

Outstanding Civil Engineering Achievement Award Winners**Central Street Bridge Replacement**

Severe deterioration of Evanston's Central Street Bridge necessitated a complete replacement. The failing three-span bridge was replaced with Evanston's only single span bridge and its only bridge with no substructure in the North Shore Channel. The new \$6.4 million Bridge is expected to have a 75- to 100-year lifespan as it was designed to be easy to construct, inspect and maintain.

Central Street is a dynamic commercial corridor heavily used by cars, CTA buses, bicyclists, and pedestrians, and provides a critical route for emergency vehicles to Evanston Northshore Hospital. Key to the replacement was safely maintaining two-way vehicular and pedestrian traffic while stage reconstructing a bridge that had not been designed to withstand this type of stress. Once the first half of the bridge was removed, the second half required temporary shoring to maintain structural integrity.

The attractive new bridge supports multiple forms of transportation with two-way traffic, dedicated 10-foot-wide pedestrian walkways and 4-foot-wide striped bike lanes. When planning began for the new Central Street Bridge, city leaders wanted the public to be engaged in the process. An extensive stakeholder engagement program gathered input from multiple stakeholder groups. The result is a showpiece bridge that is much admired by the public. Stanley Consultants is proud to have played a role in the process and the project.

Project participants include: City of Evanston (owner), Stanley Consultants (designer) and Copenhagen Construction (contractor).

Jane Byrne Interchange

The Illinois Department of Transportation reconstructed the Jane Byrne Interchange, the hub of the Chicago Expressway System. It is the convergence of the Kennedy, Dan Ryan, and Eisenhower Expressways (I-90/94 and I-290) in the heart of downtown Chicago, one of the busiest interchanges in the nation.

The Jane Byrne Interchange accommodates 400,000 vehicles daily with trucks representing 25% of those vehicles. In 2012, when preliminary engineering began, the interchange was rated by the American Transportation Research Institute and the Federal Highway Administration as the #1 freight bottleneck in the country, a distinction the Illinois Department of Transportation was motivated to address. They selected the AECOM/TranSystems JV team to plan and design the modernization of the interchange, including accommodating pedestrians and bicyclists. Reconnecting the community split by the original interchange construction 60 years ago was as important as addressing expressway traffic.



This \$640M reconstruction project was a massive undertaking. It was a complex, challenging exercise to rebuild the interchange within, and on top of, the existing interchange. The project involved the reconstruction of 19 bridges, including 7 curved steel girder ramp bridges, nearly 50 retaining walls, and over 32 miles of expressway lanes. No additional right-of-way was needed except for a small 10-foot-wide strip at the Jackson Boulevard exit ramp.

Adding to the complexity were ten service interchanges within the project area. The entire project limits were treated as one large interchange system requiring connections through collector-distributor roads, elimination of weaving areas, and moving left-handed entrance ramps off the mainline. The solution included tri-level flyover ramps, two-lane ramps for the heaviest movements, and additional through lane capacity.

Project Participants include the Illinois Department of Transportation (Owner) and the AECOM and TranSystems Joint Venture (Designer).

Outstanding Civil Engineering Achievement Award Winners, cont.***Neighborhood Storage Project***

The Village of Wilmette Neighborhood Storage Project is an urban flood control project that is also the largest capital improvement project in the Village's history. The total project cost was approximately \$64.1M and took 10 years to complete from the initial studies in 2013 to final completion of construction at the end of 2022. This project significantly transformed the quality of life on the entire west side of the Village, which had a long history of urban flooding. It was able to provide flood protection for 98% of the Village's residents that experienced flooding on the west side of town.

To provide the needed flood relief, the Village installed 44.2

acre-ft (14.4 million gallons) of underground stormwater storage at 3 prominent parks and 5 miles of storm sewer under streets throughout the west side of town. The design of each park facility was based on saving trees, re-creating the park with better drainage and facilities, and minimizing the impacts to adjacent residents and schools. The size and configuration of the underground Stormtrap vaults were first of their kind in the State of Illinois, including the vault with the largest number of pieces (Community Playfield – 2,300 pieces) and tallest height (Hibbard Park – 15 feet tall).

The Village's Engineering and Public Works Department led a full team effort that required cooperation and participation from consulting engineers, the Village Board, Park District, School District, neighborhood organizations, and most importantly understanding and patience from the Village residents. Communication and execution were the keys to the project implementation. Throughout the 10-year life of the project, the Village convened more than 50 public meetings to obtain buy-in from the residents, School District, and Park District. Ultimately, the project was delivered on time and nearly \$4M under the projected budget.

