O-1 BSRE_Point Wells Witness List
PFN: 11 101457 LU

BEFORE THE HEARING EXAMINER
IN AND FOR THE COUNTY OF SNOHOMISH

BSRE POINT WELLS, LP , Appellant v. SNOHOMISH COUNTY DEPARTMENT OF PLANNING & DEVELOPMENT SERVICES, Respondent.	NO. 11-101457 LU BSRE POINT WELLS, LP'S WITNESS LIST

Pursuant to the Snohomish County Hearing Examiner's Scheduling Order dated April 12, 2018, appellant, BSRE Point Wells, LP ("BSRE") hereby submits its witness list.

I. WITNESS LIST

At this time, BSRE anticipates calling the following witnesses to testify in the open record hearing:

1. Peter Busby, Principal, Managing Director of Perkins + Will. Expected to testify about the site plan, design, phasing, secondary access road, fire safety, building setbacks and engineering issues, ENVAC providers, and parking.

2. Kay Kornovich, Director, Managing Principal of Perkins + Will. Expected to testify about the site plan, design, phasing, secondary access road, fire safety, building setbacks and engineering issues, ENVAC providers, and parking.

KARR TUTTLE CAMPBELL
701 Fifth Avenue, Suite 3300
Seattle, Washington 98104
Main: (206) 223 1313
Fax: (206) 682 7100

3. Dan Seng, Associate Principal, Project Manager of Perkins + Will. Expected to testify about the site plan, design, phasing, secondary access road, fire safety, building setbacks and engineering issues, ENVAC providers, landscaping and parking.

4. Carsten Stinn, Senior Associate, Senior Project Designer of Perkins + Will. Expected to testify about the site plan, design, phasing, secondary access road, fire safety, building setbacks and engineering issues, ENVAC providers, landscaping and parking.

5. Mark Davies, Civil Engineer of MIG/SvR. Expected to testify about fire access, drainage, and infiltration.

6. Kirk Harris, Transportation Engineer of David Evans and Associates, Inc. Expected to testify about traffic issues and binding trip limit.

7. Richard Pratt, Senior Biologist of David Evans and Associates, Inc. Expected to testify about critical areas, shoreline management, drainage, wetlands and environmental issues.

8. Victor Salemann, Principal of Transportation Solutions, Inc. Expected to testify about traffic issues.

9. Brad Tong, Partner/Project Manager of Shiels Obletz Johnson. Expected to testify about high capacity transit and public transportation compatibility and accessibility.

10. Jack Molver, Civil Project Manager for David Evans and Associates, Inc. Expected to testify about the short plat, flood hazard permit, railroad crossing and deviation requests.

11. Kevin Jeffers, David Evans and Associates, Inc. Expected to testify about the railroad crossing and communication with BNSF.

12. O. Gray Rand III, David Evans and Associates, Inc. Expected to testify about shoreline issues, shoreline management regulations, flood hazard permit and deviation requests.

13. Roy Jensen, Senior Associate Hydrogeologist of Hart Crowser. Expected to testify about geotechnology, groundwater monitoring and modeling, and soil testing.

14. Julie K.W. Wukelic, Senior Principal Engineer of Hart Crowser. Expected to testify about environmental concerns, remediation, soil and groundwater testing and modeling.

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Seattle, Washington 98104
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15. John Bingham, Hart Crowser. Expected to testify about critical areas, geologically hazardous areas, wetlands and fish and wildlife habitat conservation areas, drainage, and secondary access.

16. Bill Gerken, Senior Coastal Engineer/Project Manager of Moffatt & Nichol. Expected to testify about wind and wave analysis.

17. Richard Schipanski, Manager, Planning and Environmental Review of EA Engineering, Science, and Technology, Inc. Expected to testify the SEPA review and remediation issues.

18. Laurel Hunter, Senior Associate of Peter Walker Partners. Expected to testify about the landscaping on the property.

19. Mark Dagel, Hydrogeologist of Hart Crowser. Expected to testify about remediation.

20. Michael Swenson, Principal of The Transpo Group. Expected to testify about traffic issues and a binding trip limit.

The resumes for most of these witnesses are attached as **Exhibit A**.

The resumes for the following individuals will be submitted as soon as possible: Kevin Jeffers, John Bingham, and Michael Swenson.

In addition to the above-named witnesses, counsel for BSRE, including Douglas A. Luetjen, Gary D. Huff, and Jacque E. St. Romain, may testify about: the facts regarding BSRE's permits, applications and supporting documents; correspondence with the Department of Natural Resources and Sound Transit; correspondence with Snohomish County Planning and Development Services; and building heights and variance requests.

BSRE reserves the right to call any witnesses identified by any other party, to identify additional witnesses on or before May 16, 2018, to call rebuttal witnesses consistent with the Snohomish County Hearing Examiner Rules of Procedure, and to call substitute witnesses if the witnesses identified above become unavailable.

KARR TUTTLE CAMPBELL
701 Fifth Avenue, Suite 3300
Seattle, Washington 98104
Main: (206) 223 1313
Fax: (206) 682 7100

Dated this 30th day of April, 2018.

Gary D. Huff, WSBA #6185
Douglas A. Luetjen, WSBA #15334
J. Dino Vasquez, WSBA #25533
Jacque E. St. Romain, WSBA #44167
KARR TUTTLE CAMPBELL
701 Fifth Avenue, Suite 3300
Seattle, WA 98104
Telephone: 206-223-1313
Facsimile: 206-682-7100
Email: dvasquez@karrtuttle.com
Attorneys for Appellant

CERTIFICATE OF SERVICE

I, Heather L. Hattrup, affirm and state that I am employed by Karr Tuttle Campbell in King County, in the State of Washington. I am over the age of 18 and not a party to the within action. My business address is: 701 Fifth Ave., Suite 3300, Seattle, WA 98101. On this day, I caused to be filed with Snohomish County Planning and Development Service a true and correct copy of BSRE Point Wells, LP's Witness List. I caused the same to be served on the parties listed below in the manner indicated.

Matt Otten
Snohomish County Prosecuting Attorney
Robert Drewel Building
3000 Rockefeller Avenue, 8th Floor, M/S 504
Everett, WA 98201
Ashley.lamp@co.snohomish.wa.us
Matthew.otten@co.snohomish.wa.us

- ☐ Via U.S. Mail
- ☒ Via Hand Delivery
- ☒ Via Electronic Mail
- ☐ Via Overnight Mail
- ☐ CM/ECF via court's website

Snohomish County Hearing Examiner
3000 Rockefeller Avenue, M/S 405
Everett, WA 98201
kdavis@co.snohomish.wa.us

- ☐ Via U.S. Mail
- ☒ Via Hand Delivery
- ☒ Via Electronic Mail
- ☐ Via Overnight Mail
- ☐ CM/ECF via court's website

I declare under penalty of perjury under the laws of the State of Washington that the foregoing is true and correct, to the best of my knowledge. Executed on this 30th day of April, 2018, at Seattle, Washington.

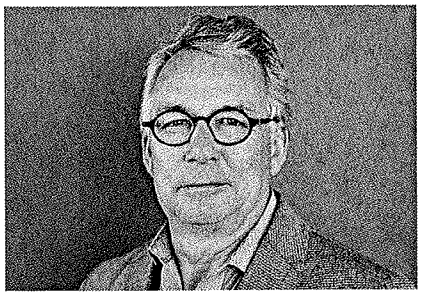
Heather L. Hattrup
Assistant to J. Dino Vasquez
and Jacque E. St Romain

KARR TUTTLE CAMPBELL
701 Fifth Avenue, Suite 3300
Seattle, Washington 98104
Main: (206) 223 1313
Fax: (206) 682 7100

EXHIBIT A

PETER BUSBY, C.M., FRAIC, LEED® FELLOW

Principal, Managing Director



Internationally recognized and published for his contributions to Architecture and Planning, Peter Busby's award-winning portfolio embodies his philosophy of social responsibility and commitment to sustainable design. Since opening his Vancouver practice in 1984, Peter's body of work has gained a reputation for design excellence and innovation, becoming a powerful catalyst in the growth of the green architecture movement in North America and abroad. After merging his firm with Perkins+Will in 2004, he became a driving force across the company, compelling its industry-leading sustainable design initiatives. In 2012, Peter relocated to be the Managing Director of Perkins+Will's San Francisco office.

EDUCATION

Honorary Doctorate in Science,
Ryerson University

Bachelor of Architecture,
University of British Columbia

Bachelor of Arts, Political Philosophy,
University of Toronto

REGISTRATIONS

Registered Architect: British Columbia, Alberta, Ontario

PROFESSIONAL AFFILIATIONS

LEED® Fellow

Fellow, Cascadia Green Building Council

Member, Order of Canada

Fellow, Royal Architectural Institute of Canada

Founder, Board Member, and Chair, Canada Green Building Council

PROFESSIONAL ACTIVITIES

CaGBC Faculty, 2003-2005

USGBC Faculty, 1997-2002

PUBLICATIONS

Busby: Architecture's New Edges, Ecotone, 2015.

Busby: Learning Sustainable Design, Janam Publications, 2007.

CIVIC / CORPORATE / COMMERCIAL

Abu Dhabi Capital District Plan
Abu Dhabi, U.A.E.

The Acqua + Vento Mixed-Use Development
LEED-NC Platinum Certified
Calgary, Alberta

Blatchford Redevelopment
Beyond Carbon-Neutral Community
Edmonton, Alberta

Chaudière Les Iles Master Plan
Sustainable Community
Windmill Developments
Chaudière Island, Canada

Confidential Client
Multiple Projects:
Employee Center
Office Building
South San Francisco, California

Cross Roads Mixed-Use Development
LEED-CS Gold Certified
Vancouver, British Columbia

District of North Vancouver Municipal Hall
Addition + Renovation
North Vancouver, British Columbia

Dockside Green Development
Master Plan
LEED-ND Platinum Certified
Victoria, British Columbia

Dockside Green Development
Balance + Synergy (Phases 1 +2)
LEED-NC Platinum Certified
Victoria, British Columbia

Eau Claire Market Redevelopment
and Master Plan
Harvard Buildings Inc +
Harvard Developments Inc.
Calgary, Alberta

Edmonton City Centre Redevelopment
Beyond Carbon-Neutral Community
Edmonton, Alberta

Ioco Lands Master Plan
Vancouver, British Columbia

Living with Lakes Centre
Laurentian University
LEED-NC Platinum Target
Sudbury, Ontario

Marine Gateway Mixed Use Development
Vancouver, British Columbia

Mount Pleasant Community Centre
LEED-NC Gold Target
Vancouver, British Columbia

North Macadam Development Master Plan
+ Merriweather Towers
LEED-NC Gold Certified
Portland, Oregon

Olaya-Batha Corridor Development Plan
Riyadh, Saudi Arabia

Plan Al Ain 2030
Abu Dhabi, United Arab Emirates

Plan Al Ain Region
Abu Dhabi, United Arab Emirates

PETER BUSBY /

Plan Abu Dhabi 2030
Abu Dhabi, United Arab Emirates

Plan Al Gharbia 2030
Abu Dhabi, United Arab Emirates

Olayya Urban Development Guidelines
Riyadh, Saudi Arabia

One Wall Centre
Vancouver, British Columbia

Samuel Brighouse Elementary School
Vancouver, British Columbia

Telus/William Farrell Building + Atrium
Vancouver, British Columbia

Westbank
Frye Residential Towers
Seattle, Washington

White Rock Operations Building
LEED-NC Gold Certified
White Rock, British Columbia

VanDusen Botanical Garden Visitor Center
Vancouver Board of Parks and Recreation
Vancouver, British Columbia

HIGHER EDUCATION

Arts and Social Sciences Complex
Simon Fraser University
Burnaby, British Columbia

Buchanan Building
University of British Columbia
Vancouver, British Columbia

Center for Novel Therapeutics
University of California, San Diego
San Diego, California

Centre for Brain Health - Neuro &
Psychiatric Translational Medicine
University of British Columbia
Vancouver, British Columbia

Centre for Interactive Research on
Sustainability (CIRS),
University of British Columbia
Vancouver, British Columbia

Computing Science Building
York University
Toronto, Ontario

Energy. Environment. Experiential. Learning
(EEEL)
University of Calgary
Calgary, Alberta

Earth Sciences Building (ESB)
University of British Columbia
Vancouver, British Columbia

Husky Union Building
University of Washington
Seattle, Washington

Murray Fraser Hall
University of Calgary
Calgary, Alberta

Nicola Valley Institute of Technology
Eagle's Perch Campus
Merritt, British Columbia

Schnitzer Campus Framework Plan
Oregon Health + Science University
Portland, Oregon

School of Architecture,
Lasserre Building
University of British Columbia
Vancouver, British Columbia

Student Services Center
University of Texas at Dallas
LEED-NC Platinum Certified
Dallas, Texas

HEALTHCARE

Chinook Regional Hospital
LEED® Silver Target
Lethbridge, Alberta

Lucile Packard Children's Hospital Stanford
Hospital Expansion
Palo Alto, California

TRANSPORTATION

Brentwood + Gilmore Skytrain Stations
Burnaby, British Columbia

Canada Line - 3 Elevated Stations
Metro Vancouver
Richmond, British Columbia

City of Ottawa
Ottawa Light Rail Transit Stations
Ottawa, Ontario

Confidential Airport Concept Design &
Sustainabilty Master Plan Conformance
Saudi Arabia

Confidential Transit Stations
Saudi Arabia

Honolulu Authority for Rapid Transit
HART Metro Stations
Honolulu, Hawaii

Municipal Government of Chongqing
Fuling Transit Hub
Chongquing, China

King Abdulaziz International Airport
Jeddah, Saudi Arabia

Riyadh Development Authority
Riyadh BRT
Riyadh, Saudi Arabia

Riyadh Development Authority
Riyadh Metro Stations
Riyadh, Saudi Arabia

Texas Central
High-Speed Rail Station Area Plan
Dallas, Texas

PETER BUSBY /

PUBLICATIONS

"Eight ways to inspire innovation in the business of architecture" Greenbiz. 13 February 2016 <www.greenbiz.com>

Busby: Architecture's New Edges, Ecotone, 2015.

Busby: Learning Sustainable Design, Janam Publications, 2007.

"Perkins+Will Portfolio: A look at recent projects from the Vancouver, British Columbia, Canada, office of Perkins+Will, led by Peter Busby." Architect. 5 March 2012. <www.architectmag.com>

"Is This the World's Greenest Neighborhood?" The Atlantic. 25 August 2011 <www.theatlantic.com>

SPEAKING ENGAGEMENTS

"Exploring Architecture's New Edges" University of Washington, Seattle, WA, October 2015

"Exploring Architecture's New Edges" San Francisco Planning and Urban Research, San Francisco, CA, July 2015

"Exploring Architecture's New Edges" Living Future UnConference, San Francisco, CA, April 2015

"Towards Regenerative Design: The Search for Zero Carbon Impact - Redefining Buildings and Communities," Hyundai Technology Symposium, Seoul, Korea, November 2013

"The Changing Face of High-Performance Design," AIBC, Vancouver, BC, October 2013

"Redux: Re-examining Wood's Role as a Sustainable Material," Association for the Advancement of Sustainability in Higher Education, Nashville, TN, October 2013

"Integrating Nature and Architecture: Toward Regenerative Design," International Green Roof Congress, Hamburg, Germany, May 2013

"The Search for Zero Carbon Impact: Redefining Buildings and Communities, University of British Columbia, Honorary Professor Lecture, Vancouver, BC, April 2013

"Designing Business for the Sustainable Future," WorldFuture 2012 Conference, Toronto, July 2012

AWARDS & HONORS

Royal Architectural Institute of Canada (RAIC) Gold Medalist, 2014

Acterra Award for Sustainability, Business Environmental Awards, 2013

Wood WORKS! Awards, VanDusen Botanical Garden Visitor Centre, 2013

Lieutenant Governor of British Columbia Medal in Architecture, 2012

Samuel Brighouse Elementary School, Lieutenant Governor of British Columbia, Medal in Architecture, 2012

Architectural Record's Schools of the 21st Century, Centre for Interactive Research on Sustainability (CIRS), 2012

AIBC Innovation Award, 2012

Top 5 Project, Clean50, 2013

Canada's Greenest Employers 2010, 2011, 2012

Firm Award - The Globe and Mail Laurentian University Living With Lakes Ecology Centre

Regional Holcim Award Winner, Dockside Green, 2009

AIBC Special Jury Award, 2009

AIA COTE Top Ten Green Projects, 2009

GLOBE Awards for Environmental Excellence, 2008

RAIC Urban Design Awards, Approved or Adopted Urban Design Plan, 2006

Canadian Architect, Award of Excellence, 2005

KAY KORNOVICH, NCARB, LEED AP®

Director, Managing Principal, and West Coast Science + Technology Leader

Kay has been actively involved in the planning and design of science and technology facilities for over 26 years. Her project work has focused on science and technology in both the public and corporate sectors, where she provides facilities planning and architectural design that is both innovative and highly responsive to rapidly evolving trends in scientific research. As a leader, Kay assists stakeholders in identifying, communicating, and reaching consensus on the vision, scope, and design elements, using her experiences to create state-of-the-art buildings. She is highly effective in managing interdisciplinary groups seeking answers to difficult challenges.

EDUCATION

Bachelor of Architecture, University of Minnesota

REGISTRATIONS

Architect: Washington, California, Wisconsin, Utah, Hawaii

LEED AP®

PROFESSIONAL AFFILIATIONS

National Council of Architectural Registration Boards (NCARB)

International Society for Pharmaceutical Engineering (ISPE)

National Association of Industrial and Office Properties (NAIOP)

ARCADE Member

RELEVANT EXPERIENCE

Science+Tech

JUST Biotherapeutics
Office, Conference Room, Labs, Warehouse and Manufacturing Facility Renovation
Seattle, Washington

Adaptive Biotechnologies
Tenant Improvements
Seattle, Washington

Alder Biopharmaceuticals
Corporate Headquarters Strategic Plan
Seattle, Washington

BioMed Realty Trust
I3 Campus
San Diego, California

BioMed Realty Trust
University of California, San Diego
Center for Novel Therapeutics
La Jolla, California

ZymoGenetics, Inc.
cGMP Microbial Manufacturing Facility Expansion and Renovation
Bothell, Washington

ZymoGenetics, Inc.
cGMP Pilot Plant Facility
Seattle, Washington

9th & Stewart Life Sciences Center
Touchstone Corporation
Seattle, Washington

Amgen Inc.
Building AW4
Seattle, Washington

Vulcan Inc.
Allen Institute for Brain Science
Seattle, Washington

Allergan, Inc.
Biologics Laboratory
Irvine, California

Allergan, Inc.
Pharmaceutical Campus
R&D Building
Irvine, California

Alza Corporation
(a Johnson & Johnson Company)
Manufacturing Facilities
ETAL-1A & ETAL-2
Vacaville, California

Alza Corporation
(a Johnson & Johnson Company)
Lab Renovations
Palo Alto, California

ALZA Corporation
(a Johnson & Johnson Company)
Lab/Warehouse Study
Vacaville, California

Applied Biosystems, Inc.
New R&D Campus
Pleasanton, California

Aviron, Inc.
Clean Room and cGMP
1,000 sf Manufacturing Suite
Mountain View, California

KAY KORNOVICH /

Baton Rouge Area Foundation
The Water Institute
Baton Rouge, Louisiana

Bayer Consolidation
Manufacturing Facility
Lynnwood, Washington

Bayer Corporation
Process Science Center
Berkeley, California

Bayer Corporation
cGMP Building 57
Manufacturing Suite
Berkeley, California

Bayer Corporation
cGMP Purification Suite Upgrade
Berkeley, California

Bayer Corporation
Incubator Space
Mission Bay, California

Bayer Corporation
Crop Science Facility
Davis, California

BioMed Realty Trust
Center for Life Sciences
La Jolla, California

BioMed Realty Trust
9775 Towne Centre Drive
La Jolla, California

Bio-Rad Laboratories
Diagnostics Production
Hercules, California

BN Builders
Berlex Consolidation
Seattle, Washington

BN Builders
Emergent BioSolutions
Tenant Improvements
Seattle, Washington

City of Tacoma
Center for Urban Waters
LEED Platinum NC
Tacoma, Washington

Corixa, Inc.
Office and Life Sciences Building
Headquarters
Seattle, Washington

Dendreon Earl Davie Building
Lab Renovation
Seattle, Washington

Dendreon Corporation
Dendreon Headquarters
Lab and Office Tenant Improvements
Seattle, Washington

Duarte Nursery*
Office and Laboratory Building
Hughson, California

Fred Hutchinson Cancer
Research Center
1100 Eastlake Tenant Improvements
Seattle, Washington

Alexandria Real Estate
Gates ARE Test Fit
Seattle, Washington

Genentech, Inc.
cGMP Manufacturing
Facility Expansion Study
Vacaville, California

Genentech, Inc.
Lab Renovations, Fit-ups
and Master Plan
South San Francisco, California

Gilead Sciences
New Research Building
Foster City, California

GlaxoSmithKline
cGMP Pharmaceutical
Campus Expansion, Phase I
Hamilton, Montana

Illumina Inc.
Illumina Foster City Tenant Improvements
Foster City, California

Illumina Inc.
I3 Tenant Improvements
San Diego, California

Immunex, Inc.1
21,000 sf Laboratory Fit-up
Seattle, Washington

Institute for Systems Biology
LEED Platinum
Corporate Headquarters
Seattle, Washington

Investigen, Inc.
New Research Facility
Hercules, California

LG
LG Science Park Competition
Seoul, Korea

Omeros Corporate
Omeros Headquarters
Lab and Office
Seattle, Washington

Oncothyreon, Inc.
Office and Lab Tenant Improvements
Seattle, Washington

Puget Sound Blood Center
Research Institute
Lab Tenant Improvements
Seattle, Washington

Scios, Inc.
(a Johnson & Johnson Company)
Maude Laboratory Renovation
Sunnyvale, California

Scios, Inc.
(a Johnson & Johnson Company)
Building Renovations
Fremont, California

KAY KORNOVICH /

ZymoGenetics, Inc.
cGMP Earl Davie
Building Expansion
Seattle, Washington

ZymoGenetics, Inc.
Fermentation Laboratory Fit-up
Seattle, Washington

CCC
Westbank
Frye Residential Towers
Seattle, Washington

King County Library System
Sammamish Library
Sammamish, Washington

King County Library System
Tukwila-Foster Library
Tukwila, Washington

State of Washington
Capitol Campus 1063 Predesign
Olympia, Washington

Touchstone Corporation
Troy Block
Seattle, Washington

Touchstone Corporation
North Edge Office Building
Seattle, Washington

Perkins+Will
Tenant Improvements
LEED-CI Platinum Office
Seattle, Washington

Plum Creek Headquarters
Office Tenant Improvements
Seattle, Washington

Point Wells
61-acre Mixed-Use Development
Snohomish County, Washington

Presbyterian Retirement Communities NW
Skyline at First Hill
Seattle, Washington

Alexandria Real Estate Equities, Inc.
1551 Eastlake
Seattle, Washington

Seattle Metro Chamber of Commerce
Office Tenant Improvements
Seattle, Washington

Skyline at First Hill - Presbyterian
Retirement Communities Northwest
Seattle, Washington

Washington State Department of General
Admission
Data Center
Olympia, Washington

Higher Education
University of Wyoming
Science Initiative Building
Laramie, Wyoming

Northeastern University
Seattle Campus
Seattle, Washington

University of Kansas
Central District
Lawrence, Kansas

Stanford University
James H. Clark Center
Palo Alto, California

University of California
Mission Bay Research Facility 162,000 sf*
San Francisco, California

University of Washington
Educational Outreach Building and Visitor
Center
Seattle, Washington

Transit
Honolulu Authority for Rapid Transit
Elevated Rail Transit - 8 Stations
Honolulu, Hawaii

Sound Transit
South 200th Station
SeaTac, Washington

Sound Transit
South Bellevue to Overlake Transit Center
Final Design
Bellevue, Washington

**Completed prior to joining Perkins+Will*

DAN SENG, AIA, CDT, LEED AP® BD+C

Associate Principal, Project Manager

Dan brings nearly 23 years of architectural, project management experience and quality assurance to the team. He has demonstrated expertise in navigating the regulatory hurdles of the entitlements process for large, complex projects and has worked on all aspects of projects, from design and documentation to construction administration and project management. Dan is currently the project manager for the East Link Light Rail South Bellevue to Overlake Transit Center Final Design Project. He was recently honored as the recipient of the University of Illinois Francis J. Plym Traveling Fellowship.

