

CURRICULUM VITAE

University of Idaho

NAME: Erin Scott Brooks

DATE: Sept. 21, 2018

PRESENT TITLE: Associate Professor

DEPARTMENT: Soil and Water Systems

OFFICE LOCATION AND CAMPUS ZIP: JML 78, 2060

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DATE OF FIRST EMPLOYMENT AT UI: September 15, 1999

Education

Ph.D. (1998-2003) - University of Idaho, Department of Biological and Agricultural Engineering, Moscow, ID 83844-0904

M.S. (1994-1995,1997) - University of Minnesota, Department of Biosystems and Agricultural Engineering, St. Paul, MN 55108-6005

B.S. (1989-1993) - Washington State University, Department of Biological Systems Engineering, Pullman, WA 99164-6120

Certificates and Licenses:

Professional Engineering (P.E.) License in Civil Engineering in the State of Idaho

Appointments

Associate Professor (July 2017 - Present)

University of Idaho, Department Soil and Water Systems
Moscow, ID 83844-2060

Associate Professor (July 2016 – July 2017)

University of Idaho, Department of Biological and Agricultural Engineering
Moscow, ID 83844-2060

Research Assistant Professor (Jan. 2012 – Jun. 2016)

University of Idaho, Department of Biological and Agricultural Engineering
Moscow, ID 83844-2060

Research Scientist (July 2008 – Dec. 2011)

University of Idaho, Department of Biological and Agricultural Engineering
Moscow, ID 83844-0904, Advisor: Dr. Jan Boll, Phone: (208) 885-7324

Hydrologist/Research Support Scientist II (1999 - 2008)

University of Idaho, Department of Biological and Agricultural Engineering
Moscow, ID 83844-0904, Advisor: Dr. Jan Boll, Phone: (208) 885-7324

Adjunct Faculty (May 1, 2007 – Dec. 2011)

University of Idaho, Department of Biological and Agricultural Engineering
Moscow, ID 83844-0904

Graduate Research Assistant (Jan. 15, 1998 – Sept. 15, 1999)

University of Idaho, Department of Biological and Agricultural Engineering,
Moscow, ID 83844-0904; Advisor: Dr. Jan Boll, Phone: (208) 885-7324

Hydrologist/Research Support Specialist (September 1995 - September 1997)

Cornell University; Department of Agricultural and Biological Engineering,
Ithaca, NY 14853-5701; Advisor: Dr. Michael F. Walter, (607) 255-2270

Graduate Research Assistant (January 1994 - June 1995)

University of Minnesota, Department of Biosystems and Agricultural Engineering
St. Paul, MN 55108-6005; Advisor: Dr. John L. Nieber, (612) 625-6724

Research Assistant and Computer Aide (May 1992-Dec 1993)

Washington State University; Department of Biological Systems Engineering,
Pullman, WA 99164-6120; Advisor: Dr. Claudio O. Stockle, (509) 335-3826

Honors

- Invitation to submit a chapter to a textbook entitled “Hydropedology”, edited by H. Lin. (2010)
- Nominated for Outstanding Technical/Lab Support Staff in the College of Agricultural and Life Sciences (2004/2007)
- Nominated for Outstanding Management Support Staff in the College of Agricultural and Life Sciences (2003)
- Received the outstanding employee award in the classified exempt category at the University of Idaho (2002)
- Received a \$1000 travel grant from the University of Idaho Graduate Student Association to present research findings at the 9th annual ERB Conference in Demanovska dolina, Slovakia, September 25-28, 2002.
- Received the outstanding student paper award in hydrology at the Fall 2001 American Geophysical Union meetings (2001)
- Accepted as a member of Gamma Sigma Delta, the national honor society for Agriculture (2001)
- Received the outstanding achievement scholarship at the University of Minnesota (1995).
- Received the Gallucci Scholarship as a Junior and Senior at Washington State University. (1993-1994)
- Selected outstanding Freshman, Sophomore, Junior, and Senior at Washington State University. (1989-1994)

Teaching Experience

BAE 452/552 Environmental Water Quality	(2012-2016)
BAE 404 DS: Ecohydrologic Engineering	(2013)
BAE 142 Engineering for Living Systems	(2012-2014)
BAE 499 DS: Identification of Subsurface Flow Paths	(2012)
BAE 499 DS: Ecohydrologic modeling and management	(2016)
ASM 315 Irrigation Systems and Water Management	(2007, 2011-2017)
ASM 305 Precision Agriculture	(2015-2017)

Guest Lectures

ISEM 301 Water in Society	(2016)
BAE 452 Environmental Water Quality	(2000, 2008, 2010)
BAE 450 Environmental Hydrology	(2008, 2010)
EnvSci 400 Senior Seminar	(2008-2010, 2012-2013)
Fish 430 Riparian Ecology	(2009)
For404/CE326/BAE356 - Hydrologic Measurement Techniques	(2005, 2009-2011)
CE235/BAE 355 - Fundamentals of Hydrologic Engineering	(2003)
BAE 457/557 - Hydrologic Modeling for Watershed Management	(2002)
BAE 341, BSysE 351 - Environmental Hydrology	(1999, 2001)
JEMS workshop	(2002)

Invited Seminars:

- “Flow Augmentation to Sustain Juvenile Steelhead Habitat in the Potlatch River Basin.” Geography and Water Resources Seminar. March 30, 2016
- “Flow Augmentation to Sustain Juvenile Steelhead Habitat in the Potlatch River Basin.” University of Idaho Soil and Water Science Seminar. February 22, 2016
- “Soil Conservation and the History of Farming on the Palouse.” University of Idaho Soil and Water Seminar and REACCH Webinar, Moscow, ID. February 25th 2013
- “Incorporating Process-based Understanding into Watershed Management” presented at the Spring 2011 WSU Crops and Soil Seminar Series on 2/14/2011
- “Groundwater Recharge Potential via Quaternary and Neogene Sediments in the Moscow-Pullman Area: "Recharge from the East?" Revisited" WSU/UI School of Earth and Environmental Sciences Seminar presented 3/24/2011
- "Soil Heterogeneity and the Hydrology of the Palouse Region" presented at the Fall 2005 IWRI Hydrology Seminar Series on 10/25/05 and presented at the WSU/UI Dept. of Geology Seminar Series on 11/10/05

Professional Assistance

- Review journal articles for Water Resources Research
- Review journal articles for Journal of the American Water Resources Association
- Review journal articles for Journal of Hydrology
- Review journal articles for Hydrological Processes
- Review journal articles for Journal of Environmental Management
- Review journal articles for Journal of Environmental Quality
- Review journal articles for the Transactions of the American Society of Agricultural and Biological Engineers
- Review journal articles for Ground Water Monitoring and Remediation
- Review proposals for the Hydrological Sciences Division of the National Science Foundation
- Reviewed textbook for Elsevier Press

Professional Membership

- American Geophysical Union
- Soil Science Society of America
- American Society of Agricultural and Biological Engineers

Served on the Following Graduate Committees

Completed (Degree Major Year)

Emily Bruner (PhD WSU Crop and Soil Science - 2016)
Trea LaCroix (MS UI Water Resources – 2015)
Matteo Poggio (PhD WSU Crop and Soil Science - 2015)
Rebecca Rittenburg (PhD - Water Resources - 2015)
Kristen Welch (PhD – Water Resources – 2015)
Paige Farrell (MS – UI Geog - 2015)
Audrey Squires (MS - Water Resources - 2014)
Ricardo Sanchez-Murillo (PhD - Water Resources - 2014)
Codie Wilson (MS - Water Resources - 2013)
Ayodeji Arogundade,(PhD - Bio. Ag. Eng - 2012)
Cindy J. Adams (MS - Environmental Science - 2012)
Alex Edstrom (MS - Water Resources - 2011)
Ricardo Sanchez-Murillo (MS - Water Resources - 2011)
Tony Loesser (MS - Civil Engineering - 2011)
Rob Lawler (MS - Forest Resources - 2010)