Project participants include: Village of Wilmette (owner), Christopher B. Burke Engineering, Baxter & Woodman, Inc. and Stanley Consultants (engineering team), HMG Engineers and Testing Service Corporation (subconsultants)

Golf Mill Park

This project was designed to reduce flooding that had repeatedly impacted homes, businesses, and roadways in nearby neighborhoods. The stormwater mitigation project integrated conveyance improvements with the creation of a new pond, event lawn, and permeable paver streetscape. These features not only build on the existing amenities at the adjacent Golf Mill Park, but have also helped to incentivize the future redevelopment of Golf Mill Mall into mixed uses. The pond is the Village of Niles' first publicly owned natural water feature and has immediately attracted visitors to the overlooks and walking paths. Underground vaults were used to provide about half of the necessary stormwater storage, which also allowed for the creation of the event lawn and gathering space next to the pond.



Project participants include: Village of Niles (owner), Hey and Associates, Inc. (designer), Hitchcock Design Group (Landscape Architecture), Nova Engineering, PC (Electrical Design), Rubino Engineering, Inc. (Geotechnical Engineering) Claassen, White & Associates, PC (Surveying) and DiMeo Brothers Inc. (General Contractor).

Sustainability in Civil Engineering Achievement Award

Green Streets Infrastructure Program



In 2008, Kenilworth experienced significant basement and street flooding with a combined sewage discharge to Lake Michigan which prompted the Village to seek a solution. The program implemented a new sewer system that separated the storm and sanitary flow, significantly increased the system capacity, and eliminated the noted flooding issues and sewage overflow to Lake Michigan. The funding for the Green Streets Infrastructure was made possible, in part, through the generous backing of the Metropolitan Water Reclamation District of Greater Chicago. TERRA Engineering, Ltd. provided H&H modeling, utility coordination, permitting and construction management services. The improvement included reconstruction with permeable pavement, new storm sewer, new water main, combined sewer repairs, curb and gutter, porous parkway areas, and new streetlighting and sidewalks.

Project participants include: Village of Kenilworth (owner), TERRA Engineering, Ltd. (designer), Copenhaver Construction (contractor).

Private Sector Employer Recognition Award



Founded in 1913, Stanley Consultants is a member-owned engineering firm with a rich history of helping clients across the globe solve complex challenges ranging from energy and transportation to water and industry. We have members in more than two dozen offices worldwide. Our Chicago office holds the distinction of being the second oldest office in the company. Opened in 1953, this year it is celebrating its 70th anniversary.

Ranked among the highest performing mid-size engineering firms in the world, Stanley Consultants has nearly 900 employees companywide. The firm is known for its customer service excellence, thought leadership, technical acumen and practical problem solving skills. Our commitment to improving lives, putting people first and employee-ownership has been the foundation of the company's efforts to create a connected, sustainable, and enriched world for over 100 years. We connect with our clients and communities in economically, environmentally, and socially responsible ways. Through our relationships, programs, operations and charitable foundation, our members hold themselves personally responsible for client success, community outreach and the progress and performance of the firm.

Stanley Consultants takes its commitment to the engineering industry seriously, supporting and encouraging active participation in professional engineering organizations such as ASCE. Members are encouraged to join and actively participate in their local chapters to enhance their personal, professional and technical development.

**Civil Engineer of the Year
Jennifer Maercklein, P.E., CFM**



Jennifer Maercklein, P.E., CFM is a Project Manager within the Water Resources Group at V3 Companies. She has extensive experience managing complex project teams of engineers, scientists, surveyors and technical experts. Jennifer is a great communicator and strives to keep her team and clients fully informed of the progress on a project. She has over 25 years of experience which includes performing hydrologic and hydraulic analyses associated with watershed studies, roadway projects, site developments, and mitigation projects; permitting experience for local, county, state and federal permits; and preparation of construction documents. She has a bachelor's degree in Civil Engineering from the University of Wisconsin at Madison.

**Government Civil Engineer of the Year
Brian Kuttab, P.E., CFM, LEED AP**

Brian is a graduate of the University of Kansas and brings 44 years of professional experience serving the CE profession including design, construction management and contract administration in the public and private sector, nationally and internationally.

