

50 CFR 402.02. 2007. Status of the Species. National Marine Fisheries Service, 815-817 pp.

50 CFR 402.14. 1986. Formal Consultation. US Fish and Wildlife Service, 880-898 pp.

50 CFR 600. 2011. National Oceanic and Atmospheric Administration, 50 CFR Part 600 [Docket No. 961030300-7238-04; Id 120996a]. N. M. F. Service, 5-198 pp.

54 FR 32085. 1989. Endangered and Threatened Species; Critical Habitat; Winter-Run Chinook Salmon. National Marine Fisheries Service, 32085-32088 pp.

55 FR 24296. 1990. Endangered and Threatened Species: Listing and Recovery Priority Guidelines. National Marine Fisheries Service, 24296-24298 pp.

55 FR 46515. 1990. Endangered and Threatened Species; Sacramento River Winter-Run Chinook Salmon. National Marine Fisheries Service, 46515-46523 pp.

56 FR 58612. 1991. Policy on Applying the Definition of Species under the Endangered Species Act to Pacific Salmon. National Marine Fisheries Service, 58612-58618 pp.

58 FR 33212. 1993. Designated Critical Habitat; Sacramento River Winter-Run Chinook Salmon. National Marine Fisheries Service, 33212-33219 pp.

58 FR 33212, 33214, and 33216-33217. 1993. Designated Critical Habitat: Sacramento River Winter-Run Chinook Salmon. National Marine Fisheries Service, 33212-33219 pp.

59 FR 440. 1994. Endangered and Threatened Species; Status of Sacramento River Winter-Run Chinook Salmon. National Marine Fisheries Service, 440-450 pp.

59 FR 440. 1994. Endangered and Threatened Species; Status of Sacramento River Winter-Run Chinook Salmon. National Marine Fisheries Service, 440-450 pp.

61 FR 4722. 1996. Policy Regarding the Recognition of Distinct Vertebrate Population Segments under the Endangered Species Act. Department of the Interior and Department of Commerce, 4722-4725 pp.

61 FR 41541. 1996. Endangered and Threatened Species: Proposed Endangered Status for Five ESUs of Steelhead and Proposed Threatened Status for Five ESUs of Steelhead in Washington, Oregon, Idaho, and California. National Marine Fisheries Service, 41541-41561 pp.

63 FR 13347. 1998. Endangered and Threatened Species: Threatened Status for Two ESUs of Steelhead in Washington, Oregon, and California. National Marine Fisheries Service, 13347-13371 pp.

64 FR 14308. 1999. Endangered and Threatened Species; Threatened Status for Three Chinook Salmon Evolutionarily Significant Units (ESUs) in Washington and Oregon, and Endangered Status for One Chinook Salmon ESU in Washington. National Marine Fisheries Service, 14308-14328 pp.

64 FR 24049. 1999. Designated Critical Habitat; Central California Coast and Southern Oregon/Northern California Coasts Coho Salmon. National Marine Fisheries Service, 24049-24062 pp.

64 FR 43255. 1999. Executive Order 13132 Federalism. The White House, 43255-43259 pp.

64 FR 50394. 1999. Endangered and Threatened Species; Threatened Status for Two Chinook Salmon Evolutionarily Significant Units (ESUs) in California. National Marine Fisheries Service, 50394-50415 pp.

- 65 FR 42422. 2000. Endangered and Threatened Species: Salmon and Steelhead; Final Rule. National Marine Fisheries Service, 42421-42481 pp.
- 65 FR 67249. 2000. Executive Order 13175 Consultation and Coordination with Indian Tribal Governments. The White House, 67249-67252 pp.
- 67 FR 1116. 2002. Endangered and Threatened Species; Final Rule Governing Take of Four Threatened Evolutionarily Significant Units (ESUs) of West Coast Salmonids. National Marine Fisheries Service, 1116-1133 pp.
- 68 FR 4433. 2003. Endangered and Threatened Wildlife and Plants; 12-Month Finding on a Petition to List North American Green Sturgeon as a Threatened or Endangered Species. National Marine Fisheries Service, 4433-4441 pp.
- 69 FR 33102. 2004. Endangered and Threatened Species: Proposed Listing Determinations for 27 ESUs of West Coast Salmonids. National Marine Fisheries Service, 33102-33179 pp.
- 69 FR 61348. 2004. Endangered and Threatened Species: Extension of Public Comment Period and Notice of Rescheduled Public Hearing on Proposed Listing Determinations for West Coast Salmonids. National Marine Fisheries Service, 61348-61349 pp.
- 70 FR 37160. 2005. Endangered and Threatened Species: Final Listing Determinations for 16 ESUs of West Coast Salmon, and Final 4(d) Protective Regulations for Threatened Salmonid ESUs. National Marine Fisheries Service, 37160-37204 pp.
- 70 FR 52488. 2005. Endangered and Threatened Species; Designation of Critical Habitat for Seven Evolutionarily Significant Units of Pacific Salmon and Steelhead in California. National Marine Fisheries Service, 52488-52627 pp.
- 70 FR 69903. 2005. Endangered and Threatened Wildlife and Plants: Endangered Status for Southern Resident Killer Whales. National Marine Fisheries Service, 69903-69912 pp.
- 71 FR 834. 2006. Endangered and Threatened Species: Final Listing Determinations for 10 Distinct Population Segments of West Coast Steelhead. National Marine Fisheries Service, 834-862 pp.
- 71 FR 17757. 2006. Endangered and Threatened Wildlife and Plants: Threatened Status for Southern Distinct Population Segment of North American Green Sturgeon. N. M. F. Service, 67 pp.
- 71 FR 69054. 2006. Endangered and Threatened Species; Designation of Critical Habitat for Southern Resident Killer Whale. National Marine Fisheries Service, 69054-69070 pp.
- 74 FR 52117. 2008. Federal Leadership in Environmental, Energy, and Economic Performance. 52117-52127 pp.
- 74 FR 52300. 2009. Final Rulemaking to Designate Critical Habitat for the Threatened Southern Distinct Population Segment of North American Green Sturgeon. N. M. F. Service, 52300-52351 pp.
- 75 FR 30714. 2010. Endangered and Threatened Wildlife and Plants: Final Rulemaking to Establish Take Prohibitions for the Threatened Southern Distinct Population Segment of North American Green Sturgeon. National Marine Fisheries Service, 30714-30730 pp.
- 76 FR 20870. 2011. Protective Regulations for Killer Whales in the Northwest Region under the Endangered Species Act and Marine Mammal Protection Act. National Marine Fisheries Service, 20870-20890 pp.

