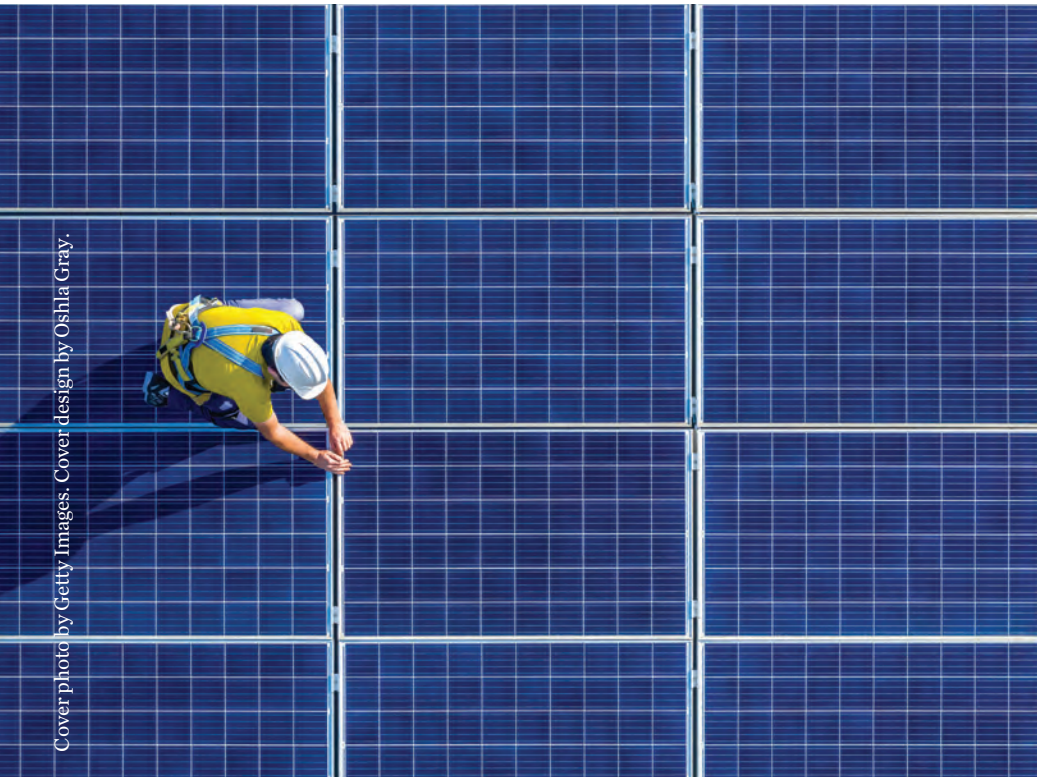
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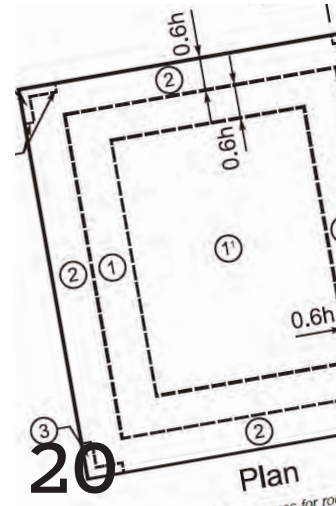
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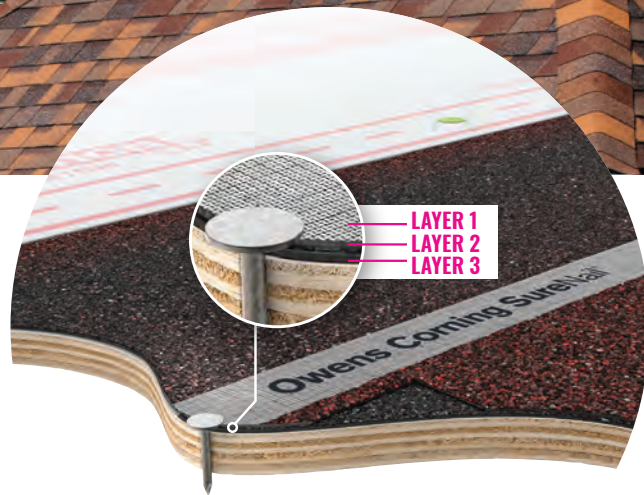
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ProfessionalRoofing (ISSN 0896-5552) is published 10 times per year by the National Roofing Contractors Association, 10255 W. Higgins Road, Suite 600, Rosemont, IL 60018. Periodicals postage paid at Des Plaines, Ill., and additional mailing offices. Postmaster: Send address changes to *Professional Roofing*, 10255 W. Higgins Road, Suite 600, Rosemont, IL 60018. Statements of fact and opinion are made on the responsibility of author alone and do not imply an opinion on the part of the officers or the membership of NRCA. No part of this publication may be reproduced or transmitted in any form or by any means, electronic or mechanical, including photocopy, recording, or any information storage and retrieval system, without permission in writing from the publisher.



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#TEAM

Whether it is a crew on a job site, administrative employees in the office, or supervisors and owners, it takes many people to run great roofing companies. Teams of roofing professionals come together to give back to their communities, share a meal, celebrate work anniversaries, train and more! Check out how a #team is highlighted across the roofing industry on social media!



westwoodliquid · Follow

westwoodliquid Some in-house training for one of our newest recruits!

Ken Russell imparted his WestWood knowledge and wisdom to Sophie White who certainly came up trumps, completing her own resin rig.....fantastic work! 🍀

Well done Sophie 🍀🍀🍀

#resin #rigs #training #team
#WestWood #WWUK



davcroofing · Follow

davcroofing Happy Work Anniversary to Dennis Merida as he celebrates 5 years with Davco Roofing & Sheet Metal! As a Field Operations Manager, Dennis has consistently ensured the efficient completion of all projects under his supervision. His daily contributions to the team are marked by an enthusiastic mindset and a positive approach. Thank you for your dedication and talent!

#EmployeeSpotlight
#workanniversary #fieldoperations
#manager #davcocareers #RCA
#jointheam
#employeeappreciation



D. C. Taylor Co.
@DCTaylorCo

What a great group! Day 4 of #wintertraining is complete, one more to go. #weappreciateyou #fun #iowa #roofing #safety #teamwork



S-5!
@S5_Attachments

The S-5! #team is at #REPlusNE #Boston showcasing our innovative #mounting #solutions for #standingseam and #exposedfastened #metal #roofs 🤖🔥🏆👍👏 @replusevents



Shingle Hut Roofing
@ShingleHut

LOVE REIGNS: Proud of our HUT #team effort to donate day-to-day supplies for Love Reign's front-line outreach efforts for individuals being sold into sex trafficking.

Join the fight! Follow Love Reigns on Facebook or visit lovereignstx.org for more information.



#HASHTAG



Guardian Roofing, Gutters & Insulation
February 14 at 11:45 AM · 🌐

It is time to spread a little Valentine's love ❤️ at Guardian Roofing! Breakfast was served today to show appreciation and love to our team. #ValentinesDay #TeamGuardian #GuardianRoofingGuttersandInsulation

Elite Roofing Supply
February 12 at 3:50 PM · 🌐

Elite Roofing Supply has come a long way since we opened our first location in 2013, and our success is directly linked to our strong relationship with our amazing vendors!

This is just a snapshot of our vendor roundtables at the 2024 National Sales Meeting, where our teams discussed products, new technologies, and the future of roofing with some of the best vendor reps in the country.

Thank you to all of you who've supported us along the way and continue to be partners today!

#TeamElite #VendorAppreciation #Roofingdistribution #Roofingdistribution

RoofConnect
February 14 at 10:32 AM · 🌐

Happy work anniversary, Jacob Lankford!
#RoofConnect #Teamwork #Workiversary

Happy Work Anniversary

Jacob Lankford

2 YEARS
THANK YOU
FOR YOUR
HARD WORK
AND
DEDICATION!

RoofConnect
NATIONAL ROOFING SERVICES

Korellis
February 14 at 12:05 PM · 🌐

Korellis' ESOP Communications Committee is on a mission to find different ways to impact the community through volunteering, supply drives, donations, and more. The committee, currently comprised of Office Administrator Debbie Wargo, Quality & Safety Manager John Zamojski, AR Accountant Myra Serrano, Controller Haley Sparling, Assistant Service Manager Meredith-Moran-Pruim, and Lead Mechanic Mike Wasserman (not pictured) proudly lead us through our charitable efforts ❤️

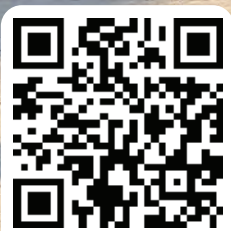
Most recently, #TeamKorellis made a dozen blankets for Phil's Friends, a local nonprofit dedicated to individuals and families impacted by cancer through care packages, cards, and support. At the end of 2023, they surpassed over 50,000 care packages! If you're interested in learning more, visit their page or website at <https://philsfriends.org/>.



Let's

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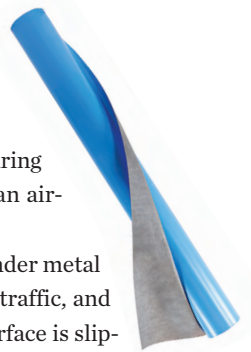
Membrane is self-adhering

Benjamin Obdyke has introduced VaporDry SA, a self-adhering, vapor-permeable roof membrane.

The membrane features a continuous acrylic adhesive able to be repositioned during installation and self-seal around fasteners, allowing the membrane to serve as an air-control layer in addition to a moisture-control layer.

Said to withstand temperatures up to 250 F, the acrylic adhesive can be used under metal roof systems. The membrane's tri-laminate structure also is durable under foot traffic, and a reinforcement scrim in the adhesive provides for more tensile strength. The surface is slip-resistant and features printed overlay guides for easier installation.

benjaminobdyke.com



Flashing is flexible

Johns Manville Roofing Systems has launched the White EPDM Peel & Stick Flashing, an uncured flashing material said to eliminate the need for welding.

Compatible with TPO membrane roof systems, the White EPDM Peel & Stick Flashing features a release liner and factory laminated, self-adhering white EPDM tape. With the flexibility to work in traditionally difficult-to-flash areas, it allows for forming flashings around corners, pipe wraps and scuppers.

The flashing is available in a 60-mil thickness and in roll sizes of 6 inches by 100 feet, 9 inches by 50 feet and 12 inches by 50 feet. Inside and outside corners are available in 7 inches by 9 inches.

jm.com



Shingles are durable

IKO has made available the Armourshake Designer roof shingles. With a Class 3 Impact Resistance rating, the shingles are made with two laminated fiberglass mats for durability and dimensional thickness and feature algae resistance, ultraviolet-protective granules and a bonding sealant.

Armourshake Designer shingles are available in four colors: Chalet Wood, Grey Stone, Shadow Black (also available in Class 4 Impact Resistance rating) and Weathered Stone.

iko.com



Spray foam roof system is protective

Huntsman Building Solutions has introduced Ultralok,™ a spray polyurethane foam roof system designed to deliver a fully adhered system that insulates, protects and waterproofs a variety of roof deck substrates.

Ultralok creates a monolithic membrane, eliminating the need for mechanical fasteners, and is said to be ideal for low-slope roofing applications in new and retrofit construction. The system reportedly conforms to any roof architecture and provides wind resistance.

huntsmanbuildingsolutions.com

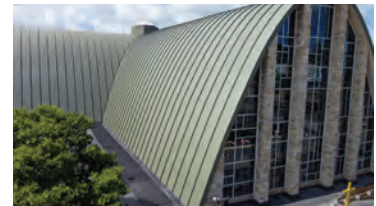
Metal panels are versatile

Innovative Metals Co. Inc. has launched Batten-Tite™ architectural metal roof panels.

Designed for slopes of 3 inches or more and vertical wall applications, the system's batten-style ribs are 1 7/8 inches high and are available in custom widths up to 44 1/2 inches.

Batten-Tite panels are available in smooth or embossed surfaces and in a range of metals, including aluminum, copper, galvanized, stainless steel and zinc. Meeting ASTM E330 and ASTM E331 requirements, the panels can be applied over plywood or gypsum board with rigid insulation over decking.

imetco.com





The subcontractor situation

The roofing industry finds itself stuck between training a workforce and following the law

by McKay Daniels

Earlier this year, an article in *The New York Times* highlighted several challenges NRCA has been working to address with Congress, regulators and the roofing industry. The article chronicled migrant children illegally working on roofs and documented the potential and realized harm many of them encountered.

The piece, one of a series about the migrant crisis, was heartbreaking and infuriating to read. The youths confronted terrible risk, but broken policies, systems and dynamics led to the dire situations.

The subcontracted crews documented in the article and the behavior by their supervisors and managers don't represent the values, morals and practices of NRCA-member roofing contractors, who are focused incessantly on safety and consider returning every person home each night paramount. The roofing industry has made incredible strides in reducing the harm and loss of life in the field, but there is still more to be done. We could all do a better job reaching, teaching and training.

What does the increased use of subcontracted labor mean for workers' overall preparedness, especially training and safety? This question requires our collective attention.

In the recent past, companies would spend rainy days or downtime



on installation training, safety education and toolbox talks to make installers safer, better skilled and more professional.

But what happens when full-time employees have been replaced by subcontracting crews? Contractors may not be able to legally train, educate or manage these workers because they are classified as independent contractors. What do subcontracted workers know or not know? What experience and training do they have? What safety measures are being taken if any?

The problem is: Contractors increasingly don't know. The people installing a roof system could be

several steps removed from the building owner or roofing contractor. Neither party may even be aware of who, precisely, is doing the work. Contractors, formerly critical to providing properly trained crews, have increasingly been cut out by market forces, legal requirements and broken government systems. As a result, subcontracted laborers are in many ways fending for themselves because of a legal barrier put in place because of their tax classification and, possibly, immigration status.

A key reason for this troubling dynamic is a failed immigration system that creates, fosters and expands the shadow economy of undocumented immigrants (of any age). Failure by policymakers of both parties to address the immigration crisis makes this problem worse

each day and puts migrant children and adults in physical jeopardy and our industry's professional image at greater risk.

NRCA has been urging and pushing the federal government for more than 20 years to fix the broken immigration system. NRCA members have testified before Congress multiple times about the needs of our industry and what is required to stabilize the immigration system. But politicians continue to fail to act, putting lives at risk, hamstringing our economy, and creating the seemingly impossible workforce dynamics and market contortions. But given how far apart the two political parties are, a solution is unlikely in the short term.

And as long as there is record low unemployment, the subcontracting arrangements will continue to grow.

So how do we ensure subcontracted workers have the training, skills and minimum age needed to perform jobs well and safely when the current system prohibits existing contractor-centric systems from filling that role?

Some contractors say they guide and assist subcontracted laborers and work with them on safety and installation training because it's the right thing to do—even if it may be illegal. But is that a long-term dynamic that's workable?

If a contractor gets hit with a few government misclassification audits resulting in large fines or is involved in high-profile cases of liability and loss because he or she was "trying to do the right thing," this practice will end in an instant. Then what?

Recently, the Department of Labor enacted new rules for defining who is a subcontractor versus an employee. The standards became more stringent, and contractors need to be prepared for possibly even more legal barriers between them and subcontracted roofing crews. Navigating those requirements to protect contractors and workers and provide the roofing industry with a viable operating structure will be increasingly important.

Other contractors say they encourage subcontracted labor to do the right thing but can't enforce anything.

NRCA RESOURCES

TRAC, NRCA's digital training platform for new workers, is available in English and Spanish and affordable enough for the smallest of installation crews. Learn more at nrca.net/education/trac.

NRCA also has made NRCA PROCertification® easier to obtain as an individual rather than through a company.

NRCA PROCertification independently verifies whether installers have the skills and expertise to call themselves roofing professionals. Contractors could require subcontracted labor to be NRCA PROCertified,® ensuring a base-level proficiency on job sites while still being mindful of contractor-subcontractor legal constraints. Find out more at nrca.net/procertification.

This seems legally sound, but at a macro-level it still leaves a large, growing swath of the roofing workforce in a dangerous situation that could ultimately make our industry worse off. Setting aside the human element, if injuries and fatalities continue to rise, jury verdicts will grow (as they have in the automobile liability space); contractors' insurance premiums will continue to escalate; and additional government interventions are likely. All this, in one form or another, will affect contractors.

NRCA is working to get training, education and certifications to roof system installers. In 2023, the association formed a task force that is developing Spanish-language resources and working on new, unique delivery mechanisms to get important information to end users.

Whether live classes, digital materials, short videos or one-on-one assistance, NRCA wants to have resources available for the industry. Contractors, regardless of the employment status of their workforces, have a vested interest in properly installed roof systems and keeping job sites safe.

