

**Letter of Interest for
Statewide On-Call Preliminary Engineering
Prequalified List of Consultants for locally
administered Local Public Agency (LPA)
Qualifications-Based Selection Contracts**

December 20, 2024

Section 1

Introduction Letter



1. | Introduction Letter

Letter of Interest

December 20, 2024

Tobey Reynolds, PE
Assistant Director of Project Development
Chairperson, Consultant Selection Committee
John O. Morton Building
7 Hazen Drive P.O. Box 483
Concord, NH 03302-0483
P: 603.271.3914 | E: Tobey.L.Reynolds@dot.nh.gov

RE: Letter of Interest for Statewide On-Call Preliminary Engineering Prequalified List of Consultants for locally administered Local Public Agency (LPA) Qualifications-Based Selection Contracts

Top 3 Engineering Firm in the U.S. per BD+C 2023

104 Years of History in the making

90+ Locations

2,800 Employees

100% Employee-Owned

Dear Tobey,

Thank you for the opportunity to respond to your Letter of Interest for Statewide On-Call Preliminary Engineering Prequalified List of Consultants for locally administered Local Public Agency (LPA) Qualifications-Based Selection Contracts for the New Hampshire Department of Transportation. Our team is led by our Nashua office who, as Hayner/Swanson. Inc., provided professional services on projects throughout New Hampshire for over 50 years.

In July 2024, we joined IMEG – a full service engineering design and consulting firm. With this merger, we are able to serve our local clients with expanded staff availability and established expertise in other disciplines such as structural engineering and traffic analysis.

An important consideration during this merger was a common passion between the firms for delivering engineering design solutions, strong client relationships, and the commitment to create positive outcomes for people, communities, and our planet.

If you have any questions from your review of our proposal and qualifications, please do not hesitate to reach out to me.

Sincerely,

John Vancor, PE
Client Executive
P: 603.912.2910 | E: john.c.vancor@imegcorp.com

IMEG - Nashua
3 Congress Street
Nashua, NH 03062
P: 603.883.2057

IMEG - Headquarters
623 26th Avenue
Rock Island, IL 61201
P: 309.788.0673 | F: 309.786.5967

Section 2

Project Understanding and Approach



2. | Project Understanding and Approach

Project Understanding and Approach

OVERVIEW

Hayner/Swanson, Inc. (HSI), now IMEG, is highly experienced in planning, managing, and designing projects following the LPA process. Demonstrating our understanding of this process is our experience providing project management support and design services to the City of Nashua for the Broad Street Parkway Project from 2009 through the completion of construction in 2023. **Although the Parkway has been open to traffic for years, we are proud to highlight that, other than one retiree, our entire project team is still working with us.**

Relevant aspects of the services we provided on this large LPA project include:

Project Management Services

It was our responsibility to ensure that our work and the work of other firms providing engineering services all complied with LPA requirements. We believe this experience exemplifies our understanding of the process and how to approach an LPA project to ensure success.

Design Services

We completed the design for several contracts in the project including the Pine and Palm Streets contract. This contract included urban roadway and intersection improvements, ADA improvements, enhancements for bicycles, and traffic calming.

Public Involvement

John Vancor, one of our Project Managers, was extensively involved in public involvement and outreach. He presented monthly updates to the Board of Public Works and to the Board of Aldermen. He presented design development updates at several public information meetings. He was often interviewed by newspaper reporters regarding progress and specific engineering concerns.



Alternative Procurement

HSI, now IMEG, participated in the City's consideration of whether the Parkway should be a design/bid/build project or a design/build project. We also developed the strategy and prepared the bid documents for the design/build effort to rehabilitate the 180-foot tall Millyard chimney.

Topographic Survey & Right of Way

Our staff completed all surveying for the project and prepared acquisition plans for numerous stakings. In support of the right-of-way process, HSI, now IMEG, led the procurement of appraisal services for multiple firms and managed their contracts. In the acquisition process, we worked closely with several City departments and New Hampshire Department of Transportation (NHDOT).

Managing the Work Performed by Other Firms

Our experience on this project also highlights our success at effectively managing the work by other firms performing services which fall outside our own areas of expertise. We believe our ability to lead effective teams on large and small projects in both the public and private sectors has been one of the keys to HSI, now IMEG's, success for over 50 years.



2. | Project Understanding and Approach

Project Understanding and Approach

Relevant to future LPA projects, on the Parkway we managed work in the following disciplines:

Structural Engineering

On the Parkway project, we managed the work of several structural engineering consultants.

However, we are now pleased to note that with our merger with IMEG, we now have structural and bridge engineering in-house.

Environmental Engineering

We worked on the permitting and managed the efforts of several firms performing environmental engineering. We participated in related coordination with the City, NHDOT, New Hampshire Department of Environmental Services (NHDES), and Federal Highway Administration (FHWA).