EDUCATION

Bachelor of Science in Architecture, University of Illinois

l'Ecole D'Architecture, Universite D'Illinois Versailles, France

Academic Scholarship, University of Illinois

REGISTRATIONS

Architect: Washington, California

LEED AP® Building Design + Construction

Construction Documents Technologist (CDT)

PROFESSIONAL AFFILIATIONS

American Institute of Architects (AIA)

RELEVANT EXPERIENCE

Martin Selig Real Estate
Third and Lenora
Seattle, Washington

Martin Selig Real Estate
15th and Market
Seattle, Washington

Just BioTherapeutics
401 Terry
Seattle, Washington

Sound Transit
South 200th Station
SeaTac, Washington

Sound Transit
South Bellevue to Overlake Transit Center
Final Design
Bellevue, Washington

Dillingham Kaka'ako Station Group
Honolulu Authority for Rapid Transit
8 Stations
Honolulu, Hawaii

Northeastern University
Seattle Campus
Seattle, Washington

Alder
Corporate Headquarters Strategic Plan
Seattle, Washington

Virginia Mason Medical Center
Bailey-Boushay House
Seattle, Washington

BN Builders
Berlex Consolidation
Seattle, Washington

Bayer Consolidation
Bayer Corporation
Seattle, Washington

Skyline at First Hill
Presbyterian Retirement Communities NW
Retirement Community
Seattle, Washington

Point Wells
61-acre Mixed-Use Development
Snohomish County, Washington

Center for Urban Waters
City of Tacoma
Tacoma, Washington

Institute for Systems Biology
Headquarters tenant improvement
Seattle, Washington

Fred Hutchinson Cancer Research Center
Seattle, Washington

Dendreon Earl Davie Building
Lab Renovation
Seattle, Washington

Dendreon Corporation
Dendreon Headquarters
Lab and Office Tenant Improvements
Seattle, Washington

Presbyterian Retirement Communities NW
Skyline at First Hill
Seattle, Washington

DAN SENG /

University of California Riverside
Research Surge Building
Riverside, California

H.W. Lochner, Inc.
East-West Corridor
Yakima, Washington

Rancheria Health Village
Design
Redding, California

Belmont Elementary School No. 6
Los Angeles Unified School District
Los Angeles, California

South Anchorage Area High School
Anchorage School District
Anchorage, Alaska

San Diego Classroom Protopart
San Diego Unified School District
San Diego, California

ZymoGenetics, Inc.
cGMP Microbial Manufacturing Facility
Renovation and Expansion
Bothell, Washington

Central Elementary School
Central School District
Rancho Cucamonga, California

AB Miller High School
Learning Academy
Fontana Unified School District
Fontana, California

Jurupa Unified School District
Pedley Elementary School Remodel
Jurupa Valley, California

Fidelity Investments
Third Floor ETAG
Seattle, Washington

Enders-Salk Elementary School
Schaumburg School District 54*
Schaumburg, Illinois

J. Robert Scott Showroom
Storefront Renovation*
Los Angeles, California

J. Paul Getty Trust
Getty Villa North Campus*
Los Angeles, California

**Completed prior to joining Perkins+Will*

PRESENTATIONS

Mount Rainier Chapter, CSI, 2010

Steelday, AISC, Tacoma, Washington, 2009

Tacoma Urban Design Lecture Series, AIA 2009

AWARDS

Urban Waters NAIOP Award, 2011

International Interior Design Association IN Mass Design Award, Institute for Systems Biology, 2011

Center for Urban Waters, AIA Washington Council Merit Award for Civic Design, 2008

Center for Urban Waters, AIA Seattle Regional Top Ten Green Award, 2008

COMMUNITY INVOLVEMENT

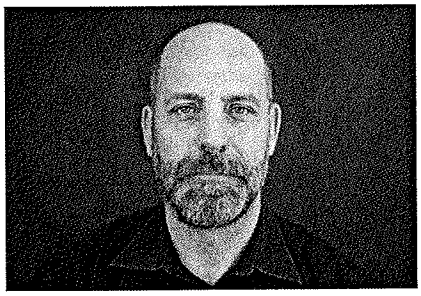
American Cancer Society, Volunteer

Leukemia Society of America, Fund Raiser and Team in Training Member

BuildOn Annual Fund Raiser Committee Chair

CARSTEN STINN, AIA, LEED AP® BD+C

Senior Associate, Senior Project Designer



Carsten brings over 21 years of experience as project designer. His design philosophy is guided by the belief that the quality and expression of the built environment has a direct influence on our well-being and the quality of our lives. His project experience reaches from transportation to commercial development, higher education, student life and science and technology facilities. He practices a rigorous design process which leads to aesthetically, technically and environmentally sound architecture. A balanced combination of skills as project designer, manager and technical thinker combined with an analytical, structured approach to the process enable him to lead projects with complex programs.

EDUCATION

Master of Architecture, Technical, University, Aachen, Germany

German Academic Exchange Scholarship
University of Washington

Fredrich-Albert Lange Schule, Wesel DE
German Craftsman's Exam

REGISTRATIONS

Architect: Washington

LEED AP® Buliding Design + Construction

PROFESSIONAL AFFILIATIONS

American Institute of Architects (AIA)

RELEVANT EXPERIENCE

Bastyr University
Center for Natural Health Feasibility Study
Seattle, Washington

Dendreon Corporation
Dendreon Headquarters
Lab and Office Tenant Improvements
Seattle, Washington

Gerding Edlen
1519 Minor Avenue
Mixed Use Residential New Construction
Seattle, Washington

Hawaiian Authority for Rapid Transit
Downtown/ Kaka`ako Station Group
Honolulu, Hawaii

Institute for Systems Biology
LEED Platinum
Corporate Headquarters
Seattle, Washington

King Saud Bin Abdul Aziz
University For Health Sciences
Al Hasa, Saudi Arabia

Lennar Multifamily Communities
Spring Street North Block
Seattle, Washington

Martin Selig Real Estate
Third and Lenora, Mixed Use Tower
Seattle, Washington

Martin Selig Real Estate
3031 Western Avenue
Seattle, Washington

Ministry of Interior
Medical City
Research & Data Center
Riyadh, Saudi Arabia

PCL Construction Services Inc.
Honolulu Tenant Improvements
Honolulu, Hawaii

Portland State University
Smith Memorial Student Union
Feasibility Study
Portland, Oregon

Point Wells
Masterplan for a sustainable community
Shoreline, Washington

Private Owner
Eastlake Apartments*
Seattle, Washington

Seattle Pacific University
Consumer Science Program
Seattle, Washington

University of Alaska Fairbanks
Student Housing and Dining Facility
Fairbanks, Alaska

University of Washington
School of Medicine Phase 3.1
Office, Laboratory, Conference
Seattle, Washington

University of Washington
Husky Student Union Building
Seattle, Washington

CARSTEN STINN /

Washington State University
Plant Growth Research Greenhouse
Pullman, Washington

Ruby Investments
1200 Van Ness
Master Planning Mixed Use Development
San Francisco, California

Experience with NBBJ West:
Private Owner*
Hotel Master Plan
Frankfurt, Germany

Reebok
World Headquarters*
Office New Construction
Canton, Massachusetts

Telenor
Corporate Headquarters*
Office Modernization
Oslo, Norway

Experience with Franken and Hecker:
Froeschen
Corporate Headquarters*
Office Modernization
Aachen, Germany

AGIT
Technology Center New Construction*
Aachen, Germany

**Completed prior to joining Perkins+Will*

SPEAKING ENGAGEMENTS / TEACHING

2014 Facade+ Conference, Seattle, Lecturer
Facade+ Conference, 2015, Event Chair
Studio, Lecturer, University of Washington
Guest Critic, Washington State University
Guest Critic, University of Hawaii, Manoa

AWARDS & HONORS

University of Alaska Fairbanks Wood Center - 2015 Society for College and University Planning (SCUP) - AIA 2015 Merit Award for Excellence in Architecture

Telenor Headquarters, Oslo, Norway,
Awards/ Publications:

Prix D'excellence, International Real Estate Federation

AIA National, Honor Award for Architecture

Best Lighting Design in Norway, National Light Culture

Havard Business Review, "Workspaces that Move People," October 1, 2014

Reebok Headquarters, Canton, MA, USA

Awards/ Publications:

The Chicago Athenaeum, American Architecture Awards

Boston Society of Architects, Honor Award for Design Excellence

BOMA, Office Building of the Year

AIA Seattle, Award of Commendation

Architectural Record, "Fast-track construction becomes the norm," February 2002

The 21st Century Office, "Reebok Headquarters," January 2003

Elementary School Addition, 1st Prize, Architectural Design, 1994

AGIT Technology Center,
1st Prize, BDB, 1993

Mark Davies, PE, LEED AP, Associate DBIA

CIVIL ENGINEER

Mark is a civil engineer and project manager with more than 20 years of experience with a focus on underground infrastructure, site development, roadway, parks and trail projects. He has worked on large scale $30-100M phased projects starting from planning and cost analysis, through permitting and construction; providing design alternatives, cost comparison and phasing alternatives. Mark has the innate ability to coordinate complex infrastructure demands, addressing stormwater, accessibility, and other right of way concerns. His civil engineering background is complemented by 2 years working directly for an international construction company.

EDUCATION

» BS, Civil Engineering, University of Washington, 1994

REGISTRATIONS

» Civil Engineer, Registered Professional Engineer, 1999 #36022

» Associate DBIA™, 2012

» LEED AP, 2007

» 2014 Highway Runoff Manual Training Certified, Certificate #140423

PROFESSIONAL AFFILIATIONS

» City of Shoreline - Bicycle and Pedestrian advisory group member, 8/2009 – Present

» NACTO Urban Bikeway Design Guide Training April 2014

» DBIA certification boot camp March 2012 (DBIA)

» 2008 Highway Runoff Manual Training, May 2010 (WSDOT)

» 2014 Highway Runoff Manual Refresher On-line, October 2016

» Improving Stormwater management Using Low Impact Development (LID) Practices, Nov 2005 (UW)

PRESENTATIONS

» Presenter - Connectivity, PSRC Active Transportation Workshop: Everett, October 2015

» Co Presenter, AIA Rainwater Harvesting, October 2015

» Oregon Active Transportation Summit, 2014

» Presenter, Yesler Terrace, AIA Seattle Urban Design Forum & Public Policy Board, June 2012

Relevant Project Experience

YESLER TERRACE REDEVELOPMENT PLAN, SEATTLE, WA

Project Manager and Civil Engineer Lead. Mark is managing the civil engineering role provided by MIG I SvR as part of a team to create a visionary redevelopment plan for the 36-acre Seattle Housing Authority's Yesler Terrace community. The vision of the Yesler Terrace Redevelopment project is to develop a mixed-income, mixed-use neighborhood. It includes various densities so as to honors the 70-year history while meeting community needs. MIG I SvR's roles have included the Plan Action Environmental Impact Statement incorporating design and engineering for density ranging from current condition to 5,000 units, 900,000 square feet of office space, medical services, and/or lodging; 150,000 square feet of other non-residential uses, more than six acres of urban park space; and green buildings, utilities and green infrastructure. We also assisted with Choice Neighborhoods HUD grant program application, Preliminary Plat and PLAT Street Improvement Plans. During the EIS and PLAT phases, MIG I SvR provided SHA estimates of probable costs to help determine phasing strategies. The existing public infrastructure is more than 60 years old. The redevelopment will require upgrades to the existing utilities, including sanitary sewer and combined sewer pipe. The infrastructure improvements have been phased starting with Yesler Way, S Washington Street and the major sewer and storm utility upgrades in the Early Infrastructure Permit Package. MIG|SvR worked with SDOT to organize design guidance meetings that included several departments of SDOT, SPU and SCL. MIG|SvR also supported SHA during the construction with reviews of submittals, RFIs, shop drawings and contractor change order requests. We also conducted initial and final punch lists. We are currently supporting SHA on the third phase of construction with the 2016 Infrastructure Permit Package.

Relevant Project Experience

WASTE MANAGEMENT WOODINVILLE FACILITY UPGRADE, SNOHOMISH COUNTY, WA

The proposed Waste Management improvements include upgrades to existing maintenance facility buildings, addition of a paint booth and vehicle wash building, paved fleet parking with slow charge (CNG) and maneuver areas and a new employee parking lot for the 7.81 acre site. This project also included bringing the site up to current code for stormwater flow control and water quality within the Little Bear Creek basin. Stormwater facilities included a cast in place 50'x190' detention vault, oil water separators and bioretention planters for the fleet parking area and a porous asphalt pavement for the employee parking area. The regrading required new cast in place retaining walls along with the re-use of existing ecology blocks located on-site. New 6-inch water and sewer utilities were provided for the building expansions and permitted through Alderwood Water and Sewer District. This project also required 1700 linear feet of roadway frontage improvements included new roadway, sidewalks, landscape and channelization. SvR coordinated with Snohomish County to modify the standard roadway section to maintain the stream along 234th St SE. This required having the sidewalk adjacent to the curb and the planting area/stream between the back of walk and property line. The street improvements also included Filterra treatment planter boxes, new storm drain conveyance system, and a detention pipe flow control system that collected, treated and detained stormwater prior to discharging to the existing storm drain system that is within a quarter mile of Little Bear Creek.

SNOHOMISH COUNTY ON-CALL/204TH ST SW & 6TH AVE W, SEATTLE, WA

Project Manager: The 204th St SW and 6th Ave W projects are sidewalk infill projects for Snohomish County. The 204th ST SW is a Safe Routes to School project and provides a missing segment of sidewalk for Hazelwood Elementary School. The 6th Ave W project includes three sidewalk infill projects between 170th PL SW and 164th St SW for approximately 600 linear feet of curb, gutter and sidewalk. MIG|SvR developed full plans and estimates and coordinated with Snohomish County on the development of the special provisions. In addition to providing plans and estimate for the job order contracting, deviation request for no planter strip, LDA application, and drainage report was completed for 6th Ave W.

CEDARBROOK LODGE EXPANSION (CHASE/WAMU CORPORATE LEADERSHIP CENTER), FEDERAL WAY, WA

Project Manager. SvR provided civil site design for the new $16 Million, 5 story, 63 guest room and 3,500 SF spa. Expansion required relocation of existing water main, storm drain, and water quality vault. Utilities that could not be relocated were replaced in cast iron sleeves under the building. For the expansion, 49 new parking stalls were required to be added to the site. SvR reviewed the additional impervious areas to confirm it was within the limits of the capacity of the existing onsite storm water detention and water quality ponds and vaults. Previous 2001 development included 18-acre new corporate training facility containing lodging, meeting, dining and recreational facilities constructed adjacent to wetlands and Bow Lake. Work included design of 80,000 square feet of drive lane and parking facilities, along with 30,000 square feet of pathways and patios. Also included design of new water and sanitary sewer utilities and improvements to the road and sidewalks that front the property.

THE BRAVERN, BELLEVUE, WA

Senior Project Engineer. Mark managed the earthwork and utility subcontractors for this $500M mixed-used project called the Bravern. The project consisted of 7 levels of underground parking, two office towers, one being 14 stories and the other 24 stories. Site improvements included over 750,000 cubic yards of soil removal, a temporary dewatering system including 44 dewatering wells, a temporary soil nail wall, a new 12-inch water main, a 15-inch storm drain system, and a 16-inch sanitary sewer service including an inside drop connection for a new 30-foot-deep sanitary manhole.

RELEVANT EXPERIENCE

- Point Wells Development, Unincorporated Snohomish County, WA (2009-Present)
- Building 81 Seismic Replacement, American Lake, WA (2009-ongoing)
- NewHolly Redevelopment Infrastructure and Housing, Phase III, Seattle, WA
- Fort Worden Maker Square, Port Townsend, WA (2016- Present)
- SDOT Trail/Cycle Track Development, Seattle, WA (2014-2015)
- City of Lynnwood – Interurban 212th Crossing, Utility and Roadway Reconstruction (2011-Present)
- Winslow Way Planning and Design, Bainbridge Island, WA (SvR #07004)

Kirk A. Harris, P.E. | Transportation Engineer

Education

University of Washington, B.S. Civil Engineering, 1992

Registration and Certification

Professional Engineer (PE), Washington (34403), 1997

Project Management Professional (PMP), (1388369), 2011

Professional Affiliations

American Public Works Association, (APWA),
Institute for Transportation Engineers (ITE)

Mr. Harris has 26 years of experience in traffic engineering, transportation design, and project management. In the previous five years, he has designed and managed traffic and transportation improvement projects for municipal and private clients within the cities of Covington, Edmonds, Lynnwood, Monroe, Sammamish, Snoqualmie, and unincorporated Snohomish County. These projects have required Mr. Harris's strength in managing roadway and intersection improvement projects involving traffic counts, traffic modeling and studies, traffic engineering, signal and illumination design, and channelization improvements. He is also an expert at developing plans, specifications, and estimate (PS&E) bid packages for transportation projects; recommending and analyzing project alternatives on planning and pre-design studies; and reviewing transportation projects for local agencies. Mr. Harris's professional experience also includes developing roadway and drainage designs, providing on-call construction engineering support services, formally and informally presenting transportation projects in a public forum, and developing specific recommendations to improve road and pedestrian safety. Mr. Harris's attention to detail and well-rounded experience from the planning, design, and construction perspectives affords him the opportunity to provide insightful direction during the alternatives analysis and design development processes.

Project Experience:

Point Wells Urban Center, for Blue Square Real Estate (BSRE) LP, Snohomish County, Washington

Mr. Harris is responsible for the preparation of the expanded traffic impact analysis (ETIA) report associated with the transformation of an industrial site into a mixed-use residential and commercial development. The report analyzed the level of service for 50 different build/no build scenarios for the forecast years using Synchro software for 64 different intersections, in multiple jurisdictions near the project site, for both the AM and PM peak hour travel periods. VISUM software was used to distribute the travel trips generated by the site along with existing background traffic. A traffic corridor study for the primary route to the site included a public involvement process and was conducted in partnership with the City of Shoreline, a jurisdiction adjacent to the project. Recommendations for traffic mitigation were included with the ETIA report submitted to Snohomish County for review September 2016.