Major Professor to the Following Graduate Students

Currently

Scott Fennema PhD/Water Resources
Chinmay Deval PhD/Water Resources
Dillon Shults MS/Water Resources
Vishal Seth PhD/Soil and Water Systems

Graduated

Dylan Quinn MS/Water Resources (2018)
Ayana Glover, MS/Water Resources (2018)
Samantha Vega MS/Water Resources (2018)
Jessica Norby MS/Water Resources (2017)
Dan Bone MS/Water Resources (2017)
Matt Yourek, MS/Bio. and Ag. Eng. (2016)
Nicole Ward, MS/Water Resources (2015)
Ryan Boylan, MS/Water Resources (2014)
Jon Treasure, MS/Water Resources (2013)

Mentor/Advisor/Sponsor for the following Students/Staff

Currently

Mariana Dobre, Research Scientist (2013-present)

Formerly

Jessie Balibani Non-thesis Masters Water Resources (2014-2015)
Ian Tanimoto Undergraduate (2015-present)
Olivia Grove Undergraduate, MILES, REACCH intern (2016-present)
Anurag Srivstava, Post-doc (2014-2016)
Eric Verhoeff, Visiting Scientist (2015)

Levi Dawes Undergraduate Help (2011-2015)
David Brands, Undergraduate (2014-2015)
Josie Flerchinger, Undergraduate (2014-2015)
William Payne, Undergraduate (2011-2012, 2015)
Audrey Martinez, Undergraduate Help, MILES Intern (2015)
Adrian Ashworth, MILES intern (2015)
Todd Anderson, Post-Doc (2012-2014)
Jasper Candel, Visiting Scientist (2013)
Michelle Chaffee, REACCH Undergraduate Intern (2015)
Jashvina Devadoss, REACCH Undergraduate Intern (2014)
Austin Wardall, REACCH Undergraduate Intern (2013)
Dylan Quinn, REACCH Undergraduate Intern (2013)
Laura Sampson NSF-REU (2011)
Kate Wicher Undergraduate Help (2013-2014)
Parker Burton Undergraduate Help (2010-2013)
Matt Francis Undergraduate Help (2011-2013)
Nora Sedgwick Undergraduate Help (2011-2013)
Amy Shaw Undergraduate Help (2013-2014)
Matt Williams Undergraduate Help (2013-2014)
Rebekah Kim Undergraduate Help (2013-2014)

Committee Activities

Advisor to American Society of Agricultural and Biological Engineering Student Club
(2012-2015)
Student Disciplinary Review Board (2013-2015)

Funded Proposals

Brooks, E.S., M. Dobre, D. Strawn. Post-fire phosphorus availability and mobility in forest soils and the effects on water quality. USGS 104b (\$15K) (2017-2018)
Brooks, E.S. Enhancing Forest Watershed Modeling Performance (Mod 2) USFS-Research Joint Venture, 15-JV-11221634-107 (\$80K) (2017-2018).
Brooks, E.S. Rangeland Post-Fire Erosion (renewal), USDA-ARS Cooperative Agreement, 58-2052-6-002, \$10,000 (2017-2018)
Brooks, E.S. Development and assessment of an online watershed decision support tool to assess runoff, erosion and phosphorus transport in Forested landscapes. Internal NSF-MILES EPSCoR funding (\$38K) (2017-2018)
Brooks, E.S., J. Johnson-Maynard, D. Strawn. Effects of long-term alternative cropping systems on soil health and nutrient transport. USDA-ARS Research Service Agreement (RSA), \$81,818 (2017-2018).
Johnson-Maynard, J., S. Eigenbrode, E. Brooks, K. Schroeder. Inland Pacific Northwest Wheat-Based Systems: Landscapes in Transition, USDA-CAP proposal (\$4M)
Brooks, E.S. Enhancing Forest Watershed Modeling Performance (Mod 1) USFS-Research Joint Venture, 15-JV-11221634-107 (\$107K) (2016-2017)
Brooks, E.S., J. Johnson-Maynard, D. Strawn. Effects of long term no-tillage management on soil structure and soil phosphorus distribution. USDA-ARS Goods and Services agreement, 58-2090-6-032, \$93,500 (2016-2017).
Brooks, E.S. Rangeland Post-Fire Erosion, USDA-ARS Cooperative Agreement, 58-2052-6-002, \$32,000 (2016-2018)
Dobre, M., E.S. Brooks, D. Strawn, C. Gasch. Phosphorus Management in Forested Landscapes. USDA-NIFA (\$402k) (2016-2019)
Kolden, C., E.S. Brooks et al. FireEarth Modeling System for Wildfire Mitigation USDA-SEES, (\$3M, (\$218K to Brooks) (2015-2018)

- Brooks, E.S. Enhancing Forest Watershed Modeling Performance USFS-Research Joint Venture, 15-JV-11221634-107 (\$70K) (2015-2016)
- Strawn, D. and Brooks, E.S. Linking Agronomic Soil-P with Water Quality in Palouse Cropping Systems. USGS 104 (\$92K) (2015-2016)
- Heinse, R, E.S. Brooks. Demonstration of spatial irrigation management using distributed soil-water tension measurements. Hortau Corporation (\$60,494) (2014-2015)
- Brooks, E.S., J. Candel, R. Dijkma, R. Sánchez-Murillo, G. Grader, R. Heinse, J. Boll, and J. Fairley. Identifying hydrologic recharge connections in the Moscow sub-basin using isotopic and caffeine tracers. \$51,528. Palouse Basin Aquifer Committee. (2014-2015)
- Wilhelm, F.M., E.S. Brooks, and J. Boll. The juvenile steelhead food web in an effluent dominated stream, Troy, Idaho, determined using stable isotopes. Office of Species Conservation, Pacific Coast Salmon Recovery Grant, \$40,182 (2013-2014)
- Elliot, W.J., E.S. Brooks, J. Boll, R. Foltz, M. Hogan. Development of an Online Watershed Interface to predict the effects of forest and fire management on sediment and phosphorus loads in surface runoff in Lake Tahoe Basin. (\$454,877) (\$194,000 to Brooks) (2013-2016)
- Brown, D., L. Vierling, E.S. Brooks, et al. Site-Specific Climate-friendly Farming, USDA National Institute of Food and Agriculture, Agricultural and Food Research Initiative Grant \$5,000,000 (\$560,000 to Brooks) (2011-2016)
- Eigenbrode, S., E.S. Brooks, et al. Regional Approaches to Climate Change – PNA, USDA National Institute of Food and Agriculture, Regional Coordinated Agricultural Project (CAP) Grant, \$20,000,000 (\$185,000 to Brooks) (2011-2016).
- Brooks, E.S.; Improving steelhead habitat in WF Little Bear Creek using the Big Meadow Creek Reservoir. Governor's Office of Species Conservation. (\$86,162) (2012-2013)
- Brooks, E.S. *Dissolved Oxygen Recovery in Effluent-Dominated Streams*. Idaho Governor's Office of Species Conservation. Snake River Basin Adjudication Funding \$53,000 (2009-2011).
- Elliot, W.J., E.S. Brooks, D. Traumer. Modeling and decision support tools for multi-objective forest management. USDA-Forest Service through the Round 10 Southern Nevada Public Land Management Act (SNPLMA) \$203,102 (\$11,447 to Brooks) (2010-2011)
- Brooks, E.S. and J. Boll Base Flow Characterization and Simulation in the Inter-Mountainous Regions of the Pacific Northwest, Joint Research Venture Agreement, US Forest Service, Rocky Mountain Research Service, \$58,262.00 (2010-2013)
- Langendoen, E.J., E.S. Brooks, J. Boll, J. Wu, W. Elliot. *Assessing hillslope and stream channel sediment loading in the Tahoe Basin using the WEPP and CONCEPTS models*. Joint Agreement between University of Idaho, Washington State University, Rocky Mountain Research Station USDA-FS, USDA-ARS National Sedimentation Laboratory. \$10,000. (2009-2010)
- Brooks, E.S., J. Boll, J. Wu, W. Elliot, P. Robichaud and W. Chistensen, *Assessing the Sources and Transport of Fine Sediment in Response to Management Practices in the Tahoe Basin using the WEPP Model*, USDA-Forest Service through the Round 7 Southern Nevada Public Land Management Act (SNPLMA) (\$232,149) (2007-2009).
- Brooks, E.S., J. Boll, S. Chen, and D. McCool. *Improving tillage systems for minimizing erosion*. USDA-STEPP (\$62,560) (2004-2006).
- J. Boll, S.L. McGeehan and E.S. Brooks. *Valley County Soil and Water Conservation District, Assessing BMP Effectiveness in Reducing Phosphorus Loading in Irrigated Pastures*. IDWR March 1, 1998-present (\$32,000).