- 76 FR 50447. 2011. Endangered and Threatened Species. 5-Year Reviews for 5 Evolutionarily Significant Units of Pacific Salmon and 1 Distinct Population Segment of Steelhead in California. National Marine Fisheries Service, 50447-50448 pp.
- 76 FR 50448. 2011. Endangered and Threatened Species; 5-Year Reviews for 17 Evolutionarily Significant Units and Distinct Population Segments of Pacific Salmon and Steelhead. National Marine Fisheries Service, 50448-50449 pp.
- 76 FR 76386. 2011. Endangered and Threatened Species; 5-Year Reviews for 4 Distinct Population Segments of Steelhead in California. National Marine Fisheries Service, 76386 pp.
- 77 FR 23463. 2012. Endangered and Threatened Species; Take of Anadromous Fish. National Marine Fisheries Service, 23463-24364 pp.
- 78 FR 2893. 2013. Endangered and Threatened Species: Designation of a Nonessential Experimental Population for Middle Columbia River Steelhead above the Pelton Round Butte Hydroelectric Project in the Deschutes River Basin. National Marine Fisheries Service, 2893-2907 pp.
- 78 FR 79622. 2013. Endangered and Threatened Species: Designation of a Nonessential Experimental Population of Central Valley Spring-Run Chinook Salmon Below Friant Dam in the San Joaquin River, CA. National Marine Fisheries Service, 79622-79633 pp.
- 79 FR 20802. 2014. Endangered and Threatened Wildlife; Final Rule to Revise the Code of Federal Regulations for Species under the Jurisdiction of the National Marine Fisheries Service. National Marine Fisheries Service, 20802-20817 pp.
- 79 FR 40004. 2014. Endangered and Threatened Species: Designation of a Nonessential Experimental Population of Upper Columbia River Spring-Run Chinook Salmon in the Okanogan River. National Marine Fisheries Service, 40004-40016 pp.
- 79 FR 42504. 2014. Endangered and Threatened Species; Recovery Plans. National Marine Fisheries Service, 42504-42505 pp.
- 80 FR 15871. 2015. Planning for Federal Sustainability in the Next Decade. 15871-15884 pp.
- 80 FR 26832. 2015. Interagency Cooperation—Endangered Species Act of 1973, as Amended; Incidental Take Statements. Fish and Wildlife Service and National Marine Fisheries Service, 26832-26845 pp.
- 81 FR 7214 and 7216. 2016. Interagency Cooperation—Endangered Species Act of 1973, as Amended; Definition of Destruction or Adverse Modification of Critical Habitat. U.S. Fish and Wildlife Service and National Marine Fisheries Service, 7214-7226 pp.
- 81 FR 7414. 2016. Listing Endangered and Threatened Species and Designating Critical Habitat; Implementing Changes to the Regulations for Designating Critical Habitat; Final Rule. 7414-7440 pp.
- 81 FR 33416. 2016. Endangered and Threatened Species: Designation of Experimental Populations under the Endangered Species Act. National Marine Fisheries Service, 33416-33423 pp.
- 81 FR 33468. 2016. Endangered and Threatened Species; 5-Year Reviews for 28 Listed Species of Pacific Salmon, Steelhead, and Eulachon. National Marine Fisheries Service, 33468-33469 pp.
- 81 FR 72759. 2016. Revisions to Hatchery Programs Included as Part of Pacific Salmon and Steelhead Species Listed under the Endangered Species Act. National Marine Fisheries Service, 72759-72769 pp.

- 83 FR 4235. 2018. Louisiana; Amendment No. 3 to Notice of an Emergency Declaration, Indian Entities Recognized and Eligible to Receive Services from the United States Bureau of Indian Affairs. Department of Homeland Security and Department of the Interior, 7 pp.
- Aasen, G. A. 2008. Fish Predation in the Collection, Handling, Transport, and Release Phase of the State Water Project's John E. Skinner Delta Fish Protective Facility. Page 134.
- Abadia-Cardoso, A., E. C. Anderson, D. E. Pearse, and J. C. Garza. 2013. Large-Scale Parentage Analysis Reveals Reproductive Patterns and Heritability of Spawn Timing in a Hatchery Population of Steelhead (*Oncorhynchus mykiss*). *Molecular Ecology* 22(18):4733-4746.
- Abadia-Cardoso, A., A. J. Clemento, and J. C. Garza. 2011. Discovery and Characterization of Single-Nucleotide Polymorphisms in Steelhead/Rainbow Trout, *Oncorhynchus mykiss*. *Molecular Ecology* 11 Suppl 1:31-49.
- Abatzoglou, J. T. and T. J. Brown. 2012. A Comparison of Statistical Downscaling Methods Suited for Wildfire Applications. *International Journal of Climatology* 32(5):772-780.
- Abatzoglou, J. T., K. T. Redmond, and L. M. Edwards. 2009. Classification of Regional Climate Variability in the State of California. *Journal of Applied Meteorology and Climatology* 48(8):1527-1541.
- Abbe, T. B., A. P. Brooks, and D. R. Montgomery. 2003. Wood in River Rehabilitation and Management. *Ecology and Management of Wood in World Rivers* 37:367-389.
- Abbott, R. and J. A. Reyff. 2004. Fisheries and Hydroacoustic Monitoring Program Compliance Report. San Francisco - Oakland Bay Bridge East Span Seismic Safety Project.
- Aceituno, M. E. 1993. The Relationship between Instream Flow and Physical Habitat Availability for Chinook Salmon in the Stanislaus River, California. Sacramento, California.
- AD Consultants. 2014. SalSim: Salmon Simulator as Implemented for the San Joaquin River System. California Department of Fish and Wildlife.
- Adams, B. L., W. S. Zaugg, and L. R. Mclain. 1975. Inhibition of Salt-Water Survival and Na-K-ATPase Elevation in Steelhead Trout (*Salmo gairdneri*) by Moderate Water Temperatures. *Transactions of the American Fisheries Society* 104(4):766-769.
- Adams, N. S., D. W. Rondorf, S. D. Evans, J. E. Kelly, and R. W. Perry. 1998. Effects of Surgically and Gastrically Implanted Radio Transmitters on Swimming Performance and Predator Avoidance of Juvenile Chinook Salmon (*Oncorhynchus tshawytscha*). *Canadian Journal of Fisheries and Aquatic Sciences* 55(4):781-787.
- Adams, P. B., C. Grimes, J. E. Hightower, S. T. Lindley, M. L. Moser, and M. J. Parsley. 2007. Population Status of North American Green Sturgeon, *Acipenser medirostris*. *Environmental Biology of Fishes* 79(3-4):339-356.
- Adams, P. B., C. B. Grimes, J. E. Hightower, S. T. Lindley, and M. L. Moser. 2002. Status Review for North American Green Sturgeon, *Acipenser medirostris*. National Marine Fisheries Service, 58 pp.
- Addley, C. R., B. Bradford, and J. Ludlow. 2005. Klamath River Bioenergetics Report. Institute for Natural Systems Engineering, Logan, Utah.
- AECOM. 2015. Yuba Goldfields 200-Year Flood Protection Project Draft Environmental Impact Report, Prepared for the Three Rivers Levee Improvement Authority.
- Agness, A. 2011. Change in Southern Resident Killer Whale Population Growth Rates, Abundance & Viability. Department of Commerce, 18 pp.