36th Avenue West Corridor Improvements, for the City of Lynnwood, Washington

Mr. Harris is the project manager responsible for the traffic analysis, preparation of environmental documentation and permit applications, development of the preliminary design, and preparation of the final contract bid documents for a key 1-mile-long, north-south corridor linking the city of Lynnwood and Snohomish County. DEA evaluated the corridor with respect to the traffic needs of the area and developed design solutions that considered both vehicular and non-motorized methods of travel, such as biking and walking. The evaluation included the operational benefits and physical footprints required for both three-lane and five-lane roadway alternatives, each with options for new roundabouts or traffic signals at two key intersections. The project included acquisition of new right-of-way, permanent and temporary easements from 93 parcels. Construction of this $9.3 million project will begin in June 2018 and is expected to be complete by December 2019.

36th/35th Avenue West Corridor Improvements, for Snohomish County, Washington

Mr. Harris is managing the design for this one-mile-long corridor that provides a key connection between SR 99 to the north and commercial areas such as Alderwood Mall and Lynnwood's City Center to the south. DEA evaluated the corridor with respect to the traffic needs of the area and is developing the 90% and 100% design submittals, which will be completed and submitted to Snohomish County in December 2018.

76th Ave W/212th Street SW Intersection Improvements, for the City of Edmonds, Washington

Mr. Harris is the project manager for responsible to provide a solution to improve intersection level of service (LOS) and pedestrian safety at an intersection adjacent to Edmonds-Woodway High School. The City applied for and received grant to add opposing left turn lanes the four-lane section on 76th to increase the capacity of the intersection. The City's proposal improved vehicle LOS, but did not provide significant bike or pedestrian improvements. DEA evaluated the site and identified a range of alternatives that would still correct the congestion problem and provide corridor wide improvements for pedestrian and bicycle safety at the same time for the same cost. Construction of this $3.5M project will be completed June 2018.

Snoqualmie Roundabouts, for the Snoqualmie Tribe, King County, Washington

Mr. Harris managed the traffic analysis and development of design drawings for a new roundabout along SE North Bend Way roundabout and the intersection with the west entrance to the Snoqualmie Casino. The design also included modifications to an existing roundabout at the east entrance to improve safety and mobility. Following trip generation analysis using ITE land use codes for the proposed near term and long tern development at the site, the traffic analysis for the roundabout operations used aaSidra software to validate the effectiveness of the design configurations. Design completed 2017.

Tjerne Place SE Extension Project, for the City of Monroe, Washington

Mr. Harris led the planning and design efforts for the extension of Tjerne Place from Chain Lake Road (CLR) to Woods Creek Road (WCR) with a new $6 million roadway connection to improve the City's transportation network. The new connection provides an alternate east-west alternative to the highly congested US 2, and provides added access to the growing North Kelsey Development area. An existing traffic signal at CLR was modified and a new one at WCR was installed. Construction completed in 2016.

Sammamish Impact Fees, Concurrency Management Program and On-Call Transportation Services, for the City of Sammamish, Washington

Mr. Harris is the project manager responsible for providing traffic engineering, modeling, and on-call transportation services for the City. This contract is ongoing.

Covington Impact Fees, Concurrency Management Program and On-Call Transportation Services, for the City of Covington, Washington

Mr. Harris was the project manager responsible for providing traffic engineering, modeling, and on-call transportation services for the City. This contract is ongoing.

Transportation Plan Update and Concurrency Ordinance, for Parametrix for the City of Poulsbo, Washington

Mr. Harris was the project manager responsible for providing travel demand modeling support for the city's transportation plan update in accordance with the Growth Management Act. Contract completed 2016.

US 2/East Main St/Old Owen Road Intersection Improvements, for the City of Monroe, Washington

Mr. Harris managed this project which provided intersection design and traffic signal improvements on an urban, five-lane, principal arterial State route. Project elements included ADA-compliant pedestrian facilities, adding an exclusive right-turn lane, improving the existing intersection angle, and eliminating the existing alignment offset. Construction of this $600,000 project was completed in 2013.

Southcenter Parkway Extension, for the City of Tukwila, Washington

Mr. Harris was the traffic engineer responsible for the design and development of traffic signal improvements for this corridor extension project. PS&E bid documents included the design of four new signalized intersections and modifications to one existing signalized intersection. Constructed 2012.

2010 Traffic Calming Beacons and Radar Project, for the City of Redmond, Washington

Mr. Harris managed the design of improvements to five separate sites in residential areas of the city where it had determined there was a problem with a significant percentage of vehicles exceeding the posted speed limits and that traffic calming measures were warranted. Three sites were at existing school crossing locations and two were stand-alone speed radar sites. Constructed 2011.

SR 16/Burnham Drive NW Interchange and Roadway Improvements, for the City of Gig Harbor, Washington

Mr. Harris was the project manager responsible for the development of improvements to an existing interchange and its adjacent roadways needed to accommodate a new community hospital whose aim was to serve the health care needs of residents of Gig Harbor, Key Peninsula, and south Kitsap County. This $10 million construction project included raising a periodically flooded roadway arterial, a natural fish ladder system and fish- passable concrete box culvert, widened four interchange ramps, and modified two existing roundabouts at the interchange ramp ends to meet the goals of both improving safety and increasing the traffic-carrying capacity of the system by 30,000 vehicles per day. The project was constructed in 2010.

SR 900 (NE Sunset Boulevard)/Hoquiam Avenue NE Traffic Signal Project, for the City of Renton, Washington

Mr. Harris provided project management and on-call construction support for the design of a new traffic signal on an existing State route in a residential area of Renton. A channelization plan and project analysis report prepared for this project was approved by WSDOT. The purpose of this new traffic signal is to increase the intersection safety of those turning to and from the side street that serves as access to a local high school. Constructed 2009.

166th Avenue NE/NE 104th Street Traffic Signal Intersection and 4- to 3-Lane Corridor Conversion Improvements, for the City of Redmond, Washington

Mr. Harris managed the design of improvements to an existing intersection and corridor by adding a new traffic signal and converting an existing 4-lane roadway section to 3 lanes with two bike lanes along the frontage of Redmond Junior High. The project includes curb bulb extensions at each corner shorten the length of each crosswalk and improve the visibility and safety of pedestrians at this intersection. This project was funded with Safe Routes to Schools federal grant dollars. Constructed 2009.

172nd Avenue NE Corridor Study/Traffic Calming Improvements, for the City of Redmond, Washington

Mr. Harris managed the development of roadway design alternatives for the corridor study, prepared the corridor study design report; and provided coordination, preparation, and assistance at two public open houses. For the traffic calming phase of the project, Mr. Harris managed and implemented the recommended traffic calming improvements; developed project update newsletters; facilitated client and design team coordination; and managed the project budget and schedule. Constructed 2008.

DAVID EVANS and ASSOCIATES inc.

Richard Pratt

Senior Biologist

Education

MS, Coastal Studies, 1998, Louisiana State University

BS, Environmental Studies, 1989, Western Washington University

Certifications

Certified Erosion and Sediment Control Lead, 2015

Washington State Wetland Rating System, September 2014

U. S. Army Corps of Engineers Regulatory IIA, December 2007

Hydric Soils, January 2007

U. S. Army Corps of Engineers Regulatory I, September 2006

Dept. Transportation, Cultural Resources Training, October 2006

Washington State Wetland Rating System, January 2006

Advanced Hydric Soils, May 1996

Professional Affiliations

Society of Wetland Scientists

Rick Pratt is a senior biologist with years of experience working on wetland and environmental resources projects throughout the Pacific Northwest. He has conducted thorough and scientifically defensible wetland studies for public and private sector clients throughout the Puget Sound area. In addition, while a Washington State Department of Transportation (WSDOT) liaison at the Army Corps of Engineers, he recommended issuance or denial of Department of Army permit for projects based on compliance with Section 404 of the Clean Water Act, Section 10 of the Rivers and Harbor Act, Endangered Species Act (ESA), Magnuson-Stevens Fisheries Conservation and Management Act (MSA), and other regulations. He has conducted presentations to the public, trained regulatory staff and other environmental professionals on wetland plant identification, delineation techniques, and environmental documentation and permitting. Rick has extensive experience in both design of wetland mitigation and monitory mitigation for regulatory compliance. His stream experience includes determining stream's ordinary high water mark and regulatory jurisdiction for both western Washington and the arid west regions. Rick has worked on numerous projects with documentation from simple discipline reports to EISs throughout the Pacific Northwest. He also is familiar with the requirements of both SEPA and NEPA.

Representative Project List

Centennial Trail – Woodinville to Snohomish, Snohomish County, Washington. DEA is assisting Snohomish County Parks with analysis, design, and permitting of a new 12-mile extension of the existing Centennial Trail system in Snohomish County, Washington. Overall, DEA is responsible for all aspects of design on the project, including civil, bridge and structures, geotechnical, and environmental. Mr. Pratt is the field lead for environmental work on the project, which has included extensive wetland and stream delineations along the entire 12-mile corridor. DEA has identified, mapped and classified approximately 60 wetlands, 40 streams, and 40 jurisdictional ditches along the corridor. Mr. Pratt produced a comprehensive Critical Area Study documenting the results of the fieldwork and analyzing potential project impacts, based on 30% design.

Upper Hoh River Road Bank Stabilization and Bridge Replacement, FHWA Western Federal Lands Highway Division, Jefferson County, Washington. Mr. Pratt conducted the environmental assessment and produced existing conditions and mitigation documents for natural resources and permitting for a bank stabilization project along the Hoh River on the west side of the Olympic Peninsula. The project involved wetland and stream delineation.

BNSF Pasco to Spokane Side Track Expansion, BNSF, Eastern Washington. Mr. Pratt led a team providing environmental surveys for wetlands and streams for Clean Water Act permitting and NPDES projects for railroad sidings, yards, bridges/ structures, and communications systems. Mr. Pratt developed environmental documents.

Environmental Assessment for Mason County SR 3 Replacement Study, Mason County, WA. Rick conducted environmental assessment for wetland and streams for 75 miles of proposed roadway alignment from Belfair to Shelton,

Washington. He was involved in all field identification of wetlands and streams, and coordinating multiple reviews with the project engineering staff.

Emerald Downs Racetrack, Wetland Mitigation Site Monitoring, Auburn, WA. Rick served as project manager for the 15-year mitigation monitoring period. He supervised staff in conducting and documenting the regulatory compliance documents for the racetrack's mitigation. He coordinated with both the client and regulatory agencies to provide regulatory status of the mitigation compliance.

Previous Experience

Environmental Permitting/Biology Coordination Assistance, BNSF Railway, Seattle, WA. Rick was the biological lead providing assistance with environmental permitting needs as it pertains to biological coordination for over 100 Corps and NPDES projects for sidings, yards, bridges/structures, communications systems, various infrastructure improvements, and natural event emergencies. He conducted wetland delineations, assessed stream jurisdiction, and determined the ordinary high water for streams throughout Washington. He was also responsible for assisting in project construction compliance management and documentation.

WSDOT, Northwest Region, Seattle, WA. Rick conducted wetland mitigation design and other mitigation support for transportation projects, including the design for the Charles Plummer mitigation site in Woodinville, Washington. He was the biological lead and coordinated mitigation design with the project team, which included engineers, planners, landscape architects, hydrologist, environmental coordinators, and regulatory staff. The design and documents for the Plummer Mitigation Site provided successful agency review and permitting.

WSDOT, Liaison with the Army Corps of Engineers, Seattle, WA. Rick managed evaluation of permit applications for large and small transportation and federally funded projects in waters of the U.S. pursuant to Section 404 of the Clean Water Act and Section 10 of the Rivers and Harbor Act. He coordinated ESA and MSA actions in association with permit issuance. Rick reviewed, researched, and interpreted policy documents, laws, and regulations. He communicated with the applicants, WSDOT, resources agencies, and local governments and agencies.

Rick recommended issuance or denial of Department of Army permit for proposed projects based on findings. He collected and evaluated necessary data to assess natural resource impacts. He conducted jurisdictional determinations and wetland delineations for proposed projects. He conducted inspections of Department of Army authorized projects to determine compliance with permit conditions. Rick also conducted reviews of wetland mitigation monitoring and determined compliance with permit conditions. He evaluated and determined acceptance or contingencies for completed wetland mitigation projects.

Shapiro and Associates, Ecologist, Seattle WA. Rick worked as a senior aquatic ecologist with expert knowledge in wetland and stream ecology and regulation. Conducted wetland delineations, determinated regulatory jurisdiction, assessed wetland functions, and environmental impacts. Rick submitted permits, coordinate agency review, and provide oversight for wetland and salmonid permits under King County ordinances and regulations and in accordance with Clean Water Act and Sec 10 of the Rivers Harbors Act and ESA. Rick specialize in developing, conducting and reviewing wetland mitigation and monitoring plans. Rick's position included work

with clients and agencies involved in alleged permit violations. This includes wetland delineation, processing new or after-the-fact permit applications, writing reports, and corresponding with clients and agencies. Rick work involved the assessment of impacts and producing Biological Assessment/Evaluations for ESA compliance in estuarine and freshwater systems. Rick has expert knowledge in aquatic ecology, botany and soils science as used in the identification of wetlands, and wetland mitigation design and monitoring.

Victor Salemann PE

TSI
Transportation Solutions, Inc.

Areas of Expertise

Traffic Engineering
Transportation Planning
Complete Streets
Traffic Design
Comprehensive Plan Policy Development
Code Review & Development
Concurrency Management
Transportation Impact Fees
Development Review

Representative Projects

Mt. Vernon Concurrency Study
Port Orchard Comprehensive Plan
Tahoma High School Review
Mt. Vernon Intersection Safety Study
Ash Way Design
City of Gig Harbor 2035 Model & TIF
Northern State Campus Planned Action EIS
I 90 & SR 18 Feasibility Study
City of Lynnwood 194th Pre-Design Study
Port Orchard ADA Transition Plan
Renton School District Impact Fee Review
Burlington Transportation Element
SR 16 TNB to SR 3 Congestion Study
Sammamish Transportation Element
Issaquah Pedestrian Study
US 395 /Ridgeline Drive
City of Lynnwood Traffic Modeling
32nd St/D Ave Intersection Improvements
Issaquah Complete Streets Study
Washington St Corridor Signal Analysis
The Village at Sammamish
Mt. Vernon Subarea Plan

Victor Salemann has 34 years of local transportation planning and traffic engineering expertise. He has managed transportation planning, analysis, and PS&E projects ranging from $1,500 to $2,000,000 in consulting fees. He has managed staff of 10 to 40 employees during his career. His professional experience includes program administration, travel demand forecasting, comprehensive transportation planning, development review, traffic operations analyses, and roundabout, traffic signal, and arterial roadway design. Victor has demonstrated an ability to identify and address the challenges faced by municipal staff and diverse stakeholders.

Victor serves as the on-call traffic engineer for multiple municipalities including the City of North Bend, City of Lynnwood, City of Mount Vernon, City of Port Orchard, and City of Sammamish. He also represents private clients in multiple jurisdictions.

Victor is an active Member of the Institute of Transportation Engineers and American Public Works Association.

He is a skilled public speaker and is able to present complex transportation issues to City Councils, Planning Commissions, Hearing Examiners, stakeholders, and the public. He has worked directly with the City Councils of Lynnwood, Sammamish, Issaquah, Maple Valley, Gig Harbor, Poulsbo, Covington, and Woodinville on transportation planning and traffic engineering issues including the impacts of regional through-traffic on new and established communities.

Victor's previous experience includes 7 years serving as the Engineering Manager for the City of Issaquah.

Education

BS, Civil Engineering, University of Washington

Licensure

Professional Engineer, Washington & Alaska

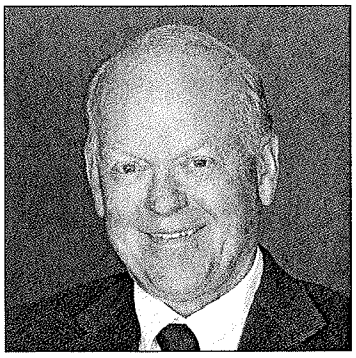
Affiliations

Institute of Transportation Engineers (ITE)
American Public Works Association (APWA) Washington

Brad Tong, PE Partner/Project Manager for Shiels Oletz Johnson

Brad Tong oversees development of major civic, commercial, residential, transportation, education and sports/entertainment projects for both public and private clients. He executes them with a disciplined approach to meet budget and schedule requirements and broad policy objectives. Brad's project management experience is enhanced by his training and years of practice as a licensed Structural Engineer. He specializes in civic place-making, transit oriented developments (TOD) and transit system development. Representative projects include Seattle City Hall, ShoWare Center Arena in Kent, Washington and the Washington State Convention Center Expansion. Brad is actively engaged in the community having served on several local boards and commissions including the Seattle Economic Development Commission, Intiman Theater, Japanese Cultural Center of WA, and Amy Yee Tennis Center among others. Brad received his Bachelor of Science in Civil Engineering from the University of Washington with minor studies in Urban Planning and obtained his professional engineering license from the State of Washington.

Jack Molver, PE Civil Project Manager



BRIEF EXPERIENCE BIO

Jack has 39 years of civil engineering experience in Snohomish County. During this time, he has worked on many different types of projects for a diverse group of clients. This experience has given him a solid understanding of not only the engineering requirements for a successful project, but the significance of the entitlement process as it relates to project cost and delivery. Along with the understanding of the local entitlement process, Jack has developed long term working relationships with various staff, including department heads responsible for code development and management of the permitting process. This experience gives him an understanding of the planning, design, and constructibility aspects of infrastructure. Years of collaboration with public agencies and developers has given him an understanding of financial requirements and the importance of close scrutiny of property issues pertaining to title.

CURRICULUM VITAE

Education
BS, Civil Engineering, 1976, University of Washington

Registration
Professional Civil Engineer, Washington (20777), 1982

RELEVANT PROJECTS

Lake Stevens Water Operations Facility, Snohomish County PUD, Washington. Mr. Molver and the DEA team provided Snohomish County PUD with planning, surveying and civil engineering services for a 13,200 square foot office building located on 12.7 acres. Work included planning and civil engineering including site clearing and grading, erosion control, paving, and sewer and water design. DEA also provided transportation planning services.

Operations Center Administration Building Addition, for Snohomish County PUD, Washington. Mr. Molver was principal-in-charge/client manager for the construction of a 32,000 square-foot addition to the existing operations center administration building located north of Paine Field. DEA provided planning, engineering, surveying, and permitting services for this project. In addition, an existing parking lot south and west of the proposed addition was reconfigured and up to 70 additional parking stalls were added to the existing Operations Center parking facilities for additional equipment, employee & visitor parking.

South Storage Expansion, for Snohomish County PUD, Washington. Mr. Molver was project manager responsible for the preparation of PS&E documents for permitting and bidding purposed, facilitated local and state permits, provided Department of Ecology (DOE) permit documentation and construction support for this project. In order to comply with new federal regulations, Snohomish County PUD No. 1 required additional outdoor storage space for transformer storage. An approximately 2-acre expansion of the PUD's existing outdoor paved facility was proposed.

West Marine View Drive, for the Port of Everett, Washington. This ARRA-funded project involved the design and construction of frontage improvements for 2,500 feet along West Marine View Drive from 16th to 11th Street. DEA performed the topographic survey, provided support for environmental documentation, and prepared the PS&E documents. DEA's design work included alignment, channelization, stormwater, illumination, and landscaping. DEA collaborated closely with the Port and the project developer to develop a visually expressive landscape and illumination plan that will define the gateway for the 67-acre North Marina Redevelopment. DEA also led the coordination effort with WSDOT, which was required since the corridor is a designated state route, as well as coordinating with BNSF because of an adjacent rail yard.

Navy Northwest Housing PPP, North Puget Sound, Washington. Mr. Molver served as project manager for a Public Private Partnership between the Navy and American Eagle Communities. DEA's role in this project was to prepare ALTA surveys for divestiture parcels, and to prepare plans and specifications for residential developments at Bangor and Oak Harbor. DEA also prepared conceptual level plans for redevelopment of various other existing Navy Housing projects. DEA assisted in the effort to bring an 80 acre assemblage of property into the Marysville UGA with the intention of providing housing for Naval Station Everett. His work included the analysis of the existing infrastructure and the ability to serve the subject site. A part of this effort included the comparative analysis of competing parcels vying for inclusion in the Marysville UGA.

Point Wells Redevelopment, Snohomish County, Washington. The Point Wells Redevelopment project involves the conversion of an existing petroleum terminal on Puget Sound into a mixed-use Urban Center community. The site consists of 62 acres of prime waterfront. Mr. Molver is a part of the team that processed the comprehensive plan change and a rezone application. He has been responsible for assessing the suitability of the site for the planned development. This has involved the assessment of the capacity of utilities required to serve the development and directing staff to investigate traffic constraints. Mr. Molver is also a team member for the effort to obtain entitlements for construction of the project.

Underwood Gartland 61 and 62, Everett, Washington. Mr. Molver served as project manager. Underwood Gartland 61 and 62 is being developed in phases as an existing mineral extraction facility is mined and reclaimed. The original area was 300 acres. DEA recently completed the reclamation plans for the remaining 110 acres of the site. We prepared reclamation plans so that the property could be immediately redeveloped for industrial purposes. Drainage basin planning ensured that the pre-mining drainage basins were properly balanced. DEA's plans managed the needs of the ongoing mining operations while allowing redevelopment to simultaneously occur. DEA provided permitting, planning, surveying engineering, and landscape architectural services.

Lot 13 in Puget Acres (Boeing 777X Wing Facility), Mukilteo, Washington. Mr. Molver served as project manager. DEA provided site civil engineering services for a new 30,000 square foot temperature-controlled building for Electroimpact. The facility will house the carbon fiber-laying machines that produce the Boeing 777X's giant carbon fiber composite wings.