Peer Reviewed Publications

- Srivastava, A., J.Q. Wu, W.J. Elliot, E.S. Brooks, and D.C. Flanagan. 2018 A simulation study to estimate effects of wildfire and forest management on hydrology and sediment in a forested watershed, Northwestern USA. *Transactions of the ASABE*. In press doi.org/10.13031/trans.12326
- Norby, J, D. Strawn, and E. Brooks. 2018. Filter Membrane Effects on Water-Extractable Phosphorus Concentrations from Soil. *J Environ Qual*. 47(2):378-382. doi: 10.2134/jeq2017.10.0412.
- Toohey, R.C., J. Boll, E.S. Brooks, and J.R. Jones. 2018. Effects of land use on soil properties and hydrological processes at the point, plot, and catchment scale in volcanic soils near Turrialba, Costa Rica. *Geoderma*, 315:138-148. <https://doi.org/10.1016/j.geoderma.2017.11.044>

- Gasch, C.K., D.J. Brown, C.S. Campbell, D.R. Cobos, E.S. Brooks, M. Chahal, and M. Poggio. 2017. A Field-Scale Sensor Network Data Set for Monitoring and Modeling the Spatial and Temporal Variation of Soil Water Content in a Dryland Agricultural Field. *Water Resources Research*. DOI: 10.1002/2017WR021307
- Pan, W.L., W.F. Schillinger, F.L. Young, E.M. Kirby, G.G. Yorgey, K.A. Borrelli, E.S. Brooks, V.A. McCracken, T.M. Maaz, S. Machado, I.J. Madsen, J.L. Johnson-Maynard, L.E. Port, K. Painter, D.R. Huggins, A.D. Esser, H.P. Collins, C.O. Stockle, S.D. Eigenbrode. 2017. Integrating Historic Agronomic and Policy Lessons with New Technologies to Drive Farmer Decisions for Farm and Climate: The Case of Inland Pacific Northwestern U.S. *Frontiers in Environmental Science*. <https://doi.org/10.3389/fenvs.2017.00076>
- Chi, J., S. Waldo, S.N. Pressley, E.S. Russell, P.T. O’Keeffe, W.L. Pan, D.R. Huggins, C.O. Stöckle, E.S. Brooks, and B.K. Lamb. 2017. Effects of climatic conditions and management practices on agricultural carbon and water budgets in the inland Pacific Northwest USA. *Journal of Geophysical Research – Biogeosciences*. DOI: 10.1002/2017JG004148
- Chi, J., Maureirab, F., Waldo, S., Pressley, S., O’Keeffe, P., Stöckle, C., Pan, W. L., Huggins, D. R., Brooks, E., S. and Lamb, B. K., 2017. Carbon and water budgets in wheat-based cropping systems in the inland Pacific Northwest US: Comparison of CropSyst simulations with eddy covariance measurements. *Front. Ecol. Evol.*, | <https://doi.org/10.3389/fevo.2017.00050>
- Srivastava, A., J.Q. Wu, W.J. Elliot, E.S. Brooks, and D.C. Flanagan. 2017. Modeling streamflow in a snow-dominated forest watershed using the Water Erosion Prediction Project (WEPP) model. *Trans. of the ASABE*, 60(4): 1171-1187, ISSN 2151-0032 <https://doi.org/10.13031/trans.12035>
- Squires, A.L., J. Boll, and E.S. Brooks, 2017. On the Role of Spatial, Temporal, and Climatic Forces on Stream Sediment Loading from Rural and Urban Ecosystems. *Journal of the American Water Resources Association (JAWRA)* 53(5):1195-1211. <https://doi.org/10.1111/1752-1688.12566>
- Maaz, M.T., W.F. Schillinger, S. Machado, E. Brooks, J.L. Johnson-Maynard, L.E. Young, F.L. Young, I. Leslie, A. Glover, I.J. Madsen, A. Esser, H.P. Collins, and W.L. Pan. 2017. Impact of climate change adaptation strategies on winter wheat and cropping system performance across precipitation gradients in the inland Pacific Northwest, USA. *Frontiers in Environmental Science*. 5:23. doi: 10.3389/fenvs.2017.00023 <https://doi.org/10.3389/fenvs.2017.00023>
- Ward, N.K., F. Maureira, E.S. Brooks, C.O. Stöckle, K.M. Painter, M.A. Yourek; C.K. Gasch. 2017. Simulating field-scale variability and precision management with a 3D hydrologic cropping systems model. *Precision Agriculture*, <https://doi.org/10.1007/s11119-017-9517-6>
- Stöckle, C.O., S. Higgins, R. Nelson, J. Abatzoglou, D. Huggins, W. Pan, T. Karimi, J. Antle, S. Eigenbrode, and E.S. Brooks. 2017. Evaluating opportunities for an increased role of winter crops as adaptation to climate change in dryland cropping systems of the U.S. Inland Pacific Northwest. *Climate Change*. In Press.
- Gasch, C.K., D.J. Brown, E.S. Brooks, M. Yourek, M. Poggio, D.R. Cobos, and C.S. Campbell. A pragmatic, automated approach for retroactive calibration of soil moisture sensors using a two-step, soil-specific correction. 2017. *Computers and Electronics in Agriculture Journal*, 10.1016/j.compag.2017.03.018.
- Kelley, C.J., C.K. Keller, E.S. Brooks, J.L. Smith, C. Orr. R.D. Evans. 2017. Water and nitrogen movement through a semi-arid dryland agricultural catchment: Seasonal and decadal trends. *Hydrological Processes*, <https://doi.org/10.1002/hyp.11152>
- Elliot, W., M. Dobre, A. Srivastava, K. Elder, T. Link and E. Brooks. 2016. Forest Hydrology of Mountainous and Snow-Dominated Watersheds. IN: Forest hydrology : processes, management and assessment, edited by D.M. Amatya, T.M. Williams, L. Bren, and C. de Jong, Ch. 4, CAB International, Boston, MA LCCN 2016013391| ISBN 9781780646602.
- Candel, J., E.S. Brooks, R. Sanchez-Murillo, G. Grader, R. Dijkstra. 2016. Identifying groundwater recharge connections in the Moscow sub-basin using isotopic tracers and the SMR model. *Hydrogeology Journal* 24: 1739. doi:10.1007/s10040-016-1431-x
- Brooks, E.S., M. Dobre, W.J. Elliot, J.Q. Wu, and J. Boll. 2016. Watershed-scale evaluation of the Water Erosion Prediction Project (WEPP) model in the Lake Tahoe basin. *Journal of Hydrology*, 533:389-402.
- Bellmore, R. A., J. A. Harrison, J. A. Needoba, E. Brooks, and C. Kent Keller 2015. Hydrologic control of dissolved organic matter concentration and quality in a semiarid artificially drained agricultural catchment, *Water Resour. Res.*, 51, doi:10.1002/2015WR016884.