- Agness, A. 2011. Chinook Needs of Southern Resident Killer Whales & Ratios of Chinook Available : Whale Needs. Department of Commerce, 20 pp.
- Agness, A. 2011. Overview to the Killer Whale Prey Analysis: NMFS Biological Opinions. Department of Commerce, 8 pp.
- Ahearn, D. S., R. W. Sheibley, R. A. Dahlgren, M. Anderson, J. Johnson, and K. W. Tate. 2005. Land Use and Land Cover Influence on Water Quality in the Last Free-Flowing River Draining the Western Sierra Nevada, California. *Journal of Hydrology* 313(3-4):234-247.
- Alabaster, J. S. and R. Lloyd. 1980. *Water Quality Criteria for Freshwater Fish*. Butterworths, London.
- Albertson, L. K., L. E. Koenig, B. L. Lewis, S. C. Zeug, L. R. Harrison, and B. J. Cardinale. 2013. How Does Restored Habitat for Chinook Salmon (*Oncorhynchus Tshawytscha*) in the Merced River in California Compare with Other Chinook Streams? *River Research and Applications* 29(4):469-482.
- Alderdice, D. F. and F. P. J. Velsen. 1978. Relation between Temperature and Incubation-Time for Eggs of Chinook Salmon (*Oncorhynchus-Tshawytscha*). *Journal of the Fisheries Research Board of Canada* 35(1):69-75.
- Allan, J. D., M. S. Wipfli, J. P. Caouette, A. Prussian, and J. Rodgers. 2003. Influence of Streamside Vegetation on Inputs of Terrestrial Invertebrates to Salmonid Food Webs. *Canadian Journal of Fisheries and Aquatic Sciences* 60(3):309-320.
- Allee, B. A. 1981. The Role of Interspecific Competition in the Distribution of Salmonids in Streams. Pages 111-122 *in* E. L. Brannon and E. O. Salo, editors. University of Washington Press, Seattle.
- Allen, K. O. and J. W. Hardy. 1980. Impacts of Navigational Dredging on Fish and Wildlife: A Literature Review. U.S. Department of the Interior, 1-100 pp.
- Allen, M. A. 2000. Seasonal Microhabitat Use by Juvenile Spring Chinook Salmon in the Yakima River Basin, Washington. *Rivers* 7(4):314-332.
- Allen, M. A. and T. J. Hassler. 1986. Species Profiles: Life Histories and Environmental Requirements of Coastal Fishes and Invertebrates (Pacific Southwest) Chinook Salmon. U.S. Fish and Wildlife Service and U.S. Army Corps of Engineers, U.S. Fish and Wildlife Service Biological Report 82(11.49), U.S. Army Corps of Engineers, TR EL-82-4, 36 pp.
- Allen, P. J. and J. J. Cech. 2007. Age/Size Effects on Juvenile Green Sturgeon, *Acipenser medirostris*, Oxygen Consumption, Growth, and Osmoregulation in Saline Environments. *Environmental Biology of Fishes* 79(3-4):211-229.
- Allen, P. J., J. J. Cech, Jr., and D. Kultz. 2009. Mechanisms of Seawater Acclimation in a Primitive, Anadromous Fish, the Green Sturgeon. *J Comp Physiol B* 179(7):903-920.
- Allen, P. J., J. A. Hobbs, J. J. Cech, J. P. Van Eenennaam, and S. I. Doroshov. 2009. Using Trace Elements in Pectoral Fin Rays to Assess Life History Movements in Sturgeon: Estimating Age at Initial Seawater Entry in Klamath River Green Sturgeon. *Transactions of the American Fisheries Society* 138(2):240-250.
- Allen, P. J., B. Hodge, I. Werner, and J. J. Cech. 2006. Effects of Ontogeny, Season, and Temperature on the Swimming Performance of Juvenile Green Sturgeon (*Acipenser medirostris*). *Canadian Journal of Fisheries and Aquatic Sciences* 63(6):1360-1369.

- Allen, P. J., M. McEnroe, T. Forostyan, S. Cole, M. M. Nicholl, B. Hodge, and J. J. Cech, Jr. 2011. Ontogeny of Salinity Tolerance and Evidence for Seawater-Entry Preparation in Juvenile Green Sturgeon, *Acipenser medirostris*. *J Comp Physiol B* 181(8):1045-1062.
- Allen, P. J., M. Nicholl, S. Cole, A. Vlazny, and J. J. Cech. 2006. Growth of Larval to Juvenile Green Sturgeon in Elevated Temperature Regimes. *Transactions of the American Fisheries Society* 135(1):89-96.
- Allendorf, F. W., D. Bayles, D. L. Bottom, K. P. Currens, C. A. Frissell, D. Hankin, J. A. Lichatowich, W. Nehlsen, P. C. Trotter, and T. H. Williams. 1997. Prioritizing Pacific Salmon Stocks for Conservation. *Conservation Biology* 11(1):140-152.
- Alpers, C. N., M. P. Hunerlach, J. T. May, and R. L. Hothem. 2005. Mercury Contamination from Historical Gold Mining in California. *US Geological Survey*:7.
- Alpine, A. E. and J. E. Cloern. 1992. Trophic Interactions and Direct Physical Effects Control Phytoplankton Biomass and Production in an Estuary. *Limnology and Oceanography* 37(5):946-955.
- Amado, A. A. 2012. Development and Application of a Mechanistic Model to Predict Juvenile Salmon Swim Paths. Iowa, Iowa City, Iowa.
- Amoser, S. and F. Ladich. 2003. Diversity in Noise-Induced Temporary Hearing Loss in Otophysine Fishes. *J Acoust Soc Am* 113(4 Pt 1):2170-2179.
- Anadromous Fish Restoration Program. 2007. Anadromous Fish Restoration Program Objectives Website. www.delta.dfg.ca.gov/AFRP/planningdocs.asp.
- Anadromous Fish Restoration Program Core Group. 1995. Working Paper on Restoration Needs: Habitat Restoration Actions to Double Natural Production of Anadromous Fish in the Central Valley of California. Stockton, California.
- Anchor QEA, L. 2017. Conceptual Engineering Plans for Fish Passage at La Grange and Don Pedro Dams on the Tuolumne River. 133 pp.
- Andelman, S. J. and W. F. Fagan. 2000. Umbrellas and Flagships: Efficient Conservation Surrogates or Expensive Mistakes? *Proc Natl Acad Sci U S A* 97(11):5954-5959.
- Anderson, E. C., T. C. Ng, E. D. Crandall, and J. C. Garza. 2017. Genetic and Individual Assignment of Tetraploid Green Sturgeon with SNP Assay Data. *Conservation Genetics* 18(5):1119-1130.
- Anderson, J. H., P. L. Faulds, W. I. Atlas, and T. P. Quinn. 2013. Reproductive Success of Captively Bred and Naturally Spawmed Chinook Salmon Colonizing Newly Accessible Habitat. *Evol Appl* 6(2):165-179.
- Anderson, J. H., G. R. Pess, R. W. Carmichael, M. J. Ford, T. D. Cooney, C. M. Baldwin, and M. M. McClure. 2014. Planning Pacific Salmon and Steelhead Reintroductions Aimed at Long-Term Viability and Recovery. *North American Journal of Fisheries Management* 34(1):72-93.
- Anderson, J. J. 2000. A Vitality-Based Model Relating Stressors and Environmental Properties to Organism Survival. *Ecological Monographs* 70(3):445-470.
- Anderson, J. J. 2002. The Flow Survival Relationship and Flow Augmentation Policy in the Columbia River Basin. University of Washington, Seattle, Washington.