Lots 28 & 29 Corner Bay Parking Lot, Mukilteo, Washington. Mr. Molver served as project manager. Since 1997, Jack has assisted Electroimpact in the development of their industrial campus in Mukilteo, Washington. From the construction of their first High Bay building in 1997, until the most recent permitting of Building H, Jack has provided this leading edge, world renowned industrial manufacturing firm with permitting guidance and civil engineering services. Jack's relationship with Electroimpact has also provided DEA structural engineers opportunities to assist Electroimpact with analysis and design of components to support complex robotic structures to be deployed at aerospace manufacturing facilities. The combination of local permitting requirements, professional relationships and technical expertise has allowed DEA to contribute to the success of the major employer in Mukilteo, which is located next to Paine Field.

Halls Lake Office, Lynnwood, Washington. Mr. Molver served as project manager. DEA conducted a traffic analysis and prepared plans for landscape, irrigation, and stream restoration.

Mount Baker Terminal Access Roadway and Utility Improvements, Everett, Washington. Mr. Molver served as project manager. DEA provided project management, civil engineering, and landscape architecture for improvements at the Mount Baker Terminal. The construction drawings include road improvement plans reviewed by the City of Mukilteo and water and sewer plans reviewed by the Mukilteo Water and Wastewater District. Permit applications were prepared for work in both the City of Everett and City of Mukilteo, as well as for the waterline crossing under the BNSF Railroad, and to DOE for coverage under the Statewide NDPES permit for construction activities. JARPA applications were prepared for hydraulic project approvals for the two crossings of Japanese Creek. This project provides public access to the waterfront developed as part of the Port's rail/barge terminal facility by providing a crossing of the BNSF rail tracks at Mount Baker Avenue and constructing a new portion of First Street. The project includes roadway and sidewalk improvements, decorative lighting, storm drainage improvements, water and sewer extensions, and landscaping. The project includes coordination with the City of Mukilteo, City of Everett, Mukilteo Water and Wastewater District, Washington State Ferries, BNSF, and the Tulalip Tribes.

David Evans and Associates, Inc.
14432 SE Eastgate Way, Suite 400
Bellevue, WA 98007

Phone 425 519 6500
Fax 425 519 5361
E mail ogr@deainc.com

O. Gray Rand III

Experience Summary

Mr. Rand is a senior fish, wildlife and wetlands biologist with David Evans and Associates, Inc. with 23 years of experience in ecological, wildlife, and habitat studies throughout the Pacific Northwest. Mr. Rand specializes in analysis of proposed project impacts on fish, wildlife, and wetlands, often in support of the NEPA and SEPA process. Mr. Rand has been qualified as a Senior BA Author with WSDOT since 2006 when they began their BA training and testing program. He has prepared more than 50 BAs and ESA assessments to WSDOT standards, as well as numerous Critical Area Reports and NEPA/SEPA Environmental Assessments and Environmental Impact Statements. Mr. Rand is also a Professional Wetland Scientist certified by the Society of Wetland Scientists, and he has conducted thorough and scientifically defensible wetland studies for public and private sector clients through the Puget Sound area, including cities, counties, Native American Indian Tribes, state and federal agencies, and numerous private developers. Mr. Rand also is a lead biologist for fish salvage operations that are often required for in water construction. Mr. Rand has successfully obtained permits for private and public clients from local, state, and federal agencies for a host of different projects.

Education

1992 1994 Washington State University Pullman, WA

Post-Baccalaureate Work, Environmental Science

- 2 years in Masters of Science Program; taught Introductory Biology for three semesters.

1987 1991 Washington and Lee University Lexington, VA

B.S. Biology, Minor English

- Graduated Cum Laude; conducted research on rare plant endemic to Virginia.

Professional Experience

2005 – Present David Evans and Associates, Inc. Bellevue, WA

Senior Scientist/Project Manager

Senior scientist responsible for technical analysis of wildlife, fish and wetland resources on a wide range of transportation, land development and water resources projects. Prepared or contributed to more than 100 wetland delineation reports, critical area studies, biological assessments, and other environmental documents. Managed approximately 100 projects. Lead fish moving biologist for in water construction. Familiar with wide array of permits required by local, state and federal agencies for aquatic

related projects.

2000 2005 Shapiro and Associates, Inc. (now Amec Foster Wheeler) Seattle, WA

Senior Ecologist/GIS Analyst

Extensive experience with projects involving wetlands, salmon, wildlife, shoreline issues, permitting, and GIS. Prepared more than 40 Biological Assessments, including more than 20 on Lake Washington and Lake Sammamish. Worked for and interacted with many local municipalities, counties, state and federal agencies, tribes, stakeholder groups, and private citizens. Supervised three other technical specialists. Regularly planned, conducted, and supervised field work, including in water work. Conducted more than 50 wetland projects, including reconnaissance, delineation, mitigation and monitoring. These projects ranged in size from several hundred square feet to an 8,000 acre wetland complex in Duck Valley, Idaho

Professional Experience (continued)

1994 2000 Foster Wheeler Environmental (now Tetra Tech) Bothell, WA

Wildlife Biologist/GIS Analyst

Primary author on wildlife sections and discipline reports for several controversial Environmental Impact Statements, including Headwaters, I 90 Land Exchange, Lower Snake River Dam Removal, and several projects in Alaska. Also served as GIS Analyst for numerous projects in Alaska, South Carolina, Minnesota, California, Oregon, and Washington. Created survey plans, supervised field crews, and participated in field surveys for multiple species of concern on Forest Service Land in the Cascades and in Oregon.

Professional Activities and Certifications

- Professional Wetland Scientist (#2039), 2010
- How to Administer Development Permits in Western Washington's Shorelines, Coastal Training Program, 2018
- Wildlife Crossings Field Course, WSDOT, 2008
- Arid West Regional Supplement Training (USACOE), 2007
- Washington Department of Ecology Wetland Rating System Training – Western and Eastern WA, 2005 & 2007
- Certified Senior Author, BA Preparation, WSDOT, 2006
- Forage fish bulk spawn sampling protocol (Certified by WDFW), 2003
- SCUBA (PADI 2000)
- Wetland Delineation (certified by the Corps), 1999
- Habitat Evaluation Procedure (Certified by the National Biological Survey), 1995
- SCUBA (certified by PADI)
- The Wildlife Society, Washington Chapter
- Society of Northwestern Vertebrate Biology

Reprensentative Client List

- City of Issaquah
- City of Sammamish
- FHWA Western Federal Lands
- Snohomish County
- City of Kirkland
- Washington Department of Transportation
- Snohomish County
- Puget Sound Energy
- Chelan County
- Idaho Transportation Department
- Sound Transit
- Grays Harbor County
- City of Tacoma
- McClean Iron Works
- City of Gig Harbor
- City of Lynnwod

Reprensentative Project List

Centennial Trail – Woodinville to Snohomish, Snohomish County, Washington. DEA is assisting Snohomish County Parks with analysis, design, and permitting of a new 12 mile extension of the existing Centennial Trail system in Snohomish County, Washington. Overall, DEA is responsible for all aspects of design on the project, including civil, bridge and structures, geotechnical, and environmental. Mr. Rand is the task lead for all environmental work on the project, which has included extensive wetland and stream delineations along the entire 12 mile corridor. DEA has identified, mapped and classified approximately 60 wetlands, 40 streams, and 40 jurisdictional ditches along the corridor. Mr. Rand oversaw the production of a comprehensive Critical Area Study documenting the results of the field work and analyzing potential project impacts, based on 30% design.

Upper Hoh River Road Bank Stabilization and Bridge Replacement, FHWA Western Federal Lands Highway Division, Jefferson County, Washington. Mr. Rand is the Project Manager and task lead for natural resources and permitting for a bank stabilization project along the Hoh River on the west side of the Olympic Peninsula. The project involved wetland and stream delineation, wildlife habitat surveys, and cultural resources; preparation of technical reports; preparation of a Draft and Final Environmental Assessment for NEPA compliance; preparation of a FONSI; preparation and submittal of numerous local, state and federal permit packages, as well as extensive agency coordination.

Confluence Park Pedestrian Bridge, for City of Issaquah, Issaquah, Washington. Mr. Rand prepared the critical area assessment for the project and submitted the application for the project HPA from WDFW. For this project DEA's approach to streamline permitting was to avoid in water work and "zero rise" with a 150 foot bridge structure spanning the floodway.

Wenberg County Park Boat Launch & Waterfront Renovation, for Bruce Dees & Associates, LLC., Stanwood, Washington. Mr. Rand was the task manager for the critical area assessment and permitting for this project. DEA, as a subconsultant, provided environmental permitting

assistance, prepared the Draft and Final Critical Area Study to Snohomish County standards, developed a conceptual plan for riparian habitat mitigation, and coordinated with local and state permitting agencies.

35th/36th Avenue West Improvements, City of Lynnwood and Snohomish County, Washington. Mr. Rand is the environmental task lead responsible for preparing environmental documentation and obtaining permits for a key one mile long, north south corridor linking the City of Lynnwood and Snohomish County. Mr. Rand is directly involved with agency coordination, obtaining project permits, and negotiating mitigation for this project.

McNaughton Group Rural Cluster Subdivision III Critical Areas Support, Snohomish County, Washington
Mr. Rand was task lead for preparation of a Critical Areas Report for this 100+ lot development in Snohomish County, Washington near Lake Goodwin. Work involved extensive field studies, including wetland delineation and stream mapping, habitat mapping, and stand typing. Mr. Rand responded to multiple rounds of review on the report by both the applicant and the County.

PSE Tolt Gas Pipeline, Phase 1B, Cottage Lake Creek Bridge, King County, Washington. DEA is assisting Puget Sound Energy with critical area assessment, restoration design, hydraulic analysis, and permitting of 1,800 lineal feet of new gas pipeline. The focus of the project is the crossing of Cottage Lake Creek, where the new gas pipeline will be suspended underneath a new pedestrian footbridge across the creek. Mr. Rand was the project manager and lead permitting biologist, responsible for all DEA deliverables, including a Hydraulic Analysis Report, a Critical Areas Report, 30/90/100% restoration plans, specifications and estimates, and various permitting applications.

NE 124th Avenue NE Pedestrian Improvements, City of Kirkland, Washington. Mr. Rand is lead permitting biologist for this project for the City of Kirkland. Mr. Rand oversaw the production of a Critical Areas Report, Conceptual and Final Wetland and Stream Buffer Mitigation Plan, and Programmatic Permit Application. The City requested Mr. Rand to assist them in using this project as a case study as the first transportation project to use the City's new programmatic permit process under their revised Critical Areas Ordinance.

60 Acres South Soccer Park, Lake Washington Youth Soccer Association, Redmond, Washington. Mr. Rand served as project manager for the development of a new soccer park in Redmond, Washington. Mr. Rand supervised staff in the production of the critical areas report, SEPA checklist, and all permitting, including the JARPA, HPA, and shoreline permit. Mr. Rand wrote a Biological Assessment to meet the applicant's responsibilities under Section 7 of the Endangered Species Act. Mr. Rand is also coordinating the implementation of the wetland mitigation plan and the long term monitoring of the mitigation areas.

Point Wells Pile Replacement Permitting and Biological Assessment, Lead Biologist, Snohomish County, Washington, Paramount Petroleum. Mr. Rand was the lead biologist for permitting

and preparation of biological documentation for a pile replacement at Paramount Petroleum's Point Wells facility in Snohomish County, Washington. Work involves preparation of a Biological Evaluation for bald eagles and marbled murrelet, critical habitat assessment for listed fish species, and all associated permitting.

Wild Horse Wind Facility, for Puget Sound Energy, Kittitas County, Washington. Mr. Rand served as task manager for preparation of a Draft and Final Supplemental EIS analyzing impacts of a proposed 22 turbine expansion of one of the largest wind power facilities in Washington. Mr. Rand coordinated all technical authors, participated in weekly coordination meetings with the client, responded to public comments on the DSEIS, and produced the Final SEIS in a total of less than 3 months. Mr. Rand also participated in sage grouse lek surveys on the expansion area.

Chelan County Public Works Environmental On Call Contract, for Chelan County, Washington. Mr. Rand serves as contract manager and project manager for this environmental on call contract for the Chelan County Department of Public Works. Mr. Rand has overseen the completion of sixteen task orders under this contract in the past ten years, which have included conducting fish salvage activities for culvert replacement projects, conducting wetland delineations, visual quality assessments, and ESA consultations.

I 90 Snoqualmie Pass East SEIS, WSDOT, Kittitas County, Washington. Mr. Rand prepared the ESA Reinitiation of Consultation document, a specialized BA, when the construction contractor for I 90 Snoqualmie Pass East highway improvements proposed designing and constructing and series of bridges along Keechelus Lake that would allow avalanches to pass under them instead of an 1100 foot snowshed designed by WSDOT. Bull trout is an ESA listed species that occurs in the lake and portions of its tributaries, and the lake itself is designated as critical bull trout habitat under ESA. DEA worked closely with WSDOT South Central Region environmental staff, and also briefed USFWS staff through presentation to the Interdisciplinary Team of agencies as well as one on one meetings

Presentations/ Publications

Poster Presentation, International Conference on Ecology and Transportation, Annual Meeting, 2015 *When the Project Changes During Construction: Management Environmental Commitments Through Redesign.*

Powerpoint Presentation, Society of Inland Northwest Environmental Scientists, March 2012 – *Environmental Mitigation for Three Washington Wind Facility Proje.cts.*

Invited Speaker, American Wind Energy Association, Wind Power Project Siting Workshop, Seattle, WA, February 2009 – *Sage Grouse and the Wild Horse Wind Power Facility.*

Powerpoint Presentation, DEA Everett Office Staff, 2007 – *SWANCC and Rapanos – What They Mean for Our Clients*

Presentation to Private Real Estate Investors, August 2007 – *Wetlands and Real Estate – What you Need to Know.*

Poster Presentation, The Wildlife Society, Washington Chapter, Annual Meeting, 2006 – *Preliminary Observations of Wildlife Diversity and Abundance in Remnant Shrub Steppe and Bunchgrass Habitat in South Central Walla Walla County, Washington.*

Poster Presentation, The Wildlife Society, Washington Chapter, Annual Meeting, 2003 – *Wildlife Monitoring at the Urban Interface.*

Poster Presentation, The Wildlife Society, Washington Chapter, Annual Meeting, 2000 – *Sampling for Survey and Manage Species in the Cascade Mountains of Washington.*

Knox, J.S., M. J. Gutowski, D.C. Marshall, and O. Gray Rand. 1995. *Tests of the Genetic Bases of Character Differences Between Helenium virginicum and H. autumnale (Asteraceae) Using Common Garden and Transplant Studies,* Systematic Botany 20(2):120 131.

HARTCROWSER

ROY E. JENSEN, LHG

Senior Associate Hydrogeologist

EDUCATION

Geology and Hydrogeology, Postgraduate Work, South Dakota School of Mines and Technology, Rapid City, SD, 1983-1988

MS, Geology, Loma Linda University, 1983

BS, Medical Technology, Walla Walla College, 1979

BS, Biology, Walla Walla College, 1978

LICENSES/ CERTIFICATES

Licensed Hydrogeologist, WA

Registered Geologist, CA

Registered Site Assessor, WA

AFFILIATIONS

Association of Washington Business – Energy, Transportation, Water Resources, Water Quality, and Environmental Subcommittees

National Ground Water Association

Roy is a senior-level hydrogeologist with 30 years of experience in the Pacific Northwest. He has managed, designed, and conducted numerous geologic and hydrogeologic investigations for a variety of private and public clients. He has particular expertise in long-term hydrogeologic assessments, aquifer testing, groundwater monitoring and sampling, and groundwater modeling. He also provides hydrogeologic support for geotechnical projects including developing construction dewatering plans, evaluating groundwater seepage for slope stability problems, and stormwater infiltration assessments.

REPRESENTATIVE PROJECT EXPERIENCE

Terminal 46 Environmental Assessment, Port of Seattle, WA.
Project Manager for waste disposal study of soil and groundwater to support construction of stormwater vaults at a marine terminal. Results indicated that disposal to a lower cost disposal facility was required.

Infiltration Testing and Modeling, Federal Center South, Seattle, WA.
Roy designed a test program and evaluated stormwater infiltration for a major office development along the Duwamish Waterway.

Environmental Assessment, Richmond Marine Terminal, Seattle, WA.
Project Manager for multi-phase MTCA environmental investigation of a petroleum product storage facility at marine terminal along Puget Sound.

Piers 24/25, Groundwater Quality Assessment, Port of Tacoma, WA.
Roy managed groundwater investigations for metals, PCBs, and petroleum. A model was used to evaluate impacts on recontamination of the sediment cap from upgradient groundwater.

Terminal 5/PSR CERCLA Site, Transport Modeling, Port of Seattle, WA.
Developed a contaminant transport model that was used to evaluate the potential of contaminated groundwater to impact sediment and offshore water quality.

Terminals 18 and 46, Dewatering Assessment, Port of Seattle, WA.
Managed aquifer test programs and developed dewatering recommendations for construction of stormwater water quality treatment vaults at a very active port facility.

Groundwater Investigation (RFI), Duwamish Waterway, Seattle, WA.
Conducted a multiphase RCRA hydrogeologic investigation of a 100-acre former manufacturing facility. Activities included well installation, soil sampling, water quality assessment, tidal studies, and aquifer testing. Prepared a detailed evaluation of the total mass loading and water quality goals for chemicals in groundwater discharging to the Duwamish Waterway that would minimize impacts to sediment and surface water quality.

Former Louisiana-Pacific Log Yard Facility, Port of Tacoma, WA.
Conducted a groundwater monitoring program for evaluating the effectiveness of a cap placed over arsenic-contaminated slag material at site located on the Hylebos Waterway. The analysis showed that the cap was effective in preventing leaching of metals to groundwater.

Risk Evaluation, Hylebos Waterway, Commencement Bay, Port of Tacoma, WA.
Evaluated the risk of chemicals (metals and petroleum hydrocarbons) in groundwater and stormwater from adjacent sites to contaminate sediment in waterway.

Groundwater Remediation Analysis, Occidental Chemical Marine Terminal, Tacoma, WA.
Provide technical hydrogeology oversight and developed approach for a CERCLA site to evaluating groundwater remedies for plume discharging to active waterway.

Pacific Sound Resources Remedial Investigation/Feasibility Study (RI/FS), Seattle, WA.
Senior Hydrogeologist responsible for providing technical hydrogeology support for an CERCLA RI/FS at a former wood treatment site along the waterfront for the EPA. The site was developed on pile supported hydraulic dredge fill in Elliott Bay. Services included evaluating the design, construction, and implementation of groundwater monitoring systems and site hydrogeology characteristics.

Remedial Investigation/Feasibility Study, Asarco Sediments, Tacoma, WA.
As Senior Hydrogeologist, provided technical oversight and cleanup plan support for CERCLA RI/FS for sediment and groundwater at former Asarco smelter. Developed probabilistic approach using Monte Carlo methods to develop evaluate groundwater mass loading rates to the bay. Provided technical review of the groundwater sampling plans, and studies of tidal-influenced groundwater levels and prepared groundwater load determinations.

Technical Review, Various Sites, Commencement Bay, WA.
Provided technical review for the EPA for various proposed or constructed sediment disposal sites in the Hylebos, Blair, Theo Foss, Sitcum and Milwaukee Waterways within the Commencement Bay Superfund sites. Tasks included review of the work plans, groundwater investigations and remedial designs to determine if they meet the projects and protectiveness to human health and the environment.

Groundwater Monitoring, PACCAR Superfund Site, Renton, WA.
Roy is the Project Manager for an ongoing groundwater monitoring program to evaluate the effectiveness of soil and groundwater remediation at an industrial site

HARTCROWSER

JULIE K.W. WUKELIC

Senior Principal Engineer

EDUCATION

BS, Mechanical Engineering, Seattle University, 1982

AFFILIATIONS

Commercial Real Estate for Women (CREW)

American Society of Mechanical Engineers

Julie leads Hart Crowser's due diligence, property redevelopment and environmental construction oversight practices. She is a recognized local leader in providing environmental support for large-scale, high-profile property development projects, including projects requiring screening, managing, disposal, and re-use of hundreds of thousands of tons of dirt. With 32 years of environmental consulting experience, Julie's expertise includes investigating soil, groundwater, sediments, and air media, developing construction contingency plans, conducting feasibility studies, preparing plans and specifications, preparing excavation and cleanup action plans, conducting treatability studies, negotiating with regulators to develop reasonable cleanup standards and timeframes, managing contractor activities, and characterizing and making recommendations for waste designation of excavated materials. Julie has extensive experience in managing, advising, and collaborating with the field personnel (both environmental and geotechnical), contractors, and owners in quickly making decisions on managing risks and environmental unknowns during construction activities. She has also provided support to the project team in obtaining LEED credits.

REPRESENTATIVE PROJECT EXPERIENCE

1931 Second Ave, Seattle, WA

Environmental Principal-in-charge for conducting Phase II environmental services on this property located in downtown Seattle. Our environmental services included soil, groundwater, and soil vapor sampling and analysis to characterize the environmental conditions of the Property. We also conducted a ground penetrating radar (GPR) on the Property to evaluate for potential USTs and a known eractic below the Property and adjacent site to the south. We also prepared planning-level cost estimates for potential cleanup costs during site development, including differentiating between contamination from the adjacent Viktoria Site and potential contamination originating from the subject property.