- Waldo, S., J. Chi, S. Pressley, P. O’Keeffe, W. Pan, E. Brooks, D. Huggins, C. Stockle, B. Lamb. 2015. Assessing carbon dynamics at high and low rainfall agricultural sites in the inland Pacific Northwest US using the eddy covariance method. *Agricultural and Forest Meteorology*, 218-219:25-36, doi:10.1016/j.agrformet.2015.11.018.
- Chi, J., S. Waldo, S.N. Pressley, P. O’Keeffe, W.L. Pan, E. Brooks, D.R. Huggins, C.O. Stockle, and B.K. Lamb. 2015. Assessing carbon and water dynamics of no-till and conventional tillage cropping systems in the inland Pacific Northwest US using the eddy covariance method. *Agricultural and Forest Meteorology*, 218-219:37-49, doi:10.1016/j.agrformet.2015.11.019.
- Brooks, E.S., S.M. Saia, J. Boll, Z.M. Easton, T.S. Steenhuis. 2015. Assessing BMP effectiveness and guiding BMP planning using process-based modeling. *Journal of the American Water Resources Association*, 51(2):343-358.
- Boll, J., E.S. Brooks, B. Crabtree, and S. Dun. 2015. Variable source area hydrology modeling with the Water Erosion Prediction Project Model. *Journal of the American Water Resources Association*. 51(2):340-342.
- Boll, J., T.S. Steenhuis, E.S. Brooks, L.A. Kurkalova, R.A. Rittenburg, A.L. Squires, G. Vellidis, Z.M. Easton, J.D. Wulfforst. 2015. Featured Collection Introduction: Synthesis and Analysis of Conservation Effects Assessment Projects for Improved Water Quality, *Journal of the American Water Resources Association*. 51(2):302-304
- Rittenburg, R.A., A.L. Squires, J. Boll, E.S. Brooks, Z.M. Easton, and T.S. Steenhuis. 2015. Agricultural BMP effectiveness and dominant hydrological flow paths: Concepts and a review. *Journal of the American Water Resources Association*. 51(2):305-329.
- Sanchez-Murillo, R, E.S. Brooks, W.J. Elliot, and J. Boll. 2015. Isotope hydrology and baseflow geochemistry in natural and human-altered watersheds in the Inland Pacific Northwest, USA. *Journal of Isotopes in Environmental & Health Studies*. doi: 10.1080/10256016.2015.1008458.
- Sanchez-Murillo, R., C. Birkel, K. Welsh, G. Esquivel-Hernandez, J. Corrales-Salazar, J. Boll, E. Brooks, O. Rouspard, O. Saenz-Rosales, I. Katchan, R. Arce-Mesen, C. Soulsby, L.J. Araguas-Araguas. 2015. Key drivers controlling stable isotope variations in daily precipitation of Costa Rica: Caribbean Sea versus Eastern Pacific Ocean moisture sources, *Quaternary Science Reviews*, <http://dx.doi.org/10.1016/j.quascirev.2015.08.028>
- Sanchez-Murillo, R, G. Esquivel-Hernandez, K. Welsh, E.S. Brooks, J. Boll, R. Alfaro-Solis, J. Valdex-Gonzalez. 2013. Spatial and Temporal Variation of Stable Isotopes in Precipitation across Costa Rica: An analysis of historic GNIP records. *Open Journal of Modern Hydrology*, 3:226-240, DOI:<http://dx.doi.org/10.4236/ojmh.2013.34027>
- McCool, D.K., S. Dun, J.Q. Wu, W.J. Elliot, and E.S. Brooks. 2013. Seasonal Change of WEPP erodibility parameters on a fallow plot. *Transactions of the ASABE*. 56(2): 711-718.
- Saia, S.M., E.S. Brooks, Z.M. Easton, C. Baffaut, J. Boll, and T.S. Steenhuis. 2013. Incorporating Pesticide Transport into the WEPP Model for Mulch Tillage and No Tillage Plots with an Underlying Claypan Soil. *Applied Engineering in Agriculture* 29(3):373-382.
- Sanchez-Murillo, R, E.S. Brooks, L. Sampson, J. Boll, and F. Wilhelm. 2012. Ecohydrological analysis of Steelhead (*Oncorhynchus mykiss*) habitat in an effluent dependent stream in the Pacific Northwest, USA. *Ecohydrology Journal* DOI: 10.1002/eco.1376.
- Srivastava, A., S. M., Dobre, J. Wu, W. Elliot, E. Bruner, S. Dun, E. Brooks, and I. Miller. 2012. Modifying WEPP to improve streamflow simulation in a pacific northwest watershed. *Transactions of the ASABE*. 56(2): 603-611.
- Fuka, D.R., Z.M. Easton, E.S. Brooks, J. Boll, T.S. Steenhuis, and M.T. Walter. 2012. Process-based snowmelt modeling: Integration into watershed models. *J. Am. Water Res. Assoc.* 48(6):1151-1161
- Brooks, E.S., J. Boll, and P.A. McDaniel. 2012. Hydopedology in seasonally dry landscapes: The Palouse region of the Pacific Northwest, USA. In: Hydopedology, Lin, H. (ed.) 1st Edition, Chapter 10, 329-350.
- Jang, T., G. Vellidis, J. Hyman, E. Brooks, L. Kurkalova, J. Boll, and J. Cho. 2012. Model for Prioritizing Best Management Practice Implementation: Sediment Load Reduction. *Environment Management*. DOI 10.1007/s00267-012-9977-4.
- Osmond, D.L. J. Boll, E.S. Brooks, J.D. Wulfforst, R. Mahler, L.W. Van Tassell, M. Arabi, and D.L.K. Hoag. 2012. Paradise Creek Watershed, Idaho: National Institute of Food and Agriculture–Conservation Effects Assessment Project. In: *How to Build Better Agricultural Conservation Programs to Protect Water Quality: The National Institute of Food and Agriculture – Conservation*

- Effects Assessment Project Experience*. Osmond, D.L., D.W. Meals, D.L.K. Hoag, and M. Arabi (Eds). Soil and Water Conservation Society. Akeney, IA. Chapter 12, 221-233.
- A. Spisni, F. Tomei, S. Pignone, E. Muzzi, A. Panzacchi, G. Antolini, G. Villani, M. di Lorenzo, R. Foraci, M. Bittelli, E. S. Brooks. 2011. *Snow cover analysis in Emilia-Romagna*, Italian Journal of Remote Sensing, doi: 10.5721/ItJRS20114315
- Dijkma, R., E.S. Brooks, and J. Boll. 2010. Groundwater recharge in Pleistocene sediments overlying basalt aquifers in the Palouse Basin, USA: modeling of distributed recharge potential and identifying water pathways. *Hydrogeology Journal* 19:489-500 (DOI 10.1007/s10040-010-0695-9).
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- Boll, J., E.S. Brooks, and D. Traeumer. 2001. Hydrologic and Sediment Delivery Analysis of Agriculturally Dominated Watersheds in the Clearwater River Basin. Final report to Idaho Soil Conservation Commission.
- Boll, J., C.S. Campbell, M.-E. van Egmond, A.E.M. Traeumer, E.S. Brooks, and J.-J. Reitsma. 2000. Comparison of WEPP and WATSED. Final report: Phase I (Agreement No. Int. 97058 RJVA) to U.S. Forest Service, Rocky Mountain Research Station, Forest Sciences Laboratory, Moscow, ID.