If you use subcontracted labor, you should have some form of prequalification process in place to ensure subcontracted workers have the following:

- Valid, applicable insurance. Far too often, bogus certificates or ridiculous

policy exclusions on the part of subcontracted crews put contractors at risk.

- Valid, applicable training and education. Safety training, installation and technical training and anything else that could affect a job should be top of mind for contractors and building owners.
- Proof workers meet the minimum age for roofing work. State laws vary regarding minimum age for construction work and amount of hours a minor can work during weekdays.

I'm not a lawyer, but prequalification requirements seem well within the legal structures of the contractor-subcontractor relationship. Contractors have the ability (and some would argue the responsibility) to

vet or validate subcontractors' capabilities or skills before giving them work. Roofing contractors undergo vetting or meet criteria in place by general contractors to bid work; roofing contractors also should vet or impose criteria on their subcontractors.

For a decade or so, Capital One has asked consumers: "What's in your wallet?"

It's time the roofing industry asks: "Who's on your roof?"

Do they have the skills, training and knowledge to be there? 🌀🌧️⚡

MCKAY DANIELS is NRCA's CEO.

✉️ MDANIELS@NRCA.NET

What are the construction industry's top staffing challenges?

The construction industry continues to struggle with a labor shortage, and there are numerous factors contributing to the issue. Construction Dive shares the following top staffing challenges for construction in 2024.

- *Lack of experience.* A 2023 survey from Associated General Contractors of America shows many candidates do not have the right skills or experience to work in the construction industry. Additionally, many seasoned workers will soon age out; the Bureau of Labor Statistics reports nearly half of construction workers are older than 45. As a result, many in the industry are promoting construction as a career alternative to college for young students. Some experts say shortened training windows and a focus on technology also could help combat the worker shortage.
- *Transportation challenges.* More than one-quarter of respondents to the AGC survey said potential employees reported difficulty acquiring transportation to and from work. Some employers are incentivizing carpooling, providing shuttles and offering more flexible schedules, but a long commute still can make it difficult to retain workers.
- *Childcare troubles.* Many construction workers need flexible, quality childcare, but because they may need to arrive early or stay late, available childcare services do not always meet their needs. One in four respondents to the AGC survey reported workers needed flexible work schedules to help them with childcare or care of another family member.
- *Drug use.* One-third of survey respondents said their potential workers often cannot pass drug tests. The construction industry faces an opioid epidemic and a mental health crisis where workers often turn to legal and illegal substances. Drug testing is about maintaining workplace safety, and regulations legalizing or decriminalizing marijuana have made things tricky for employers when it comes to testing.

Experts say higher pay and an attractive culture—including advancement opportunities and better benefits—currently are some of the best ways to recruit and retain employees.



Holcim acquires ZinCo

Holcim has acquired ZinCo, a manufacturer of advanced green roof systems based in Germany with global operations across the Americas, Asia and Europe. With its integrated green and solar roof systems, ZinCo will expand Holcim's specification selling approach with tailored solutions to bring more nature into cities and improve urban well-being, from reducing heat island effects to improving air quality.

"ZinCo is recognized as a leader in advanced green roofing systems with a well-established network across the value chain, from architects and developers to distributors and contractors," says Jamie Gentoso, Holcim's global head of solutions and products. "This acquisition extends our leadership in advanced roofing systems and broadens the innovative and sustainable building envelope solutions available to our customers."

With this acquisition, Holcim is advancing its goal of expanding solutions and products business to 30% of Holcim Group net sales by 2025.



How to choose a helmet vs. a hard hat

Traditional hard hats have been a long-standing staple in the roofing industry, serving as the standard for head protection. Although hard hats offer practical utility, the advantages of modern safety helmets present an alternative to elevate worker safety.

The Occupational Safety and Health Administration recently moved away from traditional hard hats for its field staff and adopted the use of safety helmets. Despite there being no formal regulatory requirement changes, some industry employers also are beginning to transition away from conventional hard hats.

According to CPWR—The Center for Construction Research and Training, almost 8,000 construction workers suffered head injuries in 2018 and 230 construction workers died from those injuries. These types of injuries can be reduced by using appropriate head protection, but not all protective headwear is the same.

The American National Standard for Industrial Head Protection, ANSI Z89.1-201, created standards for protective headwear that assess the impact properties of a helmet. ANSI-rated Type 1 hard hats meet standards for impacts to the top of the head, but Type 2 helmets must meet standards for impacts to the top, front, back and sides of the head.

Most traditional hard hats only have a Type 1 rating, and though roofing contractors face overhead exposures, they also face potential for impacts to the side of the head. In addition to ANSI ratings, there are other key differences between hard hats and safety helmets employers should consider.

- **Materials and construction.** Traditional hard hats are typically made from high-density polyethylene or fiberglass. These materials offer durability and impact resistance and have made hard hats a reliable option for decades. Modern safety helmets often use advanced materials that contribute to lighter weight, improved strength and enhanced protection against impact.
- **Comfort and fit.** Traditional hard hats commonly feature an adjustable suspension system to ensure a secure fit. However, some workers tend to find them less comfortable during extended use. Modern safety helmets often incorporate adjustable straps and padding for a more customized, comfortable fit. Ventilation systems also are common, promoting airflow and reducing heat buildup, which can be especially beneficial on hot rooftops.
- **Additional features.** Unlike hard hats, most modern safety helmets feature an adjustable chin strap that keeps the helmet in place, reducing the potential for traumatic brain injuries often tied to incidents involving slips, trips and falls.

Additionally, many modern helmet manufacturers offer optional features such as integrated communication systems and eye, face and hearing protection.

- **Cost differences and life spans.** A drawback of modern safety helmets is cost. Although costs vary among manufacturers, safety helmets often cost more than traditional hard hats. Fortunately, the life span of modern safety helmets may help justify the cost as most helmets have a life span of two to three times longer than traditional hard hats when cared for appropriately.

For questions regarding hard hats, safety helmets and other safety topics, contact Rich Trewyn, NRCA's director of risk education and training, at rtrewyn@nrca.net.



New York tops USGBC ranking for LEED green building in 2023

New York topped the U.S. Green Building Council's annual ranking of states for LEED green building in 2023 after ranking third on the list in 2022, according to USGBC.

States were ranked based on the number of LEED-certified square feet per capita in the state. In 2023, New York certified 201 LEED projects for a total of more

than 93 million square feet, equating to nearly 4.6 LEED-certified square feet per person. The top 10 states certified 1,221 projects and more than 338 million gross square feet under LEED.

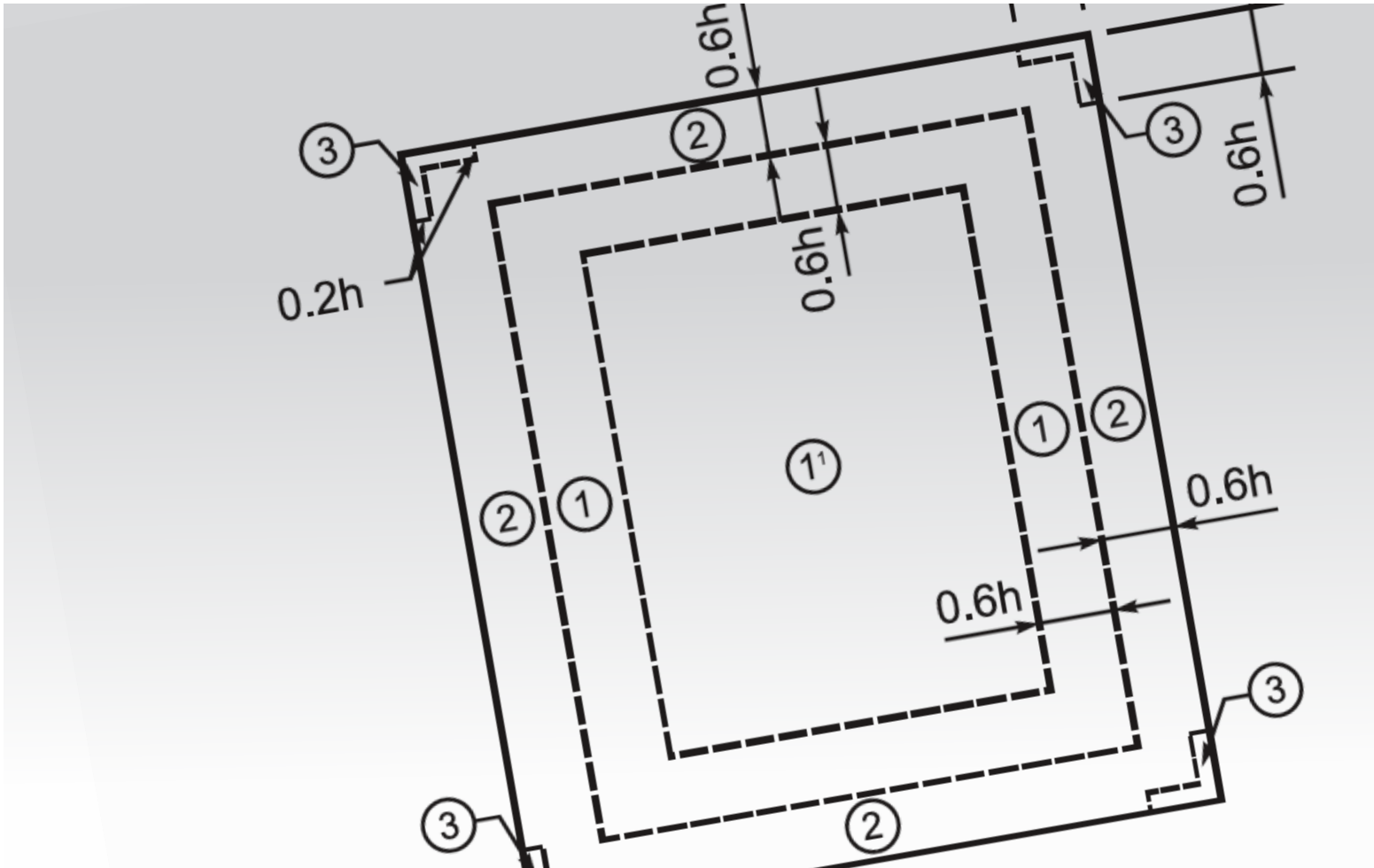
The states following New York in the Top 10 included Illinois, Massachusetts, Washington, Georgia, Virginia, California, Colorado, Hawaii and Maryland. USGBC notes Washington, D.C., would have had the highest ranking with 43.04 green square feet per capita and 126 green building projects, but it is not included because it is not a state.



To view information about the LEED rating system, go to professionalroofing.net.



To view the OSHA standards for head protection, go to professionalroofing.net.



FM Global makes changes

FM Global Loss Prevention Data Sheets have updates that affect the roofing industry

by Mark S. Graham

In January, Factory Mutual Insurance Co., commonly referred to as FM Global, updated several of its Property Loss Prevention Data Sheets. These data sheets provide designers with property loss prevention guidance for specific building attributes, including roof assemblies. An overview of the roofing-related changes follows.

FM 1-15

FM Global Property Loss Prevention Data Sheet 1-15, “Roof-mounted Solar Photovoltaic Panels,” provides guidance related to the fire and natural hazards for the design, installation and maintenance of roof-mounted solar PV panels used to generate electrical power.

The January revision includes minor editorial changes from the previous July 2023 interim revision and January 2023 revision. Most notably, the latest revision clarifies all roof-mounted PV equipment should be checked at six-month intervals for any damage and required maintenance. This is in addition to previously called for checks after seismic or severe weather events, including windstorms, lightning, hail and snowstorms.

FM 1-28

FM Global Property Loss Prevention Data Sheet 1-28, “Wind Design,” provides general guidance to building designers regarding wind considerations for property protection at highly protected buildings, including recommended design wind pressures for building components and cladding, protected openings and anchorage of roof-mounted solar PV panels. For main wind force-resisting systems and other structures, designers are referred to the specific edition of ASCE 7, “Minimum Design Loads and Associated Criteria for Buildings and Other Structures,” required by the applicable building code.

The January revision, referred to as an interim revision, contains several changes from the previous July 2022 revision. Most notable: Tornado guidance has been moved from the document’s appendix to Sections 2.11-Tornados, 3.12-Tornados and 4.0-References. With this change, tornado-resistant building envelopes, including roof assemblies, and roof-mounted equipment designs are recommended where design tornado wind speed is 140 mph or greater. A map is provided showing Arkansas and Missouri and portions of Alabama, Colorado, Georgia, Illinois, Indiana, Iowa, Kansas, Kentucky, Louisiana, Minnesota, Mississippi, Nebraska, Oklahoma, South Dakota, Tennessee and Texas are in

a tornado region where the design tornado wind speed is 140 mph or greater. ASCE 7-22’s 10,000-year mean recurrence interval map is conservatively used.

FM 1-28 provides a calculation method for determining ultimate tornado velocity pressure. FM Global recommends considering a building to be “partially enclosed” and assume a Surface Roughness Exposure C and Importance Factor of 1.15 for calculation purposes. Because this pressure calculation is by the ultimate design method, converting to the allowable stress design method by multiplying by 0.6 and adding a safety factor of 2.0 for new construction is recommended.

FM 1-28 further recommends not using roof aggregate of any type or size in a tornado region other than mineral surfacing for cap sheets and avoiding use of windows in exterior walls. Where windows are necessary and for large exterior doors, impact-resistant windows and doors tested according to FM 4350, “Approval Standard for Windstorm Resistant Fenestrations,” or similar standards are recommended. Full-time inspection during the installation of exterior wall and roof components also is suggested.

FM 1-28 also revises the calculation procedure for vertical forces on roof-mounted equipment to prevent overturning in high winds. Use of FM-approved roof anchors tested according to FM 4481, “Anchors for Roof Mounted Equipment,” are recommended to resist the horizontal and vertical forces calculated.

Finally, a new basic wind speed map, FM 1-28’s Figure 11b, is added and provides basic wind speeds in the Canadian maritime areas of eastern Quebec and New Brunswick, Newfoundland and Labrador, Nova Scotia and Prince Edward Island.

FM 1-54

FM Global Property Loss Prevention Data Sheet 1-54, “Roof Loads and Drainage,” provides recommendations for snow loads, roof live loads, rain loads and roof drainage for the design of new roofs on buildings and other

structures. It also provides recommendations for snow monitoring and removal.




The January revision includes minor editorial changes from the previous July 2023, October 2021 and July 2021 revisions. Significant changes were made in the April 2021 revision.

Final thoughts

Designers and roofing contractors working on FM Global-insured buildings should be aware of FM Global Property Loss Prevention Data Sheets and the latest revisions. FM 1-28’s addition of tornado-resistant building envelope construction criteria for FM Global-insured buildings in the tornado region in the central U.S. has a significant effect on building designs.

FM Global’s wind loss experience has been more favorable with structural concrete roof decks than steel roof decks. The use of steel roof decks is still possible; however, steel roof decks will need to be designed for higher tornado-resistant loads. Such designs may include narrower joist spacing resulting in shorter steel roof deck spans, use of thicker or deeper steel roof deck, and increased steel roof deck securement to joists or purlins.

In the central U.S., most conventional wind designs are based on relatively low wind speeds (for example, V_{ASD} equals 90 mph). FM Global indicates cost increases to change from 90-mph wind design construction to FM 1-28’s higher tornado-resistant construction will vary based on specific project conditions but could be as high as 50%.

FM Global Property Loss Prevention Data Sheets can be found at fmglobaldatasheets.com.   

MARK S. GRAHAM is NRCA’s vice president of technical services.

Artificial intelligence can help predict company's futures

With the topic of artificial intelligence on the rise, a recent *Forbes* article reported AI shows promise regarding analyzing data and predicting future outcomes.

Forbes shares the following three ways AI can help predict your company's future.

- **Financial forecasting.** Strategic planning for a business involves using historical data to forecast revenue and other financial data. The Association for Financial Professionals says AI forecasting can identify patterns from large datasets and offer fast, accurate predictions of financial performance and market trends. German technology conglomerate Siemens reported a 10% improvement in financial forecasting when using AI.
- **Predicting customer preferences.** It is important for businesses to gather data

regarding customer behavior, and being able to predict what customers may want in the future can be significant. AI-powered customer relationship management systems identify patterns from demographic data and purchase histories to group similar customers together, a process that reportedly can be used to predict customer desires and market trends.

- **Anticipating inventory.** Maintaining a certain amount of inventory can be a delicate balance, and AI can use historical data and ongoing trends to predict what products or services may soon be in demand. AI also can factor in the production time of items to alert business owners when they may need to boost their inventory.



To view the *Forbes* article highlighting AI trends and statistics in technology and business, go to professionalroofing.net.

SPRI posts white paper on IBC change

SPRI has posted a new white paper detailing the process of building consensus among multiple diverse stakeholders to change the International Building Code.® The company, along with representatives from the Asphalt Roofing Manufacturers Association, Lightning Protection Institute, National Electrical Manufacturers Association, NRCA, Roof Coating Manufacturers Association, UL Solutions and United Lightning Protection Association, worked to build consensus to have new language written, approved and adopted into the IBC.