- Anderson, J. J., F. Chung, M. Anderson, L. Brekke, D. Easton, M. Ejeta, R. Peterson, and R. Snyder. 2007. Progress on Incorporating Climate Change into Management of California's Water Resources. *Climatic Change* 87(S1):91-108.
- Anderson, J. J., M. Deas, P. B. Duffy, D. L. Erickson, R. Reisenbichler, K. A. Rose, and P. E. Smith. 2009. Independent Review of a Draft Version of the 2009 NMFS OCAP Biological Opinion.
- Anderson, J. J., J. A. Gore, R. T. Kneib, M. S. Lorang, J. M. Nestler, and J. Van Sickle. 2013. Report of the 2013 Independent Review Panel (IRP) on the Long-Term Operations Biological Opinions (LOBO) Annual Review.
- Anderson, J. J., E. Gurarie, and R. W. Zabel. 2005. Mean Free-Path Length Theory of Predator–Prey Interactions: Application to Juvenile Salmon Migration. *Ecological Modelling* 186(2):196-211.
- Anderson, J. J. and C. Van Holmes. 2003. An Analysis of Smolt Survival with Implications to Flow Management. Page 52.
- Anderson, J. T., C. B. Watry, and A. Gray. 2007. Upstream Fish Passage at a Resistance Board Weir Using Infrared and Digital Technology in the Lower Stanislaus River, California: 2006–2007 Annual Data Report. U.S. Fish and Wildlife Service.
- Anderson, L. 2011. Spongeplant: A New Aquatic Weed Threat in Delta. Page 20 *Cal-IPC News: Quarterly Newsletter of the California Invasive Plant Council*. California Invasive Plant Council, Berkeley, CA.
- Anderson, M., G. Giannico, and S. Jacobs. 2011. Seasonal Migrations of Adult and Sub-Adult Redband Trout in a High Desert Basin of Eastern Oregon, USA. *Ecology of Freshwater Fish* 20(3):409-420.
- Anderson, N. H. and J. R. Sedell. 1979. Detritus Processing by Macroinvertebrates in Stream Ecosystems. *Annual Review of Entomology* 24(1):351-377.
- Anderson, N. H., J. R. Sedell, L. M. Roberts, and F. J. Triska. 1978. The Role of Aquatic Invertebrates in Processing of Wood Debris in Coniferous Forest Streams. Pages 64-82 *in* University of Notre Dame Press, editor.
- Anderson, T. D. and M. J. Lydy. 2002. Increased Toxicity to Invertebrates Associated with a Mixture of Atrazine and Organophosphate Insecticides. *Environmental Toxicology and Chemistry* 21(7):1507-1514.
- Andre, M., M. Sole, M. Lenoir, M. Durfort, C. Quero, A. Mas, A. Lombarte, M. van der Schaar, M. Lopez-Bejar, M. Morell, S. Zaugg, and L. Houegnigan. 2011. Low-Frequency Sounds Induce Acoustic Trauma in Cephalopods. *Frontiers in Ecology and the Environment* 9(9):489-493.
- Angilletta, M. J., E. Ashley Steel, K. K. Bartz, J. G. Kingsolver, M. D. Scheuerell, B. R. Beckman, and L. G. Crozier. 2008. Big Dams and Salmon Evolution: Changes in Thermal Regimes and Their Potential Evolutionary Consequences. *Evol Appl* 1(2):286-299.
- Annear, T. C., W. Hubert, D. Simpkins, and L. Hebdon. 2002. Behavioural and Physiological Response of Trout to Winter Habitat in Tailwaters in Wyoming, USA. *Hydrological Processes* 16(4):915-925.
- Apperson, K. A. and P. J. Anders. 1991. Kootenai River White Sturgeon Investigations and Experimental Culture. Report Prepared for the U.S. Department of Energy, Bonneville Power Administration, Division of Fish and Wildlife. Project No. 88-65. Contract No. DE-AI79-88BP93497, 73 pp.
- Araki, H. 2015. Rapid Adaptation to a New Environment: Is It Reversible? *SEAFDEC Aquaculture Department*:19-24.
- Araki, H., B. Cooper, and M. S. Blouin. 2009. Carry-over Effect of Captive Breeding Reduces Reproductive Fitness of Wild-Born Descendants in the Wild. *Biol Lett* 5(5):621-624.

- Arctic Climate Impact Assessment (ACIA). 2004. Impacts of a Warming Arctic. Cambridge University Press.
- Ardren, W. R. and A. R. Kapuscinski. 2003. Demographic and Genetic Estimates of Effective Population Size (Ne) Reveals Genetic Compensation in Steelhead Trout. *Mol Ecol* 12(1):35-49.
- Arendt, K., T. Kleisborg, and B. Pyper. 2006. Detailed Study Plan for Coded Wire Tagging of Chinook Salmon in the Stanislaus River. Gresham, Oregon.
- Arkoosh, M. R., E. Casillas, E. Clemons, A. N. Kagley, R. Olson, P. Reno, and J. E. Stein. 1998. Effect of Pollution on Fish Diseases: Potential Impacts on Salmonid Populations. *Journal of Aquatic Animal Health* 10(2):182-190.
- Arkoosh, M. R., E. Clemons, M. Myers, and E. Casillas. 1994. Suppression of B-Cell Mediated Immunity in Juvenile Chinook Salmon (*Oncorhynchus tshawytscha*) after Exposure to Either a Polycyclic Aromatic Hydrocarbon or to Polychlorinated Biphenyls. *Immunopharmacol Immunotoxicol* 16(2):293-314.
- Arkoosh, M. R. and T. K. Collier. 2002. Ecological Risk Assessment Paradigm for Salmon: Analyzing Immune Function to Evaluate Risk. *Human and Ecological Risk Assessment* 8(2):265-276.
- Arkush, K. D. and P. A. Siri. 2001. Exploring the Role of Captive Broodstock Programs in Salmon Restoration. *Fish Bulletin* 179(2):319-330.
- Armentrout, S., H. Brown, S. Chappell, M. E. Brown, J. Fites, J. Forbes, M. McFarland, J. Riley, K. Roby, A. Villalovos, R. Walden, D. Watts, and M. R. Williams. 1998. Watershed Analysis for Mill, Deer, Antelope Creeks - Almanor District, Lassen National Forest. U.S. Forest Service, 299 pp.
- Arsenault, H. H. and M. Denis. 1981. Integral Expression for Transforming Signal-Dependent Noise into Signal-Independent Noise. *Optics Letters* 6(5):210-212.
- Arsenault, H. H., C. Gendron, and M. Denis. 1981. Transformation of Film-Grain Noise into Signal-Independent Additive Gaussian-Noise. *Journal of the Optical Society of America* 71(1):91-94.
- Arteaga, F., D. B. Koch, J. C. Pedri, E. Pert, and D. Welsh. 2007. Final Report on the Recovery of the Upper Sacramento - Subsequent to the 1991 Cantara Spill.
- Arthaud, D. L., C. M. Greene, K. Guilbault, and J. V. Morrow. 2010. Contrasting Life-Cycle Impacts of Stream Flow on Two Chinook Salmon Populations. *Hydrobiologia* 655(1):171-188.
- Arthur, J. F., M. D. Ball, and S. Y. Baughman. 1996. San Francisco Bay: The Ecosystem: Further Investigations into the National History of San Francisco Bay and Delta with Reference to the Influence of Man, Summary of Federal and State Water Project Environmental Impacts in the San Francisco Bay-Delta Estuary, California Page 27 in R. T. C. James T. Hollibaugh, San Francisco State University,, editor.
- Ashley, R. P. and J. J. Rytuba. 2008. Mercury Geochemistry of Gold Placer Tailings, Sediments, Bedrock, and Waters in the Lower Clear Creek Area, Shasta County, California-Report of Investigations, 2001-2003. U.S. Geological Survey Open-file Report 2008-1122.
- Ashley, R. P., J. J. Rytuba, R. Rogers, B. B. Kotlyar, and D. Lawler. 2002. Preliminary Report on Mercury Geochemistry of Placer Gold Dredge Tailings, Sediments, Bedrock, and Waters in the Clear Creek Restoration Area, Shasta County, California.
- Atcheson, M. E., K. W. Myers, D. A. Beauchamp, and N. J. Mantua. 2012. Bioenergetic Response by Steelhead to Variation in Diet, Thermal Habitat, and Climate in the North Pacific Ocean. *Transactions of the American Fisheries Society* 141(4):1081-1096.