Poster Presentations and Co-Authorship on Presentations at Professional Meetings

- Norby, J.C., E.S. Brooks, and D.G. Strawn. 2017. Subsurface phosphorus transport through a no-till field in the semi arid Palouse region. B53B-1957 Presented at the 2017 Fall meeting, AGU, New Orleans, LA 11-15 Dec. (Poster Presentation)
- Shults, D., E.S. Brooks, R. Heinse, and C.K. Keller (2017), Characterizing subsurface water flow to artificial drain lines using fiber-optic distributed temperature sensing H21A-1422 Presented at the 2017 Fall meeting, AGU, New Orleans, LA 11-15 Dec. (Poster Presentation)
- Quinn, D., E.S. Brooks, P.R. Robichaud, M. Dobre, R.E. Brown, and J. Wagenbrenner. 2017 Catchment-scale Validation of a Physically-based, Post-fire Runoff and Erosion Model. H21B-1451 Presented at the 2017 Fall meeting, AGU, New Orleans, LA 11-15 Dec. (Poster Presentation)
- Vega, S., F.B. Pierson, C.J. Williams, E.S. Brooks, E.K. Strand, M.S. Seyfried, M. Murdock, and J.L. Pierce. 2017. Quantifying Hillslope to Watershed Erosional Response Following Wildfire. H21B-1452 Presented at the 2017 Fall meeting, AGU, New Orleans, LA 11-15 Dec. (Poster Presentation)
- Bone, E.D., P.R. Robichaud, E.S. Brooks, and R.E. Brown. 2017. Burn Severity Based Stream Buffers for Post Wildfire Salvage Logging Erosion. H21B-1453. Presented at the 2017 Fall meeting, AGU, New Orleans, LA 11-15 Dec. (Poster Presentation)
- Boll, J., D.D. Adams, E.S. Brooks, L.D. Rivera. 2017. Evaluation of a Complementary Flux Principle Using Field Measurements for a Semi-Arid Climate. H13F-1462 Presented at the 2017 Fall meeting, AGU, New Orleans, LA 11-15 Dec. (Poster Presentation)
- Cao, L., W. Elliot, and E.S. Brooks. 2017. Forest soil erosion prediction as influenced by wildfire and roads. H21B-1456 Presented at the 2017 Fall meeting, AGU, New Orleans, LA 11-15 Dec. (Poster Presentation)
- Fowler, A., J. Boll, E.S. Brooks, and R.D. Boylan. 2017. Critical Source Area Delineation: The representation of hydrology in effective erosion modeling. H53H-1566 Presented at the 2017 Fall meeting, AGU, New Orleans, LA 11-15 Dec. (Poster Presentation)
- Baffaut, C., E. Brooks, D. Goodrich, E. Elias, D. Hoover, M.A. Liebig, D. Moriasi, D. Harmel, D.R. Smith, J. Okalebo, T.B. Moorman, L. Yasarer, S. Hamilton, H. Corners, K. King, A. Saha, A.R. Buda, and G.W. McCarty. 2017. Hydrologic Budgets across the Long-Term Agroecosystems Research Network.

- 258-7. Presented at the 2017 American Society of Agronomy, Crop Science Society of America, and Soil Science Society of America International Meeting Oct. 22-25, Tampa, FL. (Oral Presentation)
- Lew, R., M. Dobre, W. Elliot, P. Robichaud, E. Brooks, and J. Frankenberger. 2017. Usability and Functional Enhancements to an Online Interface for Predicting Post Fire Erosion (WEPP-PEP). Presented at the European Geophysical Union (EGU) Apr. 23-28, Vienne, AU (Oral Presentation)
- Dobre, M., E. Brooks, R. Lew, C. Kolden, D. Quinn, W. Elliot, and P. Robichaud. 2017. Quantifying soil burn severity for hydrologic modeling to assess post-fire effects on sediment delivery. Presented at the European Geophysical Union (EGU) Apr. 23-28, Vienne, AU (Oral Presentation)
- Quinn, D., E. Brooks, M. Dobre, R. Lew, P. Robichaud, and W. Elliot. 2017. The effects of hillslope-scale variability in burn severity on post-fire sediment delivery. Presented at the European Geophysical Union (EGU) Apr. 23-28, Vienne, AU (Poster Presentation)
- Shaljian, M., C.K. Keller, K.B. Jones, E.S. Brooks, D.R. Huggins. 2016. Chemical Denudation and Cation Depletion in a Semi-Arid Catchment of the Long-Term Agroecological Research Observatory. American Geophysical Union Meetings Dec. 12-16. H33J-1696. (Poster presentation).
- Dobre, M., E.S. Brooks, A. Srivastava, R. Lew, W.J. Elliot. 2016 Modeling sediment yield and phosphorus in the Lake Tahoe basin with the Water Erosion Prediction Project (WEPP) model. American Geophysical Union Meetings Dec. 12-16. H33L-03. (Oral presentation).
- Zhao, M., J. Boll, E.S. Brooks, and M. Gao. Evaluating the Effects of Forest Treatments on Hydrologic Pattern at Temporal and Spatial Scales. American Geophysical Union Meetings Dec. 12-16. H43G-1527. (Poster presentation).
- Vega, S., F.B. Pierson, C.J. Williams, E.S. Brooks, J.L. Pierce, and C. Roehner. 2016. Quantifying Hillslope to Watershed Erosional Response Following Wildfire. American Geophysical Union Meetings Dec. 12-16. H43G-1544. (Poster presentation).
- McClellan, T.M., D.J. Brown, D.R. Huggins, E.S. Brooks, J.U.H. Eitel, K.A. Sanguinet, L.A. Vierling and W.L Pan. 2016. Managing Chlorosis in Waterlogged, Dryland Winter Wheat. American Society of Agronomy, Crop Science Society of America, and Soil Science Society of America International Meeting Nov. 6-9, Phoenix, AZ. 362-16 (Oral Presentation)
- Brooks, E., N. Ward and A. Wardall. 2015. Implications of wetter and warmer future climates on the soil water availability in the Palouse. Presented at the International Arid Cereals Meeting, Transitioning Cereal Systems to Adapt to Climate Change, Nov 13-14, Minneapolis, MN. (Poster Presentation)
- Chaffee, M., N. Ward, A. Glover, K. Borrelli, E. Brooks. 2015. Improving site specific nitrogen management. Presented at the 6th Annual Northwest Climate Conference 3-5 November 2015, Coeur d'Alene, Idaho. (Poster Presentation)
- Poggio, M., D.J. Brown, C. Gasch, E. Brooks, M. Yourek and R.S. Bricklemeyer. 2015. Using a VisNIR Penetrometer to Map Field-Scale Clay Content, Bulk Density and Restrictive Layers for the Palouse Region, Washington, USA. American Society of Agronomy, Crop Science Society of America, and Soil Science Society of America International Meeting Nov. 15-18, Minneapolis, MN. (Oral Presentation)
- Stockle C.O., F. Maureira, N.K. Ward, M. Yourek, M. Poggio and E. Brooks. 2015. Importance of Characterization of Soil Properties and Spatial Distribution in Watershed Modeling. American Society of Agronomy, Crop Science Society of America, and Soil Science Society of America International Meeting Nov. 15-18, Minneapolis, MN. (Poster Presentation)
- Ward, N.K., F. Maureira, E. Brooks, M. Yourek, and C.O. Stockle. 2015. Cropsyst-Microbasin Model as a Tool to Inform Variable-Rate Nitrogen Management and Dryland Farm Profitability. American Society of Agronomy, Crop Science Society of America, and Soil Science Society of America International Meeting Nov. 15-18, Minneapolis, MN. (Oral Presentation)
- Ward, N.K., K.M. Painter, H. Davis, and E. Brooks. 2015. Use of the Nutrient Management Plan Policy Tool to Overcome Barriers to Adoption of Precision Agriculture in the Palouse Region of the Inland Pacific Northwest. American Society of Agronomy, Crop Science Society of America, and Soil Science Society of America International Meeting Nov. 15-18, Minneapolis, MN. (Poster Presentation)
- Brooks, E.S., M. Poggio, T.R. Anderson, C. Gasch, M.A. Yourek, N.K. Ward, T.S. Magney, D.J. Brown and D.R. Huggins. 2014. Capturing field-scale variability in crop performance across a regional-scale climosequence. American Geophysical Meetings, San Francisco, CA, Dec. 15-19. 2014.