The 2024 IBC includes language clarifying how lightning-protection systems, when used on commercial structures, should be attached to gutters, metal edge systems, roof covers and roof assemblies. The new language has been added as subsections in Section 1511-Rooftop Structures and stipulates the work must be completed in accordance with the instruction of the manufacturer or a design professional. The language also notes lightning-protection system components must be properly flashed where they are secured to or penetrate a roof.

The white paper, titled "Lightning Protection Code Change Updates," was co-written by SPRI and the Lightning Protection Institute and is available at spri.org.

ABC releases artificial intelligence resource guide for contractors

Associated Builders and Contractors has released an AI technology guide for the construction industry, including definitions, construction use cases and considerations. The purpose of the guide is to provide a level of knowledge to ensure contractors can be active participants in the construction AI conversation.

"The possibilities of AI technology may sound endless, but we must first educate ourselves on the basics. This resource is a starting point to understanding AI and its potential impact on the construction industry," says Patrick Scarpati, ABC's director of construction technology and innovation and the guide's author. "The industry has opportunities to evaluate how we can better deliver projects. We can lean on AI in achieving essential goals like enhanced safety design, knowledge transfer, planning, supply chain optimization, upskilling and workforce development."

The guide describes uses of AI during the construction project life cycle, including preconstruction, construction and building maintenance. It also provides definitions of terms, such as deep learning and predictive AI, as well as best practices in drafting office AI policies.

More information is available at abc.org/ai.



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Advocating for the workforce

NRCA supports legislation to improve workforce development

by Duane L. Musser

As the roofing industry continues to face workforce challenges, the need for effective strategies to address the concerns is vital. NRCA remains focused on advocating for innovative workforce development policies and continues working with lawmakers in Congress to develop new and improved solutions.

WIOA

In 2024, one priority strategy for improving workforce development is expanding opportunities through reform of the Workforce Innovation and Opportunity Act. The federal WIOA law provides funding for state and local workforce training programs open to citizens interested in skills training and career services and is targeted toward low-income individuals and veterans. WIOA made significant improvements to the public workforce system when it was approved on a bipartisan basis by Congress in 2014, but nearly a decade later, significant challenges hamper the system's ability to provide high-quality services to workers and employers.

Some NRCA members have had success in recent years using WIOA programs to help address workforce development needs. However,



many of the programs, which vary in operation and structure by state, often contain paperwork requirements and other obstacles that hinder their effectiveness. But some of the programs are not targeted at sectors of the economy most in need of workforce services.

NRCA believes WIOA programs should be more responsive to the needs of roofing industry employers. Given this issue's importance, NRCA made WIOA reform a priority issue during Roofing Day in D.C., the roofing industry's annual advocacy event.

NRCA supports WIOA reforms that

will streamline the bureaucracy and provide flexibility within the workforce training system to improve accessibility for employers, especially small businesses. Reforms should provide autonomy and transparency at state and local levels to spur innovation and enable the system to respond more effectively to workforce shortages to help close the skills gap.

NRCA also supports allowing more entities to participate as eligible training providers to expand opportunities within the roofing industry. Additionally, provisions to expand industry and sector partnerships and allocate

“NRCA’s advocacy efforts during the past few years are paying off”

more funding for incumbent worker education have significant potential to help members address workforce needs.

H.R. 6655

NRCA’s advocacy efforts during the past few years are paying off. In December 2023, after months of negotiations among key lawmakers in Congress, bipartisan legislation was released to reauthorize and reform WIOA. This bill, H.R. 6655, A Stronger Workforce for America Act, was introduced by Reps. Virginia Foxx (R-N.C.), chairwoman of the House Committee on Education and the Workforce, and Bobby Scott (D-Va.), ranking member of the committee.

NRCA strongly supports H.R. 6655 because it will increase access to WIOA programs for roofing industry employers. It provides for better functioning state and local workforce boards to enable employer input that will lead to more effectively addressing regional workforce shortages. The bill also will allow for greater recognition of competency-based training and certification programs and provides more funding dedicated to incumbent worker training. These and other reforms and improvements have great potential to help more roofing contractors use state-based WIOA programs to address their future workforce needs.

To contact a member of Congress to urge support for H.R. 6655, A Stronger Workforce for America Act, visit roofingadvocacy.nrca.net/takeaction.

NRCA is pleased H.R. 6655 was approved by the Committee on Education and the Workforce with an overwhelming bipartisan vote of 44-1. The bill now moves to the floor of the House of Representatives for a vote expected soon. Given the strong bipartisan support for the bill, it has a chance to be enacted into law this year even in a difficult political environment. NRCA commends Foxx, Scott and other committee members for working to develop effective workforce solutions that will expand access to well-paying, rewarding careers for employees in roofing and similar industries.

NRCA will continue working to advance this legislation that will benefit employers and employees, as well as other initiatives designed to provide new and/or improved workforce development strategies for members. 🇺🇸🌟

DUANE L. MUSSER is NRCA’s vice president of government relations in Washington, D.C.

DOL announces adjustments to civil penalties

The Occupational Safety and Health Administration’s civil penalty amounts for violations of workplace safety and health standards increased in 2024 based on cost-of-living adjustments. The adjusted maximum penalty amounts took effect in January.

New maximum penalties for willful and repeat violations increased from \$156,259 per violation to \$161,323 per violation. Maximum penalties for serious and other-than-serious violations increased from \$15,625 per violation to \$16,131 per violation.

States operating their own Occupational Health and Safety Plans are required to adopt maximum penalty levels that are at least as effective as OSHA’s federal penalties. Additional information is available at osha.gov/penalties.



To view individual OSHA-approved state plans, go to professionalroofing.net.

Contractor faces \$281,485 in proposed fines for fall hazard exposure

During the summer of 2023, Occupational Safety and Health Administration inspectors found Appleton, Wis.-based Bacilio Rios, who operates as Chilos Construction, did not provide employees with required fall protection when they were performing residential roofing work, exposing them to fall hazards, according to OSHA. The company is not an NRCA member.

In July 2023, OSHA observed three workers employed by Rios near the peak of a home in Appleton and another employee operating a leaf blower on the home's roof with no form of fall protection.

Rios was cited with four repeat violations and \$281,485 in proposed penalties. The violations included the company's failure to provide fall-protection equipment and train employees how to use it; improper use of ladders; and failure to train workers regarding hazards related to falls and ladders. Rios was cited for similar violations in October 2022.

NRCA's classes, webinars and products offer information to ensure you can keep your employees safe on job sites. Visit NRCA's bookstore at shop.nrca.net for more information.

Florida bill would expand working hours for minors

Florida's House Bill 49, introduced by Rep. Linda Chaney in September 2023, would amend state laws to allow 16- and 17-year-olds to begin work at 6 a.m. (as opposed to 6:30 a.m.) and remove limits previously forbidding minors from working more than 30 hours in a school week and more than eight hours on school days. Additionally, it would add a provision allowing work during school hours if the individual is home-schooled, has dropped out of school or is enrolled in a virtual education program.

The alterations also would allow workers over the age of 15 to work more than six consecutive days per week and to work more than four consecutive hours without a 30-minute meal break; this provision is currently limited to workers over the age of 18.

Critics of the bill have voiced concerns the bill would incentivize minors to either work excessively outside of school hours or drop out of school to work full-time.

The Florida House of Representatives passed the bill Feb. 1, and it awaits Senate consideration.

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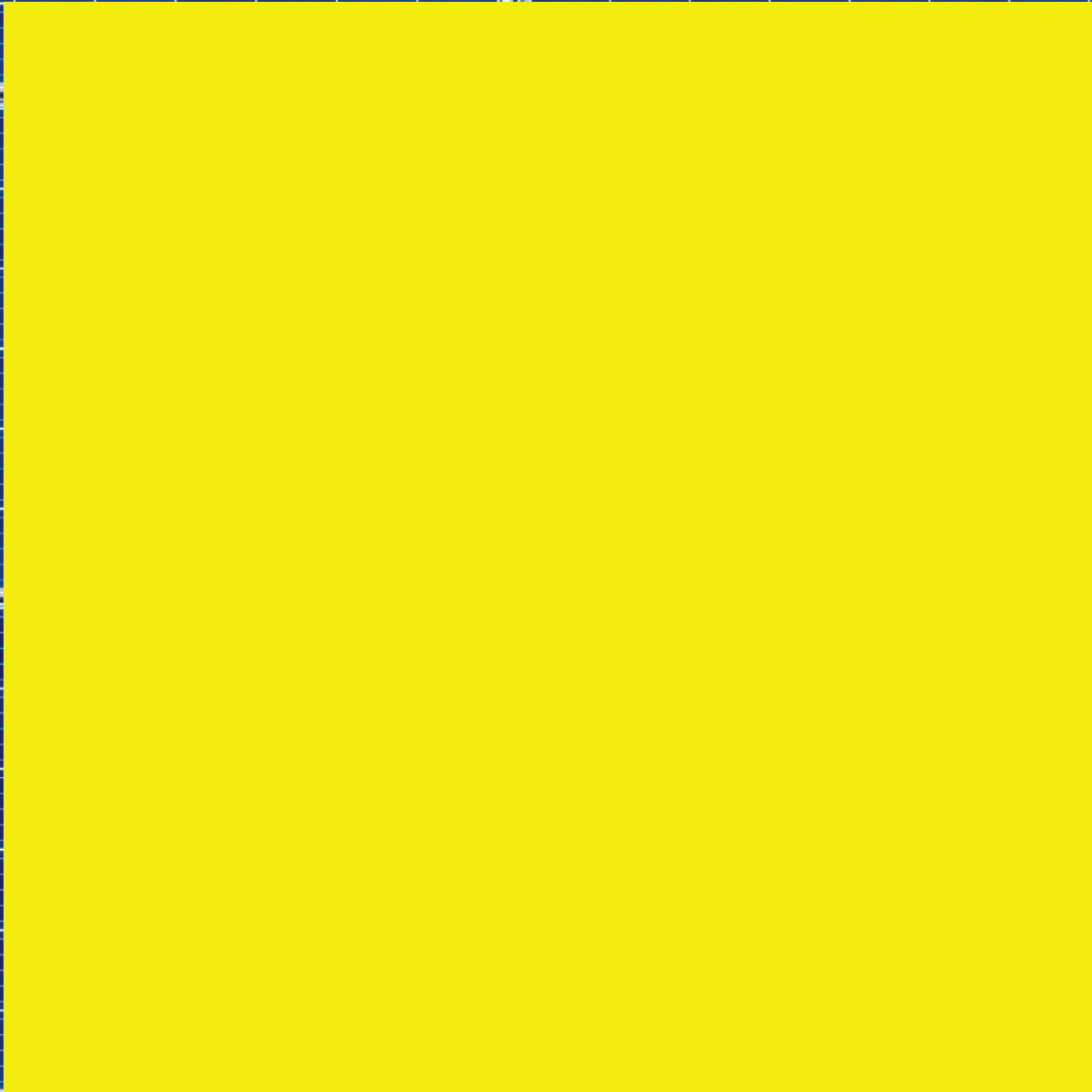
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Entering the solar market is easier than you think

by James Mason

Roofing always has been an industry of innovation. As soon as the latest techniques and technologies are mastered, improvements that challenge roofing contractors to evolve are introduced. Solar roofing is no exception. Since the early days of residential and commercial solar roofing, change has been constant.

Although making the leap into offering solar products may pose challenges to contractors, the upside is simply too great to ignore. From a consumer and commercial standpoint, the demand for solar roofing will continue to grow; for example, consider that by 2050, the Department of Energy expects solar power to make up 45% of the nation's electricity production. That growth represents a new world of opportunity—and a new potential revenue stream—for your business.

Contractor challenges

The ability to learn and master new techniques and technologies is a prerequisite for success in the roofing industry, which requires constant adaptation to remain competitive. However, industry advancements often introduce new disciplines some roofing contractors may be hesitant to pursue.

Solar is one such area. It entails not only a new array of products and technology but also specific technical expertise. Although it is certainly wise to consider what obstacles may lie ahead, a wealth of information, resources and training exists that provides everything contractors will need. After all, getting up to speed about trends, product offerings and installation training is exactly what contractors have been doing their entire careers.

There is a way to overcome every barrier to getting involved in solar roofing regardless of whether that barrier stands in the way of roofing contractors or their customers.

Is it too late to get started?

The time hasn't passed to start offering solar products. It's true solar technology is no longer in its infancy, and the establishment and widespread adoption of solar technology has put some roofing contractors at ease and encouraged them to jump in. Others, though, may believe they have fallen too far behind the early adopters to catch up.

Quite simply, this is a misconception. Although solar roofing as a whole is widely known and becoming more accepted in the mainstream, solar technologies such as inverters (which convert direct current energy from the panels into alternating current energy to be fed into the electrical grid) and batteries (which store excess solar energy for later use) are still in startup phases. Batteries in particular offer incredible opportunity as they are still relatively uncommon and provide impressive energy efficiency and cost-savings potential for customers.

In addition, solar panels, which are a well-established technology in the mature phase of development, are dropping to all-time low prices. As innovation and technological development evolve surrounding PV technologies, efficiency will improve and prices could drop further. For roofing contractors, that means greater margins on solar system sales and a larger potential revenue stream.

Plus, adding solar to your business not only gives you the opportunity to win new customers, but it also allows you to offer more options to the customer base you have already built.

Homeowners and business owners are always looking for the most efficient way to meet their roofing needs, and establishing your business as a single source for traditional and solar roofing products helps increase your revenue stream with existing customers. Hybrid contractors can offer customers a one-source, wrap-around warranty, providing them with even more value.

The industry is poised not just to expand but to explode in the years to come. There is ample opportunity for those without solar experience to get on board.

I don't have the right experience

Learning to install solar panels may seem daunting, but it's no more difficult than the skills you must master to become licensed in the roofing industry. The days are gone when solar installation required fabricating equipment by hand and anchoring panels with wire and bolts; new advancements have made the racking, waterproofing and flashing processes simpler and more streamlined.

The establishment of specialized solar companies in recent years offers the perfect opportunity to train your staff to become experts in solar installation. Engaging in training with solar companies will ensure your team is prepared to properly mount the equipment in compliance with state and national standards. In fact, DOE has established its Solar Training Network to connect professionals with the specialized training opportunities they need to become solar installation experts.

As an alternative to obtaining certification on your own, you can find solar contractor partners willing to teach fundamental solar roof system installation. Partnering with a solar contractor on projects can provide a transition period as you gain confidence and aptitude in solar installation capabilities. The options for learning the on-site portion of solar are multiple, and formulating a plan that works best for your company is an essential step toward establishing your place in the industry.

In addition, suppliers such as ABC Supply Co. Inc., Beloit, Wis., make it easy for customers to access product knowledge and installation training.

I don't have electrical expertise

Once the racking and panels are installed on a solar roof system, the focus turns to converting the solar energy being generated into usable electricity. Some may enjoy learning this component of solar roofing, but many roofing contractors find the electrical portion to be unfamiliar (and uncomfortable) territory. From understanding the wiring and installation nuances between microinverters and string inverters to connecting the system to the building's electrical panel, successfully implementing electrical components is crucial to a solar roof system.

Many contractors already have employees on staff with electrical experience and the aptitude to become experts in the electrical portion of solar installation—they just need the proper education and application experience. Certification and licensing are required to connect electrical components of a solar system, so employees will need to complete those requisite steps before stepping into that role on your team. Once they do, though, having a go-to electrical person will pay dividends in the long term.

If your staff doesn't have extensive experience in electrical work or the bandwidth to take on the electrical work on a solar job, partnering with a licensed electrical contractor to handle this work is an easy way to take the burden off your company while ensuring the job is done right.

I don't want to manage more supplies

As a contractor, you already have the challenge of ordering supplies and maintaining inventory for the services you provide, and you may not be eager to add to that list. Or you may be concerned your suppliers don't have the solar products you would need to enter the market. Finding the right distributor that can streamline the ordering and delivery process will alleviate those concerns.

For example, ABC Supply makes it easy for contractors by functioning as a single source for residential and commercial projects. The variety of solar products ABC Supply offers allows you to lump all solar and roofing needs into one order, keeping things simple and saving time.

Ordering is only half the battle. Roofing contractors new to the solar industry may not be familiar with the challenge of getting their solar panels onto the rooftops of homes and buildings. Your distributor may be able to help. ABC Supply, for instance, offers rooftop delivery in some markets and can bring supplies straight to the roof, saving time and money and minimizing safety risks.

Customer challenges

It's not enough for roofing contractors to become confident in the benefits of solar systems and the skills required to offer PV products. Homeowners and business owners who stand to benefit from implementing them must be familiar with the technology, financing possibilities and long-term savings potential before they are willing to invest.