Cultural Resources

We managed the effort of several firms providing historic and archaeological services. We participated in the related coordination with the City, NHDOT, FHWA, and New Hampshire Division of Historical Resources (NHDHR).

Traffic Analysis

Our work on the project included extensive coordination with traffic experts from the City, Nashua Regional Planning Commission (NRPC), and other consultants. Whether the work was performed by a subcontractor on our design work, or traffic experts working on design work led by others, we worked closely with the City Engineering Department to ensure consistency in approach.

Staging and Traffic Control

With a very aggressive schedule, staging the work on multiple concurrent contracts was an important element which we took the lead on. Traffic control at the project terminus points at Broad Street and in the Millyard were important considerations as well.



Stormwater Management and Hydrology

HSI, now IMEG, has extensive expertise in-house in hydrologic and hydraulic analysis and in the design of stormwater systems. In instances where hydrologic analysis of a river or stream may be needed, as on the Parkway project, we have established relationships with experts who can perform this analysis.

Complete Streets

For several municipalities, we have provided advice, assisted in planning and significant public outreach, and developed designs embracing the principals of Complete Streets consideration.

Our success in following the LPA process on the massive Parkway project, along with a proven history of completing or managing the work of outside experts to finish all the discipline tasks listed in the solicitation notice to which we are responding, makes us confident that we have the necessary project understanding and approach to succeed on future LPA projects.