425 Fairview Avenue Development Environmental Services, Seattle, WA

Environmental Project Manager during development of four high-rise and mid-rise towers over a half-block area in Seattle's South Lake Union neighborhood. The project required soil management of auger-cast soldier pile drilling and mass excavation next to existing buildings, including excavation for three levels of below-grade parking. Services included support for pre-characterization of soil for disposal, segregation and profiling soils for proper disposal; underground

storage tank removals; and regulatory negotiations for site closure. The cleanup received a No Further Action opinion letter from the State of Washington in 2017.

First and Thomas Development Environmental Services, Seattle, WA

Environmental Project Manager during development of two low-rise buildings over a three-quarter block area in Seattle's Lower Queen Anne neighborhood. Environmental services included pre-construction site investigations and construction contingency plan (CCP) preparation. Hart Crowser provided environmental support during construction when isolated areas of contamination and unknown USTs were encountered. The CCP prepared and implemented aided in expeditious characterization and cleanup without interruptions to construction activities. A cleanup report was prepared and submitted to the State of Washington in a timely manner. The site cleanup received a No Further Action opinion letter in 2017.

Insignia Towers Development Environmental Services, Seattle, WA

Environmental Project Manager during development of two 40-story towers in Seattle's Denny Triangle area. The project required soil management of auger-cast soldier pile drilling and mass excavation of over 130,000 tons of soil for multiple levels of underground parking over an entire city block bordered by Fifth Avenue, Sixth Avenue, Bell Street, and Battery Street. Services included support for pre-characterization of soil for disposal, segregation and profiling soils for proper disposal. Our work also included soil and groundwater monitoring for the disposal of contaminated soils during construction.

2nd and Pike Highrise, Seattle, WA

The Second and Pike Tower is a 39-story apartment development in Seattle. Julie was environmental Principal in Charge for this project that involved pre-characterization, development of a cleanup action plan/construction contingency plan (CAP/CCP), soil and groundwater disposal management, contractor and disposal site coordination, and environmental segregation and screening of soil. Julie's team worked closely with the cross-trained Hart Crowser geotechnical and environmental field representative and contractor to maximize soil screening and sampling. The site was located in downtown Seattle where there was no room for stockpiling and identifying areas and depths of appropriate disposal by incremental sampling and analyses was crucial during soil removal. Approximately 80,000 tons of soil was generated during site development with only about 7,000 tons of impacted soil requiring off-site disposal to a Subtitle D landfill.

Weyerhaeuser Headquarters at 200 Occidental, Seattle, WA

This eight-story office building in Seattle's historic Pioneer Square is home to Weyerhaeuser's new corporate headquarters. Julie was Project Manager for Phase I and Phase II ESAs on the compact urban site. A Cleanup Action Plan/Construction Contingency Plan (CAP/CCP) was prepared for the site to manage known and unknown contamination.

Amazon.com Development, Seattle, WA

Principal in Charge for services to support development on four blocks in the South Lake Union area. The project involved developing two new 12-story buildings with four to five levels of below-grade parking, and two 4-story buildings with one to two levels of below-grade parking. Julie conducted Phase I and Phase II Environmental Site Assessments, prepared and implemented Cleanup Action Plans (CAPs) and Construction Contingency Plans (CCPs), provided soil management for almost a million-cubic yards of soil, and

groundwater and stormwater management. Efficient decision making, planning, and pre-characterization and negotiations with multiple disposal facilities resulted in minimizing expensive disposal fees and reducing long term risks. Only about 95,000 tons of impacted soil from all four blocks required disposal as Class II or Class III out of approximately 1,000,000 tons of soil removed from the sites. Julie successful ly negotiated No Further Action determinations on cleanups on several of the properties for three of the four blocks. The NFA determination for the fourth block is pending while compliance groundwater monitoring is ongoing.

Russell Investments Center-Seattle Art Museum Excavation and Tower, Seattle, WA

Julie provided technical assistance in characterizing soil for re-use off-site. Minor environmental impacts were encountered. The development of this office tower in downtown Seattle required a 90-foot-deep excavation that generated hundreds of tons of soil requiring off-site removal. Hart Crowser brought value as well as sustainable design to the project by reusing the substantial quantity of excavated fill as an environmental soil cap for the Seattle Art Museum's Olympic Sculpture Park. Based on historical documentation and soil sampling and analysis, the nature of the soil from the excavation was such that it was able to satisfy stringent environmental specifications focus as capping material at the Sculpture Park.

120 Bellevue Way, Bellevue, WA

Principal in Charge for Phase II environmental services for this building project in downtown Bellevue. The development plans called for the construction of a 21-story residential tower surrounded by a 4- to 5-level podium above two levels of underground parking. Hart Crowser conducted field explorations including sampling and testing of potentially contaminated soils and groundwater.

moffatt & nichol

William (Bill) J. Gerken, PE

Senior Coastal Engineer / Project Manager

KEY FEATURES

REMOVE IF NOT USED

List 3 to 5 items; Examples:

Years of experience

Number of similar projects (Relevance List)

EDUCATION

BS, Ocean Engineering, Texas A&M University, College Station, 1993

REGISTRATION

Washington, Civil, 34802, 1998

CERTIFICATIONS

40-hr HAZWOPER

8-hr HAZWOPER Supervisor

30-hr OSHA Construction Safety

AFFILIATIONS

Western Dredging Association

American Society of Civil Engineers (ASCE) / Coasts, Oceans, Ports & Rivers Institute

Society of American Military Engineers (SAME)

EXPERIENCE

Mr. Gerken is a senior coastal/civil engineer, with over 28 years of experience, specializing in coastal and marine design and construction. His experience covers all project phases including project management, planning, permitting, coastal processes, facility design, cost estimating, construction oversight, and site and fabrication inspection. Mr. Gerken's experience, gained through both consultant and contractor perspectives, has given him a unique understanding of marine and coastal conditions, along with the experience of interacting with clients, government agencies, and the public planning process.

Mr. Gerken has spent extensive time working in the field, both internationally and throughout the coastal United States, including Alaska. His field experience covers a variety of activities: dredging, pile driving and marine construction; breakwaters and shore protection; bathymetric and topographic surveys, contaminated sediment dredging, and capping; geotechnical sampling and investigation; project planning, project supervision and construction management.

REPRESENTATIVE PROJECT EXPERIENCE

Elliot Bay Marina Floating Breakwater Replacement, Seattle, Washington. Project manager for replacement of a 1,090-foot-long x 14-foot-wide floating breakwater which protects the eastern side of a 1,200-slip marina basin. The floating breakwater has 27 finger floats providing 56 vessel slips along its western (marina) side and yacht moorage along the eastern side. The new breakwater will include upgraded electrical services, water, and fire system. Work includes, permitting, design, production of drawings and performance specification, coordination with suppliers and contractors, and construction support. 9894

Coos Bay Channel Modifications Project (Section 204(f)/408), Coos Bay, Oregon. Senior coastal engineer providing technical review of project memoranda and reports, technical lead for the preparation of design plans and specifications, and senior review of constructability, cost and schedule. As a sub consultant for the Project Delivery Team, Moffatt & Nichol is completing coastal engineering for the Section 204 (f)/408 navigation improvements. The proposed project involves navigation channel widening and deepening, jetty modification and relocation of aids to navigation, in order to accommodate a wider variety of vessels, including larger LNG vessels than currently feasible, and larger bulk and breakbulk carrier ships. Moffatt & Nichol is preparing the marine and coastal engineering studies and analyses, including: design parameters for site environmental conditions, channel and dredging parameters; dredge material placement, alternatives analysis, estimates of construction costs, and preparation of construction documents. 9342

Engineering and Design Support for Major Marine Industrial Development, Southern Oregon Coast. Confidential Client(s). Project manager for work including Dredge Material Management Plan modifications. Preliminary design constructability analysis for potential mitigation sites. Analysis including numeric modeling for site hydrodynamics, sediment transport, vessel wake impacts, prop wash, impacts to pile dikes, turbidity, vessel cooling water discharge, impacts to salinity, and impacts to navigation. 9248-04

Elliott Bay Seawall, Seattle, Washington. Senior coastal engineer providing constructability and coastal design review for the proposed intertidal habitat bench, coordinated with project team of an adjacent City of Seattle project in order to integrate design details. Moffatt & Nichol is supporting the City of Seattle with elements of final design for the replacement of 7,000 feet of the Elliott Bay seawall on the Seattle waterfront. Moffatt & Nichol is responsible for coastal design expertise and structural design loads for the seawall structure and appurtenances and for the coastal geomorphic and engineering analysis supporting the associated habitat features of new beach and intertidal bench sites constructed to mitigate for the project. 7790-04

Experience – Prior to Moffatt & Nichol

NAVELENA Consorcio Constructor, Magdalena River Navigability Recuperation Improvements Project, Rio Magdalena, Colombia. Dredge plan technical lead for a design build team led by the NAVELENA consortium. The consultant team provided design services for the Magdalena River Navigability Recuperation Improvements project during the pre-construction and design phases. The project is focused on a 908 km portion of the Magdalena River in Colombia with the primary purpose to improve the river's navigability. To improve river navigation, the project includes development of a dredging plan to establish and maintain a permanent navigation channel as well as the design of river training structures to create natural scour of sediments to assist in maintaining navigable depths. The project is a Colombian government initiative through the national agency (Cormagdalena) in charge of Rio Magdalena Watershed Management. Multiple international consultant offices formed the coordinated design team, with the U.S. responsible for the dredging plan and the hydrologic-hydraulic modeling of the river. Colombia responsible for the fluvial dynamic design of the river, and Spain responsible for the geological-geotechnical portion of the project and structure design. (2015 - 2016)

U.S. Navy, Midway Island Old Bulky Waste Landfill Shore Protection Repair/Replacement, Midway Atoll. Technical lead and design engineer for the development and design for repair/replacement of shoreline protection for the U.S. Navy's Old Bulky Waste Landfill. The landfill is a peninsula located on the south side of Sand Island (Midway Atoll). The project involved site inspection and survey (topographic and bathymetric), numeric modeling to determine design wave conditions, design development, cost estimating, constructability analysis, and production of plans and specifications. Midway Atoll is a remote location managed by the U.S. Fish and Wildlife service as part of the Papahanaumokuakea Marine National Refuge. The remote location and nature of the project location created additional logistic permitting and cost challenges that needed to be considered in design. (2014 - 2016)

U.S. Army Corps of Engineers Portland District, Major Maintenance Reports (MMR) and NEPA Environmental Assessments (EA) for Sand Island and Cottonwood Island Pile Dike Systems, Portland, Oregon. Coastal engineering, cost, constructability, technical lead/review and project management for two MMRs for pile dike systems (PDS) in the tidally influenced Lower Columbia River. In each PDS study, repair/design alternatives were developed and evaluated with respect to system function over a 50-year life cycle. A preferred alternative recommended based on benefit/cost factors, including environmental issues. Long-term strategy for future repair requirements was developed. Work included structural and performance evaluation of the PDS, detailed hydrographic surveys, analysis of currents, sediment transport and shoreline impacts through engineering analyses and numerical modeling techniques, and life cycle cost analysis. For each PDS, the team prepared documentation that combined and integrated the MMR and National Environmental Policy Act (NEPA) EA processes. This work built on prior work as

documented in the Structural and Hydraulic Analysis of Columbia River Pile Dikes Final Report (USACE, 2011) and subsequent Final Field Investigation Results Report. (2014 - 2016)

Port of San Francisco, Crane Cove Park Master Plan and Design, San Francisco, California. Coastal engineering technical lead for the Port of San Francisco Crane Cove Park Design. Crane Cove Park is an 8-acre waterfront open space within the historic Pier 70 industrial district on San Francisco Bay. The project included design services for creation of a pocket beach, shore protection, armored contaminated sediment cap, pier extension(s) and sea level rise impact analysis. (2013 - 2016)

California State Lands Commission and C.S. Land, Inc., Selby Slag Former Smelter Site Remedial Design. Senior coastal engineer who provided coastal engineering, cost, constructability, and technical lead/review services for evaluation of site coastal conditions, development of remedial alternatives and remedial design. The Selby Site is the location of a former metal smelter located on the San Francisco Bay covering an area of approximately 66 acres including over 5,000 feet of shoreline. Site environmental issues include lead, copper, arsenic and other heavy metals-impacted soils and groundwater, presence of smelter slag throughout the site and nearshore environment extending into the Bay. (2013 - 2016)

BC Ministry of Forests, Lands and Natural Resource Operations, Toquaht Bay Campground and Marina Remediation Planning, Barkley Sound, British Columbia, Canada. Coastal engineering technical lead for site evaluation, coastal design, cost and constructability for development of remedial options. The Province of British Columbia, Ministry of Forests, Lands, and Natural Resource Operations is under obligation to remediate the upland, intertidal bank and sediments of a former mine tailings site located in Barkley Sound Canada as part of a first nations treaty. This wild lands, complex, abandoned mine tailings site, owned by the Toquaht Nation, was used as a campground and marina until ordered closed by the Medical officer of Health due to the presence of elevated arsenic and iron concentrations. Potential remediation options including dredging, insitu stabilization, exsitu treatment, capping, enhanced natural recovery, and monitored natural recovery were explored. Work included a site visit to assess conditions, development of a wave, current, and sediment transport/littoral drift model and report, and assistance in constructability and cost evaluation of potential remedial actions. (2013 - 2016)

California Metropolitan Transportation Commission (MTC) and San Francisco Bay Conservation and Development Commission (BCDC), Climate Change and Extreme Weather Adaptation Options Pilot Project for Transportation Assets in the Bay Area, Oakland, California. Senior coastal engineer who provided coastal engineering, constructability, and costing services to support identification of vulnerable assets in the Oakland area, and to develop potential adaptation strategies to protect critical assets as part of a detailed analysis of potential inundation under several sea level rise scenarios. These strategies included an offshore breakwater, to protect a site near the Bay Bridge from increased wave overtopping, and two living levees. Using detailed wave and water level data, Oversaw development of the preliminary designs for the offshore breakwater and living levees. In addition to flood protection, the levees were also designed to enhance the intertidal marsh habitat in the Bay. The project received a 2015 APA Award of Excellence in the category of Best Practices. (2013 - 2015)

Port of Seattle, Terminal 117 Sediments Remediation, Seattle, Washington. Dredging engineer who provided design and constructability planning for dredging and disposal of 10,000 cubic yards of impacted sediments. Provided technical and oversight assistance during in-water construction. Terminal 117 is a CERCLA time-critical removal action for PCB impacted soil at a former asphalt plant site within the

Lower Duwamish Waterway Superfund site. The removal action included sediment and soil removal, capping/backfill, intertidal habitat restoration enhancement, and public access. (2012 - 2015)

Companhia Siderurgica Nacional (CSN) Brazil, Volta Redonda Plant, Remediation/Capping of Contaminated River Sediments at RP15, Volta Redonda, Brazil. Project manager and lead engineer who provided project management and design services for this contaminated sediment capping project in a fast-flowing river over petroleum-contaminated sediment with sheening and gas bubbles. The project required multi-phase design and installation of an innovative modular geotextile armored sediment cap in a river environment with very high design flow velocities and challenging construction conditions. Provided management and coordination of design and construction services between U.S. and Brazilian offices. In addition to its technical challenges, the project was implemented within tight budget, schedule, and scope constraints. (2012 - 2014)

BG Group, Sediment Sampling and Analysis Program and Dredging Alternatives Analysis for Berthing Facilities at a Potential New Liquefied Natural Gas Terminal, Prince Rupert, British Columbia, Canada. Dredge engineering lead who provided planning, engineering, and technical review services for development of a Sediment Sampling and Analysis Plan in support of permitting and development of offshore dredge material disposal alternatives. Work was completed under a highly constrained schedule driven by need to complete sampling prior to fall weather conditions. Also provided engineering and cost estimation for the project Dredging and Disposal Alternatives Analysis. (2013 - 2014)

U.S. Navy, Naval Magazine Indian Island Site 10 Landfill Shoreline Protection, Indian Island, Washington. Technical lead and project engineer for repair/ replacement design of the shoreline protection system(s) at Naval Magazine Indian Island Site 10 Landfill. The landfill lies along the northern shoreline of Indian Island with exposure to waves and associated erosion. Previous shore protection systems had failed and/or not met performance expectations. The new design provided long term protection of the land fill while implementing green and sustainable habitat components. (2012 - 2013)

Confidential Client(s), Passaic River and Newark Bay Multi-beam Bathymetric Surveys. Survey oversight officer who provided QA/QC services and oversight for three multi-beam and single beam hydrographic survey efforts of 14 miles of the Passaic River. The surveys were conducted as part of ongoing studies to assess the stability of the river bottom sediments. The second survey effort was undertaken following passage of Hurricane Irene in August of 2011 which provided a unique opportunity to characterize the potential effects of a large storm event on the study area. Also provided QA/QC services and oversight for a multi-beam and single beam hydrographic survey of Newark Bay. (2011 - 2013)

U.S. Army Corps of Engineers Portland District, Coquille River Pile Dike and Jetty Root Assessment and 90% Design, Bandon, Oregon. Coastal engineering and technical lead in support of the U.S. Army Corps of Engineers Portland District jetty and structures monitoring, dredging and navigation programs. Provided project management, coastal engineering and design for an engineering assessment and repair report— including design for the jetty root, L-shaped pile dike, and navigation aids at the Coquille River mouth in Bandon, Oregon. Tasks included a condition and structural evaluation, function and needs assessment, alternatives analysis with selection of a preferred alternative, design, production of 90% level plans and specifications, and a construction cost estimate. (2011 - 2012)

U.S. Army Corps of Engineers Portland District, Siuslaw River Jetties Major Maintenance Report, Florence, Oregon. Coastal engineering technical lead in support of the U.S. Army Corps of Engineers Portland District jetty and structures monitoring, dredging and navigation programs. Provided QA/QC, design and technical review for a Major Maintenance Report (MMR) for the Siuslaw River jetties. The MMR included structural evaluation of the jetties above and below water level, a wave and current analysis, and a sediment transport analysis using engineering analyses and numerical modeling techniques to evaluate project performance and adjacent shoreline issues. The MMR included a detailed evaluation of project performance over time, and a comprehensive discussion on recommended project repairs required to sustain usage levels. Several repair/design alternatives were developed and evaluated and a preferred alternative was recommended based on benefit/cost factors that include environmental issues and life cycle cost analysis. (2011 - 2012)

Jazan Economic City, South Breakwater Need Assessment, Jazan Economic City, Saudi Arabia. Provided review of design and numerical modeling performed for an expanded/new port for Jazan Economic City. Focus was on the need for and benefits of a southern breakwater for the facility. Participated in consultant meetings with the client, a major stakeholder and their engineers, to resolve differing views with supporting engineering results related to need for the southern breakwater. (2012)

The Boeing Co., Boeing Plant 2 Shoreline and Sediment Remediation Independent Design Review, Seattle, Washington. Provided peer review services for Boeing's dredging and shoreline remediation and habitat restoration project at their Plant 2 site on the Duwamish Waterway in Seattle, Washington. Reviewed design documents and work plans, participated in peer review panel working sessions, participated in the completion and presentation of findings, and responded to follow on questions. (2011- 2012)

U.S. Navy, Shine Tidelands State Park Proposed Restoration, Jefferson County, Washington. Coastal and civil engineer for the proposed Shine Tidelands State Park Restoration project, part of the mitigation program for capital construction at the Bangor Naval Base. Shine Tidelands State Park is a barrier beach feature with a berm between the wetland/lagoon and Puget Sound preventing any significant exchange of tidal waters. Restoration design work included the removal of the berm, roadway fill and riprap, and creation of a tidal channel to fully restore tidal flow. Restoration was designed to increase the size of the wetland and intertidal beach, enhance and increase the tidal marsh function, and enhance the terrestrial interface with the restored wetland by removing invasive plant species. (2012)

GenOn Energy, Inc., Mandalay Power Plant Canal Dredging Alternatives Analysis, Oxnard, California. Dredging engineer whose responsibilities included alternatives exploration and feasibility analysis for removal and disposal of mildly contaminated sediments from approximately two miles of open canal. Project included evaluation of various means and methods of dredging, de-watering, and disposing of material, project and lifecycle costs, and potential regulatory issues. Work also included exploration of BMP's to potentially limit sedimentation due to run-off from adjacent agricultural lands. (2011 - 2012)

Port of Longview, Berth 5 Mooring Dolphin, Longview, Washington. Project manager for permitting, design, bidding services, and construction administration for a new ship-mooring dolphin located between Berths 4 and 5 at the Port of Longview. The dolphin is designed to accommodate the mooring of Panamax-size vessels at either berth or both berths simultaneously. The project also included access via a catwalk from Berth 5. (2009 - 2011)

Dakota Creek Industries, Dakota Creek Shipyard Remediation and Redevelopment, Anacortes, Washington. Project manager who led the design team and provided coastal engineering, construction engineering and QA/QC services for this redevelopment of Dakota Creek Industries shipyard. The project included creation of two deep water berths, new bulkheads and piers, utilities, stormwater, and dredging of approx. 130,000 cubic yards of material, of which 23,000 cubic yards was unsuitable for open water disposal and disposed of uplands. Also provided engineering and design assistance for the environmental impact statement, public process, and permitting of this project, which was completed in 2010. The project won a 2010 American Society of Civil Engineers (ASCE) Honor Award. (2005 - 2010)

Heavy Duty Debris Barrier System for Highland Bridge Replacement, Highland, New Jersey. Project engineer who provided engineering design services for the Gunderboom-led team tasked with development and design of a pile anchored full depth containment boom utilized during replacement of the Highland bridge in Highland, New Jersey. Barrier system was designed for use in a strong current regime and to be re locatable/re-usable. (2010)