Much like the technology itself, public perception of solar roofing has evolved substantially in recent years. Homeowners, businesses and developers are increasingly looking for ways to consume energy in an environmentally friendly way while saving money on their energy bills.

Even so, a variety of common concerns may hold customers back from making the decision to go with a solar roofing option. You should be equipped to answer these questions to put any concerns to rest and demonstrate how a customer will benefit in the near and long term by choosing a solar roofing solution.

Customers say solar is too expensive

One of the most common misconceptions held by homeowners and businesses alike is the idea solar is too expensive an option to consider. Although this may have been a valid concern in previous decades, growth of the solar industry has made solar much more affordable.

According to the Solar Energy Industries Association, an average-sized residential system has dropped from a pre-incentive price of \$40,000 in 2010 to roughly \$25,000 today. The reduced price tag alone will be reason enough for many customers to consider choosing a solar system.

In addition to the lower price of equipment, there are long-term cost benefits of solar. One of the most attractive benefits to share with customers is the savings potential of investing in a solar system. For example, the average homeowner operating a 6-kilowatt home solar system will save about \$1,500 annually compared with the national electricity price, according to SolarReviews, a consumer website that reviews and rates residential solar panels and solar panel installation companies.

Once this annual cost savings offsets the installation price of the system (usually in about 10 years), customers can pocket that additional savings for the remainder of the system's life. Plus, as utility prices continue to rise, the cost savings of running a home solar system will increase.

Helping homeowners and business owners understand



There is a way to overcome every barrier to getting involved in solar roofing regardless of whether that barrier stands in the way of roofing contractors or their customers

this long-term perspective rather than fixating on the sticker shock of installation is key for contractors looking to close a sale.

Customers aren't aware of financing options

Solar system installation, much like any major home improvement project, is a substantial investment, but with solar becoming more mainstream, financing options are more readily available and appealing to homeowners and businesses.

One of the most popular options for financing a new solar system is a solar loan. Like other loans, a solar loan allows customers to purchase a system by making monthly payments to a bank or another creditor. Because solar loans are exclusively for the purchase and installation of solar equipment, monthly payments are often low—in many cases lower than homeowners' current utility bills, according to CNET. Plus, opting for a solar loan allows customers to take advantage of all available federal and local tax incentives and eventually own the system outright.

Additional financing options, such as solar leases and purchase power agreements, are newer ways for customers to make the leap into the solar world. Although these approaches allow some flexibility for those not wanting to pay larger sums at installation, they don't offer customers ownership of the system.

Contractors who can help give their customers access to financing through third-party lenders (ABC Supply offers financing through its partnership with lender

GoodLeap) will have an upper hand in closing deals when discussing payment options.

Customers are unaware how to offset costs

Given how quickly the solar industry is evolving, it can be difficult to keep up with government regulations and policies. In 2022, Congress passed a federal tax credit for 30% of the installation cost of solar PV systems for eligible homeowners and businesses. This credit, which is in place through 2032, can aid greatly in offsetting installation costs.

Beyond the federal tax credit, favorable state and local incentives add to the benefits for those making the investment in a solar roof system. Policies vary by state and locality, but many governments have implemented tax breaks for solar energy systems. Examples of benefits offered include sales tax exemptions at purchase, property tax breaks for homeowners and other state tax credits similar to those implemented at the federal level.

Additionally, new guidance passed by the Department of the Treasury provides an extra 10% tax credit on U.S.-made solar panels. Customers looking to maximize their cost savings upon installation may consider this extra perk to lower their bills even further by opting for a PV system manufactured in the U.S.

Contractors and customers should consult with tax professionals to ensure they fully understand the expenses included under the federal solar tax credit and additional local policies. With a firm knowledge of the benefits this credit entails, you can enlighten customers about how solar power is a more attainable and financially practical option than they may previously have thought.

Where can you start?

The first step you can take toward offering solar solutions is to gather information and make a plan that best fits your business. One resource that can help is your local building supply representative, who can help set you up with the information you need to start offering solar products.

There is ample opportunity for contractors to take advantage of the solar roofing industry, and there's no better time to get started than the present. 🌞🔌

JAMES MASON is vice president of renewable energy at ABC Supply Co. Inc., Beloit, Wis.

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The NRCA Roofing Manual: Steep-slope Roof Systems

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The NRCA Roofing Manual: Architectural Metal Flashing and Condensation and Air Leakage Control

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The NRCA Roofing Manual: Metal Panel and SPF Roof Systems

2024



The NRCA Roofing Manual:
Metal Panel and SPF Roof Systems

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UPDATED BEST PRACTICES

NRCA releases the
latest volume of The
NRCA Roofing Manual

by Maciek Rupar

In January, NRCA published *The NRCA Roofing Manual: Metal Panel and SPF Roof Systems—2024*. The updated volume supersedes *The NRCA Roofing Manual: Metal Panel and SPF Roof Systems—2020*. The current edition is part of a fifth full update to The NRCA Roofing Manual.

Since 2007, NRCA has kept The NRCA Roofing Manual current by releasing an updated volume every year. The NRCA Roofing Manual currently consists of the following four volumes:

- *The NRCA Roofing Manual: Metal Panel and SPF Roof Systems—2024*
- *The NRCA Roofing Manual: Membrane Roof Systems—2023*
- *The NRCA Roofing Manual: Architectural Metal Flashing and Condensation and Air Leakage Control—2022*
- *The NRCA Roofing Manual: Steep-slope Roof Systems—2021*

The manual represents a consensus opinion of professional roofing contractors and manufacturers and presents best industry practices and technical information concerning the design, materials and installation of quality roof systems.

Manual Update Committee

NRCA's Manual Update Committee primarily was responsible for overseeing the development of *The NRCA Roofing Manual: Metal Panel and SPF Roof Systems—2024*. Eleven committee members representing eight roofing contractors and three roofing manufacturers met eight times between July 2022 and June 2023; two additional meetings were held by a task group selected from the committee to develop language addressing portable roll formers.

The committee focused on updating the metal panel roof systems section. NRCA Technical Services staff developed revisions for the spray polyurethane foam roof systems portion.

A reference

The volume is composed of two self-contained sections: metal panel roof systems and SPF roof systems.

The metal panel roof systems section consists of 11 chapters and two appendixes. Chapter 1—Roof System Configurations is intended as a guide for designers when specifying metal panel roof systems and developing project specifications.

New construction and roof system replacement configurations are addressed separately from roof re-cover configurations. Architectural metal panel and structural metal panel configurations also are addressed separately. Each roof system configuration provides one or more system drawings and a list of major components with references to roofing manual chapters and sections where each component is addressed in detail. For example, designers can select a metal panel roof system configuration and refer to Chapters 2 through 11, the appendixes and sections in other volumes of the manual for additional information.

Chapters 2 through 9 address:

- Roof decks and spaced structural supports
- Air and vapor retarders
- Metals and protective coatings used in metal roofing applications
- Guidelines applicable to architectural metal panel roof systems and structural metal panel assembly construction
- Fasteners used in metal roofing applications
- Roof accessories for metal roofing applications

Chapter 10 provides design considerations applicable to roof system replacement and re-covering an existing

roof system with the installation of a new metal panel roof system.

Chapter 11 provides construction details for common metal panel roof system perimeter and penetration conditions. Construction drawings are included for:

- Architectural vertical seam metal panel roof systems
- Architectural T-seam metal panel roof systems
- Structural trapezoidal seam metal panel roof assemblies
- Structural vertical seam metal panel roof assemblies

Appendix 1 provides information about code compliance for metal panel roof systems. Appendix 2 addresses guidelines for determining design loads for snow guards.

The SPF roof systems section is laid out similarly to the metal panel roof systems section and consists of nine chapters and one appendix.

Chapter 1—Roof System Configurations includes new construction or roof system replacement configurations and roof re-cover configurations. New construction and roof system replacement configurations are provided for applications using protective coatings and fleece-backed roof membranes over concrete decks, rigid board insulation, nailable decks and steel decks. Separate roof configurations are provided for roof re-cover applications using protective coatings and fleece-backed roof membranes over existing adhered membrane or SPF roof assemblies and existing nonadhered single-ply roof assemblies.

Chapters 2 through 7 address: roof decks; base sheet and rigid board insulation substrates; air and vapor retarders; SPF foam; protective surfacings; and roof accessories.

Chapter 8 provides design considerations applicable to roof system replacement and re-covering an existing roof system with the installation of a new SPF roof system.

Chapter 9 provides construction details for common SPF roof system perimeter and penetration conditions. Separate sets of construction drawings address:

- New and replacement SPF roof systems with protective coating surfacing
- New and replacement SPF roof systems with fleece-backed membrane surfacing
- Re-cover SPF roof systems

Appendix 1 provides information about code compliance for SPF roof systems.

Global revisions

Sections and volumes of The NRCA Roofing Manual share content updated at least every four years. Following are some pertinent global revisions made among all four volumes of The NRCA Roofing Manual.

References to manufacturers' installation instructions replace previous references to manufacturers' recommendations.

Sheet steel product thicknesses are primarily designated in decimals. The manual previously designated sheet steel thickness by gauge number. However, the practice of designating sheet steel materials using gauge numbers often is not useful because there is no universally accepted standard that defines the thicknesses associated with each gauge number. The steel industry encourages the use of decimal thicknesses for specifying sheet steel products.

Updated guidelines for steel roof deck design reference the Steel Deck Institute's *Roof Deck Design Manual, Second Edition*. Beginning with the second edition, the manual's load tables are revised to be based on a minimum yield strength of 40 ksi and minimum tensile strength of 50 ksi for steel roof decks. The manual's first edition included load tables based on a yield strength of 33 ksi and tensile strength of 45 ksi. As a result, steel decks' allowable loads are increased in the second edition. NRCA urges designers to be aware of this change, particularly when evaluating existing steel roof decks. Most existing steel deck panels are fabricated from steel with a minimum yield strength of 33 ksi or Grade 33 steel.

References to model building codes, industry standards and guides, and NRCA manuals and guides were updated to point to the current editions at the time the 2024 update was being developed. The 2024 volume references the 2021 editions of the I-Code family of model building codes.

Metal panel roof systems

The catalogue of changes in the metal panel roof systems section is extensive. Users of The NRCA Roofing Manual should find the following revisions worth noting.

In Chapter 2—Structural Substrates, NRCA updated its recommendations for minimum design slope of metal panel roof systems. Designers should consider valleys included in the roof design when determining minimum slope because valley slope is less than the panel slope. NRCA recommends 3 inches per foot as the minimum

design slope for architectural metal panel roof systems' surfaces without valleys and 1/2 of an inch per foot as the minimum design slope for structural metal panel roof assemblies' surfaces without valleys.

The term used to describe structural steel members shaped from sheet metal and commonly used as intermittent supports in metal panel roof systems was changed from "light-gauge framing" to "cold-formed steel framing." ANSI/AISI S240, "North American Standard for Cold-Formed Structural Framing," defines cold-formed steel as "sheet steel or strip steel manufactured by (1) press braking blanks sheared from sheets or cut length of coils or plates or (2) continuous roll forming of cold- or hot-rolled coils of sheet steel. Both forming operations are performed at ambient room temperature; that is, without addition of heat, which would be required for hot forming."

Cold-formed steel framing materials commonly used in construction include hat channels, square tubing, C-channels and Z-purlins. Cold-formed steel framing may be used to provide a substrate to support and attach metal roof panels, provide space for roof insulation, provide means to bridge over an irregular substrate, permit the underside of metal roof panels to be ventilated and create roof slope.

Chapter 3—Air and Vapor retarders includes new language regarding NRCA's position on metal panel roof assembly air retarders. NRCA is concerned with the feasibility of constructing structural standing-seam metal roof panel assembly air retarders that comply with building thermal envelope air leakage provisions of the International Energy Conservation Code® and ASHRAE Standard 90.1, "Energy Standard for Sites and Buildings Except Low-Rise Residential Buildings." NRCA considers the materials and methods commonly used for constructing structural standing-seam metal roof panel assemblies inadequate to consistently provide the level of building thermal envelope air retarder performance specified in currently adopted energy codes.

NRCA recommends architectural metal roof panel assembly air retarders be designed and installed in the assembly below the structural roof deck or substrate—at the ceiling plane in cold attic assemblies, for example—

**THE 2024 VOLUME
REFERENCES THE
2021 EDITIONS OF
THE I-CODE MODEL
BUILDING CODES**

or within the attic space in conditioned unvented attics, where energy code-compliant air retarders can be constructed using proven construction materials and methods.

Revisions in Chapter 4—Guidelines Applicable to Metal mirror updates introduced in the corresponding chapter in *The Architectural Metal Flashing and Condensation and Air Leakage Control—2022*.

Notable revisions include:

- Expanded information about sheet-metal materials, including thickness tolerances and discussion of terms commonly used in project specifications to describe metallic-coated steel sheets
- Updated and expanded information about protective coatings, including color matching
- Updated and expanded information about oil canning, including how tension precision leveling may be used to minimize oil canning
- Moving information about copper-coated stainless steel (CopperPlus®) and lead-coated copper to the Historic Metals section

In Section 5.7—Manufacturing methods, NRCA's Manual Update Committee added a discussion of best practices for portable roll-former operation and site-formed metal panel handling.

In Chapter 6—Architectural Metal Panel Roof Systems, there is new information about underlayment materials. New language cautions designers about metal panel roof system manufacturers commonly specifying underlayment material types and attachment methods that meet the manufacturer's requirements for a material or system warranty. For example, some manufacturers accept the use of mechanically fastened underlayments for field-of-roof applications whereas other manufacturers only accept the use of self-adhering underlayments applications.

Information was added about ASTM D8257, "Standard Specification for Mechanically Attached Polymeric Roof Underlayment Used in Steep Slope Roofing." The material standard, which was first published by ASTM International in December 2020, is referenced in the 2024 I-Codes as a permitted underlayment material specification for most steep-slope roof systems except wood roof systems. NRCA recommends designers specifying synthetic sheet underlayments for architectural metal panel roof system applications select materials complying with ASTM D8257 and specify the minimum water vapor transmission rating.

Chapter 8—Fasteners includes best-practice recommendations for driving gasketed fasteners. The use of correct tools and practices is important for correctly compressing the gasket material for a weather tight seal and making secure panel-to-substrate connections.

The Manual Update Committee added a new set of architectural T-seam metal panel roof system construction details, designated ATM. Previously included details depicting architectural metal panel roof systems have been designated AVM for architectural vertical-seam metal panel roof systems.

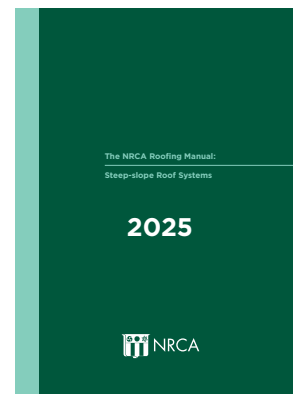
For ATM and AVM construction details, an additional option is available for detailing an eave or an eave with a gutter where water and ice-dam protection membrane is used: First, a half-sheet of self-adhering stripping ply is applied to the deck and down fascia. Next, edge metal is applied. And then a full-width sheet of self-adhering stripping ply is applied.

Revisions to existing construction details address elastomeric sealant application for panel closures at ridge caps, standing-seam end closures and compatibility of underlayments and self-adhering materials at roof-to-wall transitions.

Access the new manual

NRCA's Manual Update Committee is working on reviewing, revising and updating the manual's next volume—*The NRCA Roofing Manual: Steep-slope Roof Systems—2025*—scheduled to be released in January 2025.

In the meantime, NRCA members can view and download electronic versions of the most recent volume, *The NRCA Roofing Manual: Metal Panel and SPF Roof Systems—2024*, for free by accessing shop.nrca.net. Printed versions of the 2024 manual and other volumes of *The NRCA Roofing Manual* also can be purchased by accessing shop.nrca.net.