Section 3

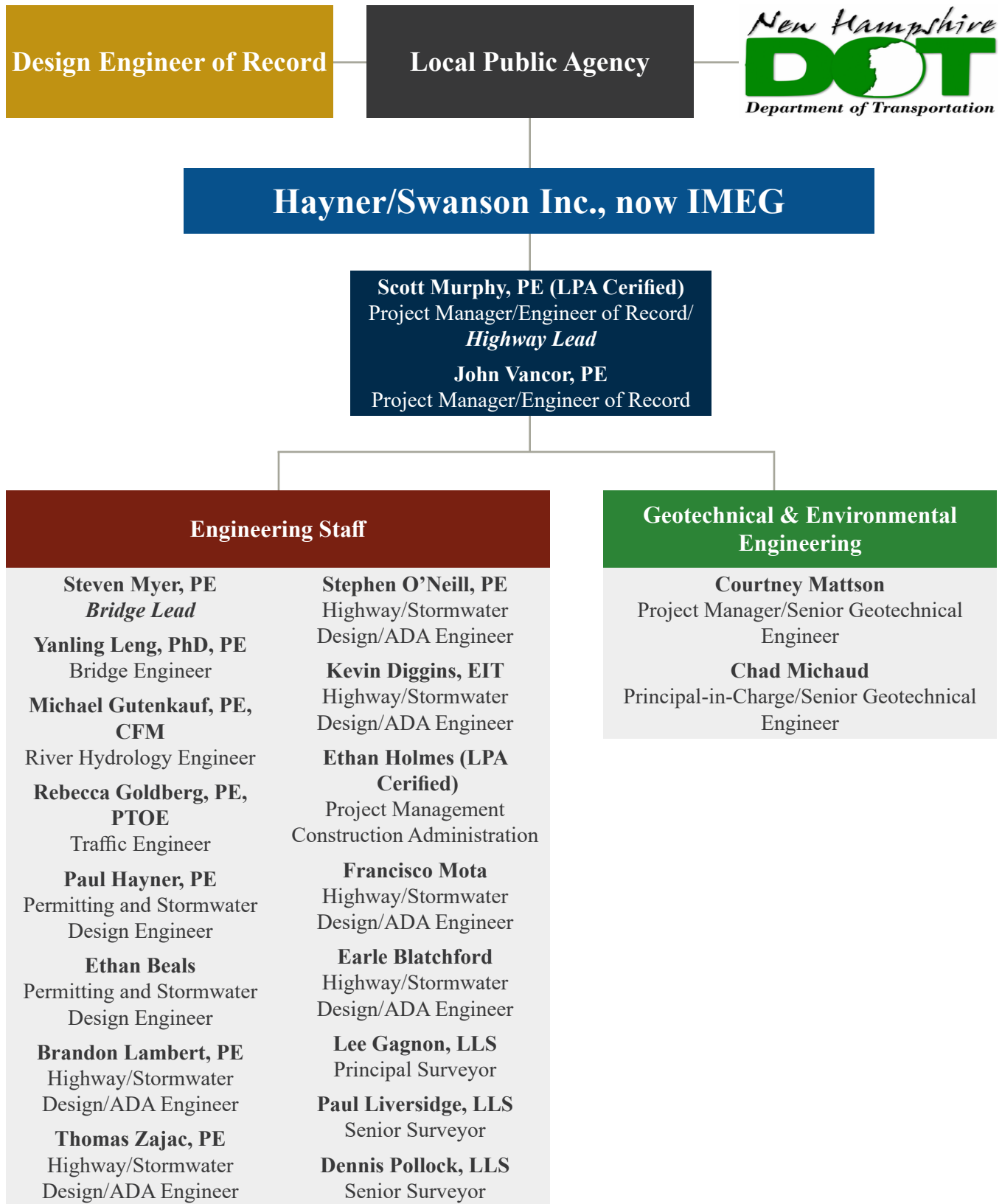
Organizational Chart





3. | Organizational Chart

Organizational Chart



Section 4

Project Team





4. | Project Team

Project Team

OVERVIEW

Hayner/Swanson, Inc., now IMEG, has provided engineering and project management support on many municipal projects to design transportation and infrastructure improvements. Several of these projects have been LPA projects and many have been funded through other Federal and State funding sources.

Our greatest strength is our staff. The background of our close-knit team has built-in flexibility that helps us adapt even when unforeseen conditions are encountered. We are a team-based company that plays on the many strengths of our members. Hayner/Swanson, now IMEG's, civil engineering group performs a wide-range of engineering services from initial consultation and concept planning through final design, permitting, and construction administration.

Scott Murphy and John Vancor are qualified to serve as Project Manager on any particular assignment, as well as perform a supporting role as needed. Our staff of engineers has the depth to assure our clients of our ability to complete work on schedule.

In addition to our project managers, Rebecca Goldberg, Steven Myer, and Yanling Leng bring decades of civil engineering experience. Together, they are available to complete analysis and design while also acting as mentors for other team members.

Hayner/Swanson, Inc., now IMEG, has identified additional staff members that can be called upon to complete any needed projects. When necessary, additional IMEG staff is assigned temporarily to assist in the effort and help bring the design process back within the schedule parameters. As a firm of 2,800 employees, we have the resources to augment staff to accommodate any schedule need.

Our team includes S.W. Cole Engineering, Inc. to provide geotechnical engineering support. We have worked with S.W. Cole on many public sector projects and value the qualifications and responsiveness they bring to our team.



We have extensive experience managing the effort to secure all permits needed for our projects. At times, we need to supplement our resources with local subconsultants for a particular environmental concern. We enjoy strong professional relationships with several environmental engineering firms and can bring in a subconsultant with specific expertise which may be needed.



4. | Project Team

HIGHWAY AND BRIDGE DESIGN ENGINEERING SERVICES IN SUPPORT OF LPA PROJECTS		YEARS OF EXPERIENCE	YEARS WITH FIRM	LPA CERTIFIED	PROJECT MANAGEMENT	HIGHWAY DESIGN	BRIDGE DESIGN	STRUCTURAL ENGINEER	ALTERNATIVE PROCUREMENT METHODS	CORRIDOR STUDY PLANNING	BRIDGE INSPECTION	BRIDGE LOAD RATING	HYDROLOGY	ENVIRONMENTAL	TRAFFIC ANALYSIS	GEOTECHNICAL ENGINEER	SURVEYOR	PUBLIC INVOLVEMENT	
KEY PERSONNEL	PROJECT ROLE																		
HAYNER/SWANSON, NOW IMEG																			
Scott Murphy	Project Manager/Engineer of Record/ Highway Lead	29	29	X	X	X							X						
John Vancor	Project Manager/Engineer of Record	40	15		X	X			X	X									X
Steven Myer	Bridge Lead	23	20				X	X			X	X							
Yanling Leng	Bridge Engineer	20	7				X	X			X	X							
Michael Gutenkauf	River Hydrology Engineer	25	24										X						
Rebecca Goldberg	Traffic Engineer	24	20			X				X					X				
Paul Hayner	Permitting and Stormwater Design	50	46			X			X				X	X					X
Ethan Beals	Permitting and Stormwater Design	6	6			X							X	X					
Ethan Holmes	Project Management Const. Admin.	19	19	X	X	X								X					
Brandon Lambert	Highway/Stormwater Design/ADA	7	7			X													
Thomas Zajac	Highway/Stormwater Design/ADA	14	14			X							X						X
Stephen O'Neill	Highway/Stormwater Design/ADA	40	9			X													X
Kevin Diggins	Highway/Stormwater Design/ADA	4	2			X													
Francisco Mota	Highway/Stormwater Design/ADA	6	3			X													
Earle Blatchford	Highway/Stormwater Design/ADA	29	29			X													
Lee Gagnon	Principal Surveyor	35	12																X
Paul Liversidge	Senior Surveyor	44	10																X
Dennis Pollock	Senior Surveyor	35	9																X
S.W. COLE, INC.																			
Courtney Mattson	Project Manager/Geotechnical	13	2		X											X			
Chad Michaud	Principal-in-Charge/Geotechnical	27	26		X											X			

