

# Connecticut Society of Civil Engineers January Newsletter

#### From the President

Dear CSCE Members,

Happy New Year! I hope you all had a wonderful holiday season and have had a great and healthy start to 2022.

Our first meeting of the year will be a virtual lunch presentation by Jagdeesh Gopal and Luis Vila from GM2 on January 26 and will feature the "Rehabilitation of Bridge 03094 of I-91 using Ultra-High-Performance Concrete (UHPC), New Haven, CT". As these types of innovative methods and materials start to be used more commonly in Connecticut, I know I am personally looking forward to this one!

We have made the decision that due to the rise in Covid cases, our monthly meeting on February 16th originally scheduled to be in-person at Quinnipiac will now be a virtual lunchtime event. The meeting will be sponsored by CSCE's Legislative Affairs committee, and Mark Rolfe, Deputy Commissioner at CTDOT, will give a presentation on "Federal Infrastructure Investment and Jobs Act: Impacts on Connecticut's Transportation Systems". This event will be free, so we are hoping for a large turnout!

As always, feel free to reach out to me by email at brianna.ritacco@gmail.com if you have any interest in being involved with CSCE or have any questions about volunteer opportunities. Stay safe and stay warm!

Sincerely,

Brianna Ritacco, P.E., M. ASCE

#### From the Editor

As we start the new year, we plan to continue to use the newsletter to highlight compelling projects and engineers across the state. We also hope to provide a one stop destination for up-to-date information current events and recaps of past months meeting. January happens to be international brain teaser month, so in 2022 we will be adding a Brain Teaser Corner. Each month a new brain teaser will be posted and the solution will be posted in the subsequent newsletter. Again, thank you to everyone who has submitted content to newsletter in 2021 and we look forward to hearing from you in 2022.

Tyler Parker, P.E. M. ASCE

Newsletter Editor

# **Upcoming Events**

#### 2022

January 26 - Virtual Lunch Meeting - Time: 12-1:30 p.m.

- Topic: Rehabilitation of Bridge 03094 using UHPC, New Haven, CT
- Speakers: Jagdeesh Gopal P.E. and Luis Vila, Ph.D., P.E., GM2 Associates, Inc.
- Co-Sponsors: CT Chapter of the ASCE Structural Engineering Institute and the ASCE Student chapter at University of Hartford
- Earn 1 NYS PDH at this meeting
- <u>Click Here</u> to Register for the Event

February 9-11 - Virtual Multi-Region Leadership Conference

February 16 - Virtual Lunch Meeting - Time: 12-1:30 p.m

- Free Meeting
- Topic/Speaker: Federal Infrastructure Investment and Jobs Act: Impacts on Connecticut's Transportation Systems
- Speaker: Connecticut Department of Transportation (DOT) Deputy Commissioner Mark Rolfe
- Co-Sponsors: Legislative Affairs Committee and the ASCE Student Chapter at Quinnipiac University
- No PDHs will be offered at this meeting
- <u>Click Here</u> to Register for the Event

March 2-4 ASCE Legislative Fly-In (Virtual and In-Person)

#### March 22 - Dinner Meeting at the Norwalk Inn, Norwalk, CT

- Topic/Speaker: Henry Hudson Bridge Manhattan Approach Rehabilitation/Siefert Associates
- Sponsor: Fairfield County Branch of CSCE
- Earn 1 NYS PDH at this meeting

#### April 13 - Dinner Meeting at the USCGA Officers Club

- Topic/Speaker: TBD
- Co-Sponsors: CSCE Government Engineers Committee and the ASCE Student Chapter at the USCGA

#### April TBD - Annual Spring Geotechnical Workshop

• Earn NYS PDH at this meeting

#### May 10 - Virtual Lunch Meeting - Time: 12-1:30 p.m.

- Topic/Speaker: Applications of iTwin
- Sponsor: CT Chapter of the ASCE Transportation & Development Institute
- Earn 1 NYS PDH at this meeting

#### May 26 - Annual Achievement in Civil Engineering (ACE) Awards, The Aqua Turf Club, Plantsville, CT

#### June 10-11 East Region Young Member Council Conference

Hosted By CSCE in Hartford

#### June TBD - Structural Seminar (Working topic: Structural Issues, Challenges and Failures)

• Earn NYS PDHs at this event

# ASCE Section Membership Drive

The Section Member Drive is back, and here is your chance to win!