MACIEK RUPAR is an NRCA director of technical services. 🌐📧



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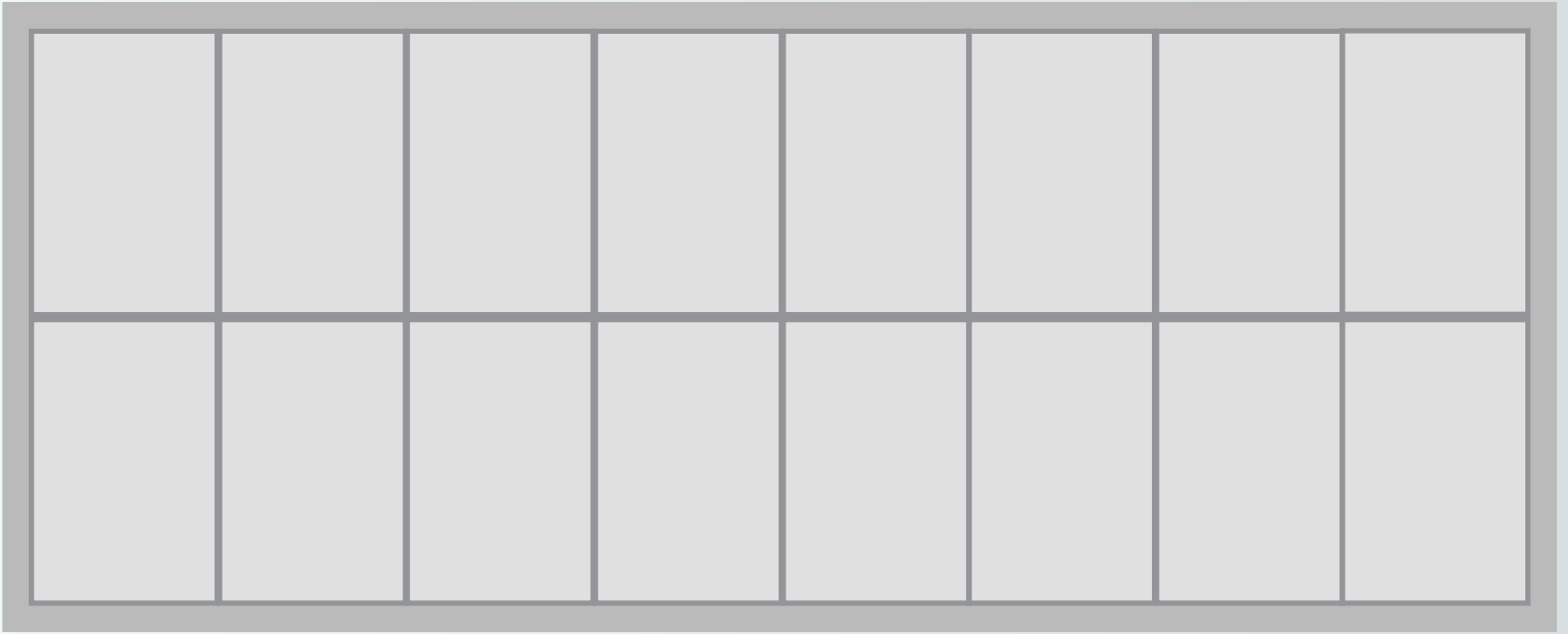
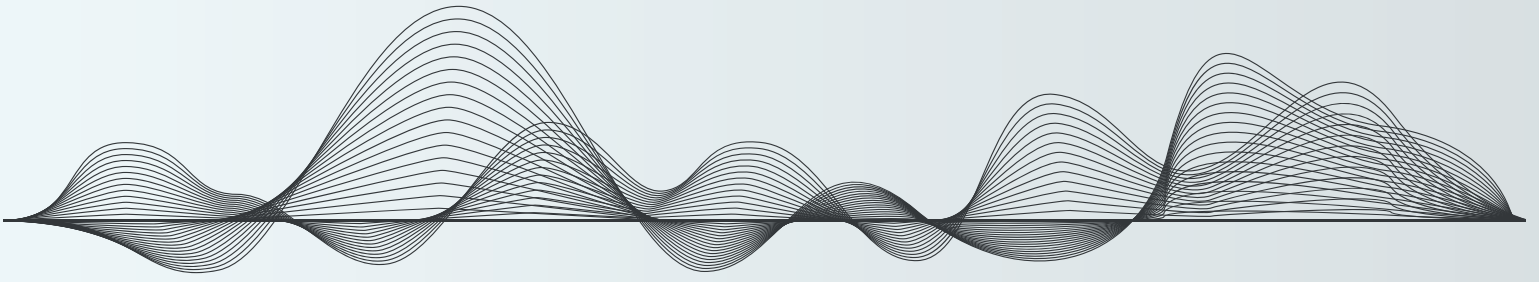


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Soundproof Roofing

**Nations Roof helps solve a noise
issue for Lionsgate Studios**

by Chrystine Elle Hanus

Project name: Lionsgate Studios
Project location: Yonkers, N.Y.
Project duration: February-August 2023

Roofing contractor: Nations Roof—East,
Yonkers, N.Y.
Roof system type: TPO membrane

Roofing manufacturers: Carlisle® SynTec
Systems, Carlisle, Pa.; Georgia-Pacific
Gypsum, Atlanta; ROCKWOOL®, Milton,
Ontario



Built on the site of an old elevator factory overlooking the Hudson River, Lionsgate Studios, Yonkers, N.Y., opened in January 2022 with plans of becoming the largest modern-built film and television production facility in the Northeast.

Owned by Great Point Studios, whose movie portfolio includes popular franchises such as “The Hunger Games,” “John Wick” and the “Twilight” saga, the \$500 million studio campus features two 20,000-square-foot sound stages, a smaller 10,000-square-foot stage, six talent suites for actors, dozens of dressing rooms, hair and makeup stations, dedicated writers’ rooms, a carpentry shop for set construction and office space.

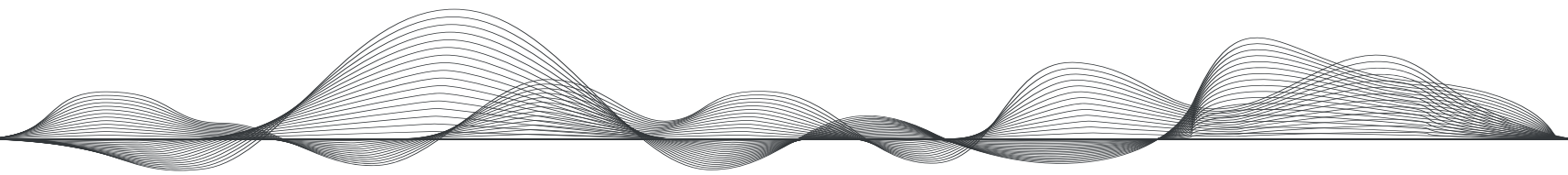
During the summer of 2021, design/build firm Steve Pustola and Associates, Naugatuck, Conn., contacted Nations Roof—East, Yonkers, N.Y., to install a roof system on one of the studio’s sound stages. The project successfully was completed using a double layer of polyisocyanurate insulation and 60-mil-thick mechanically attached TPO membrane.

A few months later, the developer contacted Nations Roof again to install a new roof system on another sound stage. But this time, the new roof would be much more complex and unlike anything the company previously installed.

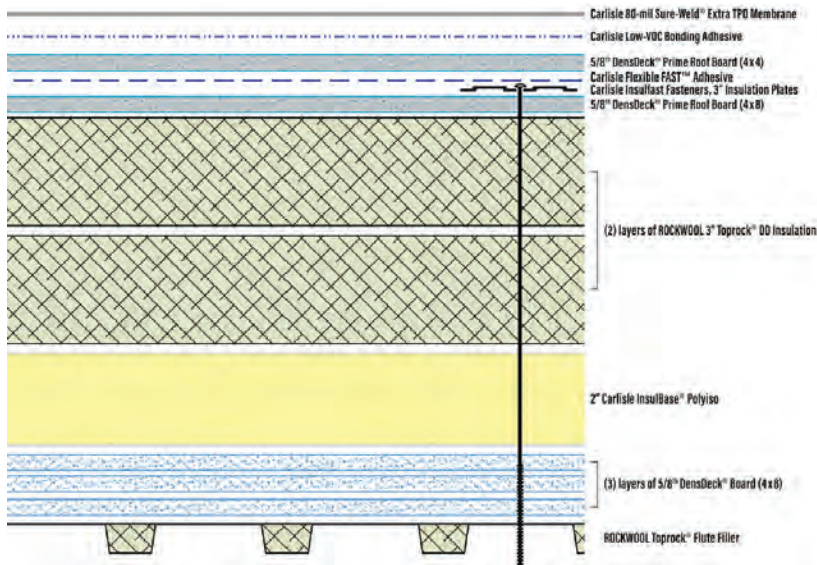
Collaboration

After Nations Roof installed the first roof system, television crews working in the building realized the more than 100 commuter trains passing nearby daily produced so much noise, filming had to stop every time a train went by. Great Point Studios asked the Nations Roof team to develop a solution to block out the noise pollution before installing a roof system on a new building.

The team brought in several partners to design a roof system that addresses three fundamentals to reducing sound transmission through



Initial work on the studio's roof



Roof system components

a roof assembly: adding mass, adding absorption and decoupling.

“Although we were familiar with a number of roofing products that had sound blocking properties, we looked to several manufacturers to help us dig into the product specifications and come up with a fully warrantable system that also met the acoustical needs of the building owner,” says Michael Johannes, president of Nations Roof—East.

The Nations Roof team called in ROCKWOOL,® Milton, Ontario, for help with increasing the sound transmission class rating. The ROCKWOOL building science team used the results from its highest-performing assembly to model a further improved roof assembly. The analysis predicted an STC rating of 55, a robust rating that met the client’s demanding requirements. The team also evaluated the thermal performance of the roof system

and estimated an R-value of 38, exceeding the minimum requirement of 30.

To provide mass, the ROCKWOOL team recommended Georgia-Pacific DensDeck® Roof Boards. For sound absorption, ROCKWOOL Toprock® B-Deck Flute Filler and Toprock DD insulation were recommended. The manufacturing team also recommended adhering the top layer of DensDeck Prime Roof Boards and the roof membrane to decouple them from the fasteners and layers below.

Once the acoustical design was accepted by Great Point Studios, the Nations Roof team brought the assembly to Carlisle® SynTec Systems, Carlisle, Pa., to ensure it met warranty requirements. The Carlisle SynTec Systems team recommended 80-mil-thick Sure-Weld® Extra TPO for the membrane and offered the client a 20-year system warranty.

The roof assembly

The final roof system (not including the steel deck) measures more than 11 ¼ inches deep.

“It was a little bit daunting to say the least when we saw everything it was going to take to be able to control sound in addition to being able to control water getting into the system,” Johannes says.

In February 2023, the Nations Roof crew began the task of installing the following roofing materials on top of the roof deck (see figure):

- ROCKWOOL Toprock B-Deck Flute Filler
- Three layers of 5/8-inch-thick, 4- by 8-foot Georgia-Pacific DensDeck Roof Boards
- One layer of 2-inch-thick Carlisle InsulBase™ polyisocyanurate insulation
- Two layers of 3-inch-thick ROCKWOOL Toprock DD insulation

- One layer of 5/8-inch-thick, 4- by 8-foot Georgia-Pacific DensDeck Prime Roof Boards
 - Carlisle Insulfast™ Fasteners with 3-inch Insulation Plates
 - Carlisle Flexible FAST™ Adhesive
 - One layer of 5/8-inch-thick, 4- by 4-foot Georgia-Pacific DensDeck Prime Roof Boards
 - Carlisle Low-VOC Bonding Adhesive
 - One layer of Carlisle 80-mil-thick Sure-Weld Extra TPO Membrane in gray
- Nations Roof also partnered with Beacon Building Products, Herndon, Va., local distributor for Carlisle SynTec Systems.

“On a complex system like this, it’s challenging to have everything show up on time and in the proper sequence so the roofing team can load the roof properly and meet the production schedule work without delay,” Johannes says. “Beacon Building Products coordinated the delivery of 16 truckloads of materials and did an excellent job of coordinating deliveries and lifting materials to the rooftop.”

Safety

Adding to the project’s complexity, Lionsgate Studios is located on a busy urban street.

“The safety of our crews is paramount, and safety was the first component that went into this project even before materials were ordered,” says Arios Geci, Lionsgate Studios project manager for Nations Roof. “This project required a unique plan to accommodate the loading of a large amount of materials required for the roof assembly.”

The Nations Roof team created a site-specific safety plan that included a safety railing and orange netting on all sides of the building, barriers to separate workers from street traffic, daily on-site safety “huddles” and posted safety information with emergency contacts. As a result of diligent safety measures, the crew worked more than 2,800 man-hours on the project without incident.

“The project presented unique safety challenges to the crew on-site,” Johannes says. “We were confident in our planning and preparation to address any issues before they resulted in an incident. We fulfilled our goal to keep our team safe and able to go home to family and loved ones at the end of each workday.”

Quiet on set

In May 2023, the Nations Roof team completed a substantial amount of the roofing work on Lionsgate Studios with final details finished in August 2023. Thanks to a mobilized team of partners who each contributed unique expertise to solving Great Point Studios’ sound dilemma, the team successfully delivered a strong, durable, soundproof roof system while protecting the building envelope.

“Our crew was able to draw on experience installing all the individual components to complete an innovative assembly,” Johannes says. “When you watch a Lionsgate film recorded in Yonkers, you’ll only hear the sounds that were meant to be heard inside the studio thanks to the roof system.”

For its work on Lionsgate Studios, Nations Roof—East received a 2024 NRCA Gold Circle Award in the Innovative Solutions category. 🏆🌟

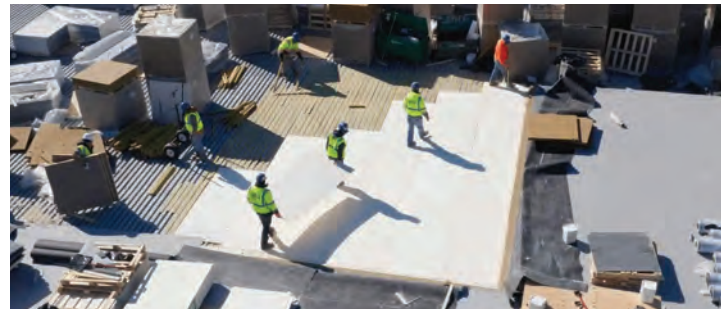
CHRISTINE ELLE HANUS is *Professional Roofing’s* associate editor and an NRCA director of communications.



To watch a video produced by Nations Roof about the Lionsgate Studios project, go to professionalroofing.net.



Insulation assembly



Insulation assembly aerial view



The studio’s new roof system



Lionsgate Studios entrance



Just say no

Price fixing and other antitrust violations will result in steep fines and jail time

by Trent Cotney

Editor's note: This article is for general educational purposes only and does not constitute legal advice.

In the construction industry, the competitive bidding process is an essential foundation that ensures a level playing field. Private companies and public agencies rely on the process, which allows competitors to set prices and submit bids in an ethical manner. Unfortunately, there are times when competitors collude and manipulate the bidding process. These practices, which include price fixing and bid rigging, are violations of the Sherman Antitrust Act, and those who engage in them are subject to criminal investigation and prosecution.

The Sherman Antitrust Act

Approved in 1890, the Sherman Antitrust Act was the first law the U.S. Congress passed to prohibit the practice of trusts. A trust is created when stockholders of several corporations transfer their shares to one set of trustees. The stockholders are then entitled to specified shares of the jointly managed companies' consolidated profits. The law was named for

Ohio Sen. John Sherman, who was then chairman of the Senate Finance Committee. He also served as Secretary of the Treasury in the Rutherford B. Hayes administration.

The act was the first federal law to outlaw monopolies and associated business practices. At the time of the law's passing, many industries were dominated by trusts, which eliminated competition. One example was the Standard Oil Trust, which was formed in 1882 and effectively enabled Standard Oil to monopolize the U.S. oil industry. In 1911, the U.S. Supreme Court determined Standard Oil had violated the Sherman Antitrust Act, and it was divided into 34 separate companies.

Antitrust law prohibits competitors from conspiring with one another to combine, monopolize or restrict trade and commerce. That prohibition includes fixing prices, rigging bids and partaking in other antitrust actions. Violating the Sherman Antitrust Act is considered a felony. Those found guilty can face as much as 10 years in prison, as well as fines of \$1 million for individuals and \$100 million for companies. In addition, corporations or individuals can be required to make restitution to all victims affected by their actions.

Antitrust violations

Most antitrust violations involve schemes related to price fixing, bid rigging and market allocations. Following are some examples of anticompetitive conduct:

- **Price fixing:** This occurs when two or more competing sellers collude and agree on what price to charge their customers. For example, they might increase their prices by a set amount or refuse to sell below a given price.
- **Bid rigging:** This action involves two or more companies discussing their bids and specific dollar amounts to ensure the company they choose will submit the winning bid. The purchaser, who relies on ethical competition, is harmed in this process, having to accept the "lowest bid" that may well be above what the market can bear. Variations include the following:
 - **Bid suppression:** Competitors agree not to bid on a contract or they withdraw an already submitted bid, ensuring a designated party wins the contract.
 - **Bid rotation:** In this scheme, all competitors bid but take turns submitting the lowest bid.
 - **Complementary bidding:** Some competitors

intentionally bid high or fail to meet the requirements and lose a contract to a company with whom they are conspiring.

- **Market or customer allocation:** This occurs when two or more companies divide their customers—often by geography or demographics—to eliminate or at least reduce competition.