Section 5

References



5. | References

References

CITY OF NASHUA, NH

Lisa Fauteux
Director of Public Works
City of Nashua
P.O. Box 2019
Nashua, NH 03061-2019
P: 603.589.3140
E: dpwrequest@nashuanh.gov

CITY OF NASHUA, NH

Daniel Hudson, PE
City Engineer
City of Nashua
P.O. Box 2019
Nashua, NH 03061-2019
P: 603.589.3134
E: dpwengrequests@nashuanh.gov

TOWN OF CONCORD, MA

Stephen Dookran, PE
Town Engineer
Town of Concord
133 Keyes Road, 2nd Floor
Concord, MA 01842
P: 978.318.3210
E: sdookran@concordma.gov
(Former City Engineer for City of Nashua, NH)

As Director of Public Works, **Lisa Fauteux** has first-hand knowledge of the commitment we make to our clients and the thoroughness of project planning and management.

In his capacity as City Engineer, **Daniel Hudson** has worked closely with us on projects that have included pavement rehabilitation, road design, stormwater management, and project management.

Through past experience as the Nashua City Engineer and current position as Concord Massachusetts Town Engineer, **Stephen Dookran** has seen our commitment to high quality planning, design engineering, and project management. In Concord, we have worked with Steve on roadway rehabilitation, complete streets, and transportation safety improvement projects.

Section 6

Appendix



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Resumes

Scott Murphy, PE

Project Manager/Engineer of Record/Highway Lead



Scott is a senior civil engineer with 29 years of experience in the civil engineering field with specialized experience in roadway design, stormwater management, roadway design, pavement rehabilitation, and construction administration. His typical responsibilities include engineering design, specifications, cost estimates, feasibility studies, preparation of bid documents and construction coordination for municipal and private development projects. Scott also has expertise in reviewing existing conditions for ADA compliance and detailing improvements to address non-compliant sidewalk conditions.

Project Highlights

- City of Nashua, NH, Broad Street Parkway. Assisted in overall administration for this \$60 million LPA roadway and bridge construction project. Assisted in the final design for improvements to Pine Street and Palm Street, a densely developed urban neighborhood. Participated in review of various concepts for the Parkway design and intersection geometrics.
- City of Lincoln, MA, On-call Services. Included roadway design, review of alternatives for intersection geometrics improvements, and preparation of construction cost estimates. One assignment included performing an evaluation of a concept to extend a roadside path along Concord Road from Baker Bridge Road to the Walden Pond recreational area. Key concerns included safety, environmental impacts, aesthetics, and right-of-way. Another included review of alternatives to enhance pedestrian safety for a heavily traveled intersection. Options for traffic calming and improved signage were studied. Project included final design of preferred alternative.
- City of Nashua, NH, Annual Paving Program. Reviewing condition of candidate streets and recommending rehabilitation techniques.
- City of Nashua, NH, Federally Funded Arterial Roadway Paving. Extensive grading design for reconstruction of pedestrian ramps to achieve ADA compliance.
- City of Nashua, NH, City Sidewalk Program. Reconstruct approximately 80 sidewalk ramps to achieve ADA compliance
- City of Malden, MA, Town-wide Paving Program including Safety Enhancements at Intersections, New Sidewalks, Access Improvements, Storm Drainage, Granite Curbing, and Landscaping
- City of Brookline, NH, New Sidewalk Construction Oversight along Old Milford Road and Pepperell Road (NH Route 130). All work in accordance with the NHDOT LPA Manual

Experience

29 Total, 29 with IMEG

Education

University of Maine Orono, BS Civil Engineering

Certifications

Local Public Agency (LPA)

Registrations

Professional Engineer

New Hampshire (No.11386)

Licensed NHDES RSA 485-A

Designer Permit No. 1374

Approved MASS DEP Soil Evaluator (#SE1715)

Affiliations

ASCE

CSHE



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Resumes

John Vancor, PE Project Manager/Engineer of Record



John has over 40 years of experience in engineering, focused on public infrastructure improvements. As a former City Engineer and seasoned consultant, John has managed all phases of project development, from initial planning to construction oversight. His expertise includes the design and management of projects involving highways, municipal roads, sidewalks, stormwater systems, sanitary sewers, and water facilities. With a strong track record and deep technical knowledge, John is dedicated to delivering high-quality solutions tailored to the needs of his clients.