- Brown, D.J., C. Gasch, E.S. Brooks, D.R. Huggins, C.S. Campbell, and D.R. Cobos. 2014. An agronomic field-scale sensor network for monitoring soil water and temperature variation. American Geophysical Meetings, San Francisco, CA, Dec. 15-19. 2014.
- Heinse, R., J. Caron, E. Brooks, and J. MacPherson. 2014. Towards Spatial Irrigation Management Using Distributed Soil-Water Tension Measurements Optimized for Soil Heterogeneity. American Society of Agronomy, Crop Science Society of America, and Soil Science Society of America International Meeting Nov. 2-5, 2014 (Poster Presentation)
- Maureira, F., C.O. Stockle, M. Liu, R. Nelson, E.S. Brooks and R. Sommer. 2014. MicroBasin - A High-resolution Watershed Scale Ecohydrologic Model for Agro-ecosystems. American Geophysical Meetings, San Francisco, CA, Dec. 15-19. 2014.
- Ward, N.K., F. Maureira, M.A. Yourek, E.S. Brooks and C.O. Stockle. 2014. Assessing variable rate nitrogen fertilizer strategies within an extensively instrument field site using the MicroBasin model. American Geophysical Meetings, San Francisco, CA, Dec. 15-19. 2014.
- Ward, N.K., F. Maureira, E. Brooks, M. Yourek, and C.O. Stockle. 2014. Impacts of Increased over-Winter Precipitation on Dryland Cereal Production Systems in the Pacific Northwest. American Society of Agronomy, Crop Science Society of America, and Soil Science Society of America International Meeting Nov. 2-5, 2014 (Poster Presentation)
- Magney, T., N.K. Ward, E. Brooks, D.R. Huggins, S. Finch, J.U.H. Eitel, L.A. Vierling, M. Yourek, T.R. Anderson, C.O. Stockle and D. Brown. 2014. Assessing the Spatio-Temporal Controls of Field-Scale Nitrogen Uptake Using Biophysical Modeling and High Resolution Satellite Imagery. American Society of Agronomy, Crop Science Society of America, and Soil Science Society of America International Meeting Nov. 2-5, 2014 (Oral Presentation)
- Gasch, C., T.R. Anderson, M. Yourek, E. Brooks and D. Brown. 2014. Calibration of Soil Moisture Sensors Using Pedotransfer Functions. American Society of Agronomy, Crop Science Society of America, and Soil Science Society of America International Meeting Nov. 2-5, 2014 (Poster Presentation)
- Bruner, E.A., D. Brown, E. Brooks and L. Carpenter-Boggs. 2014. Quantifying in-Situ Nitrate and Ammonium Production in Response to Site-Specific Setting in No-till Dryland Wheat Agroecosystems of the Pacific Northwest. American Society of Agronomy, Crop Science Society of America, and Soil Science Society of America International Meeting Nov. 2-5, 2014 (Poster Presentation)
- Brown, D.J., D.R. Huggins, C.O. Stockle, E. Brooks, J.U.H. Eitel, K.M. Painter, L.A. Vierling and C. Reardon. 2014. Site-Specific Climate-Friendly Farming: Benefits and Challenges of Transdisciplinary Research. American Society of Agronomy, Crop Science Society of America, and Soil Science Society of America International Meeting Nov. 2-5, 2014 (Oral Presentation)
- Ward, N., F. Maureira, R. Boylan, E.S. Brooks, M. Yourek, A. Wardall, C.O. Stockle. 2014. Impacts of Increased Over-Winter Precipitation on Dryland Cereal Production Systems in the Pacific Northwest. 5th Annual Pacific Northwest Climate Science Conference September 9-10, 2014, Seattle WA. (Poster Presentation)
- Gasch, C., D. Brown, E. Brooks, D. Huggins, C. Campbell, D. Cobos, and M. Chahal. 2014. A Field-Scale Sensor Network for Monitoring and Modeling the Spatial and Temporal Variation of Soil Moisture Content. 5th Annual Pacific Northwest Climate Science Conference September 9-10, 2014, Seattle WA. (Poster Presentation)
- Farrell, P., J.T. Abatzoglou, and E.S Brooks. 2014. Impact of Climate Change on Inland Northwest Soil Erosion Under Various Land Management Practices. American Geophysical Meetings, San Francisco, CA, Dec. 15-19. 2014. (Poster Presentation)
- Farrell, P., J. Abatzoglou, and E.S. Brooks. 2014. Changes in Soil Erosion Rates in Inland Pacific Northwest Agricultural Lands Under Climate Change. 5th Annual Pacific Northwest Climate Science Conference September 9-10, 2014, Seattle WA. (Poster Presentation)
- Srivastava, A., L. Dawes, E.S. Brooks. 2014. Assessing the Effects of Fuel Treatments on Sediment Production in the Fernan Lake Watershed using a Process-Based Modeling Framework. Poster presentation at the MILES-EPSCoR Annual Meeting Boise, ID. Oct. 7-9, 2014.
- Boll, J., R. Sanchez-Murillo, E.S. Brooks, and W. Elliot. 2013. Baseflow mean transit times in natural and human-altered catchments. Abstract American Geophysical Union Fall Meeting, Dec. 9-13, San Francisco, CA.