#### Here is how the contest works:

- Each Section will compete based on the percentage of growth driven by that Section's participating members.
- The information below provides you and your team with crucial program details, valuable resources to be successful in your referral efforts, and the ability to monitor your current ranking.

#### What Your Section Can Win



# How To Participate



#### Motivate Your Section to Participate and Compete

Encourage your Section members to participate in the Member-Get-a-Member campaign actively.



#### Encourage Professional Referrals

Have your Section members refer professional colleagues and friends that are not currently ASCE members.



#### Monitor and Share Your Section's Success

Increasing the percentage of overall growth driven by the Section will aid in the Section rising in the rankings below.

Visit American Society of Civil Engineers (asce.org) for more information about the Competition

# ASCE Structure Congress 2022



1 -

o Join us at Structures Congress 2022 in Atlanta! There's something for everyone from our keynote speakers, six specials essions, and a robust technical program. Register and learn more today.

https://www.structurescongress.org/

# **Project Spotlight**

Greenwich Avenue & Elm Street Intersection Improvements

CSCE's 2021 ACE award winner in Excellence in Sustainable Development was the Greenwich Ave. and Elm Street intersection Improvement project in Greenwich, Connecticut. This project's goal was to improve the overall safety and wellbeing of the community. Through collaborating with multiple groups and departments, the project has increased pedestrian safety, improved accessibility, and aesthetically revitalized iconic Greenwich Avenue.

As a trafficked area, at least 7,600 vehicles travel through the intersection per day. On a Saturday, over 800 pedestrians and 835 vehicles can pass through the intersection in just one hour. After a town decision for Greenwich Police officers to no longer direct traffic on Greenwich Avenue intersections, it became imperative to implement new safety measures to improved the safety experience for all street users – including pedestrians, bicyclists, motorists, baby carriage users and people with disabilities.

As a complete streets type of design, the new intersection is intended to allow safe and convenient street access for people of all ages and abilities. Safety features of the redesigned Greenwich Avenue and Elm Street intersection include adding curb extensions (a.k.a. bump-outs), raising the roadway and enhancing illumination. The newly built curb extensions increase the visual connection between the pedestrian and driver, and reduce the crossing time and crossing distance for pedestrians by up to 40 percent. The curb extensions act as a traffic calming measure by widening the sidewalk into the paved roadway to slow down motorists in the busy retail area and make them more aware of their surroundings. Another safety component is the raised roadway, which improves visibility between pedestrians and motorists, while slowing the speed of vehicles as they proceed through the busy intersection. The road pavement was raised several inches, heightening the visibility of pedestrians and slowing cars as they proceed through the busy intersection. To provide better illumination for pedestrians, lights were relocated closer to crosswalks.

Also, the project improved the streetscape's appearance. The green-space was increased around the intersection from 340 square feet to 1,860 square feet- a 550 percent increase. Framed by rough-cut granite, the new planting beds include hydrangea, roses, spirea, daylilies and liriope. The hardy plants are easy to maintain, show color three seasons a year, and won't grow tall to hinder sight distance.

Significant challenges in this project included managing vehicular and pedestrian traffic during construction while never entirely closing the roadway or sidewalks. One way to minimize impact on the traveling public was the type of materials used during the construction of the decorated crosswalks. The team used a thermoplastic material called TrafficPatternsXD, which provides a cost-effective alternative to the use of brick and stone pavers. Installation occurs at a fraction of the time it takes to install traditional brick and stone pavers, with significantly less disruption to traffic. The pattern and color combinations allow designers the flexibility to create the ideal crosswalk or traffic calming pattern that complements the overall streetscape design.

Some of the other challenges of the project were, meeting specific conditions set by the Town in order to receive funding, and communicating with adjacent businesses/owners, budget committees, oversight committees and local groups to get stakeholder buy-in. During the project a group of residents appealed the Town's Tree Warden decision to allow removal of 1 tree for installation of an ADA parking stall and associated pedestrian ramp. This could have had a caused a significant delay to construction, however the team was able to modify the design to allow for the tree to remain without delaying the project.

The raised intersection and decorative crosswalks are two focal points in this project that showcase the ingenuity in construction techniques and materials. Most intersections are driver-centric where pedestrians must navigate ramps down to the roadway and experience longer crossing distances. This raised intersection strategically shortens the walking distance and levels the surface, which makes it easier for pedestrians to cross the street. This redesigned intersection could be the first of several intersection projects on Greenwich Avenue. Currently the engineering team is soliciting stakeholder feedback on future prosed intersections and educating the public on this recent completed project through their new and interactive website, Geenwichstreetscapes.com.