- Atcheson, M. E., K. W. Myers, N. D. Davis, and N. J. Mantua. 2012. Potential Trophodynamic and Environmental Drivers of Steelhead (*Oncorhynchus mykiss*) Productivity in the North Pacific Ocean. *Fisheries Oceanography* 21(5):321-335.
- Ayaz, A., V. Ünal, D. Acarli, and U. Altinagac. 2010. Fishing Gear Losses in the Gökova Special Environmental Protection Area (SEPA), Eastern Mediterranean, Turkey. *Journal of Applied Ichthyology* 26(3):416-419.
- Ayllon, F., P. Davaine, E. Beall, and E. Garcia-Vazquez. 2006. Dispersal and Rapid Evolution in Brown Trout Colonizing Virgin Subantarctic Ecosystems. *J Evol Biol* 19(4):1352-1358.
- Ayres Associates. 2001. Two-Dimensional Modeling and Analysis of Spawning Bed Mobilization, Lower American River. Sacramento, CA.
- Ayres, W. O. 1854. Descriptions of Three New Species of Sturgeon San Francisco. *Proceedings of the California Academy of Natural Sciences* 1:14-15.
- Bacey, J., F. Spurlock, K. Starner, H. Feng, J. Hsu, J. White, and D. M. Tran. 2005. Residues and Toxicity of Esfenvalerate and Permethrin in Water and Sediment, in Tributaries of the Sacramento and San Joaquin Rivers, California, USA. *Bull Environ Contam Toxicol* 74(5):864-871.
- Bacher, D. 2010. Salmon Spawning in American River above Folsom Lake. Page 5.
- Bacher, D. 2013. Both Kings and Kokanee Successfully Spawn. *The Fish Sniffer* 32(14):2.
- Bailey, E. D. 1954. Time Pattern of 1953-54 Migration of Salmon and Steelhead into the Upper Sacramento River. California Department of Fish and Game, 4 pp.
- Bailey, H. C., C. Alexander, C. Digiorgio, M. Miller, S. I. Doroshov, and D. E. Hinton. 1994. The Effect of Agricultural Discharge on Striped Bass (*Morone saxatilis*) in California's Sacramento-San Joaquin Drainage. *Ecotoxicology* 3(2):123-142.
- Bailey, R. 2003. Streams of Western Placer County: Aquatic Habitat and Biological Resources, Literature Review. Sierra Business Council.
- Bain, D. 1990. Examining the Validity of Inferences Drawn from Photo-Identification Data, with Special Reference to Studies of the Killer Whale (*Orcinus orca*) in British Columbia. Report of the International Whaling Commission, Special(12):93-100.
- Bain, D. E. and M. E. Dahlheim. 1994. Effects of Masking Noise on Detection Thresholds of Killer Whales *in*.
- Bain, D. E., R. Williams, J. Smith, and D. Lusseau. 2006. Effects of Vessels on Behavior of Southern Resident Killer Whales (*Orcinus Spp.*) 2003-2005.
- Bain, M. B. and N. J. Stevenson. 1999. Aquatic Habitat Assessment, Common Methods. Page 371. American Fisheries Society, Bethesda.
- Bain, M. B. and N. J. Stevenson. 1999. Aquatic Habitat Assessment: Common Methods. American Fisheries Society, Bethesda, Maryland.
- Bair, J., J. Souza, and T. Griggs. 1999. New Design Approaches for Floodplain Restoration and Riparian Revegetation on Clear Creek, California. Pages 290-301 *in*.
- Baird, R. W. 2000. The Killer Whale, Foraging Specializations and Group Hunting. Pages 127-153 *in*.

- Baker, D. W., B. P. Bledsoe, C. M. Albano, and N. L. Poff. 2011. Downstream Effects of Diversion Dams on Sediment and Hydraulic Conditions of Rocky Mountain Streams. *River Research and Applications* 27(3):388-401.
- Baker, J. 2003. Captain's Table Resort and Marina Project Section 7 Biological Opinion. U.S. Department of Commerce, 41 pp.
- Baker, P. F., F. K. Ligon, and T. P. Speed. 1995. Estimating the Influence of Temperature on the Survival of Chinook Salmon Smolts (*Oncorhynchus tshawytscha*) Migrating through the Sacramento – San Joaquin River Delta of California. *Canadian Journal of Fisheries and Aquatic Sciences* 52(4):855-863.
- Baker, P. F. and J. E. Morhardt. 2001. Survival of Chinook Salmon Smolts in the Sacramento-San Joaquin Delta and Pacific Ocean. *Fish Bulletin* 2:163-182.
- Bakke, A. M., D. H. Tashjian, C. F. Wang, S. H. Lee, S. C. Bai, and S. S. Hung. 2010. Competition between Selenomethionine and Methionine Absorption in the Intestinal Tract of Green Sturgeon (*Acipenser medirostris*). *Aquatic Toxicology* 96(1):62-69.
- Bakke, A. M., D. H. Tashjian, C. F. Wang, S. H. Lee, S. C. Bai, and S. S. O. Hung. 2010. Competition between Selenomethionine and Methionine Absorption in the Intestinal Tract of Green Sturgeon (*Acipenser medirostris*). *Aquatic Toxicology* 96:62-69.
- Bakke, P. 2009. Physical Science and Climate Change: A Guide for Biologists (and Others). Rocky Mountain Research Station Stream Notes(April 2009):8.
- Bakun, A. 1990. Global Climate Change and Intensification of Coastal Ocean Upwelling. *Science* 247(4939):198-201.
- Balazik, M. T., K. J. Reine, A. J. Spells, C. A. Fredrickson, M. L. Fine, G. C. Garman, and S. P. McIninch. 2012. The Potential for Vessel Interactions with Adult Atlantic Sturgeon in the James River, Virginia. *North American Journal of Fisheries Management* 32(6):1062-1069.
- Balcomb, K. C. 2008. pers. comm. October 2, 2008.
- Baldwin, D. H., J. F. Sandahl, J. S. Labenia, and N. L. Scholz. 2003. Sublethal Effects of Copper on Coho Salmon: Impacts on Nonoverlapping Receptor Pathways in the Peripheral Olfactory Nervous System. *Environ Toxicol Chem* 22(10):2266-2274.
- Baldwin, D. H., J. A. Spromberg, T. K. Collier, and N. L. Scholz. 2009. A Fish of Many Scales: Extrapolating Sublethal Pesticide Exposures to the Productivity of Wild Salmon Populations. *Ecological Applications* 19(8):2004-2015.
- Ball, M. D. and J. F. Arthur. 1979. Planktonic Chlorophyll Dynamics in the Northern San Francisco Bay and Delta. Pages 265-286 *in*.
- Banks, M. A., M.J. Calavetta, S. Greene, V. Rashbrook, and D. Hedgecock. 1996. The Question of Run Identity for the Winter Run Take in 1996: Some Genetic Perspectives. *IEP Newsletter* 9(3):7-12.
- Banks, M. A., V. K. Rashbrook, M. J. Calavetta, C. A. Dean, and D. Hedgecock. 2000. Analysis of Microsatellite DNA Resolves Genetic Structure and Diversity of Chinook Salmon (*Oncorhynchus tshawytscha*) in California's Central Valley. *Canadian Journal of Fisheries and Aquatic Sciences* 57(5):915-927.
- Bark, R. C., B. Bridges, and M. D. Bowen. 2013. Predator Impacts on Salvage Rates of Juvenile Chinook Salmon and Delta Smelt. 1-20 pp.