Facility Condition Inspection Services at U.W. Friday Harbor Labs, Friday Harbor, Washington. Project manager who led facility condition inspection at Friday Harbor Labs for the University of Washington Capital Projects Office. Inspection projects included piers, floating breakwaters, floats, and other in-water and over-water structures, as well as shoreline and seawall assessment. Inspection services included mechanical and electrical services, design for floating breakwaters, and anchor system repair and replacement. (2009 - 2010)

Electricité de France, Blayais and Paluel Nuclear Power Plant Vegetal Debris Exclusion Studies, France. Project coastal engineer for Gunderboom-led teams developing feasible solutions for exclusion of vegetal debris sufficient to cause shutdowns from the cooling water intakes at two nuclear power plants in France. Paluel is a four-reactor power plant located on the Normandy coast. Cooling water is drawn through a channel protected by armored breakwaters extending offshore in a heavy wave environment. The proposed solution involved reconfiguration and extension of breakwaters and groins to divert and/or trap algae during varying parts of the tidal cycle. Blayais is a four-reactor power plant on an estuary in the Bordeaux region with offshore intakes located in a high current region with moderate design wave heights. The proposed solution was an enclosure barrier combining solid diversion/end walls and permeable filter walls to allow flow while providing vegetal debris exclusion. (2007 - 2010)

U.S. Army Corps of Engineers Galveston District, Matagorda Ship Channel VE Study, Matagorda, TX. Coastal and Dredge Engineer. Selected member of a value engineering team for the U.S. Army Corps of Engineers project "Design Deficiencies at the Matagorda Ship Channel". Reviewed the Design Deficiency report and planning and design documents. Assisted in development of alternatives and cost estimating, study report, presentations. (2009)

Port of Kennewick, Clover Island Marina Design, Kennewick, Washington. Project manager who provided engineering services for the Clover Island Redevelopment master planning team and led the design effort for the Clover Island Marina for the Port of Kennewick. The marina project includes redevelopment of a 150-slip marina (70% covered moorage), transient and boat house moorage, approach pier, gangways, utilities, and additional amenities. Provided engineering, developed performance specifications, and bidding and construction administration assistance. The project received a 2008 AGC Build Washington Award. (2005 - 2008)

Clover Island (Metz) Marina Condition Assessment, Kennewick, Washington. Project manager who led a facility condition inspection and report for the Port acquired Clover Island Marina (formerly the Metz Marina) for the Port of Kennewick. Work included a load rating of marina structures as well as maintenance and redevelopment recommendations. Also identified an approximate schedule for planned maintenance and repairs. Based on the results of the inspection, damage sustained in a winter storm, and output from a master planning effort it was determined that the Port's future needs could not be met by the existing marina. (2006)

City of Oak Harbor, Oak Harbor Marina Redevelopment Master Plan, Preliminary Engineering and Permitting, Oak Harbor, Washington. Project manager who led a multidisciplinary team that developed the Marina Redevelopment Master Plan for the redevelopment of Oak Harbor's marina. The plan addressed accommodation for larger recreational vessels, evaluation and phased replacement of the marina, and maintenance. Following adoption of this master plan, Mr. Gerken led the team that provided preliminary design and permitting services for redevelopment of the 350-slip marina. The project included surveys, PSDDA sampling and analysis, permitting for 206,000 cubic yards of primarily new work dredging, a reconfigured/expanded slip mix, and development of an acceptable mitigation plan. Final permits for the project were obtained. (2006 - 2008)

Oak Harbor Municipal Pier Project, Oak Harbor, Washington. Project manager who provided management, permitting, and design for work that encompassed a large area of new dredging, large fixed piers, floats, a wave barrier, and shoreline enhancement, as well as the development of a creative and viable mitigation plan. The project permitting process included ESA formal consultation by the agencies. Necessary permits were obtained. Final design of project was held at 90%. (2005 - 2006)

City of Seattle, Luna Park Reconstruction, Seattle, Washington. Project manager who provided design and construction administration for the renovation/ reconstruction of Luna Park near Alki Beach in Seattle for the City of Seattle Parks Department. The project involved replacement of a 100-year-old deteriorated concrete bulkhead and fill that was 100 feet x 90 feet. The new structure is a pile-supported pier that accommodates a large, grassy area and continues to serve as a waterfront park. The project was well received by the community, and provided an environmentally sound solution that helps to restore the shoreline. (2004 - 2005)

Port of Skagit County, La Conner Marina Maintenance Dredging, La Conner, Washington. Project engineer who led teams in the permitting, design, and construction monitoring for two maintenance dredging projects at the La Conner Marina's North and South Basins. Permitting efforts included sampling and analysis under the PSDDA protocols. For the second project, a down-ranking of site sediments under PSDDA protocol was achieved along with a 10-year maintenance dredging permit, thus reducing costs at that time and in the future. (2000 - 2006)

Ketchikan Pulp Company, USEPA, Ward Cove Sediment Remediation Project, Ketchikan, Alaska. Quality Assurance Oversight Officer who provided QA/QC and technical review services on behalf of the oversight agency (USEPA), and acted as full time on-site third party quality assurance officer on this Superfund project that included dredging of 12,000 cubic yards of material from two berthing areas and thin capping of over 26 acres of bottom sediments with 23,000 cubic yards of clean sand. (2001 - 2002)

Duwamish Yacht Club, Dredging Project on the Duwamish Waterway, Seattle, Washington. Project engineer who managed environmental analysis (including PSDDA analysis), permitting, and design for dredging of 24,000 cubic yards of

sediment from the marina. Explored beneficial use of material by the U.S. Army Corps of Engineers on a capping project. (1999)

Permeable Wave Barrier Research Program, Seattle, Washington. Project engineer responsible for management of design, fabrication, installation, and analysis of data from pressure and wave measurement equipment on Bell Street Pier in Seattle, Washington. Assisted in coordination of model testing at the Oregon State University, O.H. Hinsdale Wave Research Laboratory, and the U.S. Naval Academy Hydromechanics Laboratory. Assisted in development of revised design methodology. (1996 - 1999)

Hurlen Construction & Boyer Alaska Barge Lines, Duwamish River Maintenance Dredging, Seattle, Washington. Project engineer who managed environmental analysis (including PSDDA analysis), permitting, and design for dredging of 23,000 cubic yards of sediment from berthing, staging, and loading area on the Duwamish River in the South Park area of Seattle. (1998)

San Francisco Airport Authority, International Airport Offshore Runway Concept Study, San Francisco, California. Project engineer whose work included evaluation of existing offshore soil conditions and concept design for soil improvements and an open-cell sheet pile bulkhead containment system. The proposed $1.9 billion dollar project included use of prefabricated vertical drains to achieve 100% primary consolidation in less than a year on the 30 to 90 feet of soft Young Bay Mud. Work included static and seismic stability analysis. The proposed construction schedule had to take into account the existing active on nearby runways so constraints were imposed on hours of work, personnel and equipment access, crane heights, and security issues. (1997 - 1998)

U.S. Oil, Blair Waterway Emergency Dredging, Tacoma, Washington. Project engineer who provided design and management assistance in the regulatory process to obtain an expedited permit under emergency provisions. In January 1997, U.S. Oil & Refining of Tacoma, Washington suffered a small underwater bank failure at their tanker berthing facility on the Blair Waterway. The slumped material prevented the full utilization of the berth by the large incoming tankers. (1997)

Port of Anacortes, CapSante Marina/Curtis Wharf, Pier 1/Dakota Creek Industries Dredging Evaluation, Anacortes, Washington. Project engineer who provided design for environmental analysis (including PSDDA analysis), permitting, and design for dredging of up to 695,000 cubic yards of sediment from all sites for the Port of Anacortes. (1996 - 1997)

Makah Native American Tribe, Dredging and Mitigation Beach Makah Marina, Neah Bay, Washington. Project engineer who provided coastal and dredging engineering direction for the design of a new 200-slip marina to accommodate commercial and recreational vessels up to 90 ft. in length. Design included 48,000 cubic yards of dredging and a mitigation plan for placement of material on an adjacent tract of land to form a beach for mitigation purposes. (1996)

Nygarrd Logging, Tansey Point Log Dock, Warrenton, Oregon. Designer and resident engineer who provided design and construction administration services for a 500-foot sheetpile bulkhead dock on the Columbia River in Warrenton, Oregon. The dock was constructed using the OPEN CELL® concept, with a face approximately 32 feet above mudline. Project was completed on time and within budget, in spite of very wet and windy conditions throughout construction. Also provided inspection, design and oversight services for dock repairs in 2008. (1995 - 1996)

White Pass and Yukon Railroad, Railroad Dock Project, Skagway, Alaska. Resident on-site engineer for 50,000 cubic yards of dredging and the construction of 1600 feet of steel pipe pile supported dock. (1995 - 1996)

Wave Studies for Akutan and Red Dog, Alaska. Design engineer whose work included instrumentation, data collection, and analysis of data. (1994 - 1996)

Wave Hindcasts and/or Design of Shoreline Protection, Various Locations. Design engineer whose project sites included Port MacKenzie, Lena Point, Dutch Harbor, Cold Bay, Valdez, Whittier, and a variety of sites in Alaska, Washington, and Oregon. (1995 - 2005)

Analysis and/or Design of Partially Penetrating (Permeable) Wave Barriers, Various Locations. Design engineer whose project sites included Seattle and Blaine Harbor, Washington; Astoria, Oregon; and Whittier and Akutan, Alaska. (1995 - 2005)

City of St. George, St. George Harbor Rock Dredging Program, St. George Island, Alaska. Design and resident engineer provided permitting and design services, and acted as resident engineer for a 50,000-cubic-yard rock dredging project on St. George Island in the Bering Sea. Dredging was performed under force account by the client, the City of St. George. The project required close coordination of permitting, funding (State, Corps and private sources), design, procurement, and construction. Work included dock and mooring structure construction and planning, and harbormaster building site civil work. (1993 - 1994)

Great Lakes Dredge and Dock Company. Field engineer whose responsibilities included most aspects of on-site engineering for a wide variety of dredging and beach nourishment projects requiring a broad range of equipment and methods. Following is a representative list of project locations and types. (1985 - 1990)

<u>Maintenance Dredging (entrance and/or shipping channel)</u>

Columbia River Bar
Freeport, Texas
Sabine Pass, Texas
South Pass, Louisiana
Gulfport, Mississippi
Jacksonville, Florida
Oregon Inlet, North Carolina
Chesapeake Bay
Brownsville, Texas
Galveston, Texas
Cameron, Louisiana
Southwest Pass, Louisiana
Mobile, Alabama
Hilton Head, South Carolina
Morehead City, Delaware

<u>Maintenance Dredging with Upland Disposal (entrance and/or shipping channel)</u>

Tampa, Florida
Albany (Hudson River), New York
Philadelphia, Pennsylvania

<u>Beach Nourishment</u>

Miami, Florida
Fort Lauderdale, Florida
Sandy Hook, New Jersey
Dania Beach, Florida
Virginia Beach, Virginia

<u>Sand Mining</u>

South Amboy, New Jersey

<u>Misc.</u>

Assorted projects in New York Harbor and surrounding area including maintenance and new work dredging, drilling and blasting, excavation and placement of submerged sewer line, and survey work.

PUBLICATIONS AND PRESENTATIONS

William Gerken, Pedro Aronchi, Anne Fitzpatrick, Élida Hulgado, Marcello Batista and Luiz Antonio Escobar, "An Interim Remedy to Contain Sediment Contamination at an Active Steel Mill in Brazil". Battelle 9th International Conference on Remediation of Chlorinated and Recalcitrant Compounds 2014. Battelle 8th International Conference on Remediation and Management of Contaminated Sediments 2015.

Gerken, W.J., D. Kriebel, and C. Sollitt, "Wave Forces on a Vertical Wave Barrier", ASCE Coastal Engineering '98 Conference, Copenhagen, Denmark, 1998.

Gerken, William J. and J. F. Gilman, "Dredging in the Bering Sea, St. George Island 1993-94 Harbor Dredging Project", ASCE Dredging '94 Conference, Orlando, Florida, 1994.

Gerken, William J., "Random Wave Reflection in a Two-dimensional Wave Tank", NSF, 1992.

Rich Schipanski

Manager, Planning and Environmental Review

Mr. Schipanski has 29 years of land use assessment, environmental analysis, permitting, and project management/coordination experience for a wide range of projects including: education/major institution projects, industrial mining operations with barge, rail and truck transportation modes, waterfront redevelopments, mixed-use developments, residential proposals, and business park and industrial projects. He has coordinated large teams of technical consultants in support of State Environmental Policy Act (SEPA) and National Environmental Policy Act (NEPA) documentation, land use approvals, and permitting.
Mr. Schipanski provides strategic planning services to public and private clients related to SEPA and NEPA compliance for institutional, mixed-use, and industrial and residential projects.

Qualifications

Education
M.C.P.; San Diego State University; City Planning; 1987
B.A.; Washington State University; Landscape Architecture; 1984

Professional Affiliations/Appointments
American Planning Association
City of Kenmore Planning Commission; 2001 2005

Experience
Years with EA: 7 Total Years: 29

Professional Experience

Environmental Impact Statements—Environmental Impact Statement (EIS) Project Manager for the Waterfront District Planned Action EIS for the Port of Bellingham. The EIS supported the redevelopment of approximately 216 acres of maritime industrial property in the City of Bellingham to a mixed-use master plan development. The project included assisting the City of Bellingham through the Planned Action Ordinance process.

EIS Project Manager for the West Campus Student Housing project for the University of Washington. The proposed student housing facilities are proposed for six separate sites in the West Campus Area of the University of Washington. Primary issues associated with this project include traffic, views, and relationship to historic resources.

EIS Project Manager for the Grant County International Airport Employment Center Project for the Port of Moses Lake. The EIS identified and analyzed conditions associated with the development of an employment center on approximately 1,200 acres adjacent to the airport. The Planned Action EIS, which is intended to streamline future permitting of individual employment projects, was completed in approximately 10 months.

EIS Project Manager for the Mats Quarry Operation on Mats Bay in Jefferson County. The EIS supported requests for increased mining, barge dock improvements, and increased barge traffic.

Project Manager for the Lakepointe Mixed-Use Redevelopment EIS located on Lake Washington in Kenmore. The EIS for the proposed conversion of a contaminated industrial site to mixed-use development with marina, shoreline improvements, and major transportation infrastructure facilities was completed within a 1 year time period.

Project management/coordination for the Southport Development Planned Action EIS located along Lake Washington in Renton. The proposed waterfront mixed-use development entitlement process was completed within a 6 month time period.

Project Manager for the Fred Hutchinson Cancer Research Center Master Plan Expansion EIS and the Amgen Campus Expansion EIS Addendum in Seattle.

Project Management—Project Manager on several University of Washington buildings, including Animal Research and Care Facility, Police Department Building, Southwest Campus Utility Plant, Life Sciences Building, the Business School, Molecular Engineering Facility, and Medical Center. Responsible for day-to day coordination,

preparation of the land use and aesthetics sections, and assistance to the University of Washington through the City of Seattle MUP process on these projects.

Project Manager on several regional mining operations, including the High Rock Quarry and Cadman Gold Bar sand and gravel mine in Snohomish County, and the Snoqualmie Sand and Gravel Operation in King County.

EA Project Experience

Waterfront District Redevelopment – Bellingham, Washington; Port of Bellingham; Project Manager—Led environmental consultant on the Port of Bellingham's efforts to redevelopment the New Whatcom (Waterfront District) site. The Port and the City of Bellingham have joined forces to master plan and redevelop the approximately 216 acre waterfront brownfield site, a portion of which was acquired from the Georgia Pacific Company in 2005. Concurrent with master planning and redevelopment, the Port is conducting a comprehensive environmental cleanup of the property and the adjoining waterway in conjunction with the State Department of Ecology. EA coordinated with the Port and the City in the formulation of strategies for SEPA review and overall land use permitting efforts; the Draft EIS addresses long term redevelopment alternatives with a mix of marine, industrial, office, institutional, retail, and residential uses. A Supplemental Draft EIS evaluates a Preferred Alternative. The EIS is intended to support a Planned Action Ordinance, indicating environmental review for the redevelopment has been accomplished at this planning stage. EA managed a team of six technical consultants and served as lead environmental consultant with the Port and the City through the SEPA process. Ultimately, a Comprehensive Scheme of Harbor Improvements will be adopted by the Port, a subarea plan will be approved by the City (consistent with the State Growth Management Act) and a Development Agreement will be executed between both parties that will guide long term redevelopment of the site. The Final EIS was issued in July 2010.
Project Dates: 2005–2010
Project Value – 930,000; Contract Type – Time and Materials; EA Project No. – 1480701

Blair-Hylebos Terminal Redevelopment Project – Tacoma, Washington; Port of Tacoma; Project Manager—A long term vision of the Port of Tacoma was to redevelop existing industrial properties located on approximately 550 acres within its Industrial Development District on the Blair Hylebos peninsula in the City of Tacoma. The Redevelopment Project was planned to consist of a new terminal for a container shipping tenant; relocation and consolidation of an existing terminal tenant; expansion of a berth at the existing Washington United Terminal; and, modifications to portions of the road, rail, and utility infrastructure on the peninsula to support terminal improvements. The project included both upland and in-water demolition, dredging and construction of buildings and infrastructure to enable terminal and road/rail improvements. EA staff provided input to the Port regarding environment review and entitlement strategies and options during the conceptual design phase of the project. The EIS comprehensively addressed the various redevelopment elements. EA staff coordinated with a team of eight technical consultants and the Port's design engineering team through the SEPA process. As well as managing and incorporating the technical analyses, EA staff prepared comprehensive EIS analyses in the areas of land use, relationship to plans and policies, aesthetics and environmental justice. The SEPA EIS was intended to support shoreline and other applicable construction permits from the City of Tacoma over build-out of the site.
Project Dates: 2009–2010
Project Value – 150,000; Contract Type – Time and Materials

The Lodge at St. Edwards; City of Kenmore; Senior Technical Review—EA is managing preparation of the SEPA EIS and EIS Addendum for the Lodge at St. Edwards, located in the City of Kenmore on a site in St. Edwards State Park. The project involves entering into a lease agreement with State Parks and Recreation Commission and rehabilitating the existing historic seminary building onsite for use as a lodge type hotel with up to 100 guest rooms, meeting/conference rooms and other facilities. As part of the lease, the project proponent would acquire and dedicate to State Parks the approximately 10 acre, privately owned parcel contiguous to the State Park for public use. The two action alternatives analyzed in the EIS differ in the location of surface parking to address clearing/grading and light and glare impacts. The following environmental elements are analyzed in the EIS: earth, water, plants and animals, noise, land use/plans and policies, recreation and park use, light and glare, historic and

cultural resources, public services, utilities and transportation. The project requires effective coordination by EA with City of Kenmore and Washington State Parks to meet the tight project schedule.
Project Date: 2016 – Present
Project Value – $143,000; Contract Type – Time and Materials; EA Project No. – 1542401

Grant County International Airport Employment Center Project – Moses Lake, Washington; Project Manager — EA was selected by Grant County, Port of Moses Lake, and City of Moses Lake to lead the Planned Action EIS effort for proposed mixed use development on approximately 1,200 acres of Port owned and adjacent properties. EA helped prepare an application to the Department of Commerce for an Advanced Planning Grant to provide funding for the EIS. The Planned Action EIS comprehensively analyzed a broad range of environmental elements upfront during the planning stage of the project, thereby streamlining future permitting for individual projects. Preparation of the Planned Action EIS and adoption of ordinances are intended to provide the certainty and time savings to facilitate the attraction of future aerospace related developers to the properties. EA managed an expedited EIS process to meet the tight timeframe of the Commerce grant.
Project Dates: January–July 2015
Project Value – 350,000; Contract Type – Time and Materials

Westside Prison Reception Center – Western Washington; Integrus Architects—Project Manager/Quality Control for the EIS associated with the Washington State Department of Corrections proposed new Reception Center. This facility would house approximately 1,100 inmates on a 40 to 60 acre site for the purpose of screening prior to transfer to one of the State's prison facilities. The siting aspect of the project involved compilation of a solicitation letter with supporting information, distribution of the data to all cities, counties, port districts, state and federal agencies, tribes and chambers of commerce located in Western Washington (approximately 400 recipients); review and screening of all submittals; site visits; public meetings; final site evaluations; and preparation of a Site Evaluation Report identifying 3 4 potential candidate sites for more thorough evaluation in the EIS. The EIS process involved scoping and associated public meetings within each jurisdiction with a candidate site; preparation of the Draft EIS, which evaluates a broad range of environmental impacts associated with each site alternative, including land use, transportation, water resources, cultural and historic resources, and public services. The EIS was intended to support site acquisition and permitting.
Project Dates: 2010–2012
Project Value – 340,000; Contract Type – Time and Materials; EA Project No. – 148150

Port Gamble Master Plan – Kitsap County, Washington; Olympic Resource Group; Project Director—EA is the lead EIS consultant for the SEPA EIS on the master plan development. The town of Port Gamble is a National Historic Landmark located in Kitsap County, and is the last company owned mill town on Puget Sound. Olympic Property Group (Pope Resources), the town owner for over 150 years, is proposing a master plan development of the approximately 120 acre town site that will include residential, retail, office, hotel/conference, and recreational/open space uses. The EIS will address the full spectrum of environmental elements, with a focus on: water resources, critical areas, historic/cultural resources, transportation, land use, and aesthetics. EA is assisting the County and Olympic Property Group with all aspects of the EIS, from public EIS scoping through completion of the Final EIS.
Project Dates: 2011 – Present
Project Value – $180,000; Contract Type – Time and Materials; EA Project No. – 1496201