#### **Brain Teaser Corner**



You're at a fork in the road in which one direction leads to the City of Lies (where everyone always lies) and the other to the City of Truth (where everyone always tells the truth). There's a person at the fork who lives in one of the cities, but you're not sure which one. What question could you ask the person to find out which road leads to the City of Truth?

Solution to be shown in subsequent newsletter. Want to stump your colleagues? If the answer to this question is Yes, please submit your Brain Teaser (and solution) to the Newsletter editor at tparker@hwlochner.com

# **Employment Opportunities**



- Connecticut Department of Transportation
- Transportation Engineer 3
- Job Posted: January 7, 2022

The <u>State of Connecticut</u>, <u>Department of Transportation (DOT)</u>, is now accepting applications for <u>Transportation Engineer 3</u> positions throughout its Headquarters in Newington.



- Connecticut Department of Transportation
- Principal Engineer
- Job Posted: January 2, 2022

The <u>State of Connecticut Department of Transportation</u> is accepting applications for an exciting full-time (40-hours/week) <u>Transportation Principal Engineer (Engineering)</u> within the Traffic Signals Unit in the Division of Traffic Engineering in our Newington, CT Headquarters building.



- TAGLIATELA COLLEGE OF ENGINEERING
- Lecturer & Assistant Professor positions
- Job Posted: December 21, 2021

**University of New Haven** 

The Department of Civil and Environmental Engineering at the University of New Haven invites applications for 1) a full time Lecturer in Construction Management and 2) a Tenure-track Assistant Professor (or a Non-tenure track Lecturer) in Environmental Engineering with primary expertise in water treatment, solid waste management or climate change/air pollution. The positions will commence in Spring 2022 or Fall 2022. Review of applications will start immediately and continue until the position is filled. Apply at:

- 1) <a href="http://apply.interfolio.com/96130">http://apply.interfolio.com/96130</a> Full-time Lecturer in Construction Management. The successful candidate must have a minimum of MS degree and extensive professional experience in Construction Management/Engineering.
- 2) <a href="http://apply.interfolio.com/96125">http://apply.interfolio.com/96125</a> Tenure Track Assistant Professor in Environmental Engineering. Exceptional candidates with prior teaching experience and a strong record of scholarship may be considered for an associate Professor appointment.



Siefert Associates, LLC

- Structural Project Manager
- Job Posted: December 21, 2021

Siefert Associates, LLC., is a Structural-Geotechnical Engineering firm practicing in the niche field of Construction Engineering. We are the professional service firm of choice for contractors across the Northeast and are proud to call 10 of the top 15 Domestic Heavy Contractors [per ENR] as our Clients. Our specialty is developing working drawings and calculations for heavy highway, building, railroad, & utility projects. Our work includes temporary & permanent design, inspection, & field services.

We seek a Structural Project Manager for responsibilities that include the management & preparation of calculations for complex projects, business development, proposal writing, & training/mentoring of production staff. BS or MS in Civil Engineering, PE license in NY/CT, & 10 years of design experience in construction engineering preferred. Located in Naugatuck, CT office with hybrid work options.

Apply at: www.siefertassociates.com - email cover letter & resume to info@siefertassociates.com



- GeoDesign
- Entry Geotech Engineers, Project Geotech Engineer
- Job Posted: December 9, 2021

GEODesign has immediate openings in Connecticut for an entry level and a project-level geotechnical engineers to provide geotechnical services on design and construction projects in New England and Metro New York areas.

GEODesign is a premier geotechnical specialty engineering consulting firm headquartered in Middlebury, Connecticut, with offices in NJ, VT, NY and OR. We are a regional industry leader providing services in the fields of geotechnical, environmental, forensic, and construction engineering. This position offers an excellent opportunity to work on a wide variety of projects such as highways & bridges, buildings, water front structures, land development, forensic engineering, dam engineering, and environmental remediation. GEODesign offers great growth potential and learning opportunities to those aspiring professionals by working closely with our highly competent, seasoned engineers recognized in the field. For more information/to apply, please visit <a href="https://geocompanies.com/">https://geocompanies.com/</a> or email resume to <a href="https://geocompanies.com/">https://geocompanies.com/</a> or email resume to <a href="https://geocompanies.com/">https://geocompanies.com/</a>



Nathan L. Jacobson & Associates

- Chief Inspector
- Job Posted: November 23, 2021

Established Civil and Environmental Engineering firm seeking highly motivated technical personnel with excellent communication skills for a Construction Chief Inspector position. Experience in bridge and roadway construction inspection, testing and CTDOT four volumes. Minimum AS degree in CE or CE Technology desired, and; Microsoft Word, Excel and Outlook experience required. NICET 3 certification or PE required. For more information and to apply, visit our website; www.nlja.com.