- Barnett-Johnson, R., C. B. Grimes, C. F. Royer, and C. J. Donohoe. 2007. Identifying the Contribution of Wild and Hatchery Chinook Salmon (*Oncorhynchus tshawytscha*) to the Ocean Fishery Using Otolith Microstructure as Natural Tags. *Canadian Journal of Fisheries and Aquatic Sciences* 64(12):1683-1692.
- Barnett-Johnson, R., D. Massa, J. Bergman, T. Johnson, and G. E. Whitman. 2010. Contribution of Hatchery and Natural Origin Chinook Salmon on the Lower Yuba River. Page 27.
- Barnhart, R. A. 1986. Species Profiles: Life Histories and Environmental Requirements of Coastal Fishes and Invertebrates (Pacific Southwest) -- Steelhead. U.S. Fish and Wildlife Service and U.S. Army Corps of Engineers, U.S. Fish Wildl. Serv. Biol. Rep. 82(11.60); U.S. Army Corps of Engineers, TR EL-82-4, 21 pp.
- Barnhart, R. A. and J. Parsons. 1986. Life Histories and Environmental Requirements of Coastal Fishes and Invertebrates. U.S. Department of the Interior and U.S. Army Corps of Engineers, 31 pp.
- Barre, L. 2008. Stock Identity of Chinook Salmon Taken by Southern Resident Killer Whales. Memorandum to the File.
- Barrows, C. 1980. Feeding Ecology of the Spotted Owl in California. *Raptor Research* 14(3):73-78.
- Barsugli, J. J., J. M. Vogel, L. Kaatz, J. B. Smith, M. Waage, and C. J. Anderson. 2012. Two Faces of Uncertainty: Climate Science and Water Utility Planning Methods. *Journal of Water Resources Planning and Management-Asce* 138(5):389-395.
- Bartholomew, J. 2008. *Ceratomyxa Shasta 2007 Study Summary*. Oregon State University,.
- Bartholomew, J. L., S. D. Atkinson, S. L. Hallett, C. M. Zielinski, and J. S. Foott. 2007. Distribution and Abundance of the Salmonid Parasite *Parvicapsula Minibicornis* (Myxozoa) in the Klamath River Basin (Oregon-California, U.S.A.). *Dis Aquat Organ* 78(2):137-146.
- Bartholow, J. M. 2000. *The Stream Segment and Stream Network Temperature Models: A Self-Study Course*. U.S. Department of the Interior, 282 pp.
- Bartholow, J. M. 2003. *Modeling Chinook Salmon with Salmod on the Sacramento River, California* U.S. Geological Survey, 24 pp.
- Bartholow, J. M. 2005. Recent Water Temperature Trends in the Lower Klamath River, California. *North American Journal of Fisheries Management* 25(1):152-162.
- Bash, J., C. Berman, and S. Bolton. 2001. *Effects of Turbidity and Suspended Solids on Salmonids* University of Washington Water Center
- Bates, D. W. and S. G. Jewett. 1961. Louver Efficiency in Deflecting Downstream Migrant Steelhead. *Transactions of the American Fisheries Society* 90(3):336-337.
- Bates, D. W., O. Logan, and E. A. Pesonen. 1960. *Efficiency Evaluation Tracy Fish Collecting Facility Central Valley Project California*. Department of the Interior, 166 pp.
- Bates, D. W. and R. Vinsonhaler. 1957. Use of Louvers for Guiding Fish. *Transactions of the American Fisheries Society* 86(1):38-57.
- Battin, J., M. W. Wiley, M. H. Ruckelshaus, R. N. Palmer, E. Korb, K. K. Bartz, and H. Imaki. 2007. Projected Impacts of Climate Change on Salmon Habitat Restoration. *Proc Natl Acad Sci U S A* 104(16):6720-6725.

- Baxter, R., R. Breuer, L. Brown, L. Conrad, F. Feyrer, S. Fong, K. Gehrts, L. Grimaldo, B. Herbold, P. Hrodey, A. Mueller-Solger, T. Sommer, and K. Souza. 2010. Interagency Ecological Program 2010 Pelagic Organism Decline Work Plan and Synthesis of Results. Interagency Ecological Program for the San Francisco Estuary.
- Beacham, T. D. and C. B. Murray. 1989. Variation in Developmental Biology of Sockeye Salmon (*Oncorhynchus nerka*) and Chinook Salmon (*O. tshawytscha*) in British Columbia. *Canadian Journal of Zoology* 67(9):2081-2089.
- Beachler, M. M. and D. F. Hill. 2003. Stirring up Trouble? Reassessing of Bottom Sediments by Recreational Watercraft. *Lake and Reservoir Management* 19(1):15-25.
- Beak Consultants Inc. 1989. Yuba River Fish Investigations 86-88-2, Part 2
- Beak Consultants Inc. 1989. Yuba River Fish Investigations 86-88-4, Part 4.
- Beakes, M. P., J. W. Moore, S. A. Hayes, and S. M. Sogard. 2014. Wildfire and the Effects of Shifting Stream Temperature on Salmonids. *Ecosphere* 5(5):1-14.
- Beakes, M. P., W. H. Satterthwaite, E. M. Collins, D. R. Swank, J. E. Merz, R. G. Titus, S. M. Sogard, and M. Mangel. 2010. Smolt Transformation in Two California Steelhead Populations: Effects of Temporal Variability in Growth. *Transactions of the American Fisheries Society* 139(5):1263-1275.
- Beamesderfer, R., M. Simpson, G. Kopp, J. Inman, A. Fuller, and D. Demko. 2004. Historical and Current Information on Green Sturgeon Occurrence in the Sacramento and San Joaquin Rivers and Tributaries. S.P. Cramer & Associates, Inc.
- Beamesderfer, R., M. Simpson, G. Kopp, J. Inman, A. Fuller, and D. Demko. 2004. Historical and Current Information on Green Sturgeon Occurrence in the Sacramento and San Joaquin Rivers and Tributaries. State Water Contractors and S. P. Cramer & Associates, Inc., Oakdale, California.
- Beamesderfer, R. C. P., M. L. Simpson, and G. J. Kopp. 2007. Use of Life History Information in a Population Model for Sacramento Green Sturgeon. *Environmental Biology of Fishes* 79(3-4):315-337.
- Beamesderfer, R. C. P., D. L. Ward, and A. A. Nigro. 1996. Evaluation of the Biological Basis for a Predator Control Program on Northern Squawfish (*Ptychocheilus Oregonensis*) in the Columbia and Snake Rivers. *Canadian Journal of Fisheries and Aquatic Sciences* 53(12):2898-2908.
- Beamish, R. J. and D. R. Bouillon. 1993. Pacific Salmon Production Trends in Relation to Climate. *Canadian Journal of Fisheries and Aquatic Sciences* 50(5):1002-1016.
- Beamish, R. J. and C. Mahnken. 2001. A Critical Size and Period Hypothesis to Explain Natural Regulation of Salmon Abundance and the Linkage to Climate and Climate Change. *Progress in Oceanography* 49(1-4):423-437.
- Beamish, R. J., C. Mahnken, and C. M. Neville. 1997. Hatchery and Wild Production of Pacific Salmon in Relation to Large-Scale, Natural Shifts in the Productivity of the Marine Environment. *ICES Journal of Marine Science* 54(6):1200-1215.
- Bear, E. A., T. E. McMahon, and A. V. Zale. 2011. Comparative Thermal Requirements of Westslope Cutthroat Trout and Rainbow Trout: Implications for Species Interactions and Development of Thermal Protection Standards. *Transactions of the American Fisheries Society* 136(4):1113-1121.
- Beccio, M. 2018. pers. comm. J. Heublein. June 25, 2018.
- Becker, C., R. Cuthbert, and A. Fuller. 2011. Fall/Winter Migration Monitoring at the Tuolumne River Weir. FISHBIO Environmental, LLC;20.

