

77th Annual Surveyors' Institute

Registration Resource Guide

Wednesday, January 21, 2026

9:30 - 10:10 a.m. (0.8 PDH)

Opening Keynote: Artificial Intelligence: The Next Utility?

Speaker: Bryn Fosburgh

Artificial Intelligence. AI is no longer just a set of specialized tools—it is rapidly becoming an always-available resource embedded in mapping, autonomy, agriculture, construction, natural resource management, and countless workflows. In many ways, AI is following the same trajectory GPS did decades ago. AI is on the path to becoming the world's next utility. If GPS transformed how we navigate and measure the physical world, AI is transforming how we navigate information, choices, and complex systems.

10:20 a.m. – noon (1.8 PDH)

Session 1: Professional Ethics

Speaker: Todd Horton

Professional ethics are founded on core values. Come explore the core values and personal virtues promoted in the NSPS Surveyors Creed. Join us for a unique and refreshing view of professional growth in service of the American citizen.

Session 2: I'd Like to Hire You to Divide My Land - How Soon Can I Have the Survey?

Speaker: Renee Powers

A "Back to Basics" discussion on land division requirements that should be considered before accepting a job. These considerations may affect the cost of the survey and could even determine if you accept the job at all.

Session 3: ALTA 101 for the Technician**Speaker:** Jim Sehloff

ALTA/NSPS Surveys What are they? Where do the requirements come? What does it mean for you as the field personnel? There are many questions that we as project managers assume you may know when we send you out on an ALTA survey. When all team members have an understanding of the requirements the whole team succeeds. My goal is to give the technician a better understanding of the survey requirements so they can get what is needed in the field on the first trip.

Session 4: Big City! Lot and Block Surveying 101**Speaker:** Kevin Slottke

This session will cover surveying in the "City". Typically lots and blocks, we'll talk about some history, review basic procedures and look at the use of technology in surveying "ancient" plats.

Session 5: Applying the New Law that Revived Access Easements**Speaker:** Duane Wunsch

Until recently, access easements were time-barred either 40 years or 60 years after the easement's recordation. Effective March 13, 2022, a new law, Act 174 extended the time period by reviving easements recorded after January 1, 1960. The new law also revived easements recorded prior to January 1, 1960, if the easement was "apparent from or can be provided from physical evidence of its use at such time when a person acquired the real state subject to the easement." The new law replaced a readily ascertainable 40-year standard with a new standard that imagines what physical evidence of an easement former purchasers, most of whom are deceased, observed at the time of their purchase many years ago. When the surface of land is not disturbed, grasses and pioneer trees tend to take root quickly. The new law is retroactive. Does the new law require a heightened level of awareness of remote easements?

Session 6: Young Surveyor's Meeting**Speakers:** Devin Bailey, Zach Holshuer, and Connor Christopherson

1:30-3:10 p.m. (2.0 PDH)

Session 7: Understanding FEMA compliance for successful development in Flood Zones

Speaker: Karol Grove

This class provides an in-depth overview of the new FEMA Flood Insurance Rate Maps (FIRMs) and updated FEMA flood zone designations. Participants will learn when and how to file a Letter of Map Amendment (LOMA), with guidance on considerations before construction versus after construction. The course also covers critical concepts related to building in flood zones, including strategies for elevating structures—whether by raising the building itself or by modifying the land. In addition, we will review the Letter of Map Revision Based on Fill (LOMR-F) process, outlining requirements, procedures, and best practices.

Session 8: Discontinuance of Public Highways & Properties

Speaker: Lee Turonie

Public highways and other properties may be discontinued as public dedications. Learn about: the different methods to do so; what is required to get it done; where the property goes afterwards; and challenges associated with the completion of the task. A comprehensive overview with lessons learned and time for question and answer. Discontinuance of Public Highways & Properties is a regular occurrence, should be relatively simple although it takes time to accomplish, but sometimes is not so simple.

Session 9: Processes and Procedures and how they differ between Counties and Municipalities

Speakers: Cheryl Berken and panel members

To give an overview of the CSM review processes and how the process differs from County and Municipal review. We will also give an update on Judicial Security.

Session 10: Surveying: Devices to Decisions

Speaker: Bryn Fosburgh

From knotted ropes stretched along the Nile to real-time digital twins in cloud platforms, the evolution of surveying and construction has followed a remarkable trajectory, one that mirrors humanity's pursuit of precision and progress. The continuum from early measurement devices to intelligent digital ecosystems, tracing how instruments, data, and computation have evolved to shape decision-making in surveying and construction.