Project Highlights

- City of Nashua, NH, 1.8-Mile Broad Street Parkway Linking the F.E. Everett Turnpike to Downtown Nashua. Project responsibilities included construction administration complying with LPA and FHWA requirements, preparation and tracking of budgets for construction costs, recommendations for project implementation strategy, coordination with City Boards, NHDOT, FHWA, NRPC, project consultants and contractors, permitting authorities, and members of the public.
- City of Nashua, NH, Harbor Avenue Sewer Separation of Combined Sewers and Reconstruction of 9,000-lf of Roadway. Included assessment, design, and permitting for a new 60-inch outfall to Salmon Brook.
- City of Nashua, NH, 3,600-lf Pine and Palm Street Urban Roadway Improvements. Work included upgrade and improvements to storm drainage and sanitary sewer system. Project included one-way traffic couple over four city blocks to address traffic growth. Traffic calming, provisions for pedestrians and bicyclists, and safety improvements.
- Town of Lincoln, MA, On-call Engineering Services. Recent assignments include survey in support of improvements to a parking lot, survey and design of access improvements to a Town owned facility, safety improvements to a mid-block crosswalk and coordination with a major state highway project impacting the Town.
- F.E. Everett Turnpike, Nashua, NH, 4.5-mile Highway Designer for the Final Design and Reconstruction of F.E. Everett Turnpike between Exits 3 through 7

Experience

40 Total, 15 with IMEG

Education

Rensselaer Polytechnic Institute Troy,
BS Civil Engineering

Registrations

Professional Engineer

New Hampshire (07479)

Connecticut (0024152)

Massachusetts (47255)

Rhode Island (0008935)

Vermont (018.0088629)

Affiliations

New Hampshire Public Works
Association Board of Directors

American Public Works Association

Past Chair, American Society of Civil
Engineers NH Technical Committee

Publications

ASCE Footprint Design Manual for
Local Roads

(Participated in the Development as a
member of the ASCE National Local
Roads & Streets Committee)



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Resumes

Steven Myer, PE

Bridge Lead



Steve is an award-winning Professional Engineer and is involved in all aspects of civil engineering design and construction. He is experienced in bridge design and inspection, bridge hydraulic analysis, watershed modeling, and construction administration. Steve has worked with the South Dakota Department of Transportation for various project types. Steve is proficient in the use of several design software programs. As the Bridge Market Leader, his primary duties include project management, design engineering, client relations, and quality control.

Project Highlights

- Brown County Highway Department, Frederick, SD, One 204'-10 5/8" Prestressed Girder Bridge Replacement
- Brown County Highway Department, Frederick, SD, Structure No. 07-110-057 Replacement - Construction Administration
- Browns Valley, MN, Structure No. 55-170-220 Continuous Concrete Bridge Replacement
- Day County Highway Department, Pierpont, SD, Two 11'x5/ Cast-in-Place Structures
- Day County Highway Department, Waubay, SD, Structure No. 19-345-165 Replacement - Construction Administration
- Hamlin County Highway Department, Hazel, SD, 183rd Street Construction and Bridge Removal
- Hamlin County Highway Department, Hazel, SD, Removal of Bridge 29-020-051, Reconstruct 483rd Avenue, and Re-route 183rd Street for 1/3 Mile
- Jones County, Murdo, SD, 2022 Bridge Inspections
- Lyman County, Kennebec, SD, 2022 Bridge Inspections
- McCook County Highway Department, Bridgewater, SD, Design for the Replacement of Structure No. 44-010-185
- Ranch at Rock Creek, Philipsburg, MT, Bridge Style, Materials Investigation, Site Visit, and Reporting for Future Bridge Construction
- Roberts County Highway Department, Wilmot, SD, Structure No. 55-180-354 Replacement
- South Dakota Department of Transportation, Multiple Counties, SD, 2021 Bridge Inspections

Experience

23 Total, 20 with IMEG

Education

South Dakota State University, BS
Civil Engineering
Normandale Community College, AA

Registrations

Professional Engineer

North Hampshire (Pending)

South Dakota (8749)
Colorado (PE-0064522)
Minnesota (47304)
Montana (75363)
Nebraska (E19143)
North Dakota (40555)
New York (110114)

Affiliations

ASCE
South Dakota Engineering Society



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Resumes

Yanling Leng, PHD, PE Bridge Engineer



Yanling is an expert in bridge design/load rating, inspection, rehabilitation, and forensic analysis. She has comprehensive knowledge, skills, and experience in the bridge life cycle. Yanling's work has been informed by her research into bridge safety and maintenance with a focus on the refined safety evaluation of bridge structures. She is a prolific author of peer-reviewed articles, and she has a passion for teaching and mentoring. She lectures Bridge Aesthetics at the Hebei Academy of Fine Arts, delivers STEM experiences to young children by leading a First Lego Explore League team, and presents a STEM lecture series at an elementary school. Yanling is also named a MIDAS Top Expert Engineer. She has received multiple outstanding awards including ENR's National Top 20 Under 40 Award in 2023.