- Becker, C. D. and D. A. Neitzel. 1985. Tolerance of Eggs, Embryos, and Alevins of Chinook Salmon to Temperature Changes and Reduced Humidity in Dewatered Redds. *Transactions of the American Fisheries Society* 114(2):267-273.
- Becker, C. D., D. A. Neitzel, and C. S. Abernethy. 1983. Effects of Dewatering on Chinook Salmon Redds: Tolerance of Four Development Phases to One-Time Dewatering. *North American Journal of Fisheries Management* 3(4):373-382.
- Becker, C. D., D. A. Neitzel, and D. H. Fickeisen. 1982. Effects of Dewatering on Chinook Salmon Redds: Tolerance of Four Developmental Phases to Daily Dewaterings. *Transactions of the American Fisheries Society* 111(5):624-637.
- Beckman, B. R., B. Gadberry, P. Parkins, K. A. Cooper, and K. D. Arkush. 2007. State-Dependent Life History Plasticity in Sacramento River Winter-Run Chinook Salmon (*Oncorhynchus tshawytscha*): Interactions among Photoperiod and Growth Modulate Smolting and Early Male Maturation. *Canadian Journal of Fisheries and Aquatic Sciences* 64(2):256-271.
- Bednarek, A. T., A. B. Cooper, K. A. Cresswell, M. Mangel, W. H. Satterthwaite, C. A. Simpfendorfer, and J. R. Wiedenmann. 2011. The Certainty of Uncertainty in Marine Conservation and What to Do About It. *Bulletin of Marine Science* 87(2):177-195.
- Beechie, T., E. Buhle, M. Ruckelshaus, A. Fullerton, and L. Holsinger. 2006. Hydrologic Regime and the Conservation of Salmon Life History Diversity. *Biological Conservation* 130:560-572.
- Beechie, T., H. Imaki, J. Greene, A. Wade, H. Wu, G. Pess, P. Roni, J. Kimball, J. Stanford, P. Kiffney, and N. Mantua. 2012. Restoring Salmon Habitat for a Changing Climate. *River Research and Applications* 29(8):939-960.
- Beeman, J. W., H. Hansel, S. Juhnke, and G. Stutzer. 2009. Summary of Migration and Survival Data from Radiotagged Juvenile Coho Salmon in the Trinity River, Northern California, 2008.
- Beeman, J. W., B. Hayes, and K. Wright. 2012. Detection Probability of an in-Stream Passive Integrated Transponder (Pit) Tag Detection System for Juvenile Salmonids in the Klamath River, Northern California, 2011.
- Beer, N. W. 1999. Application of the Out-Migrant Survival Simulator Using the Swarm Modeling Environment to Study Smolt-Predator Interactions. Page 14.
- Beer, W. N. and J. J. Anderson. 2000. Application of the Out-Migrant Survival Simulator (Omss) Using the Swarm Modeling Environment to Study Smolt-Predator Interactions. Pages 1-18.
- Behnke, R. J. 1992. Native Trout of Western North America. Page 6 *in*. American Fisheries Society, Bethesda, Maryland.
- Behnke, R. J. 1992. Native Trout of Western North America. American Fisheries Society Monograph 6 *in*. American Fisheries Society.
- Behnke, R. J. and J. R. Tomelleri. 2002. Trout and Salmon of North America *in*, Simon & Schuster.
- Behrenfeld, M. J., R. T. O'Malley, D. A. Siegel, C. R. McClain, J. L. Sarmiento, G. C. Feldman, A. J. Milligan, P. G. Falkowski, R. M. Letelier, and E. S. Boss. 2006. Climate-Driven Trends in Contemporary Ocean Productivity. *Nature* 444(7120):752-755.
- Bejder, L., A. Samuels, H. Whitehead, N. Gales, J. Mann, R. Connor, M. Heithaus, J. Watson-Capps, C. Flaherty, and M. Krutzen. 2006. Decline in Relative Abundance of Bottlenose Dolphins Exposed to Long-Term Disturbance. *Conserv Biol* 20(6):1791-1798.

- Bell, M. C. 1986. Fisheries Handbook of Engineering Requirements and Biological Criteria. U.S. Army Corps of Engineers, 320 pp.
- Bell, M. C. 1991. Fisheries Handbook of Engineering Requirements and Biological Criteria. U.S. Army Corps of Engineers, 353 pp.
- Bellinger, K. L., G. H. Thorgaard, and P. A. Carter. 2014. Domestication Is Associated with Reduced Burst Swimming Performance and Increased Body Size in Clonal Rainbow Trout Lines. *Aquaculture* 420:154-159.
- Bellinger, M. R., M. A. Banks, S. J. Bates, E. D. Crandall, J. C. Garza, G. Sylvia, and P. W. Lawson. 2015. Geo-Referenced, Abundance Calibrated Ocean Distribution of Chinook Salmon (*Oncorhynchus tshawytscha*) Stocks across the West Coast of North America. *PLoS ONE* 10(7):e0131276.
- Bellman, M. A., E. Heery, and J. Majewski. 2010. Observed and Estimated Total Bycatch of Green Sturgeon in the 2002-2009 U.S. West Coast Fisheries. National Marine Fisheries Service, 38 pp.
- Bellmore, J. R., C. V. Baxter, M. K., and P. J. Connolly. 2013. The Floodplain Food Web Mosaic: A Study of Its Importance to Salmon and Steelhead with Implications for Their Recovery. *Ecological Applications* 23:189-207.
- Belmecheri, S., F. Babst, E. R. Wahl, D. W. Stahle, and V. Trouet. 2015. Multi-Century Evaluation of Sierra Nevada Snowpack. *Nature Climate Change* 6(1):2-3.
- Bemis, G. 2006. Inventory of California Greenhouse Gas Emissions and Sinks: 1990 to 2004. California Energy Commission, CEC-600-2006-013-SF, 132 pp.
- Benjamin, J. R., P. J. Connolly, J. G. Romine, and R. Perry. 2013. Potential Effects of Changes in Temperature and Food Resources on Life History Trajectories of Juvenile *Oncorhynchus mykiss*. *Transactions of the American Fisheries Society* 142(1):208-220.
- Bennett, D. H. 2009. Effect of Sport-Fishing Regulations on Striped Bass Population and Predation in the Delta: Expert Report, Coalition for a Sustainable Delta et al. v. Koch, E.D. Cal. Case No. 08-397.
- Bennett, W. A. and M. P. B. 1996. Where Have All the Fishes Gone? Interactive Factors Producing Fish Declines in the Sacramento-San Joaquin Estuary. Pages 519-541 in *San Francisco Bay: The Ecosystem*, J. T. Hollibaugh, editor. American Association for the Advancement of Science, Washington, D.C.
- Bennett, W. A., D. J. Ostrach, and D. E. Hinton. 1995. Larval Striped Bass Condition in a Drought-Stricken Estuary: Evaluating Pelagic Food-Web Limitation. *Ecological Applications* 5(3):680-692.
- Benson, R. L., S. Turo, and B. W. McCovey. 2007. Migration and Movement Patterns of Green Sturgeon (*Acipenser medirostris*) in the Klamath and Trinity Rivers, California, USA. *Environmental Biology of Fishes* 79(3-4):269-279.
- Berg, L. and T. G. Northcote. 1985. Changes in Territorial, Gill-Flaring, and Feeding-Behavior in Juvenile Coho Salmon (*Oncorhynchus kisutch*) Following Short-Term Pulses of Suspended Sediment. *Canadian Journal of Fisheries and Aquatic Sciences* 42(8):1410-1417.
- Berg, L. and T. G. Northcote. 1985. Changes in Territorial, Gill-Flaring, and Feeding-Behavior in Juvenile Coho Salmon (*Oncorhynchus-Kisutch*) Following Short-Term Pulses of Suspended Sediment. *Canadian Journal of Fisheries and Aquatic Sciences* 42(8):1410-1417.
- Berg, N. H., A. Carlson, and D. Azuma. 1998. Function and Dynamics of Woody Debris in Stream Reaches in the Central Sierra Nevada, California. *Canadian Journal of Fisheries and Aquatic Sciences*(55):1807-1820.