Shelton Hills Mixed Use Development – Shelton, Washington; Hall Equities Group; Project Director—EA is managing preparation of a full scope SEPA EIS for a proposed mixed use development on approximately 700 acres located in the City of Shelton. At full build out, the development will include over 500,000 ft^2 of retail uses, an 80 acre business park, 280 acres of residential uses, and 375 acres of parks and open space. A significant challenge for the development that will be analyzed in the EIS includes insufficient and failing road infrastructure at the access to the site from US highway101. The compatibility of the development with the adjacent regional airport will also be evaluated. Finally, the EIS will address natural environment issues related to the project, such as the Department of Ecology cleanup actions at Goose Lake and a closed landfill adjacent to the site. EA is assisting the City and Applicant in defining the EIS strategy, including EIS alternatives and the potential to prepare a Planned Action EIS.
Project Dates: 2011 – Present

Project Value – $158,500; Contract Type – Time and Materials; EA Project No. – 1491901

St. Joseph Medical Center Alternatives Analysis – Bellingham, Washington; PeaceHealth; Project Manager – EA is the lead consultant on the St. Joseph Medical Center Alternatives Analysis. PeaceHealth is proposing to develop a new internal site access roadway to improve vehicular/pedestrian safety, improve campus wayfinding and provide opportunities for new building development to meet future health care needs for the region. Establishment of the roadway as initially proposed would require the filling of wetland area. EA is managing the Alternatives Analysis in support of the U.S. Army Corps of Engineers Section 404(b)(1) Permit. Services provided by EA include: preparation of project Purpose and Need discussion, establishment of criteria to define applicable alternatives, coordination with the U.S. Corps of Engineers regarding methodology and process, and preparation of an Alternatives Analysis.
Project Dates: 2013 – Present
Project Value – $35,000; Contract Type – Time and Materials; EA Project No. – 1503001

University of Washington 2018 Campus Master Plan, Seattle, Washington; University of Washington; Senior Technical Review—EA is the manager and principal author of the SEPA EIS for the University of Washington 2018 Seattle Campus Master Plan. The Master Plan identifies 85 potential development sites with a development capacity of approximately 12.9 million gsf. It is anticipated that during the 10 year planning horizon the University would develop a total of 6 million gsf to meet their anticipated demand for building space and a portion of the 85 potential development sites. Key elements of the Master Plan include: identifying building sites and campus physical capacity, establishing maximum building heights, defining planned open spaces, identifying transportation improvements, identifying potential street/alley/aerial vacations, and establishing development standards. The programmatic, full scope EIS analyzes five action alternatives with differing amounts and locations of campus development under the Master Plan, as well as a no action alternative. The project involves extensive coordination with numerous active campus committees, close coordination with the City of Seattle, and involvement with a citizens' advisory committee.
Project Date: 2015 – Present
Project Value – $700,000; Contract Type – Time and Materials; EA Project No. – 1529201

University of Washington Population Health Science Building; University of Washington; Senior Technical Review—EA is assisting with the site selection process and managing preparation of the SEPA Supplemental EIS for the Population Health Science Facility located on the University of Washington Seattle Campus. This facility is intended to consolidate the currently dispersed Institute of Health Metrics and Evaluation, Department of Global Health, and selected portions of the School of Public Health. Development on three potential sites is analyzed in the Supplemental: Site 37W, Site 22C, and Site 50S/51S. Two building height/footprint scenarios are studied for Site 22C; two parking garage scenarios are studies for Site 50S/51S. The elements analyzed in the Supplemental EIS include: land use, aesthetics, historic and cultural resources, and construction impacts. The evaluation of historic resources is particularly important, since historic buildings are located on or near all of the development sites.
Project Date: 2016 – Present
Project Value – $170,000; Contract Type – Time and Materials; EA Project No. – 1544401

University of Washington Burke Gilman Trail Project; Seattle, Washington; University of Washington; Project Manager—Prepared a Local Agency Environmental Classification Summary in support of a NEPA Documented Categorical; Exclusion for the 15th Avenue to Rainier Vista Segment of the trail and an Environmental Assessment for the overall 1.8 mile University owned portion of the trail. In general, the project included improvements to the Burke Gilman Trail that would reduce conflicts between pedestrians and bicycles, enhance safety, and accommodate existing and future traffic flows. Improvements would include a widened trail area with separate paths for pedestrians and bicycles and enhanced connections/trail intersections. To fulfill grant funding requirements, the Environmental Classification Summary was issued first to address specific improvements to the 0.35 mile 15th Avenue to Rainier Vista Segment that would occur within that portion of the trail. A subsequent EA was prepared to address potential impacts of the improvements to the overall University owned portion of the trail. Key environmental elements that were addressed as part of this analysis were recreation, historic/cultural resources, transportation, and construction impacts.
Project Date: 2013 – Present

Contract Type – Time and Materials; EA Project No. – 1480910

University of Washington Animal Research and Care Facility Project; Seattle, Washington; University of Washington; Project Manager—EA is the lead environmental consultant for the SEPA EIS for the University of Washington Animal Research and Care Facility Project, located in the Southwest Campus area of the Seattle campus and includes the Portage Bay Vista. The proposal involves development of a below-grade structure containing approximately 95,000 ft^2 of building space intended to replace currently non-compliant facilities (e.g., functional and space deficiencies) and provide centralized holding and procedure space for the Department of Comparative medicine and the Washington National Primate Research Center. The EIS focuses on: construction (including transportation, noise and vibration conditions), land use and aesthetics. The Final EIS is currently being prepared.
Project Dates: 2014 – Present
Project Value – $175,000; Contract Type – Time and Materials; EA Project No. – 1512301

University of Washington Police Department Building Project; Seattle Washington; University of Washington; Project Manager—EA was the lead environmental consultant for a SEPA Expanded Environmental Checklist for the University of Washington Police Department Building project. Located in the Southwest Campus area, the site contains two structures over 50 years old. The proposal involved replacement and relocation of the existing Police Department building with a new 30,000 ft^2 building accommodating approximately 95 staff. The existing police department building would be demolished and replaced by a waterfront park. Primary environmental issues included: land use, traffic, lighting, views and historic resources. The SEPA Expanded Environmental Checklist was published in August 2014.
Project Dates: 2014
Project Value – $35,000; Contract Type – Time and Materials; EA Project No. – 1514001

Port of Guam Modernization Program – Guam; Maritime Administration; Project Management and Quality Control—EA managed preparation of a NEPA environmental assessment for the proposed Port of Guam Modernization Program on an approximately 70 acre site adjacent to Apra Harbor and the Philippine Sea on the island of Guam. The proposal would modernize or replace existing Port facilities, reconfigure operations, expand storage capacity, and upgrade existing infrastructure. The Port modernization is intended to help meet the forecasted future peak demand associated with the U.S. Department of Defense's Guam and Commonwealth of the Marianas Military Relocation Program (relocating up to 8,000 Marines from Okinawa, Japan to Guam), as well as the existing and future needs of the Port. EA assisted the U.S. Department of Transportation's Maritime Administration in developing a reasonable alternative for analysis in the environmental assessment. EA also incorporated technical studies into the environmental assessment, drafted the Finding of No Significance, and maintained the Administrative Record for the project. Key issues that were addressed in the EA included potential impacts of the Port Modernization Program on air quality, transportation, and biological resources.
Project Dates: 2011 – Present
Project Value – $91,230; Contract Type – Time and Materials; EA Project No. – 1477903

Des Moines Creek Business Park – Des Moines, Washington; Port of Seattle; Land Use and Relationship to Plans and Policies Analysis—EA managed and prepared a SEPA EIS for a business park featuring up to 1,000,000 ft^2 of manufacturing, logistics and office uses on an approximately 90 acre site. The Port of Seattle and the City of Des Moines served as co lead agencies. Provided strategic input to the Port and City on: formulation of EIS alternatives; relationship of the Conceptual Master Plan to the EIS review, structuring the document to serve as a Planned Action environmental review, and resolution of technical transportation and stormwater management issues. The EIS is intended to satisfy SEPA environmental review requirements for long term redevelopment of the business park.

Key issues addressed in the EIS included stormwater management, potential impacts to wetlands and Des Moines Creek, truck access, and circulation and infrastructure requirements.
Project Dates: 2004–2005
Project Value – $150,000; Contract Type – Time and Materials

North Bay Master Plan – Seattle, Washington; Port of Seattle; Project Manager—Lead environmental/land use consultant to the Port of Seattle for SEPA compliance and land use permitting efforts for the North Bay Master Plan. The Port's Economic Development Division was interested in developing new uses on approximately 99 acres of upland property at North Bay (Terminal 91). A mix of industrial, office, and retail uses could be developed on the site. Provided strategic input to the Port in their assessment of land use permitting options, relative to feasible comprehensive plan amendment/rezone alternatives and the substantive and procedural requirements of SEPA. The project involved close coordination with the Port and their master planning team to ensure that the environmental review and permitting efforts were consistent with overall project objectives. Critical environmental issues included: transportation access and operations; relationship of new, mixed uses to existing industrial uses; relationship of new uses to ongoing environmental cleanup efforts under Model Toxics Control Act; and view impacts to surrounding neighborhoods. Responsible for managing and completing all necessary SEPA documentation and managed and coordinated a team of technical consultants through the environmental process and Port Commission decisions on North Bay. The Final EIS was issued in July 2005.
Project Dates: 2003–2005
Project Value – $350,000; Contract Type – Time and Materials

Hyla Crossing and Rowley Center – Issaquah, Washington; City of Issaquah; Project Director—SEPA Planned Action EIS for redevelopment of the approximately 56 acre Hyla Crossing Area and the approximately 19 acre Rowley Center Area, located in Central Issaquah. The redevelopment is intended be a demonstration project, illustrating the City of Issaquah's development vision for the Central Issaquah Subarea, and would transform the Hyla Crossing and Rowley Center Areas into a new mixed-use neighborhood with office, commercial-light industrial, retail and residential uses, as well as open space areas. EA provided critical assistance in defining the EIS alternatives and assumptions for analysis in the EIS. The Draft EIS analyzes two redevelopment alternatives that feature from 5.5 to 6.5 million ft^2 of mixed-use redevelopment and a No Action alternative with two sub alternatives. Key environmental issues that are evaluated in the Draft EIS include: water resources (with three stormwater management scenarios), critical areas/plants and animals (including potential impacts to Tibbetts Creek, wetlands and Lake Sammamish), and transportation/parking. The Draft EIS also represents the potential aesthetic and view impacts of the proposed redevelopment (including the analysis of two building height scenarios), and assesses the project's compliance with relevant plans, policies and regulations.
Project Dates: 2010–2012
Project Value – $150,000; Contract Type – Time and Materials; EA Project No. – 1483601

Virginia Mason Medical Center Major Institution Master Plan Update – Seattle, Washington; Virginia Mason Medical Center—Quality control for the comprehensive EIS and coordination regarding compliance with the City of Seattle's major institution master planning process for the master plan update for Virginia Mason Medical Center. Virginia Mason Medical Center encompasses an area of approximately 10.6 acres in Seattle's First Hill neighborhood; it is adjacent to Downtown and it is one of the four major medical center complexes on First Hill. Unlike the others, however, Virginia Mason Medical Center is surrounded by the high rise residential development. As such, it is the one major medical center that is located in an area with the greatest population density in Washington State. This presents challenges in terms of planned expansion of the campus boundaries, more intensive development, and community involvement. The proposed major institution master plan includes: expansion of the campus boundaries by approximately 2 acres, planned and potential development of approximately 1,700,000 square ft, demolition of several structures, vacation of portions of seven public rights-of-way, major building renovations, increased on-campus parking, and modifications to the City's development standards. This EIS required extensive coordination with Virginia Mason Medical Center, Virginia Mason Medical Center's master plan design team, a citizens advisory committee, and three key City of Seattle departments. The EIS evaluates impacts associated with three alternatives. Key environmental impact considerations include: air quality/climate change; environmental health and noise; land use and land use consistency with adopted plans, policies and regulations; housing; aesthetics (viewshed); historic resources; transportation, circulation and parking; and construction-related impacts.
Project Dates: 2010–2013
Project Value – $275,000; Contract Type – Time and Materials; EA Project No. – 1481101

Quadrant Bonney Lake Mixed Use Project – Bonney Lake; Quadrant Corporation; Project Manager—EA prepared the SEPA EIS for development of the 149 acre Washington State University site, located in the City of Bonney Lake. The site was originally donated by Weyerhaeuser to Washington State University in 1941 for experimental forest and demonstration purposes. In 2004, Washington State University determined that the demonstration uses could be held elsewhere and entered into an agreement with Weyerhaeuser to jointly sell the property for future development. The proposal required amendments to the City of Bonney Lake Comprehensive Plan and included the development of residential, commercial/medical, and recreational uses on approximately 100 acres of the site. An additional 47 acres would be dedicated to the City of Bonney Lake for use as a recreation center, parks, and open space area. The EIS addressed a range of environmental issues, including: plants and animals; land use; parks, recreation, and open space; and, transportation. The project was approved in early 2010.
Project Dates: 2008–2010
Project Value – $125,000; Contract Type – Time and Materials

MultiCare Emergency Department Covington, Washington; CollinsWoerman; Associate; Project Manager—EA was retained by CollinsWoerman to complete a SEPA Environmental Checklist for the MultiCare Emergency Department, located adjacent to an existing MultiCare Health Services Outpatient facility in Covington, Washington. The proposed Emergency Department would be an approximately 24,350 ft^2 single-story freestanding structure located to the immediate northeast of the existing Medical Center building. The new Emergency Department would provide 24 hour per day 7 days per week access to emergency medical services. The Emergency Department would provide immediate medical care services to adults and children including: triage, assessment of patients and diagnostic/therapeutic interventions such as ECG, cardiac monitoring, radiology and respiratory treatments. EA|Blumen prepared the SEPA Checklist which was approved by the City Council in 2010.
Project Dates: 2010
Project Value – $30,000; Contract Type – Time and Materials

University of Washington Mercer Hall Project, Terry/Lander Hall Project, and Development Capacity Re-allocation from Central to West Campus EIS Addendum – Seattle, Washington; University of Washington; Project Manager—EA was retained by the University of Washington to prepare an EIS addendum to analyze the consistency of the (1) Mercer Hall Project, (2) Terry/Lander Hall Project and the (3) Development Capacity Square Footage Re-Allocation from the Central Campus Sector to the West Campus Sector proposal with the *West Campus Student Housing Supplemental EIS* (2010). The Mercer Hall Project included the demolition of two existing Mercer Hall student housing buildings and construction of five new student housing buildings. The Terry/Lander Hall Project would include demolition of the existing Lander Hall and 1101 Café as well as construction of three new buildings (New Terry Hall, New Central Building and New Lander Hall), renovation of the existing Terry Hall (Renovated Terry Hall) and development of a 115 space below-grade parking garage. The University also proposed to transfer a total of 535,000 GSF of development capacity from the Central Campus Sector to the West Campus in order to accommodate proposed new student housing uses and expand the new student residential community. EA was the primary author of the EIS Addendum including the noise, land use, plans and policies, housing, aesthetics, historic and cultural resources, transportation and construction impacts analyses.
Project Dates: 2011
Project Value – $125,000; Contract Type – Time and Materials; EA Project No. – 1480904

University of Washington West Campus Student Housing Project, Seattle, Washington; University of Washington; Project Manager—To address the demand for student housing opportunities on the University of Washington Campus in Seattle, the University of Washington established a goal to provide new quality housing for undergraduate enrollment while creating a 4 year live-on campus culture. To implement this goal, the University of Washington proposed to develop new student housing in the West Campus area totaling up to approximately 2,500 residential beds on six sites. The West Campus Student Housing Project also included the vacation of several alley rights of way, public open space, supporting services, and enhanced pedestrian streetscapes. EA managed the environmental review process and the preparation of the SEPA Supplemental EIS. EA staff managed the efforts of transportation, historic resources and cultural resources specialists, as well as preparing analyses in the areas of land use, relationship to plans and policies, aesthetics and housing. EA also assisted the University of Washington through the complex City of Seattle alley vacation process; the alley vacation application was approved by the City of Seattle and construction of the West Campus Student Housing Project has commenced. To accommodate the schedule goal of having new student housing available for the beginning of the 2011/2012 school year, the SEPA environmental review and alley vacation processes were completed in approximately 1 year.
Project Dates: 2009–2010
Project Value – $200,000; Contract Type – Time and Materials

University of Washington Medical Center Expansion Project Seattle, Washington; University of Washington; Project Manager—EA was the lead environmental consultant for the Supplemental SEPA EIS on the University of Washington Medical Center Expansion, located in the South Campus area of the Seattle campus. The proposal was a two phase development of up to 264,500 ft^2 in an 8 to 9 story building. The Supplemental EIS focused on: traffic conditions associated with a new roadway and traffic signal; vehicular and pedestrian access to an adjacent elementary school for the disabled during the 2 year construction period; views to the proposed building from nearby residential areas; and impacts to designated "Exceptional" trees in the site vicinity. The facility is currently under construction.

Project Dates: 2007–2008
Project Value – $130,000; Contract Type – Time and Materials

University of Washington Molecular Engineering Facility – Seattle, Washington; University of Washington; Project Manager—EA prepared the Supplemental SEPA EIS for the University of Washington's new Molecular Engineering Facility located in the central portion of the Seattle campus. Development was proposed in two phases. The proposal featured two buildings totaling approximately 172,000 ft^2, and included development of the Molecular Engineering Facility, as well as relocation of Cunningham Hall, an identified historic feature on the project site. Two potential locations in the Central Campus area were analyzed for the Cunningham Hall relocation. Key environmental issues addressed in the Supplemental Draft EIS included: historic resources, transportation, environmental health, aesthetics, land use and construction related impacts.
Project Dates: 2008–2009
Project Value – $75,000; Contract Type – Time and Materials

University of Washington Business School Project , Seattle, Washington; C University of Washington; Project Manager—EA was retained by the University of Washington to prepare a Supplemental SEPA EIS for a new Business School Facility in the central portion of the Seattle campus. The proposal was a two phase development of approximately 189,600 ft^2 in three buildings. The primary issues addressed in the Supplemental EIS included: the relationship of the proposed buildings to surrounding historic structures, provision of parking in light of the restricted University of Washington parking supply, and visual and shadow conditions at nearby public open space areas.
Project Dates: 2007–2008
Project Value – $60,000; Contract Type – Time and Materials

Kent Events Center – Kent, Washington; City of Kent; Project Manager—Retained by the City of Kent to manage and prepare a Supplemental SEPA EIS for the development of an Events Center in downtown Kent, a 5,000 seat arena. The location of the Events Center on the Commons site required the implementation of the City of Kent Special Use Combining District due to the site's Limited Industrial zoning classification. The Special Use Combining District was designed for projects which tend to be large and difficult to site, including sports stadiums and exhibition or convention halls. Responsibilities included defining the Supplemental EIS compliance strategy and alternative development scenarios evaluated in the EIS, coordinating a team of technical consultants, and working closely with the City of Kent to resolve EIS related and technical issues. The EIS was completed and the project approved on a fast track 8 month schedule.
Project Dates: 2007–2008
Project Value – $140,000; Contract Type – Time and Materials

1100 Eastlake E. – Seattle, Washington; Fred Hutchinson Cancer Research Center; Project Manager—SEPA Expanded Environmental Checklist for a proposed change in use of an existing five story, approximately 157,155 ft^2 building from office and retail uses to office and research laboratory uses for the Fred Hutchinson Cancer Research Center. The proposed project will primarily require interior building improvements for the new Fred Hutchinson Cancer Research Center office and research laboratory uses. A new HVAC and fume exhaust system will be needed to serve the laboratory uses and vent potentially hazardous fumes/gases from the building. EA incorporated a greenhouse gases and transportation/parking analysis into the Checklist. The Checklist was prepared on a fast track schedule to accompany a Master Use Permit application.
Project Dates: 2011
Project Value – $18,000; Contract Type – Time and Materials; EA Project No. – 1487801

Snoqualmie Ridge Planned Community – Snoqualmie, Washington; Weyerhauser Real Estate Corp./Quadrant Corp.; Project Manager—Had a long term role on Quadrant's Snoqualmie Ridge planned community from 1991 to 2004. At build out, Snoqualmie Ridge will feature approximately 4,000 residential units, a business park, retail center, golf course, schools, and extensive recreation and open space system. Successfully managed and prepared three separate EIS documents over an 18 year period (SR 1, SR 2, and Snoqualmie Parkway). The first EIS for Snoqualmie Ridge addressed annexation by the City of Snoqualmie and 25 year build out under a master plan. Served as lead consultant for the two subsequent project level EISs for Snoqualmie Ridge: an EIS on a specific

Mixed Use Plan for the 1,300 acre property, and a separate EIS on construction of the new Snoqualmie Ridge Parkway, a 3.5 mile extension of SR 18 north of I-90 to SR 202.