Project Highlights

- South Dakota Department of Transportation, Various, SD, 2024 Bridge Inspections
- South Dakota Department of Transportation, Various, SD, 2023 Bridge Inspections
- South Dakota Department of Transportation, Various, SD, 2022 Bridge Inspections
- South Dakota Department of Transportation, Various, SD, 2021 Bridge Inspections
- Beadle County, SD, Design of 3-span Prestressed Concrete Girder Bridge
- City of Sioux Falls, SD, Benson Road Bridge Deck Replacement
- City of Worthington, MN, Railroad Unloading Pit Design
- Hamlin County Highway Department, Estelline, SD, Structure 29-270-144 Survey, Hydraulics, and Rehabilitation Feasibility Study
- Lake Pontchartrain, New Orleans, LA, US 11 Bridge Inspection
- Louisiana Department of Transportation, Girder Design Standards Design Calculations Review
- Multiple Locations, SD, Multiple Designs of Reinforced Concrete Slab Bridges
- Yankton County, SD, Design of 496' Long Steel Plate Girder Bridge

Experience

20 Total, 7 with IMEG

Education

New Mexico State University, PhD
Civil Engineering with Minor in
Applied Statistics

Research Institute of Highway,
Ministry of Transport of China
(RIOH), MS Bridge Engineering
Chongqing Jiaotong University, BS
Road Engineering

Registrations

Professional Engineer
South Dakota (13597)
Montana (73686)
Texas (118911)

Awards

ENR 2023 National Top 20 Under 40
Honoree

ENR Mountain States 2023 Top
Young Professionals

China Highway Society Awards for
Science Project, 1st Top Prize



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Resumes

Rebecca Goldberg, PE, PTOE Traffic Engineer



Rebecca has nearly 25 years of experience in transportation design, analysis, and permitting. She prepares and reviews traffic impact and parking studies; prepares and reviews parking and signal plans; sight distance analysis; signal warrant studies; traffic calming and safety studies; access management; permitting; traffic signal design, modification, and interconnect plans; signal construction observation; parking lot and garage layout; pavement marking plans; field-chaining pavement markings; roundabout design; Complete Streets-ADA retrofits; and engineer's cost estimates. Rebecca regularly testifies as a qualified traffic engineering expert for municipal boards and public meetings. Rebecca has been recognized as an Institute of Transportation Engineers Peer Review Expert on the ITE Trip Generation Expert Review and Urban Trip Generation Committee. She reviewed the 10th Edition Trip Generation Manual, 4th Edition Transportation Planning Handbook, and the 5th and 6th Editions of the Parking Generation Manual prior to publication and wrote a section of the 6th Edition Parking Generation Manual.

Project Highlights

- Nassau County Department of Public Works, Wantagh, NY, Beech Street Complete Streets Corridor Study and Signal Plans. Assisted the selection and analysis of drainage and road diet elements.
- Suffolk County Community College, Selden, NY, Traffic Safety Study with Traffic Counts, Speed Studies, Sight Distance Measurements, Pedestrian Feature Inventory, and Parking Counts
- Town of Babylon, NY, On-call Traffic Engineering Site Plan Review. Reviews site plan and subdivision applications and issues Traffic Engineering comment letters associated with ADA compliance, Complete Streets, circulation, parking, striping, traffic, and signage.
- South Nassau Communities Hospital, Oceanside & Long Beach, NY, State Environmental Quality Review Liaison, DEIS Review, and Site Plan Reviews
- Route 110 BRT (Bus Rapid Transit), Long Island, NY, Alternatives Analysis and Design. Prepared BRT trunk alignment conceptual engineering design along 5 miles of Route 110.
- JFK Airport, Queens, NY, Jet Blue Terminal Safety Study. Traffic inventory at the former Jet Blue Terminal 6 to develop short-term improvements and prepare conceptual plans to separate drop-offs/pickups and address daily safety concerns.

Experience

24 Total, 20 with IMEG

Education

Polytechnic University of NY, BS
Civil Engineering
Nassau Community College, AS
Engineering Science

Registrations

Professional Engineer
New York (083576)

Certifications

Professional Traffic Operations
Engineer (PTOE)

Affiliations

Institute of Transportation Engineers
(ITE) Met Section

- Technical Reviewer, 4th Edition Transportation Planning Handbook
- Technical Reviewer, ITE Trip Generation Data Collection website and 10th Edition Trip Generation Manual
- Technical Reviewer, 5th Edition Parking Generation manual and website

Design Professionals Coalition of
Long Island (DPCLI)

- Treasurer (2017-present)
- Society of Women Engineers (SWE)
Region E Members At Large
- Alternate Senator (2010-2011)
- Newsletter Editor (2010-2011)

SWE New York Section

- President (2007-2009)
- L.I. Vice President (2006-2007)
- Newsletter Editor (2004-2007)



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City of Nashua Broad Street Parkway

Nashua, NH

The project: HSI, now IMEG, provided surveying, design, project management, and construction administration services to the City of Nashua on their project to construct the new federally funded 1.8-mile Broad Street Parkway.