Session 11: Errors, Accuracy and Precision - Part 1**Speaker:** Todd Horton

Solid risk management strategy demands that field personnel understand measurement errors, their sources, and proven mitigation methods. Detecting our own problems is significantly less costly than letting others find them for us. Join us to understand the differences between accuracy and precision. Investigate error sources in the most common surveying methods and how those errors accumulate. Learn to understand those magic numbers on the data collector. Explore proven methods to manage measurement error. Choose the best tool for the task to minimize risk.

Session 12: Vendor Session - SurvPC, with Q&A**3:30-4:30 p.m. (1.2 PDH)****Session 13: How Relocation, Survey and Plats Work Together****Speaker:** Tracey Johnsrud

Surveys identify accurate property lines and show us how relocation will impact a parcel (FEE, TLE, easements and access). That information allows us to identify if there is a relocation and/or personal property realignment that will need to be addressed on the project. That information allows relocation to complete a Conceptual Relocation Plan (CRP) early in the process which is needed by the environmental department and allows us to put a relocation budget together for the finance department.

Session 14: TIF and TID**Speaker:** Art Bahr

The Basics of TID and TIF, and How are Those Boundary Maps Made?

Discuss the basics of Tax Increment Districts and Tax Increment Financing. How do we choose the type of TID, the parcels to include in the TID, the projects to include, the possibilities of incentives, and most of all how do we map out the boundaries.

Session 15: Building a Personal Legacy Through Philanthropy**Speaker:** Howard Herrild

Move beyond simple donations and discover how to build a lasting, personal legacy that aligns with your core values. This session will guide you through strategically integrating your giving goals with your financial and estate planning, ensuring your impact endures. We'll explore effective ways to involve the next generation and identify innovative, long-term solutions to social challenges. Join us to craft a philanthropic journey that is deeply meaningful and maximizes your influence.

Session 16: The National Spatial Reference System: Modernizing Our Geodetic Foundation for the Future**Speaker:** Jacob Heck

The National Geodetic Survey (NGS) is in the process of making the critical transition from the current National Spatial Reference System (NSRS) to the upcoming modernized (2022) system. The session will highlight the importance of the NSRS while reviewing the limitations of the existing framework and digging into the benefits of the modernized system, including its embracing of time-dependency. The talk will also go over how surveyors can prepare their workflows for the transition to the modernized NSRS, including updates to current NGS tools as well as planned capabilities for after the initial rollout.

Session 17: Errors, Accuracy, and Precision - Part 2**Speaker:** Todd Horton

Solid risk management strategy demands that field personnel understand measurement errors, their sources, and proven mitigation methods. Detecting our own problems is significantly less costly than letting others find them for us. Join us to understand the differences between accuracy and precision. Investigate error sources in the most common surveying methods and how those errors accumulate. Learn to understand those magic numbers on the data collector. Explore proven methods to manage measurement error. Choose the best tool for the task to minimize risk.

Session 18: Vendor Session - Carlson Survey Field-to-Finish Fundamentals, with Surfaces

Thursday, January 22, 2026

8:20-10 a.m. (2.0 PDH)

Session 19: Scratching Past the Surface of 3D Surfaces

Speaker: Dean Teska

With new machine technology and advancements in software capabilities, using and building three dimensional surfaces is becoming more prevalent in surveying workflows. While some had to draw a topographic survey on a grid and manually draw contour lines to understand hard break lines, these days, understanding how to draw accurate 3d surfaces using other methods is crucial to our profession, along with performing quality checks on that data. Take this deep dive into types and details of surface creation and why we would need to draft a surface.

Session 20: Caught in the Crossfire: A Surveyor's Role in Conflict Resolution

Speaker: Jeanette (Netty) Harley

Most of us have been here before: A potential client calls with the predicament that they believe their neighbor is using THEIR LAND! We may be entering a hostile situation. The battle lines may have already been drawn. Are you going to take the assignment or walk away? Do you just survey the line, get in and get out, give out the name of an attorney and hope you don't get called in as an expert witness should things go awry? Is there a better way to navigate our clients and their neighbor(s)? What is your current survey procedure? Are we not the experts at land law? We are going to walk through some real life situations and have open discussion on how a impartial, methodical approach can bring about a cease-fire.

Session 21: Match the Tool to the Task

Speakers: Todd Horton

Competent surveyors select the most appropriate equipment and methods based on accuracy needs and the inherent risks. Learn when to use a steel tape instead of a total station and a level instead of your RTK rover. And vice versa. We'll address the inherent strengths and weaknesses of the most common survey processes so you can choose the right tool for your next task.