- Boylan, R. and Brooks, E.S. 2013. Hydrologic carbon fluxes from the dry land agricultural region of the Inland Pacific Northwest: quantification and modeling. REACCH Annual meeting, Portland OR, February 13-15th 2013.
- Boylan, R. and Brooks, E.S. Hydrologic carbon fluxes from the dry land agricultural region of the Inland Pacific Northwest: quantification and modeling. University of Idaho Parker Plant Science Farm Field Day. Moscow, ID, July 9, 2013.
- Boylan, R.D., E.S. Brooks, J. Johnson-Maynard, D. Huggins. 2013. Hydrologic Carbon Fluxes from the Dryland Grain Producing Region of the Inland Pacific Northwest: Measurements and Modeling. Abstract American Geophysical Union Fall Meeting, Dec. 9-13, San Francisco, CA.
- Rittenburg, R., J. Boll, and E.S. Brooks, 2013. Understanding Stream Channel Sediment Source Contributions For The Paradise Creek Watershed In Northern Idaho. Abstract American Geophysical Union Fall Meeting, Dec. 9-13, San Francisco, CA.
- Rittenburg, R., J. Boll, E.S. Brooks, A. Squires, and J. Newson. 2013. Understanding Stream Channel Sediment Source Contributions for the Paradise Creek Watershed In Northern Idaho. American Water Resources Association Annual Meeting, Nov. 4-7, Portland, OR.
- Squires, A.L., J. Boll, E.S. Brooks. 2013. Characterization of dominant hydrologic events: the role of spatial, temporal and climatic forces in generating the greatest sediment loads. Abstract American Geophysical Union Fall Meeting, Dec. 9-13, San Francisco, CA.
- Squires, A.L., J. Boll, E.S. Brooks. 2013. Characterization of dominant hydrologic events: the role of spatial, temporal and climatic forces in generating the greatest sediment loads. American Water Resources Association Annual Meeting, Nov. 4-7, Portland, OR.
- Welsh-Unwala, K, R. Sanchez-Murillo, G. Esquivel-Hernandez, E.S. Brooks, J. Boll, R. Alfaro-Solis, J. Valdes-Gonzalez. 2013. Spatial and temporal variation of stable isotopes in precipitation across Costa Rica. Abstract American Geophysical Union Fall Meeting, Dec. 9-13, San Francisco, CA.
- Yourek, M.A., E.S. Brooks, T.S. Magney, T.R. Anderson, and D.J. Brown. 2013. Field-Scale Soil Moisture Mapping Using RapidEye Satellite Imagery and Distributed Hydrologic Modeling. Abstract American Geophysical Union Fall Meeting, Dec. 9-13, San Francisco, CA.
- Boylan, R., E. Brooks, M. Chahal, D. Brown, and D. Huggins. Developing Field-Scale Nitrate and Carbon Flux Modeling Tools for Mitigation and Adaptation. Tri Societies Meeting, Cincinnati OH, October 21-24th 2012. (Poster Presentation)
- Boylan, R., E Brooks, J. Johnson-Maynard, and D. Huggins. Dissolved and Particulate Organic Carbon Transport, Loads and Relationships from Catchments in the Dryland Agricultural Region of the Inland Pacific Northwest. American Geophysical Union Annual Meeting, San Francisco, CA. December 3rd-7th, 2012. (Poster Presentation)
- Boylan, R., E Brooks, J. Johnson-Maynard, and D. Huggins. Dissolved and Particulate Organic Carbon Transport, Loads and Relationships from Catchments in the Dryland Agricultural Region of the Inland Pacific Northwest. Kenworthy Theater, Moscow, ID. February 5th, 2012. (same poster as presented in San Francisco)
- Boylan, R. and Brooks, E.S. Hydrologic carbon fluxes from the dry land agricultural region of the Inland Pacific Northwest: quantification and modeling. REACCH Annual meeting, Portland OR, February 13-15th 2013. (poster presentation)
- Boylan, R. and Brooks, E.S. Hydrologic carbon fluxes from the dry land agricultural region of the Inland Pacific Northwest: quantification and modeling. University of Idaho Parker Plant Science Farm Field Day. Moscow, ID, July 9, 2013. (same poster as presented in Portland)
- Boll, J., E. Brooks, B. Rittenburg, A. Squires, J.D. Wulfhorst, B. Mahler T. Steenhuis, S. Saia, G. Vellidis, T. Jang, L. Kurkalova, D. Osmond, D. Meals, M. Arabi 2012. Workshop T1: Synthesis and Analysis of 13 NIFA CEAP Projects. Presented at the USDA-NIFA National Water Conference: Land and Sea Grant Initiatives for a Changing World May 20-24, 2012, Portland, OR
- Bruner, E.A., D. Brown, D. Huggins, E. Brooks, J.U. Eitel, T. Magney, L. Vierling, M. Poggio and T.T. Brown. 2012. Science-Based Zone Mapping for Site-Specific N Management in Dryland Wheat-Based Cropping Systems On Complex, Pacific Northwest Palouse Landscapes. Abstract ASA, CSSA, and SSSA International Annual Meetings, Oct. 21-24, 2012 Cincinnati, Ohio (oral presentation).
- Huggins, D., D. Brown, K. Keller, E. Brooks, J.L. Smith, B. Lamb, and S.D. Eigenbrode. 2012. Linkages Among C, N and Water Footprints in Wheat-Based Cropping Systems. Abstract ASA, CSSA, and SSSA International Annual Meetings, Oct. 21-24, 2012 Cincinnati, Ohio (oral presentation).

- Jang, T., G. Vellidis, J. Hyman, E. Brooks, J. Boll, L. Kurkalova. 2012. A Prioritization Model for Sediment Load Reduction. Presented at the USDA-NIFA National Water Conference: Land and Sea Grant Initiatives for a Changing World May 20-24, 2012, Portland, OR
- Rittenburg, B., A. Squires, J. Boll, E. Brooks, T. Steenhuis, S. Saia. 2012. BMP Effectiveness Literature Review. Presented at the USDA-NIFA National Water Conference: Land and Sea Grant Initiatives for a Changing World May 20-24, 2012, Portland, OR
- Steenhuis, T., J. Boll, E. Brooks, B. Rittenburg, A. Squires, J.D. Wulfhorst, B. Mahler, S. Saia, G. Vellidis, T. Jang, L. Kurkalova and Zach Easton. 2012. Bringing it all together. Presented at the USDA-NIFA National Water Conference: Land and Sea Grant Initiatives for a Changing World May 20-24, 2012, Portland, OR
- Wulfhorst, J.D., J. Boll, E. Brooks, B. Rittenburg, A. Squires, B. Mahler, T. Steenhuis, S. Saia, G. Vellidis, T. Jang, and L. Kurkalova. 2012. Synthesis and Social Feasibility from the NIFA CEAP Watersheds. Presented at the USDA-NIFA National Water Conference: Land and Sea Grant Initiatives for a Changing World May 20-24, 2012, Portland, OR
- Boylan R. and Brooks, E.S. 2012. Dissolved and particulate organic carbon transport, loads, relationships from catchments in the dryland agricultural region of the Inland Pacific Northwest. Abstract American Geophysical Union Meetings Dec. San Francisco, CA
- Boylan R. and Brooks, E.S. 2012. Transport of Carbon by runoff and erosion in the PNW dryland grain production region. Poster Presentation at the REACCH Annual Meeting Feb. 28-Mar. 1. Pendleton, OR.
- Boylan R., E.S. Brooks, M. Chahal, D. Brown. and D. Huggins. Carbon and field-scale nitrate flux modeling across wide climate gradients and diverse soil variability in the dry-land agricultural region of the Inland Pacific Northwest. Abstract ASA, CSSA, and SSSA International Annual Meetings, Oct. 21-24, 2012 Cincinnati, Ohio (poster presentation).
- Brown, D., E. Brooks, J.U. Eitel, D. Huggins, K. Painter, R.A. Rupp, J.L. Smith, C. Stockle and L. Vierling. Site-Specific, Climate-Friendly Farming: Early Activities and Accomplishments. Abstract ASA, CSSA, and SSSA International Annual Meetings, Oct. 21-24, 2012 Cincinnati, Ohio (poster presentation).
- Chahal, M., D. Brown, E. Brooks, C. Campbell, and D. Cobos. 2012. Field-Scale Soil Moisture Space-Time Geostatistical Modeling for Complex Palouse Landscapes in the Inland Pacific Northwest. Abstract ASA, CSSA, and SSSA International Annual Meetings, Oct. 21-24, 2012 Cincinnati, Ohio (poster presentation).
- Eigenbrode, S.D., J. Abatzoglou, I. Burke, J. Antle, E. Brooks, S. Capalbo, P. Gessler, D. Huggins, J. Johnson-Maynard, C. Kruger, B. Lamb, S. Machado, P. Mote, K. Painter, W. Pan, S. Petrie, T. Paulitz, C. Stockle, J. Velez, V. Walden, J. Wulfhorst and K. Wolf. 2012. Regional Approaches to Climate Change for Inland Pacific Northwest Cereal Production Systems. Abstract ASA, CSSA, and SSSA International Annual Meetings, Oct. 21-24, 2012 Cincinnati, Ohio (poster presentation).
- Payne, W.L., E.S. Brooks, and R. Sanchez-Murillo. 2012. In-Situ Measurement of Vertical Bypass Flow Using a Drain Gauge. Abstract American Geophysical Union Meetings Dec. 2012 San Francisco, CA (poster presentation)
- Rittenburg, R., A. Squires, J. Boll, and E.S. Brooks. 2012. Quantifying stream channel sediment contributions for the Paradise Creek Watershed in northern Idaho. Abstract American Geophysical Union Meetings Dec. San Francisco, CA.
- Saia, S.M., E. Brooks, J. Boll, T. Steenhuis. March 2012. A web-based BMP tool for minimizing pesticide transport in agricultural watersheds. Poster Presentation at the Penn State Environmental Chemistry Student Symposium, State College, PA.
- Sanchez-Murillo, R., E.S. Brooks, J. Boll, W. Elliot. 2012. Baseflow characterization of the intermountainous regions of northern Idaho and eastern Washington, USA. Abstract American Geophysical Union Meetings Dec. San Francisco, CA
- Squires, A., R. Rittenburg, J. Boll, and E.S. Brooks. 2012. Re-Evaluation of Development of the TMDL Using Long-Term Monitoring Data and Modeling. Abstract American Geophysical Union Meetings Dec. San Francisco, CA
- Wilson, C., E.S. Brooks, and J. Boll. 2012. Hydrologic analysis for selection and placement of conservation practices at the watershed scale. Abstract American Geophysical Union Meetings Dec. San Francisco, CA.