The goal: The City undertook this ambitious project in an effort to mitigate downtown traffic congestion and encourage economic development.

Federal and local funding: In 2008, the City faced a project with an estimated cost well in excess of the \$44 million federal funding available. The City addressed this budget gap with the approval of proposed bonding of up to \$37.6 million. HSI, now IMEG, was responsible for the extensive record keeping effort required on all federally funded construction contracts and consistently received high marks during Federal Highway Administration (FHWA) file audits.

Project amenities: The project included reconstruction of urban streets with associated accessibility and safety improvements, two new railroad overpass bridges, two 40-foot-high curved retaining walls, and a new 300-foot-long three-span bridge over the Nashua River.

Scope of work: HSI, now IMEG, provided comprehensive project management support to the City. We completed all needed survey tasks and designed significant portions of the project. Our responsibilities also included support during permitting, management of a significant property acquisition effort, and construction administration of concurrent contracts. All of the work was completed in strict accordance with New Hampshire Department of Transportation (NHDOT) Local Public Agency (LPA) and FHWA requirements. We routinely coordinated with various stakeholders, including City Boards, NHDOT, FHWA, project consultants, contractors, permitting authorities, and the public. Additionally, we managed the work of specialists who provided support in addressing property appraisals, as well as the challenges related to mediation of impacts related to extensive contaminated soil, significant wetland impacts, historic buildings, environmental justice neighborhoods, and relocation of businesses. HSI, now IMEG, also facilitated



Size	1.8-miles
Cost	\$61 million
Completion	2023
Services	Civil, Survey, Construction Administration
Awards	ACEC NH EEA Engineering Excellence Award, Overall Winner, 2017

extensive utility coordination and relocation for both underground and aerial facilities.

Schedule: HSI, now IMEG, established a project delivery strategy which depended on implementing an aggressive schedule. In order to minimize disruption, the construction phase of this schedule was further compressed by overlapping contracts.

Project outcome: While the Parkway opened to traffic in December 2015, significant work remained. The mitigation to cultural resources was successfully completed in 2024.

The project allows for economic redevelopment of Nashua’s Millyard Technology Park and 29-acre former Mohawk Tannery facility. The Broad Street Parkway also provides a bicycle and pedestrian friendly route to downtown and Mine Falls Park.



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Projects



Brown County Frederick, SD

BRIDGE REPLACEMENT NEAR THE CITY OF FREDERICK

The bridge located near the City of Frederick was posted at 25% of load carrying capacity due to deteriorating conditions. The road where the bridge was located was a high traffic area due to the nearby lake.

IMEG completed the hydrology and hydraulic analysis of the existing 90-foot structure and proposed two alternatives for replacement. Alternate 1 was a 124-foot structure, 3-span, concrete slab bridge. Alternate 2 was a 124-foot, 2-span, bulb-tee bridge. Due to the scour, another design was proposed, and Brown County selected a 204-foot, 3-span, prestressed girder bridge. IMEG completed the design, design check, load rating, and construction plans for the selected structure. The bridge provided a 28-foot clear roadway width and T-101 bridge railing on each side. The abutments were integral concrete supported on HP 12x53 steel piles. The bents were 2-column concrete bents supported on HP 12x53 steel piles

Size	Cost	Completion
204-feet	\$1.7M	2023



Day County Highway Department Day County, SD

BOX CULVERT ON BLUE DOG LAKE

The 74-foot steel stringer single span bridge on Day County Highway 1 over Blue Dog Lake had faced flooding for several years, causing the deck to deteriorate at an accelerated rate. Day County received a state Bridge Improvement Grant to help replace the existing bridge, which was built in 1952, with a new four-cell cast-in-place concrete box culvert. Preliminary engineering services included modeling the existing bridge hydraulically and developing three choices that perform equally. A final hydraulics report was prepared and approved by the South Dakota DOT. IMEG assisted Day County in securing a replacement grant which included preparation of structural engineering plans, specifications, bidding documents, and cost estimates. After the project was let with a competitive bid process, IMEG oversaw the construction.

Size	Cost	Completion
74-feet	\$1.7M	2023

Sheet piling was installed to create a cofferdam around the existing bridge to protect the site from the surrounding water. Transfer pumps were used continuously to allow workers to excavate and prepare the road/lakebed for the project. Thermal concrete blankets were used to keep the concrete's temperature above 50 degrees for three days, then above 40 degrees for two more days for curing. The thermal blankets captured the heat from the concrete curing process to maintain the required temperatures.

Day County has a safe, reliable culvert. As lake levels rise, the county can adjust the road grade around the culvert to prevent flooding.