Mr. Kuttab credentials include a Bachelor of Science in Civil Engineering and a Diploma in Highway Safety and Traffic Engineering from Northwestern University Traffic Institute. Mr. Kuttab's experience started at Kansas Department of Transportation. Brian then joined Barton Ashman Associates. as a Traffic Engineer.



Brian joined Wilson -Murrow Engineers in 1982 to work in Saudi Arabia as a Senior Design Engineer. His work was a design-build project for a 320 kms., 12-lanes expressway between the City of Riyadh and Qassim region including lighting, landscaping, irrigation, and electrical substations. Upon completion of this \$1.0 billion project, Wilson Murrow was terminated, and Brian joined Dar Al Hadassah Consultants as a project manager.

Brian joined Illinois Department of Transportation in 1992 as an EIT with promotions to CE VI - Section Chief of the Consultant Services Section in Design. During this time, Brian received several awards as District One Engineer of the Year, Employee of the Quarter, Instructor of the Year and Class of the Year for the classes Brian taught.

Brian is a Lifetime ASCE member, and his accomplishments include:

Jane Byrne Interchange, Dan Ryan Expressway, I-55 @ Lake Shore Interchange, I-88 @ IL 59 DD Interchange, I-190 Reconstruction, I-80: Chicago & Center Streets interchanges & I-80 bridge over Des Plaines River.

Young Civil Engineer of the Year Stephanie Abezetian, P.E.

Stephanie Abezetian, PE, is a Project Manager for Gannett Fleming, Inc., and currently serves as the Planning Lead for the CTA's \$3-billion capital improvement program under the Program Management Team. For the last 12 years, Stephanie consistently sought out roles increasing in responsibility from Staff Engineer to Project Engineer to Project Manager on complex planning and design projects. Throughout her various roles, she has valued being a part of a project team that finds solutions to complex transportation projects that meet the needs of its communities.

She continues to be an advocate and representative for women in the industry through her memberships. Stephanie previously served on the ASCE-IL T&DI board, promoting professional excellence in transportation engineering, urban planning, and development by planning monthly luncheons featuring agency leaders and technical presentations. She is currently a board member for the WTS Greater Chicago Chapter, serving as the Co-Chair of the Recognitions Committee. She is responsible for soliciting, selecting, and submitting to WTS International, the celebration effort of the Annual Chapter Awards.

Stephanie is a graduate of the University of Tennessee at Martin, where she earned a Bachelor of Science in Civil Engineering while playing on a soccer scholarship. Her career is supported by her husband and two boys.



Public Involvement Award IL Section Younger Member Group



The Younger Member Group is proud to be recognized tonight. In the post-pandemic world, the YMG has been able to bring back more events and is excited to host new and current ASCE members at its events. University Affairs has connected with the many local college students, while Outreach has found a group of loyal volunteers for the many events indoors and outdoors throughout the year.

Citizen Engineer of the Year
Dr. Ahmad Hadavi, Ph.D., P.E., F.ASCE



Ahmad Hadavi serves as Deputy Director of the Master of Science in Project Management (MPM) program and Clinical Professor in the Department of Civil and Environmental Engineering at Northwestern University.

As a practicing professional engineer, Dr. Hadavi has developed a strong interest in the diverse problems associated with the repair and upgrade of American infrastructure and the related challenge of preparing qualified professionals to assume project management roles as successors to the rapidly retiring workforce within the built environment sector. These drivers have propelled him to channel his varied talents into the development and operations of Northwestern's Master of Science in Project Management and Master of Science in Executive Management for design and construction programs. After more than three decades serving

the industry in this role, Dr. Hadavi has had the opportunity to impact more than 1,000 graduates who operate in 50 countries across the world.

In addition to his work in the administration of these programs, Dr. Hadavi has maintained an ongoing research program and published several technical papers. His current research interests are focused on disruptive technologies and innovations in construction and applications of virtual reality, augmented reality, mixed reality, and Metaverse in the architecture, engineering, and construction (AEC) industry. His vision for the implementation of Metaverse in design and construction is focused on improving productivity and reducing cost for projects with the added potential to improve safety.

Dr. Hadavi has a BS degree in civil engineering from Iran University of Science and Technology (1978), an MBA from Iran Center for Management Studies (1979), and a PhD in civil engineering with emphasis on construction management from Northwestern University (1991). He is a Registered Professional Engineer in the State of Georgia, and an alternate commissioner for ABET ANSAC.