Co-conspirators of these practices benefit in a number of ways:

- The winning contractor will offer a subcontract to one or more of the losing contractors.
- A losing contractor is promised to win an upcoming contract in return for fraudulent bids on the current one.
- Losing contractors are paid off with cash, checks or material goods, usually disguised as legitimate professional exchanges.

These practices often are done covertly with participants appearing to be competitors while they manipulate the system. These fraudsters deprive customers of genuine competition and force them to pay more for services and products. All such actions are considered collusion and can lead to criminal prosecution.

Collusion

Those who receive bids often can spot bid rigging and antitrust violations if they look for certain actions and patterns, such as:

- Bids are markedly higher than the agency estimated for the contract or much higher than similar bids by some companies for other contracts.
- Different companies submit identical bids either for lump sums or individual line items.
- Bids are altered at the last minute.
- The winning bid is much lower than others.
- A company submits different bids for specific line items in multiple contracts in a given time period.
- Some qualified contractors do not bid, especially after initially showing interest.
- Most bids are overly high even when companies are struggling to find work.
- Competitors are noticed to be meeting before or after bid submissions.
- Losing bidders receive subcontractor work from the winning bidder.

There also often are clear signs of price fixing and market allocation, such as:

- Competitors announce price increases for identical amounts around the same time.
- Competitors suddenly eliminate or reduce discounts at the same time.
- Competitors' prices seem to be the same, and no one will negotiate.
- The same contractor seems to win the contracts in a given geographical area.
- Contractors who should be bidding on a given project are not doing so.

In addition, it is interesting to note some industries are more susceptible to collusion, and the following specific conditions can breed it:

- Competitors know one another well, often by working together in the past, through trade associations and via social connections. They build a trust that can lead to collusion.
- When there are fewer competitors, they can easily communicate about prices and bids, so collusion is more likely to occur.
- When products are standardized, competitors easily can agree on pricing structures. Also, when a specified product cannot be substituted with others, the odds of collusion increase.

It is important to realize that though the above-mentioned examples can appear to be collusion, they may not be. There are other reasons contractors might submit an overly high bid or fail to bid at all. For example, the scope of work may have been beyond the ability of the contractor or the timeframe for the project may not have fit within the contractor's schedule. Only when contractors take such action as part of an agreement with competitors is it considered an antitrust violation.

Prevention strategies

Procurement officials are wise to always be watchful of collusion activities among bidders. They are trained to recognize the signs and prevent conspiratorial acts. To combat these activities, they use the following strategies:

- They make it more challenging for bidders to conspire by expanding the list of bidders. It is in the buyer's best interest to acquire bids from as many contractors as possible. The more bidders, the more difficult it is for bidders to control the process. Collusion is more likely to occur if the number of bidders is five or fewer.

- They ensure their purchasing department staff know the indicators of price fixing, bid rigging and other colluding activities.
- They require bidders to read, sign and submit affidavits that state bidders are aware of the Sherman Antitrust Act violation penalties and have not colluded.
- They maintain bid lists, awards, abstracts and other procurement records so they can review procurement history. This process is invaluable if there is suspicion of bid rotation or allocation.
- They do not hesitate to ask questions if bidders submit prices that seem unreasonable. Experienced procurement officials also stay informed about the market and know prices are competitive.

In addition to procurement officials remaining on alert, contractors should refrain from interacting with competitors that partake in antitrust activities. If you are approached by competitors to fix prices or rig bids, you should decline such offers, seek legal advice and consider reporting the request to antitrust authorities.

Procurement Collusion Strike Force

The Procurement Collusion Strike Force plays a critical role in combating bid rigging, price fixing, and other antitrust crimes and schemes, working to prevent them in government program funding, grants and procurement. The strike force manages this national response in all areas of government—local, state and federal.

The strike force is wide-ranging and composed of the U.S. Department of Justice Antitrust Division, Federal Bureau of Investigation, several U.S. Attorneys' Offices and Inspectors General for various federal agencies. Strike force agents and attorneys work to uncover and prosecute antitrust violations. They provide training to auditors, procurement officials and law enforcement officers to help them identify and prevent fraud and collusion throughout the competitive bidding process. They also play a role in enforcement by assisting in investigations and prosecuting companies and individuals suspected of these practices.



The Procurement Collusion Strike Force offers a tip center that receives and reviews concerns and complaints about individuals or companies that may be engaged in antitrust crimes related to government procurement and grant and program funding. For a link to report potential violations, go to professionalroofing.net.

Based on data from October 2023, there are more than 31,000 trained strike force agents and procurement officials with more than 100,000 open investigations. Their efforts have resulted in more than 50 convictions and guilty pleas, as well as more than \$65 million in restitution and fines.

Antitrust convictions

An antitrust conviction can be serious; consider these examples of convictions and prosecutions from 2023:

- An owner of multiple construction companies received a sentence of 27 months in prison and was fined \$1.75 million for his role in defrauding the U.S. through government contracts related to programs administered by the Small Business Administration.
- A business owner was sentenced to 15 months in prison and restitution of \$1,062,155. He was convicted of bid rigging and fraud schemes that targeted public and private entities in Connecticut, including the City of Hartford, Yale University and Stamford Hospital. His sentencing was the seventh related to an investigation of the insulation contracting industry.
- A Northern District of Georgia federal jury convicted three military contractors of conspiring to defraud the U.S. by preparing and procuring bogus quotes for government contracts totaling more than \$7.8 million. Months later, one of the defendants was sentenced to six months in prison and two years of supervised release. He was ordered to pay a criminal fine of \$250,000. Another defendant was sentenced to 12 months of home confinement with three years of probation and ordered to complete 100 hours of community service. The final conspirator was sentenced to four months in prison and two years of supervised release. He was ordered to pay a criminal fine of \$50,000.
- A former president of a paving and asphalt contractor was sentenced to three years of probation with six months of home detention and fined \$27,000 for attempting to monopolize the highway crack-sealing services market in Montana and Wyoming.
- A California construction company owner was sentenced to 78 months in prison. He was ordered to pay more than \$980,000 in restitution for his

participation in a bribery and bid-rigging scheme for California Department of Transportation improvement and repair contracts. Those who conspired with him were also convicted. One defendant received a sentence of 49 months in prison and was ordered to pay more than \$980,000 in restitution. The other defendant received a sentence of 45 months in prison and was ordered to pay almost \$800,000 in restitution.

- Two military contractors were sentenced for their roles in a bid-rigging scheme related to maintaining and repairing military tactical vehicles in Texas. Their actions played out over several years and involved more than \$17 million. The sentences ranged from 6 to 18 months in prison and fines up to \$300,000.
- A federal judge in Austin, Texas, ordered a company based in South Korea to pay a nearly \$9 million criminal fine and restitution for committing fraud and rigging bids related to subcontract work at U.S. military installations in South Korea.
- After a court-authorized wiretap investigation, a federal grand jury in Boise, Idaho, indicted two executives of competing companies for violating the Sherman Antitrust Act by conspiring to rig bids and allocate territories related to U.S. Forest Service contracts. They were also convicted of conspiring to commit wire fraud and committing wire fraud.

Final thoughts

Bidding on contracts and securing work on federal projects can be daunting. Competition can be fierce, and winning a big contract can sometimes seem impossible. Under these conditions, even the most upstanding contractors might be lured into price fixing, bid rigging and other acts of conspiracy.

However, it is critical for industry professionals to resist the temptation to manipulate the bidding process. Failure to follow the ethical parameters can lead to inflated prices and unfair competition for consumers and government agencies in addition to legal prosecution for those involved. 🌐🔍

TRENT COTNEY is a partner and practice group leader at the law firm Adams and Reese LLP, Tampa, Fla., and NRCA's general counsel.



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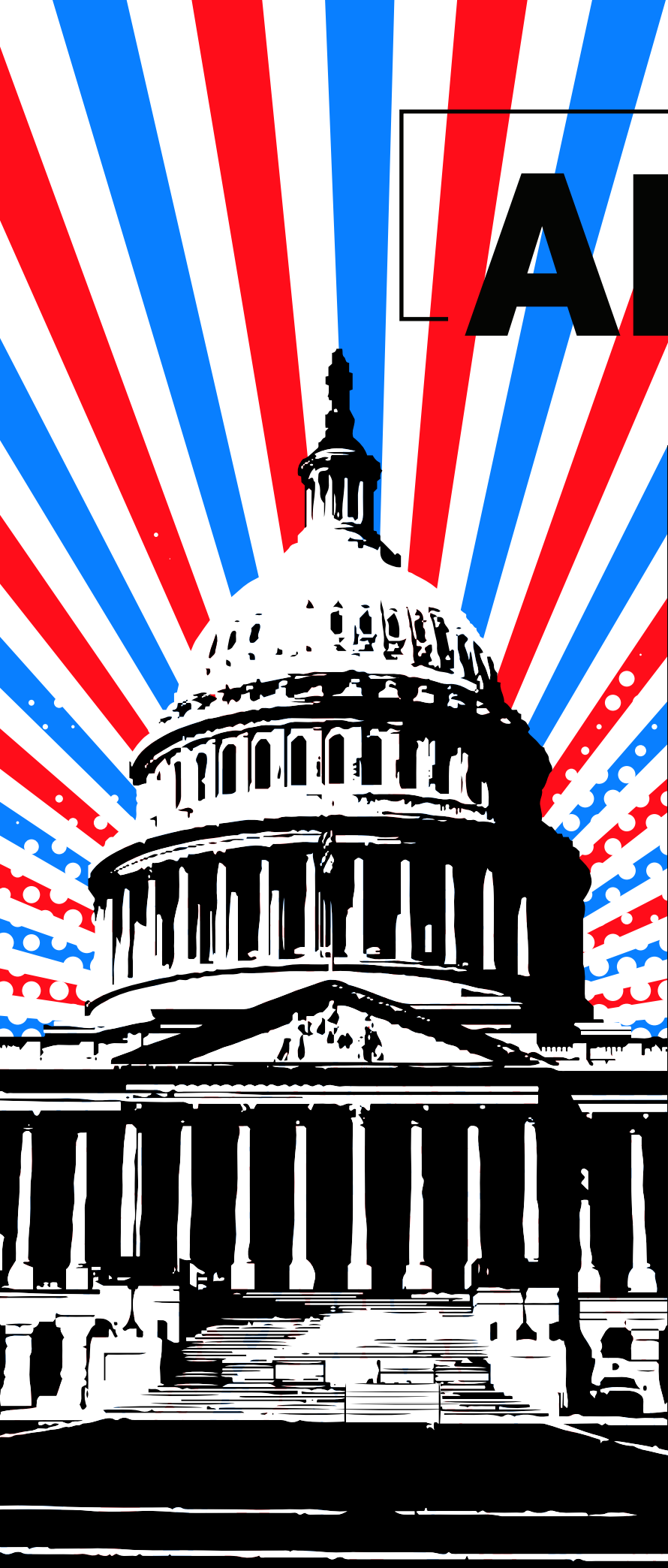
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Hit the jackpot

NRCA'S 137TH ANNUAL CONVENTION AND THE 2024 INTERNATIONAL ROOFING EXPO® BREAK RECORDS

by Avery Timmons

The roofing industry united once again in Las Vegas Feb. 6-9 during NRCA's 137th Annual Convention and Sarasota, Fla.-based Informa's 2024 IRE. An impressive, record-breaking 15,000 industry professionals attended—a 7% increase from the 2023 show in Dallas—to learn about the latest industry trends. Nearly 600 companies displayed technology, products and services over 200,000 square feet of exhibition space with 167 companies making a debut appearance.

“This year’s record-breaking IRE was a success,” says McKay Daniels, NRCA’s CEO. “There was an excellent turnout and plenty of excitement for all the events. I am looking forward to seeing everyone in San Antonio next year!”

The seventh annual National Women in Roofing Days, a two-day conference for female roofing professionals, was held Feb. 4-5 in advance of the IRE. Nearly 450 participants learned about the latest business strategies and shared tactics and secrets to success before attending an evening reception.

The convention kicked off Monday, Feb. 5, with NRCA’s Executive Committee and board of directors meetings at the Westgate Resort & Casino. NRCA’s affiliate executives meeting was held at the Las Vegas Convention Center the following day.

Community service

On Monday, Feb. 6, Informa partnered with Rebuilding Together® Southern Nevada to host the IRE’s 15th annual Community Service Day sponsored by Sika® Sarnafil, Canton, Mass. During the event, volunteers renovated homes for low-income seniors.

Primary sponsor Sika Sarnafil donated \$15,000 for the event. Additional sponsors included GAF, Parsippany, N.J., which donated roofing materials for roof system replacements; Carlisle Construction Materials, Carlisle, Pa.; CentiMark Corp., Canonsburg, Pa.; OMG® Roofing Products Inc., Agawam, Mass.; and The Original Roofing Co., Las Vegas.



Expo events

On Tuesday, Feb. 6, the IRE kicked off with a keynote address delivered by Josey Parks, CEO of Total Home Roofing, Rockledge, Fla., and sponsored by Malarkey Roofing Products, Portland, Ore. Parks discussed the latest technology in the roofing industry and how roofing contractors can use artificial intelligence in real-world scenarios to help their businesses. On Wednesday, Feb. 7, Liza Hausman, vice president of industry marketing at Houzz, Palo Alto, Calif., delivered a second keynote address by sharing consumer trends driving home improvement and her latest research about macro trends.

On the evening of Feb. 6, Informa held a welcome party at Beer Park. Attendees enjoyed food, drinks, live music and an opportunity to meet BMX rider Ricardo Laguna.

Roofing professionals visited NRCA's booth to learn about the benefits of NRCA membership and speak with NRCA experts about NRCA PROCertification,[®] Qualified Trainer Conferences, Training for Roof Application Careers, LEGALCon Virtual and LEGALCon Live, Roofing Day in D.C. 2024, and technical topics and risk management issues. Information about the 2024 edition of The NRCA Roofing Manual, *Professional Roofing* magazine, the Roofing Alliance and other resources also was available. Visitors tried their luck at the NRCA "Spin to Win" wheel, where



NRCA PROCertification demo booth

winners received prizes such as a Traeger Grill,[®] Yeti Roadie[®] Cooler, Milwaukee[®] Heated Jacket and other items.

NRCA's training programs offered during the IRE were well-attended. NRCA held a Safety Leadership Workshop Feb. 6 and a Foreman Leadership Training, Level 1, program Feb. 8 for foremen, superintendents and field managers. NRCA staff also

served as speakers for educational sessions and NRCA committee members moderated a roundtable discussion, “Industry Image and Outreach Roundtable 2024: There is More to Roofing Than the Roof.”

NRCA also conducted NRCA PRO-Certification performance exam demonstrations on the trade show floor. Industry professionals were able to see what a hands-on skills assessment looks like and speak with NRCA Qualified Assessors about the PROCertification process.

NRCA University’s Future Executives Institute—Class 10 and FEI—Class 11 met separately twice during the week to study leadership theory and develop management and communication skills. FEI-10 students completed their three-year program and graduated Feb. 7.

Benefiting ROOFPAC

ROOFPAC, NRCA’s political action committee, hosted industry professionals during “An Elegant Extravaganza on the Strip,” an NRCA/ROOFPAC fundraising event held in conjunction with National Women in Roofing at Eight Lounge Feb. 5. Attendees enjoyed a cocktail reception and live auction with opportunities to bid on vacations, artwork and more. The event raised \$46,500.

In addition, ROOFPAC held its annual silent auction Feb. 6-7. On Wednesday afternoon, participants enjoyed an open bar during the final two hours of the event while bidding on jewelry, vacations and electronics. The silent auction raised \$26,023.

NRCA appreciates the support of the sponsors who helped underwrite these successful ROOFPAC events. The funds raised will be used to support NRCA’s ongoing efforts to advocate for the roofing industry in Washington, D.C.

Student competition

The talent of future industry professionals was on display as five finalist teams of college students competed in the Roofing Alliance’s 10th annual



Attendees enjoy the live auction during ROOFPAC’s fundraising event.

Construction Management Student Competition. Student teams from the following schools were tasked with submitting a qualified bid package for a new roof system on the Formula 1 Paddock Building in Las Vegas:

- Auburn University, Auburn, Ala.
- Bradley University, Peoria, Ill.
- Colorado State University, Fort Collins
- Texas A&M University, College Station
- University of Florida, Gainesville

The team from University of Florida was selected as the first-place winner after the finalists completed oral presentations. The team received a trophy and a \$5,000 L.B. Conway scholarship for its school; teams members received individual awards.

The team from Colorado State University placed second and received a team trophy, a \$2,500 Fred Good scholarship for its school and individual awards. The teams from Auburn University and Bradley University



University of Florida’s team took first place in the student competition.

tied for third place in the competition and received team trophies, \$1,000 scholarships for their schools as well as individual awards.