- Luchs Consulting Engineers, LLC
- Chief Inspector, Office Engineer, Senior Inspector, and Inspector positions
- Job Posted: October 18, 2021

Luchs Consulting Engineers, LLC, a Meriden based Consulting Engineering firm is seeking candidates for a Chief Inspector, Office Engineer, Senior Inspector and Inspector positions. Experience with State of Connecticut and Municipal Construction Inspection procedures is required. Current NICET, NETTCP, ACI, ATSSA and NACE Certifications are a plus.

Competitive Benefit Package

Email: dcrandall@luchs.com

An Affirmative Action Employer (EOE)

http://www.luchs.com/



- Luchs Consulting Engineers, LLC
- Civil Design Engineer
- Job Posted: October 18, 2021

Luchs Consulting Engineers is a multi-disciplined engineering, surveying firm based in Meriden, CT. We have immediate opportunities for professionals who are ready to join our dynamic team.

Civil Design Engineer BS Degree in Civil Engineering; EIT or NICET a plus

- 3-7 years' experience in CTDOT design environment
- Roadway Drainage Design/HEC-RAS Hydraulic experience required
- Knowledge of MicroStation or AutoCAD required

Comprehensive Benefit Package

Please email resumes to: dcrandall@luchs.com

http://www.luchs.com/



Structural Engineering Geotechnical Engineering Historic Preservation

- GNCB
- Sr. Geotech Engineer
- Job Posted: July 22, 2021

GNCB seeks Sr. Geotech Engineer to serve as Project Manager. Responsibilities: Manage projects including all aspects of field & lab investigations, project design, & construction administration; prepare budgets, proposals, reports & contracts; build and maintain Client Relationships. Minimum Quals: B.S. or M.S. in Civil Engineering with geotech concentration; P.E. in Connecticut; 8 to 12 years' experience showing proficiency in job responsibilities & knowledge of local subsurface conditions.

http://www.gncbengineers.com/



- Hardesty & Hanover
- Civil Engineers
- Job Posted: June 22, 2021

Hardesty & Hanover is currently seeking engineers to join our expanding civil engineering design group in New England. Our New Haven office seeks experienced Civil Engineers with expertise in roadway, drainage, traffic, and highway safety design. Applicants should be able to perform design tasks, lead small groups, communicate effectively, and collaborate to meet objectives. Our firm offers a close-knit employee-based culture and opportunities for professional growth and leadership. Please visit https://www.hardestyhanover.com/current-openings/ for further details.



- Conlon Engineering, LLC
- Structural Engineer
- Job Posted: June 21, 2021

Conlon Engineering, a growing structural design firm in Brookfield, CT is seeking a structural engineer with 0-3 years of experience doing design work and calculations. We are looking for a smart, hardworking engineer who wants to be part of a profitable firm that is set up for sustainable growth. Visit our website at conlonengineering.com and email resumes to office@conlonengineering.com



- Down To Earth Consulting, LLC
- Geotechnical Senior Project Engineer
- Job Posted: June 21, 2021

Down To Earth Consulting is seeking a Senior Project Engineer to join our geotechnical group in Naugatuck, CT. The successful candidate should have a BS degree from an ABET accredited civil

engineering program, 5 to 10 years of experience, and be a licensed PE. Down To Earth Consulting is an Affirmative Action/Equal Opportunity Employer. To learn more about this opportunity, please submit your resume to ray@downtoearthconsulting.com.

https://downtoearthconsulting.com/



2 - https://www.facebook.com/PereiraEng/

- Pereira Engineering
- Civil Engineer, Land Surveyors & Survey Technicians
- Job Posted: June 21, 2021

Pereira Engineering is an established Civil/Environmental/Land Surveying firm located in Shelton, CT. PE is seeking a Civil Engineer as well as Land Surveyors and Survey Technicians (at all levels of experience) to expand our Survey Department. PE offers a very competitive salary and benefits. Please email resume to: joe.pereira@pereiraeng.com

# Memberships

#### **ASCE and CSCE Membership**

ASCE members come from all disciplines of civil engineering, from all types of environments, and from all over the world. With benefits geared to meet the high standards of professionalism, ASCE strives to cater to each member's needs.