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Projects



Size	Cost	Completion
4.7-miles	\$4.1M	Ongoing

City of Nashua

Nashua, NH

FEDERALLY FUNDED PAVING PROGRAM (LPA PROEJCT)

Hayner/Swanson, Inc., now IMEG, supported the City of Nashua in their project to pave Amherst Street, Somerset Parkway, Broad Street, and Kinsley Street. The project was funded by repurposed earmark funding remaining from the Broad Street Parkway project.

We reviewed each project for ADA access concerns. Although the footprint of the roadway did not change, ADA compliance presented some challenging concerns to address. We worked in close coordination with the City of Nashua and NHDOT to identify and detail solutions which would result in compliance without the need for right-of-way impacts.



Size	Cost	Completion
Varies	Varies	2016 - Ongoing

City of Malden

Malden, MA

ROADWAY AND SIDEWALK RECONSTRUCTION PROGRAM

Since 2016, Hayner/Swanson, Inc., now IMEG, has provided survey, design, bid phase support, and construction services on an annual program which has rehabilitated an average of 1.3-miles of roadway at an average cost of \$2.5 million per year.

The work has included grading improvements to improve drainage and sidewalk accessibility and ADA compliance.



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Projects



City of Nashua

Nashua, NH

ANNUAL ROADWAY REHABILITATION PROGRAM

Since 2018, Hayner/Swanson, Inc., now IMEG, has provided support to the City of Nashua in their annual roadway rehabilitation program. Services have included condition assessments, specification of rehabilitation techniques, preparation of bid documents, and construction administration. Since 2018, the program has rehabilitated on average 21 miles of roadway at a cost of \$8 million per year.

Size	Cost	Completion
Varies	Varies	2018 - Ongoing



Town of Lincoln

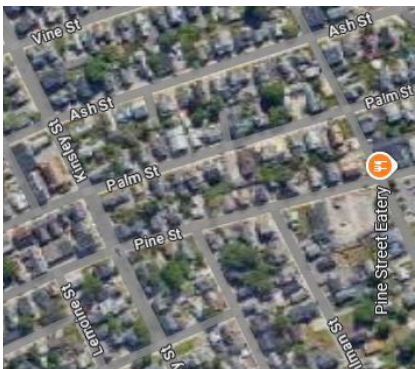
Lincoln, MA

COMPLETE STREET PROGRAM

Hayner/Swanson, Inc., now IMEG, has provided extensive services to the Town of Lincoln in their Complete Street program. We assisted in drafting the 2016 Complete Street Policy and have designed numerous specific improvements including intersection reconstruction, roadside path improvements, and crosswalks.

We have worked with the Town Bicycle and Pedestrian Advisory Committee to evaluate ten proposed projects. We have also assisted in preparing a successful request to Manual on Uniform Traffic Control Devices (MUTCD) for approval to conduct an experimental application of advisory shoulder treatment on a local road. We monitored operations during this experience and prepared the summary report for submittal to MUTCD.

Size	Cost	Completion
Varies	Varies	2016 - Ongoing



City of Nashua

Nashua, NH

PINE AND PALM STREET RECONSTRUCTION

Hayner/Swanson, Inc., now IMEG, prepared the design for this \$2.5 million contract to reconstruct 3,600 linear feet of roadway and sidewalk in this highly developed urban neighborhood. Provisions for traffic calming including bump outs and raised crosswalks were important aspects of this project.

Size	Cost	Completion
3,600-lf	\$2.5M	2014



6. | Appendix



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Geotechnical Engineering

Established in 1979 in Bangor, Maine, S. W. Cole Engineering, Inc. is a geotechnical engineering, construction materials testing and special inspections firm serving private and public sector clientele across New England from offices in Maine, New Hampshire, Massachusetts, Rhode Island and Vermont. Our team of engineers and technicians provide services on more than 3,000 projects each year.

Our geotechnical engineers investigate, characterize and engineer solutions to ground conditions to support our built environment. We are thinkers, problem solvers and team players to our very core.

We understand ground conditions and the challenges of designing, constructing and commissioning facilities in New England. Our geotechnical engineers work shoulder-to-shoulder with owners, designers, regulators and contractors, from concept to commissioning - and that's why the majority of our business comes from repeat or referral clients who have benefited from our sensible solutions, responsive, professional service and team approach.

Our licensed engineers provide sensible geotechnical solutions for foundations, earthwork and pavements associated with building, site development and infrastructure projects in New England.

- Geotechnical Feasibility Studies
- Subsurface Investigations
- Spread Footing Design Parameters
- Deep Foundation Engineering and Design
- Ground Improvement Engineering
- Excavation and Dewatering Consulting
- Retaining Wall and Slope Stability Analyses
- Waterfront Structures and Bulkheads
- Pavement Engineering and Design
- Geotechnical Laboratory Testing
- Geotechnical Construction Observations
- Geotechnical Instrumentation and Monitoring

SUBSURFACE INVESTIGATIONS - FOUNDATIONS - EARTHWORK - PAVEMENT



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