In addition, Nick Hanson from University of Florida was named Best Individual Student Presenter, and John Falavolito from Texas A&M University received second-place Best Individual Student Presenter.

Industry awards

Several roofing professionals were honored during NRCA's Industry Awards and Celebration Wednesday evening. NRCA's 2024-25 slate of officers and directors was presented (see "NRCA's 2024-25 leadership"), as well as the industry's most prestigious awards: NRCA's J.A. Piper Award; NRCA's John Bradford Volunteer Award; NRCA's Gold Circle Awards; the CNA/NRCA Community Involvement Award; the Roofing Alliance's Most Valuable Player Awards; and NRCA's Charlie Raymond Award.

J.A. Piper Award

Jim Barr, president of Barr Roofing Co., Abilene, Texas, received NRCA's 77th annual J.A. Piper Award. Named for former NRCA president Joseph A. Piper, whose extraordinary efforts kept NRCA alive during the Great Depression, the J.A. Piper Award is the industry's most prestigious honor. The award is presented to an individual who has devoted constant, outstanding service to NRCA and the roofing industry.

In 1964, Barr's father established Barr Roofing, and three years later, Barr was working on roofs and in the sheet metal department during summer breaks from high school. He



Jim Barr, president of Barr Roofing, receives NRCA's J.A. Piper Award.

NRCA's 2024-25 leadership

NRCA announced its 2024-25 slate of officers and directors during NRCA's Industry Awards and Celebration Feb. 7 in Las Vegas. All 2024-25 officers and directors will assume their roles June 1.

Doug Duncan, president of Nations Roof of Illinois, Villa Park, was elected chairman of the board, and Alex Hernandez, president of Clark Roofing Co., Broadview, Ill., was elected chairman of the board-elect. Chad Collins, president of Bone Dry Roofing Co., Bogart, Ga.; David Hesse, executive vice president of Kalkreuth Roofing & Sheet Metal Inc., Wheeling, W.Va.; and Tim Stephens, vice president of operations at Architectural Sheet Metal Inc., Orlando, Fla., were elected vice chairmen for two-year terms. Tupac de la Cruz, operations director and partner for Roofing Solutions LLC, Prairieville, La., was elected vice chairman for a one-year term.

Additionally, the following were elected as new NRCA directors:

- Chris Bowman, president of Collins Roofing Inc., Lehi, Utah
- Michelle Boykin, chief operating officer of Rackley Roofing Co. Inc., Nashville, Tenn.
- Chad Cron, senior vice president and general counsel of Tecta America Corp., Rosemont, Ill.
- Susan DeGrassi, president and COO of Antis Roofing & Waterproofing, Irvine, Calif.
- Jeff Embow, vice president of client services for Grove Roofing Services, Buffalo, N.Y.
- Rudy Gutierrez, president and CEO of Shell Roofing Solutions, Chino, Calif.
- Dean Jagusch, president of Wagner Roofing Company, Hyattsville, Md.
- Michelle Lane, vice president of marketing, Elevate commercial roofing systems & lining, for Holcim Building Envelope, Nashville, Tenn.
- Dave Lawlor, national sales manager of roofing for Canada/Mexico for ROCKWOOL, Milton, Ontario, Canada
- Steve Little, head coach of KPost Roofing & Waterproofing, Dallas
- Geoff Mitchell, CEO of Mid-South Roof Systems, Forest Park, Ga.
- RJ Radobenko, CEO of Global Roofing Group, Phoenix
- Jason Tetterton, project manager for Curtis Construction Co., Kinston, N.C.
- John Yuko, president of GSM Roofing, Ephrata, Pa.

attended the University of Texas at Austin for a few years but then returned home and started working full time at his father's roofing company. In 1993, he became a minority shareholder in the business.

In 2001, he was elected president of the Midwest Roofing Contractors Association. After his presidential term, he remained an active volunteer and continued to serve as chairman of the organization's Technical and Research Committee for eight years, acting as MRCA's representative to NRCA's Technical Operations Committee.

In 2009, Barr was elected to NRCA's board of directors and served on NRCA's Technical Operations and Manual Update committees.

In 2011, MRCA honored Barr with the James Q. McCawley Award, which is presented annually to an individual in recognition for outstanding service to the roofing industry. In 2012, he was elected to NRCA's Executive Committee, where he served as a vice chairman from 2012-14. The Roofing Alliance also recruited Barr and elected him as secretary-treasurer while he served as NRCA's chairman of the board-elect and then NRCA's chairman of the board in 2017.

To help develop a qualified workforce, Barr oversaw efforts to produce a training program where field roofing workers can receive certificates of completion upon successful training in topic-specific areas; the first two modules launched under his leadership and eventu-

ally morphed into NRCA PROCertification.

Barr also has contributed to his community and had the idea to put on a Key City Rhythm and Blues Festival while helping a roofing customer who runs the local United Way in Abilene. It became the three-day Key City Rhythm and Blues Festival, which raised \$25,000 for United Way of Abilene. The next year, the festival grew and doubled its proceeds. Barr regularly helps numerous other local communities and even participated in a Dancing with the Abilene Stars, a local event where he and 11 dancers helped fundraise \$300,000 for Hendrick Home for Children.

John Bradford Volunteer Award

Hap Esbenshade, chairman and CEO of The Mountain Company, Vienna, W.Va.; Laurel Management Group, Vienna; and Tri-State/Service Roofing & Sheet Metal Company, Vienna, received the John Bradford Volunteer Award, which is presented to an individual who has consistently demonstrated outstanding acts of volunteerism.

A graduate of Duke University, Esbenshade has been actively involved with NRCA and the Roofing Alliance for more than 40 years, including serving on 25 committees and NRCA's board of directors. His company recently celebrated 100 years of service to communities in the mid-Atlantic, Midwest and southeastern U.S.

Esbenshade's company was one of the first contractors to join the Roofing Alliance and has contributed more financially to the Roofing Alliance than any other contractor member. In addition, it was his vision to create the Melvin Kruger Endowed Scholarship Fund, which has provided scholarships to 149 students totaling more than \$1 million.

Esbenshade's company has adopted the roofs of 11 Ronald McDonald Houses in the communities he serves through the Roofing Alliance's program, providing free labor to keep families in need safe and dry. He also serves on the board of Marietta College in Ohio; oversees the Spartan Kids Foundation, which provides extraordinary experiences to underserved and challenged kids; and has been president of his local Boys and Girls Club. He donated an auditorium to the business school at West Virginia University that is dedicated to his father, and two years ago, he was inducted into the West Virginia Business Hall of Fame.

The John Bradford Volunteer Award is named after John Bradford, who served as NRCA's president from 1982-83 and was a past president of the Midwest Roofing Contractors Association. He was instrumental in the development of the Montana Roofing Contractors Association, served on many boards throughout his roofing career and enjoyed civic involvements.

Gold Circle Awards

NRCA's 2024 Gold Circle Awards were presented to NRCA members for their significant contributions to the roofing industry.

The following companies received NRCA 2024 Gold Circle Awards:

- Innovative Solutions—Nations Roof—East, Yonkers, N.Y., for Lionsgate Studios



Hap Esbenshade, chairman and CEO of The Mountain Company, Laurel Management Group and Tri-State/Service Roofing & Sheet Metal Company, receives the John Bradford Volunteer Award.

- Outstanding Workmanship: Steep-slope—Huber + Associates, Lake City, Fla., for a private residence in Silver Lake, Ohio
 - Outstanding Workmanship: Low-slope—KPost Company, Dallas, for the American Airlines Center, Dallas
- Additionally, two companies were selected as honorable mentions:
- CFE Inc., Elmira, N.Y., for Arconic Cast House, Lancaster, Pa.
 - Renaissance Roofing Inc., Belvidere, Ill., for Tower Grove Park, St. Louis

CNA/NRCA Community Involvement Award

NRCA and CNA, Chicago, presented the CNA/NRCA Community Involvement Award to Turner Roofing Services, Broken Arrow, Okla., for its charitable efforts with Green Country Habitat for Humanity. The award honors charitable works performed by NRCA contractor members between Jan. 1, 2023, and Nov. 24, 2023.

Turner Roofing Services has supported Green Country Habitat for Humanity for more than 14 years by donating materials and labor for 25 roofs—including three in 2023—to help low-income communities and families in the greater Tulsa, Okla., and Joplin, Mo., areas. CNA awarded Turner Roofing Services with \$7,500 to be presented to Green Country Habitat for Humanity.

The second-place winner was Academy Roofing Inc., Aurora, Colo., for its charitable efforts with Mile High Behavioral Healthcare. Academy Roofing came together with other roofing companies to provide a complete reroof for the Mile High Behavioral Healthcare Family Preservation Center. The project was completed Aug. 7, 2023, with an estimated value of \$123,000 and helped the organization continue to provide essential mental health services to individuals in need. CNA awarded Academy Roofing with \$5,000 for its charity.

The third-place winner was Watkins Construction & Roofing, Ridgeland, Miss., for its work with First Ridgeland Baptist Church's Central Food Pantry. Watkins Construction & Roofing team members continuously volunteer at the Central Food Pantry in Ridgeland, where they unload trucks, separate produce, pack boxes and more. Since Watkins Construction & Roofing started volunteering, the number of families the food pantry feeds has grown from 80 to 150. CNA awarded Watkins Construction & Roofing with \$2,500 for its charity.

MVP Awards

The Roofing Alliance announced the winners of its 24th annual MVP Awards during the ceremony. The awards recognize outstanding roofing workers who achieve work-related and personal goals to which others aspire. Award winners are chosen by a panel of roofing industry representatives.

The winner in the outstanding community involvement category was Daniel Gochenauer, foreman for GSM Roofing, Ephrata, Pa.

The winner in the outstanding performance and leadership category was Obed Hernandez, foreman for Wagner Roofing Company, Hyattsville, Md.

The Best of the Best Award winner also was announced. Luis Villalta, field worker for Antis Roofing and Waterproofing, Irvine, Calif., won the Best of the Best Award. Villalta won the award for his extraordinary contributions to the roofing industry. The Best of the Best Award is sponsored by *Professional Roofing* and OMG Roofing Products Inc., Agawam, Mass.



Luis Villalta (center), field worker for Antis Roofing and Waterproofing, wins the Best of the Best Award.

Charlie Raymond Award

NRCA presented the Charlie Raymond Award, its prestigious membership recruitment award, to GAF, Parsippany, N.J. Named for former NRCA president and J.A. Piper Award winner Charlie Raymond, the award honors members for their efforts to recruit new members into NRCA.

On to Texas

Following this year's success, it is never too early to plan for next year's annual convention and IRE scheduled for Feb. 19-21 in San Antonio. You won't want to miss it! 📍🌟

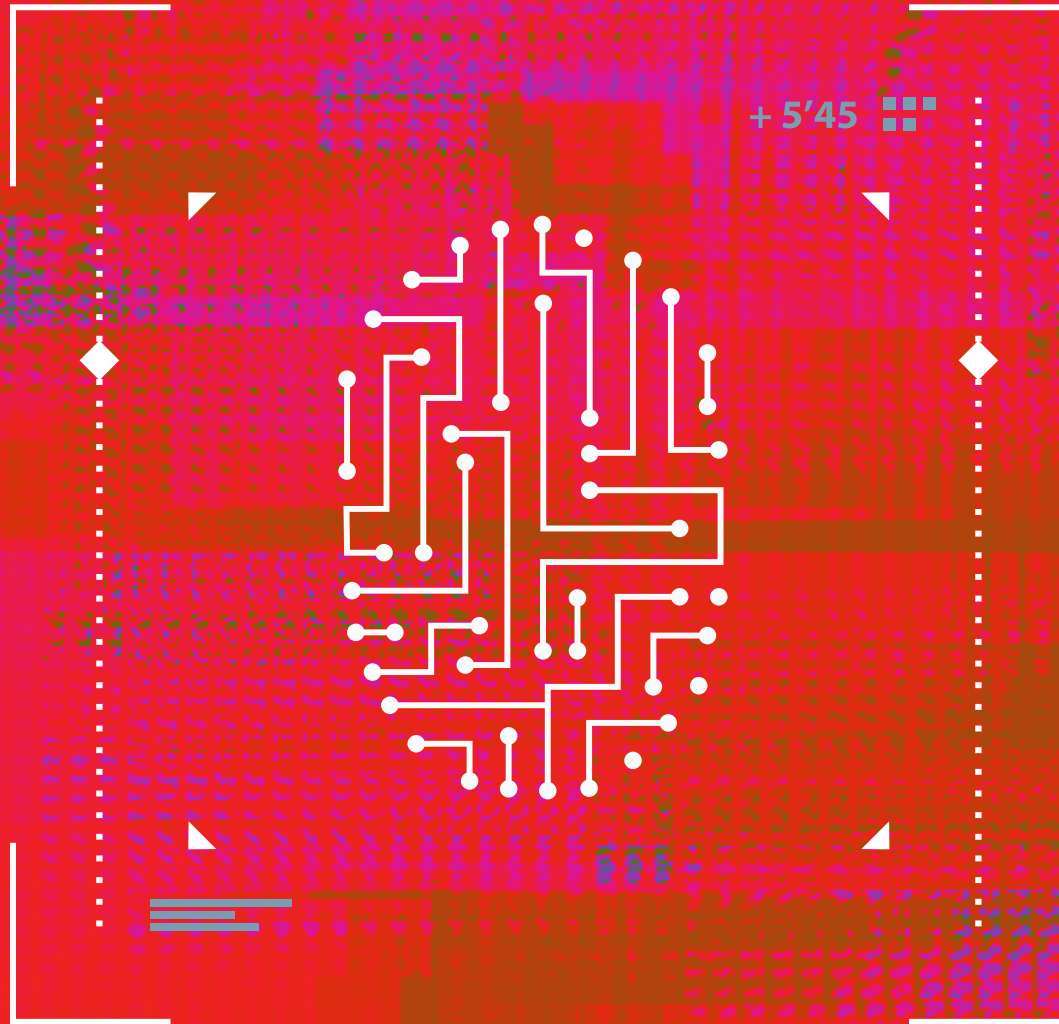
AVERY TIMMONS is *Professional Roofing's* editorial assistant.



To view a gallery of convention and IRE photos and a list of NRCA University's Future Executives Institute-Class 10 graduates, go to professionalroofing.net.



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MANUFACTURER NEWS

GAF donates to local organizations

Employees of the Valdosta, Ga., branch of **GAF**, Parsippany, N.J., recently participated in a company community day where they met with 13 nonprofit organizations, including the Greater Valdosta United Way, Habitat for Humanity of Valdosta and Second Harvest of South Georgia. GAF employees learned about each organization's mission and how the company could support them. Employees then revisited the organizations and presented donations to support them and their outreach throughout the community.

"We're very proud of the community where we live and work," says Daniel Duston, GAF Valdosta's plant manager. "GAF is dedicated to continuing to support the city and its residents in meaningful ways as it becomes a member of the Valdosta community."

GAF is supporting the Valdosta area and its residents through GAF Community Matters, its social impact initiative focused on making a positive difference as partners in the community by leveraging roofing expertise, resources and products to help build resilient communities.



TAMKO Building Products receives award

TAMKO Building Products, Galena, Kan., has announced its Titan XT® shingle has been named 2024 Product of the Year in the Home Protection category by Product of the Year USA. Product of the Year award winners are determined by consumer votes.

"We are thrilled Titan XT shingles have been crowned Product of the Year," says Alex Hines, vice president of sales and marketing for TAMKO Building Products. "We extend our gratitude to consumers for embracing Titan XT shingles. This recognition fuels our dedication to delivering superior quality products."



EagleView partners with Renoworks Software

EagleView, Bellevue, Wash., has partnered with Renoworks Software Inc., Calgary, Alberta, Canada, to create Renoworks Pro, a solution combining Renoworks Software's instant and interactive 3D home visualization with EagleView's Full House precise measurements.

The solution enables the measurement and visualization of remote projects; improves close rates and the homeowner customer experience; and removes the need to visit the job site.

"Our technologies empower contractors to design and estimate with precision. This combination can help contractors better illustrate potential projects to drive better customer engagement and improve sales effectiveness," says Piers Dormeyer, Eagleview's CEO.

Renoworks Pro is currently available to contractors from both EagleView and Renoworks. More information is available at eagleview.com/product/visualizer.



Holcim Building Envelope introduces new brand

Holcim Building Envelope, Nashville, Tenn., has announced Enverge®, a sustainability-focused spray foam insulation brand that aims to create more energy-efficient buildings and healthier living environments. Enverge unites two spray foam brands, Gaco™ SprayFoam and SES™ Foam.

"We are proud to continue the legacy of excellence of Gaco SprayFoam and SES Foam under the Enverge brand name," says Jamie Gentoso, president of Holcim Building Envelope and global head of Holcim Solutions & Products. "Alongside the portfolio of Holcim Building Envelope brands, Enverge provides high-performance insulating solutions to support Holcim Building Envelope's mission of building progress for people and the planet."