Membership in CSCE is granted to ASCE members upon receipt of Connecticut Section dues. Connecticut Section dues are \$30 per year. Please include your section dues with your national membership renewal. We can accept mid-year memberships. Please contact our <a href="Membership Committee Chair Rich Cohen at rechen@hwlochner.com">Membership Committee Chair Rich Cohen at rechen@hwlochner.com</a> for more information about CSCE and ASCE. To join the Connecticut section of ASCE, please go to the ASCE website (<a href="www.asce.org">www.asce.org</a>) and click on Join at the top of the page.

Why join CSCE? Please click <u>here</u> for our PowerPoint Presentation from a Professional Issues Seminar on Tuesday, April 8, 2008 about the Advantages to Joining Professional Associations

#### **Transferring Section Membership**

Have you recently moved to Connecticut, or are you about to? If you are a current ASCE and local Section member you can transfer your Section membership to CSCE. Once you move to Connecticut, you may go online to <a href="https://www.asce.org/myprofile">www.asce.org/myprofile</a> and log in change your address information. This will initiate the transfer from your old Section to the Connecticut Section. If you encounter any trouble while online, you can also contact the ASCE Records Department via email at <a href="memrec@asce.org">memrec@asce.org</a> or (703) 295-6300 to provide you new address information and the transfer can be handled that way as well.

If you are moving out of Connecticut, you can follow the same procedure to transfer from CSCE to you new local Section. We are sorry to see you go, but hope that you continue to be active in ASCE and your new local Section. For information about the local Section for where you are moving, you can visit the ASCE website @: http://www.asce.org/Regions-Sections-Branches/

#### Advancing your Membership Grade

Do you need to advance your membership grade? Are you a recent graduate? Did you get your P.E. license? ASCE and CSCE encourage you to advance your membership grade as your professional career progresses. Information and instructions are available on the ASCE website

#### 10 Free PDHs

Did you know ASCE members receive 10 Free PDHs.

Choose up to 10 out of 200 on-demand webinars from the comprehensive continuing education library

All active professional ASCE members have access to the courses. If you have already selected your free courses, go directly to <a href="MyLearning">MyLearning</a>. Check out other <a href="Continuing education">continuing education</a> opportunities too.

ASCE updates free On-Demand Webinars on January 1. Free webinars must be used (viewed and exam taken) between January 1 and **December 31**. When you join or renew for the next membership year, you can select ten additional free webinars as early as January 1 of the following membership year. Access them at <a href="www.asce.org/freepdh">www.asce.org/freepdh</a>. You are required to pass an exam on the webinar's content to receive a free PDH.

#### **Unemployed?**

ASCE National has a program to waive dues of unemployed members. For more information,

Write to:

**ASCE** 

Attn: Member Services Dept.

1801 Alexander Bell Drive

Reston, VA 20191-4382

Or Call: Toll free: 1-800-548-ASCE Direct: 703-295-6169 Fax: 703-295-6335

# THIS IS THE TIME TO INVEST IN YOURSELF: RENEW TODAY! ASCE FORWARD FASTER





# About **CSCE**

The CSCE is the result of a merger of two organizations that occurred 30 years ago. The Connecticut Society of Civil Engineers was founded in 1884, while the Connecticut Section of the American Society of Civil Engineers was founded in 1919. In 1958, the Section had 523 members. In 1955 (the nearest comparable year for reliable numbers), the Society had 1,033 members. The two organizations met separately until they merged in 1981, by mutual vote of membership, to become the Connecticut Society of Civil Engineers Section of American Society of Civil Engineers or CSCE.

Civil Engineers design and build our increasingly complex infrastructure; work with government officials, citizens and businesses to promote better infrastructure maintenance and renewal; and build commerce in Connecticut and throughout the World. We serve diverse industries including government, consulting, construction, academics and manufacturing and we work in a variety of disciplines including geotechnical, environmental, structures, transportation, and water resources.

# Contact Us

The 2021-2022 CSCE Executive Board thanks you for taking the time to read this newsletter. Should you have any questions, comments, or concerns - feel free to contact one of our members.