A Development Agreement was successfully executed and all projects were approved. Snoqualmie Parkway was constructed, SR 1 is built out, and SR 2 is moving through various phases of construction.
Project Dates: 1986–2004
Project Value – $325,000; Contract Type – Time and Materials

Semiahmoo Resort Community – Blaine, Washington; City of Blaine and Trillium Corporation; Project Manager—Lead consultant in the preparation of the Supplemental EIS for the proposed Resort Semiahmoo project, located in the City of Blaine. The proposed project includes three Planned Unit Developments at Resort Semiahmoo, updates to the Resort Semiahmoo Master Plan, and an amendment to the Comprehensive Plan. The Semiahmoo Resort Village Planned Unit Development includes 325 condominium units, approximately 21,500 ft^2 of commercial space, public open space, parks and associated parking on the Spit Tip area of Resort Semiahmoo. Commercial space, including retail space and restaurants, would be provided within renovated areas of the existing hotel, as well as within renovated existing buildings on the Spit Tip. The Semiahmoo Marina Phase 2 Planned Unit Development includes 189 new boat slips within the existing marina area of Resort Semiahmoo and the development of two parallel habitat benches along the shoreline to provide mitigation for potential project impacts. The Burnside Village Planned Unit Development consists of 92 multifamily residential units, approximately 12,000 ft^2 of commercial space, a community park, a public storage facility, and surface parking in the Uplands area of Resort Semiahmoo. The Supplemental EIS addresses a broad range of environmental issues, including: water, plants and animals, land use, aesthetics, historic and cultural resources, transportation, public services, and construction impacts.
Project Dates: 2010 – Present
Project Value – $125,000; Contract Type – Time and Materials; EA Project No. – 1479401

617 Market Street Mixed Use Development – Kirkland, Washington; City of Kirkland; Project Manager—EA|Blumen was retained by the City of Kirkland to prepare a limited-scope SEPA EIS for a mixed-use development in the historic center of Kirkland. The project, proposed by West Water Real Estate Services, would include 38 residential units and approximately 5,200 ft^2 of commercial space, and required modifications to Kirkland zoning code regulations for height, lot coverage, landscape buffering, and residential use on the ground floor. Key issues for this project included the relationship of the proposed project to surrounding land uses with respect to land use type and design.
Project Dates: 2002–2003
Project Value – $65,000; Contract Type – Time and Materials

Cadman Longview Mining Operation – Snohomish County, Washington; Cadman Inc.; Project Manager—EA|Blumen managed and prepared the EIS for a proposed sand and gravel mining operation on 230 acres near Highway 2 in Snohomish County. Cadman requested a zoning reclassification from Forestry to Mineral Conservation for the 612 acre property. Mining and processing activities were proposed on approximately 168 acres of the 230 acre site. The smaller active mining area within the larger site would allow for substantial screening and buffering of proposed mining activities from adjacent properties and Highway 2. Crushing, washing, and conveying operations, as well as the acceptance of clean fill for reclamation, were also proposed as part of site operations. EA|Blumen managed the EIS, coordinated a team of seven technical consultants and worked closely with the County and project team to define an approach to EIS scoping, EIS alternatives and information needed to complete environmental analysis. The EIS resolved the challenging issues stemming from the relationship between proposed mining and an adjacent sole source groundwater well serving a residential community. The rezone and conditional use permit applications were approved by Snohomish County.
Project Dates: 2002–2004
Project Value – $175,000; Contract Type – Time and Materials

Other Project Experience

Southport Planned Action, Renton – Washington; City of Renton; Project Manager—Retained by the City of Renton and Seco Development to prepare a SEPA EIS to provide project level analysis for phased redevelopment of a 17 acre site located along Lake Washington, between the Boeing Renton Plant and Gene Coulon Memorial Beach Park. The site, formerly owned by Puget Sound Energy, was used historically for industrial/utility operations. The Southport plan calls for mixed-use development of up to 600 residential units, 40,000 ft^2 of retail use, up to 750,000 ft^2 of office use, a boardwalk promenade at the water's edge and other public open space. The Proposed Actions included adoption of a Planned Action ordinance; Comprehensive Plan map and text amendments; a concurrent rezone from Heavy Industrial to Center Office Residential; and, master plan approval. Managed the EIS; coordinated a team of five technical consultants; and, assisted the City of Renton through scoping, coordination with agencies, tribes and the public, and in preparation of the Planned Action ordinance. The EIS was prepared on a fast track schedule of 6 months in order to meet City Council docket requirements for annual consideration of Comprehensive Plan amendments. The entire proposal was approved by the City in 7 months. Initial phases of development have been constructed.
Project Dates: 1998 1999; Contract Type: Time and Materials

Lakepointe Mixed-Use Project – Kenmore, Washington; King County; Project Manager—Retained by King County as lead consultant for a Supplemental EIS on a phased mixed-use redevelopment on 50 acres located adjacent to Lake Washington in the City of Kenmore (formerly within unincorporated King County). Because the site had historically been used for industrial purposes, a remediation plan consistent with Model Toxics Control Act requirements was processed in coordination with the Department of Ecology, concurrent with the Supplemental EIS. The Master Plan called for development of approximately 1,200 residential units; 600,000 ft^2 of retail, office, and theater uses; a marina; and extensive shoreline enhancement and open space/park opportunities. Included in the proposal were applications for Commercial Site Development and Shoreline Substantial Development permits. Key issues analyzed included: circulation and parking, shoreline access and improvements, wildlife and fisheries, site remediation, restoration and enhancement, density and scale of development, and aesthetics. EA|Blumen staff coordinated the efforts of six technical consultants and worked closely with King County and the project design team to identify and resolve environmental issues and satisfy Master Plan and permit requirements. The project was approved by King County and the City of Kenmore.
Project Dates: 1999–2001
Contract Type: Time and Materials

Aldarra Golf Course Project – King County, Washington; Boeing Family Trust; Project Manager—EA|Blumen staff served as lead environmental consultant in the preparation of an Environmental Document, which provided detailed environmental analysis to supplement previously submitted information for construction of an 18 hole golf course on 269 acres located on the eastern slope of Sammamish Plateau in King County. The site is proximate to sensitive areas, including wetlands, steep slopes and creeks/drainages that support fisheries. EA|Blumen staff was involved early in an internal design review process that identified potential environmental constraints relative to the site plan and revised components of the plan to avoid significant impacts that would require substantial mitigation. Preparation of the Environmental Document included managing of a team of six technical consultants through completion of analyses on a full range of topics including earth, water quality and quantity, plants and animals, wetlands, land use, aesthetics and transportation. The Environmental Document included an extensive mitigation program and supported the successful acquisition of a Mitigated DNS and U.S. Army Corps of Engineers and King County permits.
Project Dates: 1998–1999
Contract Type: Time and Materials

Employment History

Employer—EA Engineering, Science, and Technology, Inc., PBC
Dates of Employment—2010 – Present
Title—Manager, Planning and Environmental Review

Employer—Blumen Consulting Group, Inc.

Dates of Employment—2002–2010
Title—Principal

Employer—Huckell/Weinman Associates
Dates of Employment—1994–2002
Title—Senior Planner

Employer—The Ferris Company
Dates of Employment—1989–1994
Title—Project Manager

Employer—City of Edmonds
Dates of Employment—1988–1989
Title—Code Enforcement

Employer—City of Escondido
Dates of Employment—1986–1988
Title—Planner

List of Technical Skills and Specializations

- Land use and aesthetics analysis
- Land use entitlement
- Project management
- SEPA/NEPA environmental compliance and analysis
- Site selection
- Technical consultant coordination

Laurel Hunter, Senior Associate for Peter Walker Partners

Laurel is a landscape designer with 13 years experience in the field of landscape architecture and planning. She has worked on many complex projects, including the 9/11 Memorial, and has a strong background in sustainable design and planting. Laurel has experience with a broad range project types and scales, including the design of corporate headquarters, campus master plans, civic spaces, streetscapes, hotels and resorts, and garden design. Laurel received her Bachelor of Science in Landscape Architecture from Cornell University.

MARK A. DAGEL, LHG

Hydrogeologist

EDUCATION

MS, Geology, University of Maine, 1985

BA, Geology, University of Wisconsin, 1980

REGISTRATIONS

Licensed Geologist/ Hydrogeologist, WA

Registered Professional Geologist, OR

Mark has 30 years of experience with a wide range of environmental studies, including remedial investigations (RI), feasibility studies (FS), preliminary assessments, and site investigations. Facilities include petroleum-contaminated sites, landfills, military installations, industrial facilities, and abandoned mining, milling, and smelting sites. These projects have been conducted under Superfund (CERCLA), Washington's Model Toxics Control Act (MTCA), and Resource Conservation and Recovery Act (RCRA). Mark is also responsible for water resource projects, including groundwater source studies, water quality investigations, and evaluation of water right applications under Washington State's contract reimbursement program. In addition, Mark prepares environmental impact statements (EISs) and other environmental planning and permitting studies under NEPA, SEPA, and other laws and regulations. Mark's clients have included ChevronTexaco, the Washington State Department of Ecology (Ecology), U.S. Forest Service, U.S. Army Corps of Engineers (USACE), and the U.S. Navy, Air Force, and National Guard.

REPRESENTATIVE PROJECT EXPERIENCE

Environmental Investigation and Independent Soil Cleanup of Parcel 88, Tacoma, WA. Mark managed the environmental aspects of this project for the Port of Tacoma. This project involved a 255,000-ton soil clean-up while also fulfilling five separate mitigation obligations by providing nearly 30 acres of habitat along Hylebos Creek. Contaminated soil removed from the site contained petroleum hydrocarbons, arsenic and lead. Investigations revealed contaminants had entered groundwater and threatened to discharge to Hylebos Creek. The design required balancing a large number of conflicting environmental, geotechnical, civil engineering, landscape, and regulatory criteria. The project team utilized an iterative design process, balancing remedial excavation limits and geotechnical constraints to maximize high value intertidal habitat while minimizing construction costs. The project received regulatory closure under Washington's Model Toxics Control Act (MTCA) while providing over 40% more habitat area than the original concept plan; all while meeting the required completion schedule for individual habitat mitigation components.

Holden Mine Remedial Action, Okanogan-Wenatchee National Forest, WA. Project Manager supporting the Forest Service on CERCLA remedial action of large former copper mine/mill complex. Prepared risk assessments, supplemental feasibility studies, Proposed Plan, and ROD. Reviewed remedial design. Currently providing oversight of remedial action and performance standards verification monitoring. For over 10 years, Hart Crowser has supported the USFS on the CERCA/MTCA investigation and $400-million cleanup of this large, remote, abandoned underground copper mine site Chelan County.

We are also supporting the Trustees in developing and negotiating a NRDA claim.

Soil Cleanup at Elementary Schools, Washington State Department of Ecology, Yakima County, WA. Managed two task orders involving cost-effective cleanup of six elementary schools affected by area-wide arsenic and lead contaminated soil associated with historic, widespread pesticide application. The work for the Washington State Department of Ecology included preparing plans, specifications, engineering cost estimates, and other bid documents.

Bulk Fuel Terminal Remedial Investigation, Shelton, WA. Provided technical oversight for Chevron of a RI of soil, groundwater, and marine sediment contamination at a petroleum bulk facility under Agreed Order with Ecology. The site involved petroleum contamination from USTs and included marine sediment-contamination issues.

Former Bulk Fuel Terminal Remedial Investigation, Morton, WA. Conducted RI of soil and groundwater contamination for Chevron at a petroleum bulk facility under an Enforcement Order from Ecology. The site involved petroleum contamination from above-ground storage tanks (ASTs) and underground storage tanks (USTs).

Marine Bulk Fuel Terminal Supplemental RI and Cleanup Action Plan, Port Townsend, WA. Managed project involving the evaluation of over 20 years of past environmental investigations and interim actions for Chevron at a former bulk terminal on Port Townsend Bay. Developed a conceptual site model, identified data gaps, and conducted additional investigation activities.

Former Bulk Fuel Terminal Feasibility Study and Cleanup Action Plan, Bremerton, WA. Evaluated remedial alternatives to address deep soil and groundwater contamination for Chevron at a former bulk terminal site on Port Washington Narrows. Remediation will address contaminated soil, seep discharge, and potential vapor intrusion issues and must be coordinated with future site development plans. Cleanup will involve a combination of soil removal, *in situ* groundwater remediation (e.g., biosparging), and monitored natural attenuation.

Lower Duwamish Waterway Early Action Area 2 (Trotsky and Douglas Management Company Sites) Environmental Investigations, Seattle, WA. Managed this $250,000 work assignment to characterize potential soil and groundwater contamination at two adjacent industrial sites and to assess to assess the potential to recontaminate adjacent sediments in Lower Duwamish Superfund Site. The scope included reviewing historical information; preparing work plans (field sampling plans and quality assurance project plans) for approval by Ecology; sampling and analysis of soil, groundwater, seep, and intertidal sediments; data validation and management; data interpretation; and report preparation. The primary contaminants at this site were polychlorinated biphenyls (PCBs), polycyclic aromatic hydrocarbons (PAHs), and total petroleum hydrocarbons (TPH).

Lower Duwamish Waterway South Park Marina Site Environmental Investigation, Seattle, WA. Managed this $100,000 project to characterize potential soil and groundwater contamination, to assess the potential contribution to sediment contamination in the adjacent LDW Superfund Site, and to evaluate potential contaminant contributions from an adjacent property. Scope included reviewing historical information, preparing work plans (field sampling plans and quality assurance project plans) for approval by Ecology, sampling and analysis of soil, groundwater, seep, and intertidal sediments, data validation and management, data interpretation and report preparation. The primary contaminants at this site were PAHs, TPH, and metals.

Irondale Smelter Site Upland and Sediment Remedial Investigation/Feasibility Study, Irondale, WA. Managed upland components and marine component of this $200,000 RI/FS for Ecology at a historic iron smelter site on Port Townsend Bay. Primary contaminants were TPH and metals. The project included significant sediment and ecological risk assessment components, and had significant subcontractor participation.

Elementary School Soil Cleanup, Yakima, WA. Mark assisted Ecology with the preparation of plans, specifications, and other bid documents for cleanup of soil at two elementary schools in Yakima contaminated by arsenic and lead.

Most Western Laundry Site Remedial Investigation, Hoquiam, WA. Mark conducted soil and groundwater investigations for Ecology at this former commercial dry-cleaning site. Primary contaminants were chlorinated solvents and TPH.

Department of Ecology, Most Western Laundry Site Remedial Investigation, Hoquiam, WA. Mark conducted soil and groundwater investigations for Ecology at this former commercial dry-cleaning site. Primary contaminants were chlorinated solvents and TPH.

Vehicle Fueling and Maintenance Facility Site Investigation (SI), Wilbur, WA. Conducted SI of petroleum contamination in soil, groundwater, and surface water under MTCA for Ecology. Contamination sources included USTs, ASTs, vehicle maintenance shops, and equipment storage yard. Investigation involved use of geoprobe technology and field and laboratory analyses.

Waste Oil "Tar Pits" Site Investigation, Montesano, WA. Conducted SI of uncontrolled petroleum disposal site under MTCA for Ecology. The project included preparing project plans, conducting a field investigation, and preparing a SI report.

Schools Preliminary Assessments (PAs)/Site Investigations, Eastern WA. Performed PAs/SIs of petroleum contamination for Ecology at four schools in eastern Washington. Contaminant sources included USTs, ASTs, and vehicle maintenance shops. The project included literature review, site reconnaissance, developing sampling and analysis plans, surface and subsurface soil sampling, installation and sampling of monitoring wells and preparation of reports.

Unocal Bulk Fuel Terminal Groundwater Study in Support of Site-Specific Cleanup Levels, Edmonds, WA. This investigation involved collecting groundwater samples from six existing monitoring wells for Ecology at the Unocal Edmonds former bulk fuel terminal. Sampling locations were selected to represent the variability in product composition at the site. Performed toxicity (bioassay) testing using 7-day tests and multiple organisms. In addition, samples were chemically analyzed for petroleum hydrocarbons and various petroleum constituents.

Pesticide Contamination Groundwater Investigation, Whatcom County, WA. Responsible for planning and conducting a large-scale domestic well sampling program for Ecology to study agricultural contamination in a shallow, regional aquifer in northwestern Washington.

Red Shirt Mill Remedial Investigation and Feasibility Study, WA. Conducted RI/FS under MTCA for Ecology at an abandoned gold and silver mill in northcentral Washington. Characterized the nature and extent of contaminants

(toxic metals) in tailings and groundwater using geoprobe, auger borings, and monitoring wells. Characterized site hydrogeology. Conducted terrestrial ecological evaluation. Evaluated contaminant pathways to the adjacent Methow River (surface water and sediment). Evaluated potential human-health risks from airborne contaminants from exposed tailings using dispersion plume modeling and risk analyses of metal loadings in settled house dust. Developed and evaluated remedial alternatives, including removal, capping, stabilization, and "soft" streambank protection.

Tacoma Smelter Plume Soil Investigation, Tacoma, WA. Provided senior technical review of project plans and reports, and oversight of field sampling activities for Ecology. The project involved sampling and analyzing shallow soils over a wide area in southern King County, downwind from the former Asarco Tacoma Smelter. Sampling was focused on child-use areas.

Everett Asarco Smelter Plume Soil Investigation, Everett, WA. Conducted a multi-year project for Ecology to characterize soil in an extensive residential area adjacent to the former Asarco Everett smelter. The project included sampling soil at over 50 homes using geoprobe technology and analyzing for lead and arsenic using compositing and a tiered analytical approach.

American Plating Site Cleanup Action Plan, Tacoma, WA. Mark was responsible for preparing the CAP for remediation of former metal plating operation under MTCA for Ecology. The site had soil, groundwater, and surface water contaminated by toxic metals, chlorinated solvents, and petroleum hydrocarbons.

Industrial Landfill, Naval Undersea Warfare Center, Remedial Investigation/Feasibility Study and Record of Decision, Keyport, WA. This site was a former base landfill, adjacent to aquatic and marine environments, investigated under CERCLA and MTCA. Prepared RI work plans and conducted three phases of field investigations over a 2-year period for the U.S. Navy. The work included soil gas surveys, ambient air sampling, soil and groundwater sampling, aquifer testing, hydrogeologic analyses, and an extensive marine survey including water, sediment, and biota sampling, and sediment bioassay testing. Procured special analytical services to obtain risk-based detection limits as well as analysis of non-routine media (marine water, air, tissue) and analytes (torpedo fuel and its breakdown products). Developed a database for analysis and reporting of analytical data, field and laboratory QA results, and data validation information. Prepared reports including RI, human health and ecological risk assessments, FS, proposed plan, and ROD. Participated in negotiations with EPA and Ecology regarding the preferred alternative, development of pre-ROD planning documents and supplemental monitoring plans, and participated in public involvement activities, including giving presentations and workshops to public groups, Technical Review Community (TRC), and the Restoration Advisory Board (RAB). Carried out a post-RI sampling program designed to supplement the RI data and to provide additional information for selecting a remedy acceptable to the Ecology and the public.

Operable Unit 2 (OU 2) Sites, Naval Undersea Warfare Center (NUWC), Remedial Investigation/Feasibility Study and Record of Decision. Keyport, WA. OU 2 encompassed five remedial sites investigated under CERCLA and MTCA: A plating shop adjacent to Liberty Bay, a former hazardous waste management area, a sludge disposal area, a former torpedo-fuel sump and disposal area, and the marine environment bordering the NUWC facility. Prepared RI work plans and led the field investigation and preparation of the RI report for the U.S. Navy. Provided technical input to the FS and played a major role in remedial decision-making activities, including negotiations with regulatory agencies regarding the preferred alternatives, and participating in preparation of the proposed plan and ROD for these sites.

Provided support to the Navy in public involvement activities, including giving presentations and workshops to the public, the TRC, and RAB, preparing fact sheets, and developing public presentations for Navy personnel.

Industrial Landfill Remedial Investigation, Naval Air Station Whidbey Island, WA. This site was a former base landfill investigated under CERCLA and MTCA cleanup regulations. Prepared RI work plans, including Field Sampling Plan (FSP), Quality Assurance Project Plan (QAPP), and Health and Safety (H&S) Plan for this site for the U.S. Navy. Led RI field investigation, installed monitoring wells, sampled groundwater and soil, and conducted aquifer tests, including pumping and slug tests. Responsible for on-site supervision of two field teams during two phases of field investigation. Slug and pumping tests were conducted using submersible pumps and Hermit multichannel dataloggers. As health and safety officer, performed air monitoring to assure proper level of personal protection. Interpreted aquifer tests, hydrostratigraphy, groundwater flow directions and rates, and chemical data; and prepared the Site Characterization Summary and RI report.

National Guard Armory Site Investigation, Crete, NE. Conducted investigation for Nebraska Army National Guard at a former truck maintenance facility. Contamination at the site involved petroleum hydrocarbons from leaking underground storage tanks (USTs) and hydraulic vehicle lifts and heavy metals from discharges of lead-acid wastes from a battery room sink drain. The investigation was carried out in accordance with Nebraska Department of Environmental Quality (NDEQ) voluntary cleanup program LUST/ER guidance. Prepared project plans and oversaw field investigation which included collecting soil samples using a hollow-stem auger rig (including work inside buildings using a limited-access rig), performing field screening of soil samples using a photoionization detector (PID), installing and developing monitoring wells, and collecting groundwater samples. Prepared SI report which included development of a conceptual hydrogeologic site model, analysis of soil and groundwater chemistry data, and identification of potential groundwater receptors.

Groundwater and Soil Investigation, Hart Oil Refinery, Missoula, MT. Reviewed and evaluated groundwater and soil data collected over a ten-year period, identified data gaps developed additional sampling requirements in support of a human-health risk assessment for Montana Department of Health and Environmental Sciences. Contaminants included arsenic, lead, PAHs, and petroleum hydrocarbons. The plume of the contaminated groundwater at the former refinery had traveled offsite in the direction of domestic water wells and posed a potentially significant future threat to area residents.