More information is available at envergesprayfoam.com.

DISTRIBUTOR NEWS

Beacon Building Products announces acquisition

Beacon Building Products, Herndon, Va., has announced its acquisition of Roofers Supply of Greenville, Greenville, S.C.

“This acquisition grows our service geography and design services in the Carolinas, particularly for commercial roofers,” says Munroe Best, Beacon Building Products’ south division president. “The Roofers Supply of Greenville team delivers unparalleled technical knowledge, product range and service reliability. We will leverage this foundation to drive above market growth for our customers.”

ABC Supply opens new location

ABC Supply Co. Inc., Beloit, Wis., has opened a new branch in Phoenix; the branch is the company’s second location in Phoenix and 15th location in Arizona. ABC Supply operates more than 600 locations in the U.S.

OTHER NEWS

RoofersCoffeeShop® develops learning track in Spanish

RoofersCoffeeShop, Sisters, Ore., has expanded its educational series, Lunch & Learn, to include a Spanish-language track, developed in partnership with Para Latinos, a program by SRS Distribution, Madison, Wis. The series was created to help with continuing education to build Latino roofing businesses by offering training for individuals and teams and teaching relationship building using technology and networking tools.

The first three episodes are available online at rooferscoffeeshop.com/espanol-lunch-and-learn. Each 30-minute video contains a learning guide and objectives. Upon completion, individuals can take a short quiz to earn a certificate of completion.

Additionally, RoofersCoffeeShop has announced its 2024 Roofers CoffeeShop Influencers. Each month, the influencers respond to a current topic in their industries, and information is shared through articles, interviews and videos.

A full list of the 2024 Roofers CoffeeShop Influencers is available at rooferscoffeeshop.com/meet-rs-influencers.

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MCA announces award winners

The **Metal Construction Association** has presented its annual Larry A. Swaney Award to Tom Seitz, former director of strategic accounts for 3A Composites Americas. The Larry A. Swaney Award recognizes an industry professional for his or her contributions to the association's success and the betterment of the metal construction industry.



Seitz

Seitz served as an MCA board member from 2016 to 2020, and in January 2020, became the executive director of the Metal Composite Material Alliance.

"Seitz's impact on the industry was already tremendous when he retired," says Brian Partyka, MCA chair. "His decision to continue to work to accelerate the MCM panel system has been a gift to the industry."

Additionally, MCA has presented its first Lifetime Achievement Award to Dick Bus, president of ATAS International. The Lifetime Achievement Award was created to recognize the recipient's lifetime accomplishments and contributions to the association and metal construction industry.



Bus

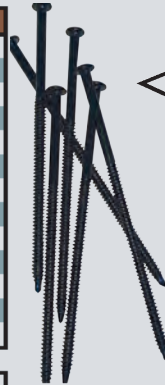
Bus served on MCA's board for 18 years, including as vice chair from 2000 to 2006 and chair from 2007 to 2009. He was also inducted into the Metal Roofing Hall of Fame in 2013 and was a recipient of the 2017 MCA Triumph Award.

"Bus persuaded the entire metal construction industry to work as allies and forge bonds," Partyka says. "Working in the spirit of cooperation has allowed us all to accomplish more for ourselves, our companies and our industry. We are all lucky to have him as a leader."

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#12	2"	1000	\$56.23
#12	2-1/4"	1000	\$62.39
#12	2-7/8"	1000	\$76.78
#12	3"	1000	\$79.58
#12	3-1/4"	1000	\$88.85
#12	3-3/4"	1000	\$101.06
#12	4"	1000	\$103.86
#12	4-1/2"	1000	\$119.34
#12	5"	1000	\$124.12
#12	6"	1000	\$153.37
#12	7"	1000	\$228.21
#12	8"	1000	\$260.98

#15	1-1/4"	1000	\$56.66
#15	2"	1000	\$71.51
#15	3"	1000	\$102.22
#15	4"	1000	\$148.73
#15	5"	500	\$92.37
#15	6"	500	\$117.00
#15	7"	500	\$135.70
#15	8"	500	\$153.41
#15	9"	500	\$186.49
#15	10"	500	\$224.10
#15	11"	500	\$277.69
#15	12"	500	\$303.34
#15	14"	500	\$377.90
#15	16"	250	\$193.72
#15	18"	250	\$263.34
#15	20"	250	\$314.93
#15	22"	125	\$196.10
#15	24"	125	\$235.03

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Insulation Plate	3" WW	1000	\$99.99
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Non-Barbed Seam Plate	2"	1000	\$84.99



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“The best part of having NRCA PROCertified® installers is instilling pride in crew members while inspiring others who want to participate. It reinforces the skill level for quality workmanship and expertise.”

David Crowther, president of CFS Roofing Services, Fort Myers, Fla.

Kansas Roofing Association elects board of directors

The **Kansas Roofing Association** has elected new officers and directors.

Officers elected to serve two-year terms include:

- President: Allyn Weddle, president of NRCA member Weddle & Sons Inc., Manhattan, Kan.
- Vice president: Curtis Hunt, territory manager for NRCA member GAF, Overland Park, Kan.
- Secretary/treasurer: Nathan Bryson, sales consultant at Division 7 Sales, Leawood, Kan.
- Chairman of the board: Ron Boone, managing member of NRCA member Boone Brothers Roofing, Olathe, Kan.

Directors elected to serve three-year terms include:

- Aaron Douglass, vice president of Douglass Roofing, Garden City, Kan.
- Karl Earnest, sales representative at NRCA member Malarkey Roofing Products, Topeka, Kan.
- Eric Howell, area manager at Gaco, Osawatomie, Kan.
- Wade Leachner, vice president of Great Plains Roofing & Sheet Metal, Kansas City, Kan.
- Blake Roberts, senior vice president of Weddle & Sons Inc., Olathe, Kan.

THE INDUSTRY ONLINE

Westlake Royal Building Products™ has launched its **Material List Generator**, an online tool aimed at simplifying the estimating process for Unified Steel Stone Coated Roofing and Westlake Royal Roofing Components. Users can insert project information and roof measurements into the generator to obtain a material list and quantities needed. The Material List Generator is available at westlakeroyalroofing.com/mlg.

UP THE LADDER

Holcim Building Envelope's Elevate™ brand has named **Frank Palmer** senior vice president of sales.

Mule-Hide Products Co. Inc. has named **James Julian** territory manager for the Arkansas/Louisiana/Missouri territory.

EVENTS

APRIL

3-4

Fall-protection Trainer Course for Roofing

NRCA
Elgin, Ill.
Contact: Rich Trewyn, NRCA's director of enterprise risk management
(847) 493-7575 or rtrewyn@nrca.net
nrca.net

16-17

Roofing Day in D.C. 2024

NRCA
Washington, D.C.
Contact: NRCA's Washington, D.C., office
(800) 338-5765
nrca.net/advocacy/roofingday

18

CERTA Train-the-trainer

NRCA
Elgin, Ill.
Contact: NRCA's Customer Service Department
(866) ASK-NRCA (275-6722) or info@nrca.net
nrca.net

25

The Roofing Alliance Member Meeting

The Roofing Alliance
St. Pete Beach, Fla.
Contact: The Roofing Alliance
roofingalliance@nrca.net
roofingalliance.net

26

CERTA Train-the-trainer

NRCA
Charlotte, N.C.
Contact: NRCA's Customer Service Department
(866) ASK-NRCA (275-6722) or info@nrca.net
nrca.net

MAY

22

Virtual CERTA Train-the-trainer

NRCA
Online
Contact: NRCA's Customer Service Department
(866) ASK-NRCA (275-6722) or info@nrca.net
nrca.net

JUNE

5-7

FRSA's 102nd Annual Convention and the Florida Roofing & Sheet Metal Expo

Florida Roofing and Sheet Metal Contractors Association
Kissimmee, Fla.
Contact: FRSA
(407) 671-3772
floridarroof.com

19

Virtual CERTA Train-the-trainer

NRCA
Online
Contact: NRCA's Customer Service Department
(866) ASK-NRCA (275-6722) or info@nrca.net
nrca.net

26-30

2024 Carolinas Roofing Expo & Annual Meeting

Carolinas Roofing and Sheet Metal Contractors Association
Myrtle Beach, S.C.
Contact: CRSMCA
(704) 556-1228
crsmca.org

NRCA NEW MEMBERS

ARCHITECTS/ENGINEERS/ CONSULTANTS

CCCM, Savage, Minn.
De Haan Associates Construction Consulting Inc., Alameda, Calif.
Hurst-Rosche Inc., Marion, Ill.
MTD and Associates LLC, Baltimore
Pacific Construction Analysts Inc., Temecula, Calif.
PHR Contracting LLC, Clinton, Ind.
RCI Engineering Inc., Lake Jackson, Texas
Sense Engineering, Markham, Ontario, Canada
Shepherd Consulting Services, Torrance, Calif.

CONTRACTORS

1 Valley 2 Peaks, Cortez, Colo.
1st Choice Roofing Co., Cleveland
2nd to None Construction LLC, Kingman, Ariz.
911 Roofing Solutions, Cheyenne, Wyo.
ABBA Construction, Wichita, Kan.
ABC Roofing, Fairmont, W.Va.
All Weather Exteriors LLC, Copperas Cove, Texas
Anchor Point Roofing, Chicago
Architectural Metals Inc., Portland, Mich.
Arkansas Roofing Kompany, Conway, Ariz.
AZ Home Technologies, Yuma, Ariz.
Bumble Roofing, Canoga Park, Calif.
C&E Wurzer Construction, Chippewa Falls, Wis.
Cabezon Roofing LLC, Placitas, N.M.
CanTex Roofing & Construction, Idalou, Texas
Carter Exteriors, Rochester, N.Y.
Cedar Valley Exteriors, Dayton, Minn.
Clark Roofing Inc., Sacramento
Colorado Construction and Restoration Inc., Highlands Ranch, Colo.
Connell's Custom Exteriors Inc., Hastings, Minn.

Elite Roofing and Restoration, Wimberley, Texas
Encore Metal Roofing & Construction, South Tamworth, N.H.
Epic Roofing and Exterior Upgrades, Burbank, Calif.
Esh Builders, Elizabethville, Pa.
Fahey Roofing and Contracting LLC, South Point, Ohio
Forte Roofing, Boynton Beach, Fla.
GOAT Roofing & Construction, El Paso, Texas
Green Ladder Roofing, Pasadena, Calif.
Heintzelman Construction Roofing LLC, Oklahoma City
Hudson Roofing and Repairs LLC, Ruffin, S.C.
Integrity Roofing and Painting LLC, Colorado Springs, Colo.
JAM General Contractors, Sumiton, Ala.
JVP Construction Group Inc., Miami, Fla.
KMC Construction Inc. d.b.a. Vermont Construction Co., Colchester, Vt.
KSG Roofing, Quincy, Ill.
Lee Hoffman Roofing Inc., Tucson, Ariz.
Len Roofing, Northbrook, Ill.
Mars Restoration, Clinton, Md.
Max Roofing Corp., Addison, Ill.
Menards Roofing LLC, Westminster, Colo.
Mountain Roofing, Butte, Mont.
Naranjo Siding LLC, Mendham, N.J.
Perry Clark Roofing LLC, Morgan, Utah
Pickle Roofing Solutions, Allen, Texas
Precision Roofing of Lake County Inc., Beach Park, Ill.
Progressive Roofing Inc., Buffalo, N.Y.
Purépecha Home LLC, Brooks, Ky.
Rebuild, Indianapolis
Regio Contractors Management Corp., Peoria, Ill.
River City Pros LLC, Byhalia, Miss.

ROAM Roof & Solar, Belton, Texas
Romans 1:16 Roofing LLC, Bay Minette, Ala.
Skybird Roofing, New Port Richey, Fla.
South Crescent Construction, Lexington, S.C.
Texas Signature Roofing, Navasota, Texas
Tom and Jerrys Roofing LLC, Woodstock, Ga.
Top Service Renovations LLC, Austin, Texas
Troa Construction Group, Boeme, Texas
United Thermal Systems, Niagara Falls, N.Y.
WeatherPro Exteriors Inc., West Allis, Wis.
Your Choice Roofing LLC, Tomah, Wis.

DISTRIBUTORS

Global Decking Systems, Blaine, Wash.
Olmeck LLC, Brooklyn, N.Y.
Tri-State Metals, Elmsford, N.Y.

MANUFACTURERS/MANUFACTURER REPRESENTATIVES

Delta Rep. Group, Saint Petersburg, Fla.
LAMILUX, Wakefield, Mass.
Tubos Inc., Largo, Fla.
WeatherLok Metal Roofing, Gildford, Mont.

MEMBER BRANCHES

Bumble Roofing of Greater Philadelphia, Newton Square, Pa.
LD Tebben Co. Inc., Austin, Texas

SERVICE PROVIDERS

Geospan Corp., Maple Grove, Minn.
Grant Cardone Enterprises, Aventura, Fla.
Insurance Office of America, Satellite Beach, Fla.



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WHAT IS YOUR POSITION WITHIN YOUR COMPANY? I am president and CEO of Horch Roofing, Warren, Maine.

WHAT IS THE MOST UNUSUAL ROOFING PROJECT OF WHICH YOU HAVE BEEN A PART? Horch Roofing was awarded the contract to roof the governor's mansion for the state of Maine. It was amazing to be part of such a historical project.

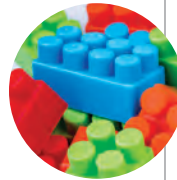
WHY DID YOU BECOME INVOLVED IN THE ROOFING INDUSTRY? By accident!

I worked for a contractor who put me on a roof because he didn't like it, and I found out I loved it. I then went to work for a roofing contractor full time and started my own business soon thereafter. I realized what an important role roofing workers have in the infrastructure of our communities; I've been in love with roofing ever since.



WHAT WAS YOUR FIRST JOB? Mowing lawns

WHAT IS YOUR FAVORITE STRESS RELIEVER? Putting together a difficult Lego set



WHAT WAS YOUR FIRST ROOFING EXPERIENCE? The earliest memories of roofing for me are feeling unsafe and scared. There were ladders tied together, no harnesses and risks. I'm glad we do things differently now to protect workers from the dangers of our trade.

WHAT IS YOUR ROOFING INDUSTRY INVOLVEMENT? I am on NRCA's board of directors; I am chairperson for the NRCA Membership Steering Committee; and I serve on the NRCA University Operations, Residential Contractor and Sustainability committees. I am a judge for the Roofing Alliance's Most Valuable Player Awards and NRCA's Gold Circle Awards. I also am on the board of directors for The Ronald McDonald House Charities of Maine; Horch Roofing ensures these houses receive free or discounted roofing services.



IF YOU COULD TRAVEL ANYWHERE IN THE WORLD, WHERE WOULD YOU GO? WHY? Norway, Sweden or Denmark in the summer: There is so much daylight!

WHAT SONG ARE YOU LISTENING TO OVER AND OVER? "Forty Six & 2" by Tool

WHAT QUALITY DO YOU MOST ADMIRE IN A PERSON? Integrity

WHAT IS YOUR FAVORITE FOOD? Pasta, pizza, bread—pretty much any Italian food.

WHEN YOU WERE A CHILD, WHAT DID YOU WANT TO BE WHEN YOU GREW UP? A football player

MY FAVORITE PART ABOUT WORKING IN THE ROOFING INDUSTRY IS ... The people! There are so many generous, smart, funny and hard-working people in the roofing industry. It's an amazing trade to be part of.

WHAT'S YOUR FAVORITE ROOFING MATERIAL TO WORK WITH? WHY? Asphalt shingles: I started my business in steep-slope asphalt roofing and it's still my favorite.

WHAT'S THE MOST EXCITING/ADVENTUROUS THING YOU'VE DONE? Skydiving in Aruba

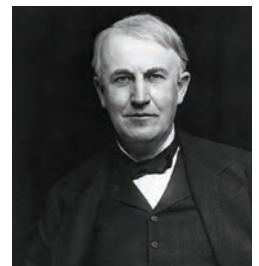


WHAT DO YOU CONSIDER YOUR MOST REWARDING EXPERIENCE? Traveling to Biloxi, Miss., after Hurricane Katrina to do volunteer roofing work.

WHAT IS THE MOST HIGH-TECH ITEM IN YOUR HOUSE? I think we all have so many high-tech items in our homes now. We have smart TVs, Roombas, Alexas, and on and on.

PEOPLE WOULD BE SURPRISED TO KNOW ... I don't eat breakfast or any breakfast-related foods after 9 a.m.

IF YOU COULD MEET ANY HISTORICAL FIGURE, WHOM WOULD YOU MEET? WHY? Thomas Edison. I am fascinated by how things work, why they work and why they don't work.





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