

# **COURSE DESCRIPTIONS & CREDITS**

## Dec 2, 2024

## **TRS 111 Understanding MCM Systems**

Presenter: Howard Black, Megan Davis, and Vanessa Hensley Credit Type: 1.0 AIA LU|HSW

Dive into the world of Metal Composite Material (MCM) systems. This course covers the essential and advanced aspects of MCM systems, emphasizing the significance of rain screens and their qualifications. Participants will gain a thorough understanding of what constitutes a rain screen, the various types of MCMs, such as ACM, and the critical role manufacturer specifications play in system performance. The course will explore the fabrication process, highlighting the importance of color flexibility and the necessity of fabricators with installer training programs. Discover the numerous advantages MCMs offer over Insulated Metal Panels (IMPs), including cost-effectiveness, aesthetic appeal, and installation considerations. Learn about essential testing and performance criteria, including NFPA 285, Miami-Dade testing, and LEED standards, ensuring you are equipped with the knowledge to evaluate MCM systems effectively.

Dec 3, 2024 TRS 091 Fire Stopping: History, Systems, and Technology Presenter: TBD Credit: 1.0 AIA LU|HSW

This course delves into the vital role of firestopping in enhancing building safety and saving lives. Participants will explore the history and importance of firestopping and examine the latest technologies available. The course offers a comprehensive review of the system approach and testing, including an indepth look at NFPA 285, system numbering, and classifications. Learners will gain insights into materials and testing crucial for successful projects and understand firestopping's significance through key statistics. Additionally, the course highlights common products used in fire-resistive and fire propagation assemblies, ensuring participants leave with the knowledge to provide peace of mind to building occupants.

## Dec 4, 2024 TRS 098 Buried Waterproofing: What Constructors Need to Know

Presenter: Wes Hensley Credit Type: 1.0 AIA LU

This course provides a comprehensive look at the nuts and bolts of waterproofing a broad variety of buried conditions including the backfilled wall, blindside wall, beneath-slab, and between-slab with a variety of membranes including cold-applied rubberized asphalt, hot-applied rubberized asphalt, liquid-applied polyurethane, and bentonite-composite sheets. Great time and emphasis are placed upon attention that needs to be given toward minimizing risks. Installation cost variables are presented along with plus-and-minus considerations of the membrane types covered toward making informed waterproofing system selections.

## Dec 5, 2024

TRM049 (2022) The Importance of Baseline IAQ and Clean Air Distribution Systems for Healthy Buildings and Ventilation Presenter: TBD Credit: 1.0 AIA LU|HSW

Through proper diagnostics, a baseline understanding of the condition and performance of a mechanical and air distribution system can be established. From this baseline, an informed plan can be developed to clean, restore, and maintain the HVAC system to supply healthy, pathogen-free indoor air quality.

## Dec 6, 2024 TRS 074 (2023) The Fundamentals of Hybrid Sealant Technology Presenters: Adam Milter Credit Type: 1.0 AIA LU|HSW

For many years, the commercial building industry has relied on urethanes, solvent-based silicones, and acrylics as their primary sealants. Although these products generally perform as anticipated, they have significant drawbacks including staining, bubbling, shrinkage, and limited UV resistance. Recognizing these limitations, a new technology has emerged that combines the best properties of silicones and urethanes - the "hybrid" sealants. This course will explore hybrid sealant technology to understand how it differentiates from other types such as compressed sealants, traditional sealants, self-leveling, and gland sealant systems. Participants will learn about the diverse industrial and commercial applications of hybrid sealant technology and acquire knowledge of efficient installation methods and detailed engineering aspects for optimal results.

#### Dec 9, 2024

#### **TRS 108 Mitigating Traffic Coating Failures**

Presenters: Steve Grala and Erin Dobies Credit Type: 1.0 AIA LU

Traffic coatings, serving as the first line of defense against high-volume pedestrian traffic, vehicular contact, and environmental elements, play a crucial role in extending the lifespan of surfaces. They add durability, create chemical resistance, and significantly contribute to the strength and functionality of concrete surfaces. Despite their resilience, traffic coatings can and do fail. This course will delve into the common causes of these failures, highlighting the key factors that can compromise the integrity and longevity of these protective layers. Participants will examine how improper substrate installation, inadequate surface preparation, and environmental factors contribute to coating failures.