Session 22: ABCs of TPPS and Utility Exhibits

Speaker: Kevin Boyer

This session will cover recent FDM Chapter 12 updates and the new utility exhibit process under the updated utility guide.

Session 23: Condominiums – More Information to Come

Session 24: Vendor Session - PhotoCapture and Point Clouds

10:20 a.m. - noon (2.0 PDH)

Session 25: Section Breakdowns and Correction Lines

Speaker: Laurence Johns

A brief look at the complexities of Section Breakdowns and how Correction Lines affects those Section Breakdowns. We'll take a look at a standard section breakdown and how previous monumentation affects it, whether documented or undocumented. We will also take a brief look at some oddities and exceptions and what to look for.

Session 26: Professional Ethics for the Surveyor

Speaker: John Matonich

As professionals, surveyors are held to a higher standard and are expected to follow a code of ethical professional conduct and operation. This presentation will examine the elements of this code and how they fit in the surveyors conduct. It will also examine real ethical case situations and discuss why they were or weren't violations of an ethical code.

Session 27: Job Site Control Survey Fundamentals - Part 1

Speaker: Todd Horton

In a job site control network, there is more than meets the eye. Join us to explore basics of horizontal and vertical control survey strategy for boundary, topographic, and construction projects – from setup through measurement to maintenance and repair.

Session 28: Legislative Update, Effective Advocacy, and Discussion on AE 6

Speaker: Bob Welch and Stamena Mesec

Welch will go through recent legislative and regulatory changes. He will lead a discussion on AE 6 with the question of "Do we need more clarity in our licensing education requirements?" Then he will go through how Wisconsin State Government really works and what you can do to help WSLs be even more effective.

Session 29: Working in FEMA Flood Zones: Field Procedures, Elevation Certs and establishing BFE's in Zone A's

Speaker: Karol Grove

This course provides a comprehensive overview of field procedures for working with properties located within FEMA-designated flood zones. Participants will learn the distinctions between studied flood areas and non-studied areas (Zone A), including the unique challenges faced when surveying in these regions.

The class will explore the various methods used to determine or establish the Base Flood Elevation (BFE) in Zone A areas, as well as when an Elevation Certificate is required. Real-world examples will illustrate the different types of surveys needed when a flood zone is present and the client plans to develop the property.

Session 30: Vendor Session

2 – 4 p.m. (2.4 PDH)

Session 31: Surveying Wisconsin Floodplains

Speaker: Sarah Rafjko

This session will provide an overview of basic floodplain management, a 101 so to speak that will give surveyors an understanding of how the work they do fits into the big picture. We will go over elevation certificates, FEMA Letters of Map Change, Wisconsin Higher Standards, and some unusual requests that may be coming their way for work in the floodplain.

Session 32: Hot Topics in Title Insurance**Speaker:** Lisa Petersen

Lisa Petersen will answer these commonly asked questions regarding the relationship between Title Insurance and Surveys:

- Why do title companies require surveys?
- What kind of surveys are required?
- How is the title industry dealing with the change in Wisconsin's easement law?
- Could a surveyor get wrapped up in a Seller Impersonation Fraud claim?

Please bring any additional questions that you might have on your mind!

Session 33: Job Site Control Survey Fundamentals - Part 2**Speaker:** Todd Horton

In a job site control network, there is more than meets the eye. Join us to explore basics of horizontal and vertical control survey strategy for boundary, topographic, and construction projects – from setup through measurement to maintenance and repair.

Session 34: Raising the Bar: Accuracy Standards in the Age of LiDAR and Photogrammetry**Speaker:** Kurt Aper

Advancements in technologies like photogrammetry and LiDAR have enabled surveyors to perform mapping functions traditionally reserved for certified mapping professionals; however, many surveyors lack awareness of recognized mapping standards needed to properly test, quantify, and report data accuracy. Traditional surveying standards do not address these modern technologies, making industry guidelines essential. The American Society for Photogrammetry and Remote Sensing (ASPRS) Positional Accuracy Standards provide a widely accepted framework. Equipped with basic knowledge, surveyors can apply these standards to improve reliability, ensure quality, and confidently deliver accurate mapping results in today's evolving geospatial landscape.

Session 35: WSLs Membership Meeting**Speakers:** Ryan Duckart and Bob Welch**Session 36: Exam Prep****Speaker:** Collin Mirkes

Learn study strategies to pass your exams to become a Professional Land Surveyor in the state of Wisconsin. We will go over different books used for all three exams, study strategies to use when preparing for each exam, and talk about the paperwork side of the state application process with DSPS.