- Boll, J., E.S. Brooks, E.S., Z. Easton, T.S. Steenhuis, G. Vellidis, L. Kurkalova, J.D. Wulfhorst, and Taeil Yang 2011. CEAP Synthesis: Analysis and tools for selection of the optimal suite of conservation practices. USDA-NIFA National Water Conference, Jan 31 - Feb 1, Washington DC.
- Brooks, E.S., J. Boll, Z. Easton, T.S. Steenhuis, and S. Saia. 2011. Assessing the success of conservation practices at the 13 CEAP watersheds through simple modeling tools based on publicly available data. USDA-NIFA National Water Conference, Jan 31 - Feb 1, Washington DC.
- Boll, J., E.S. Brooks, Z. Easton, T. Jang, L. Kurkalova, B. Mahler, T.S. Steenhuis, G. Vellidis, and J.D. Wulfhorst. 2010. CEAP synthesis & analysis: integrating process-based understanding into watershed management. CEAP Steering Committee meeting, November 19, Washington D.C.
- Brooks, E.S., J. Boll, and J. McAtty. 2010. Agricultural sediment and tributary sampling. Inter-agency meeting about sediment yield to Snake River (with scientists). August 11, Walla Walla, WA.
- Boll, J., M. Barber, E.S. Brooks, J. McAtty. 2010. Agricultural sediment and tributary sampling. Regional meeting about sediment yield to Snake River (with stakeholders). August 12, Clarkston, WA.
- Boll, J. E.S. Brooks, O. Mena, N.P. Mendoza, and J. Jones. 2010. Hydrologic Information in the FOMILENIO-CATIE-IDAHO Project Area for Sustainable Irrigation. Presented to stake holders in the Millennium Challenge Corporation Project, August 19-20, San Salvador, El Salvador.
- Boll, J., E.S. Brooks, L. Wetzel, et al. 2010. Identifying vulnerability using a hydrologic characterization tool. MALII, April 28-30, Denver, CO.
- Steenhuis, T.S., Z. Easton, J. Boll, L.A. Caballero, H.E. Dahlke, E.S. Brooks, S.A. Tilahun, and D.R. Fuka. 2010. Distributed watershed models: Back to the basics. Abstract H53K-06, presented at 2010 Fall Meeting, AGU, Dec. 13-17, San Francisco, CA.
- Edstrom, A., J. Boll, E.S. Brooks, and J. Abatzoglou. 2010. Identifying hydrologically sensitive watersheds in the Pacific Northwest, USA under future climates. Abstract H33C-1146 presented at 2010 Fall Meeting, AGU, Dec. 13-17, San Francisco, CA.
- Saia, S., T.S. Steenhuis, Z.M. Easton, J. Boll, and E.S. Brooks. 2010. Modeling the impact of landscape variability on nutrient and pesticide dynamics in CEAP watersheds. H33A-1118 presented at 2010 Fall Meeting, AGU, Dec. 13-17, San Francisco, CA.
- Sanchez-Murillo, R., E.S. Brooks, and J. Boll. 2010. Quantifying the net impacts of the Troy wastewater treatment plant on Steelhead habitat in the West Fork Little Bear drainage. Abstract H41C-1115 presented at 2010 Fall Meeting, AGU, Dec. 13-17, San Francisco, CA.
- J Boll, J W Machala, E Brooks, A Edstrom. 2009. Localized Climate Change Scenarios Using a Downscaling Methodology with a Distributed Hydrology Model Eos Trans. AGU, 90(52), Fall Meet. Suppl. (Poster)
- R Toohey, J Boll, E Brooks, J Jones 2009. Upscaling Empirically Based Conceptualisations to Model Tropical Dominant Hydrological Processes for Historical Land Use Change Eos Trans. AGU, 90(52), Fall Meet. Suppl. (Oral Presentation)
- R Sanchez-Murillo, J Boll, E Brooks 2009. Hydrologic characterization using event based d18O, Si, and hydrometric measurements. Eos Trans. AGU, 90(52), Fall Meet. Suppl. (Poster)
- Jan Boll, Erin Brooks, Kzryzstof Ostrowski, Brian Crabtree, Jeremy Newson, JD Wulfhorst, Larry Van Tassell, Naga Tosakana, and Robert Mahler 2008. CEAP: Cumulative Effects Modeling and Interdisciplinary Analyses. USDA-CSREES National Water Conference Feb 6, 2008, Reno, NV (Presentation)
- Boll, J. and E.S. Brooks. 2008. Evaluation of conservation practices effectiveness at the watershed scale using field data collection and GIS-based modeling of sediment transport. Presented at the Idaho Division of Environmental Quality, Annual All Surface Water Meeting, Oct 14-16, 2008, McCall, Idaho.
- Boll, J., E.S. Brooks, and S. Neeley. 2008. Regional Classification for the Identification of Dominant Hydrologic Flow Paths and Critical Management Zones. AGU Fall Meeting Dec. 15-19, San Francisco. (Presentation)
- Snyder, A., K.M. Ostrowski, J. Boll, and E.S. Brooks. 2008. Particle Size Influence on the Relationship Between Turbidity and Suspended Sediment Concentration. AGU Fall Meeting Dec. 15-19, San Francisco. (Poster)
- Brooks, E.S., K.M. Ostrowski, J. Boll, and A. Snyder. 2008. Particle Size Influence on the Relationship Between Turbidity and Suspended Sediment Concentration. CUAHSI Biennial Colloquium on Hydrologic Science and Engineering July, 14.-16, 2008, Boulder, Colorado, USA

- J. Boll, E.S. Brooks, S. Dun, B. Crabtree, J. Wu, and W.J. Elliot. Incorporation of variable source area processes in the Water Erosion Prediction Project (WEPP). Water Resources Seminar Series, Feb 7, 2007.
- Wulfhorst, J.D., J. Boll, L.W. Van Tassell, B. Mahler, E. Brooks, S. Kane, and N. Tosakana. 2007. "Agricultural conservation and the Act of Stewardship." Presentation at the International Symposium for Society and Resource Management. Park City, UT, June 17-21.
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