Dec 10, 2024 TRS 112 Facade Restoration Options: Good, Better, Best Presenter: Marcy Tyler Credit Type: 1 AIA LU|HSW

This course provides an in-depth exploration of key facade restoration techniques and their applications. Participants will learn the importance of selecting appropriate methods for different building types, focusing on factors such as durability, aesthetic appeal, and cost-effectiveness. The course is tailored for architects and building professionals aiming to broaden their expertise in facade restoration, equipping them with the knowledge to make informed, strategic decisions that enhance project outcomes.

Dec 11, 2024 TRS 109 Restoring Glazing System Performance and Enhancing Aesthetics Presenter: Jeff McGovern Credit: 1.0 AIA LU|HSW

As the world of architecture has evolved to reflect economic, environmental, and regulatory commitments while improving living and working spaces, it has become crucial that we address the performances of glazing facades on aging buildings. For those embracing modern sustainability while adhering to the latest regulations in doing so, this course looks at evaluation through restoration of glazing façade performances using numerous case studies to illustrate solutions to varied challenges as well as aesthetic enhancements that can be achieved. This course covers essentials like gasket replacement and wet sealing before delving into the use of innovative silicone rubber boots and overlay techniques. It continues into specialized areas such as revitalizing lock-strip systems and restoring performance to historical steel windows, moving them from traditional putty to advanced glazing mediums like tape, silicone extrusions and sealants to maintain their classic beauty while boosting durability with enhanced visual appeal and superior weather protection.

## Dec 12, 2024 TRS 113 Impact Testing and Natural Disasters: Building Resilience Presenter: Marcy Tyler Credit: 1.0 AIA LUIHSW

This course delves into the critical role of impact testing in evaluating the durability and performance of building materials during natural disasters, including hurricanes, earthquakes, and floods. Participants will explore how rigorous testing standards help architects and construction professionals design structures that stand resilient against extreme weather conditions. The course will cover essential learning outcomes, such as understanding the various testing standards, assessing material performance under stress, and applying best practices in resilient design to enhance building safety and longevity. This course is ideal for architects and construction professionals committed to advancing their knowledge in creating disaster-resistant structures.

Dec 13, 2024 TRS 099 The Deep Energy Retrofit Initiative: The ABCs of D.E.R. Presenter: Chuck Bundrick Credit: 1.0 AIA LU

For facility managers, building owners, and contractors alike, adapting existing buildings to be more energy-efficient may seem like a daunting task. The Deep Energy Retrofit (DER) initiative is expanding across North America as a holistic building analysis and construction process to conserve the energy consumed by commercial and residential buildings. While the industry tackles this next wave of construction innovation, the learning curve remains steep. Therefore, everyone must take on the task of learning about individual building inefficiencies and how they can be rectified. Join us for this informative presentation where we not only take you through the process that is needed but also look at case studies where lessons have been learned and energy-efficient improvements have been made.

Dec 16, 2024 TRS 102 The Critical Roof-to-Wall Connection Simplified Presenter: Tyler Cuckovich Credit: 1.0 AIA LU/HSW

A strong connection between the roof and wall is critical for building enclosure integrity, energy efficiency, and durability. This course will examine an innovative approach to the roof to wall connection utilizing a simplified parapet cap. Construction of these is generally fabricated in the field with wood that can warp, twist, and make this connection tricky. This course will explore a prefabricated option featuring high-strength material for a stable and sustainable parapet cap solution that can be used on any type of wall structure. This Engineered Framing System provides a plethora of installation benefits for commercial construction.

## Dec 17, 2024 NUD 0713 Dispelling the Myths of Insulated Concrete Forms Presenter: Andy Horgan Credits: 1.0 AIA LU/HSW

This course is designed to clarify common misconceptions surrounding the use of ICF in construction. Participants will explore prevalent myths regarding cost, complexity, and performance while gaining a deeper understanding of the substantial benefits ICF offers. The course will highlight how ICF contributes to superior energy efficiency, enhanced durability, and remarkable design flexibility, making it a valuable option for modern construction projects.

Through this course, architects, builders, and construction managers will learn about the practical applications and advantages of ICF, equipping them with the insights necessary to make informed decisions in their projects. By dispelling these myths, the course aims to empower industry professionals to leverage ICF for innovative and sustainable building solutions.