Friday, January 23, 2026

8:20 - 10 a.m. (2.0 PDH)

Session 37: Top Ten Legal Challenges to the Wisconsin Surveyor

Speaker: Steve Sorenson and Trace Hummel

This session will exam Legal issues that face a surveyor when doing their work. Examples of recent challenges that placed a surveyor in a quandary as to what to do or not do will be reviewed. The statutory language and administrative code provisions will be explored from the perspective of real world situations that a licensed surveyor will face. The session will have a significant portion devoted to questions from the surveyors in attendance as the presenter analyzes the questions attributes and offers several solutions to these real world dilemmas. The session will consider boundary disputes, missing markers, riparian rights, mineral rights, historical data and other major dispute elements found in today's world of land surveying.

Session 38: Business and Professional Ethics: Being a Good Person and Doing the Right Thing

Speaker: Andy Wible

This workshop will raise awareness of ethics issues often encountered at work and by professional surveyors. Common solutions to these difficult issues will be considered. Unfortunately, these “answers” frequently create more confusion than solutions. Therefore, some more justified techniques to overcome these dilemmas will be developed that spur progress and dialogue. Doing the right thing isn’t always easy, but knowing the right thing to do can be made easier.

Session 39: County Land Division Reviews and Processes, Similarities & Differences

Speaker: Tony Dallman, Dean Roth, and David Decker

Every County has their own Land Division Review parameters and the reasoning behind them. This session will talk about the similarities and differences from 3 different Counties, Eau Claire County, Lincoln County and Marathon County. There will be examples and explanations of the what and whys, and will be geared towards an open dialogue.

Session 40: Diseases in the Field: a Survey of Risk in Wisconsin

Speaker: Dr. Angelo Kolokithas

There are many diseases that make Wisconsin their home, while others come from different places. This presentation will cover diseases that are commonly acquired while outdoors, with special focus on diseases carried by ticks and mosquitos. Topics include disease spread, risk factors, signs and symptoms, treatments and prevention.

Session 41: How to Incorporate Large Language Models and Apply them to our Survey Business Workflow Part 1

Speaker: Kevin Woeste

AI offers practical opportunities to streamline workflows, improve documentation, and enhance client communication without replacing professional judgment. As AI tools become more accessible and powerful, it's critical for surveyors to understand how these technologies work and how they can be responsibly integrated into everyday operations. In Part 1, attendees will learn how LLMs work, including how they're trained, how they process language, and the core concepts behind generative AI. This portion will demystify AI, offering clear, surveyor-friendly explanations of terms like tokenization, prompt engineering, and model inference. No coding or advanced tech background is required.

Session 42: CST Exam

10:20 a.m. – noon (2.0 PDH)

Session 43: Legal Update - Recent Case Law Affecting the Real Estate Industry and Surveyors

Speaker: Steve Sorenson and Trace Hummel

This legal update will highlight cases from this past year that have clarified the role of surveyors and the changing real estate environment. Additionally the program will isolate specific cases that could have a significant impact on the future of the profession. These challenges include a consideration of how a surveyor can prepare for their role in the changing legal environment where the influences of more available public data, artificial intelligence and soaring land prices have change the landscape of the modern courtroom.

Session 44: Lines and Legends: Eugene S. Shepard's Surveying and Storytelling Legacy of Northern Wisconsin

Speaker: Kerry Bloedorn

Discover the remarkable story of Eugene Simeon Shepard, the skilled Northwoods surveyor, timber cruiser, and mapmaker whose plats and maps helped shape northern Wisconsin and even reached into Minnesota. Learn how the same man who laid out boundaries and guided the logging boom also sparked one of America's greatest tall tales: the mighty Hodag.

Session 45: Wisconsin County Surveyor Association Meeting

Speaker: Laurence Johns

Annual Meeting of the Wisconsin County Surveyors Association. All are welcome.

Session 46: Protecting yourself from disaster

Speaker: Dr. Angelo Kolokithas

Surveyors sometimes are in the field by themselves. Safety is of utmost importance and knowing what to do in the event of an emergency ahead of time will make sure you make it home. This presentation covers the basics of hazards, prevention, and basic first aid.

Session 47: How to Incorporate Large Language Models and Apply Them to our Survey Business Workflow Part 2

Speaker: Kevin Woeste

In Part 2, the session shifts to hands-on exploration of how LLMs can be integrated into the modern surveying workflow. Attendees will walk through real-world use cases such as automating proposal writing, managing client communications, generating field sketches, summarizing research data, and even routing crews. We'll demonstrate how tools like ChatGPT and other AI-powered platforms can be used safely and effectively within professional standards.

Session 48: CST Exam