- Bergen, K. 2010. Columbia Researchers Study Intersex Sturgeon in Missouri River.
https://www.columbiamissourian.com/news/local/columbia-researchers-study-intersex-sturgeon-in-missouri-river/article_578002ab-ca93-5723-9299-8f82cf1d6fae.html. 5/4/2018.
- Berggren, T. J. and M. J. Filardo. 1993. An Analysis of Variables Influencing the Migration of Juvenile Salmonids in the Columbia River Basin. *North American Journal of Fisheries Management* 13(1):48-63.
- Bergman, J., R. Nielson, and A. Low. 2012. Central Valley in-River Chinook Salmon Escapement Monitoring Plan. CDFW Fisheries Branch, Administrative Report Number: 2012-1. 236p.
- Bergman, P., J. Merz, and B. Rook. 2011. Memo: Green Sturgeon Observations at Daguerre Point Dam, Yuba River, CA. Cramer Fish Sciences, FWS Grant Number 813329G011.
- Berman, C. H. 1990. The Effect of Elevated Holding Temperatures on Adult Spring Chinook Salmon Reproductive Success. Master's Thesis. University of Washington.
- Berntssen, M. H., A. Aatland, and R. D. Handy. 2003. Chronic Dietary Mercury Exposure Causes Oxidative Stress, Brain Lesions, and Altered Behaviour in Atlantic Salmon (*Salmo salar*) Parr. *Aquat Toxicol* 65(1):55-72.
- Berris, S. N., G. W. Hess, and L. R. Bohman. 2001. River and Reservoir Operations Model, Truckee River Basin, California and Nevada, 1998. Water-Resources Investigations Report 01-4017, U.S. Geological Survey, Carson City, Nevada.
- Bigg, M. 1982. An Assessment of Killer Whale (*Orcinus orca*) Stocks off Vancouver Island, British Columbia. International Whaling Commission.
- Bigg, M. 1982. An Assessment of Killer Whale (*Orcinus orca*) Stocks off Vancouver Island, British Columbia. International Whaling Commission 32(65):655-666.
- Bigg, M., P. Olesiuk, G. Ellis, J. Ford, and K. Balcomb. 1990. Social Organization and Genealogy of Resident Killer Whales (*Orcinus orca*) in the Coastal Waters of British Columbia and Washington State. Report of the International Whaling Commission, Special (12):383-405.
- Bigler, B. S., D. W. Welch, and J. H. Helle. 1996. A Review of Size Trends among North Pacific Salmon (*Oncorhynchus* Spp). *Canadian Journal of Fisheries and Aquatic Sciences* 53(2):455-465.
- Bilby, R. E. 1984. Removal of Woody Debris May Affect Stream Channel Stability. *Journal of Forestry* 82(10):609-613.
- Bilby, R. E., T. Bennett, and P. Roni. 2002. Utilization of Nitrogen from Spawning Salmon by Juvenile Chinook Salmon and Steelhead in Two Tributaries of the Columbia River. Seattle, Washington.
- Bilby, R. E., P. A. Bisson, C. C. Coutant, D. Goodman, S. Hanna, N. Huntly, E. J. Loudenslager, L. McDonald, D. P. Philipp, and B. Riddell. 2005. Viability of ESUs Containing Multiple Types of Populations. Independent Scientific Advisory Board for the Northwest Power and Conservation Council, Columbia River Basin Indian Tribes, NOAA Fisheries.
- Bilby, R. E., B. R. Fransen, P. A. Bisson, and J. K. Walter. 1998. Response of Juvenile Coho Salmon (*Oncorhynchus kisutch*) and Steelhead (*Oncorhynchus mykiss*) to the Addition of Salmon Carcasses to Two Streams in Southwestern Washington, U.S.A. *Canadian Journal of Fisheries and Aquatic Sciences* 55:1909-1918.
- Bilby, R. E. and G. E. Likens. 1980. Importance of Organic Debris Dams in the Structure and Function of Stream Ecosystems. *Ecology* 61(5):1107-1113.

- Billard, R. and G. Lecointre. 2000. Biology and Conservation of Sturgeon and Paddlefish. *Reviews in Fish Biology and Fisheries* 10(4):355-392.
- Biological Review Team. 2005. Green Sturgeon (*Acipenser medirostris*) Status Review Update. National Marine Fisheries Service, 35 pp.
- Birstein, V. J. and W. E. Bemis. 1997. How Many Species Are There within the Genus *Acipenser*? *Environmental Biology of Fishes* 48:157-163.
- Bishop, M. J. 2004. A Posteriori Evaluation of Strategies of Management: The Effectiveness of No-Wash Zones in Minimizing the Impacts of Boat-Wash on Macrobenthic Infauna. *Environmental Management* 34(1):140-149.
- Bisson, P. A. and R. E. Bilby. 1982. Avoidance of Suspended Sediment by Juvenile Coho Salmon. *North American Journal of Fisheries Management* 2(4):371-374.
- Bisson, P. A., R. E. Bilby, M. D. Bryant, C. A. Dolloff, G. B. Grette, R. A. House, M. L. Murphy, K. V. Koski, and J. R. Desell. 1987. Large Woody Debris in Forested Streams in the Pacific Northwest: Past, Present, and Future. Pages 143-190 *in*.
- Bisson, P. A., K. Sullivan, and J. L. Nielsen. 1988. Channel Hydraulics, Habitat Use, and Body Form of Juvenile Coho Salmon, Steelhead, and Cutthroat Trout in Streams. *Transactions of the American Fisheries Society* 117(3):262-273.
- Bjornn, T. C. and D. W. Reiser. 1991. Habitat Requirements of Salmonids in Streams. *American Fisheries Society Special Publication* 19:83-138.
- Bjornn, T. C. and D. W. Reiser. 1991. Habitat Requirements of Salmonids in Streams. Pages 83-138 *in* *Influences of Forest and Rangeland Management on Salmonid Fishes and Their Habitats*, W. R. Meehan, editor. American Fisheries Society.
- Bjornn, T. C. and D. W. Reiser. 1991. Habitat Requirements of Salmonids in Streams in Streams. *American Fisheries Society* 19:83-138.
- Black, N., R. Ternullo, A. Schulman-Janiger, A. Hammers, and P. Stap. 2001. Occurrence, Behavior, and Photo-Identification of Killer Whales in Monterey Bay, California *in* 14th Biennial Conference on the Biology of Marine Mammals, Vancouver, British Columbia. Society for Marine Mammalogy, San Francisco, California.
- Blackwell, B. F. and F. Juanes. 1998. Predation on Atlantic Salmon Smolts by Striped Bass after Dam Passage. *North American Journal of Fisheries Management* 18(4):936-939.
- Blakeman, D. 2005. 2004 Tuolumne River Fall Chinook Salmon Spawning Escapement Survey. California Department of Fish and Game, 24 pp.
- Blakeman, D. 2006. 2005 Tuolumne River Fall Chinook Salmon Escapement Survey.
- Bo, T., S. Fenoglio, G. Malacarne, M. Pessino, and F. Sgariboldi. 2007. Effects of Clogging on Stream Macroinvertebrates: An Experimental Approach. *Limnologica* 37(2):186-192.
- Boeger, W. A., M. R. Pie, A. Ostrensky, and M. F. Cardoso. 2006. The Effect of Exposure to Seismic Prospecting on Coral Reef Fishes. *Brazilian Journal of Oceanography* 54(4):235-239.
- Boehlert, G. W. and A. B. Gill. 2010. Environmental and Ecological Effects of Ocean Renewable Energy Development Current Synthesis. *Oceanography* 23(2):68-81.

- Boehlert, G. W., G. R. McMurray, and C. E. Tortorici. 2008. Ecological Effects of Wave Energy Development in the Pacific Northwest, A Scientific Workshop. National Marine Fisheries Service, NOAA Technical Memorandum NMFS-F/SPO-92, 186 pp.
- Boles, G. L. 1988. Water Temperature Effects on Chinook Salmon (*Oncorhynchus tshawytscha*) with Emphasis on the Sacramento River: A Literature Review. Department of Water Resources, 1-48 pp.
- Boles, G. L. 1988. Water Temperature Effects on Chinook Salmon with Emphasis on the Sacramento River: A Literature Review. California Department of Water Resources, 48 pp.
- Bolnick, D. I., P. Amarasekare, M. S. Araujo, R. Burger, J. M. Levine, M. Novak, V. H. Rudolf, S. J. Schreiber, M. C. Urban, and D. A. Vasseur. 2011. Why Intraspecific Trait Variation Matters in Community Ecology. *Cell Press* 26(4):183-192.
- Bolster, B. C. 1986. Movement Patterns of Striped Bass (*Morone saxatilis*) in Clifton Court Forebay, Contra Costa County, California. California State University Sacramento.
- Bond, N. A., M. F. Cronin, H. Freeland, and N. Mantua. 2015. Causes and Impacts of the 2014 Warm Anomaly in the Ne Pacific. *Geophysical Research Letters* 42(9):3414-3420.
- Booth, D. B. and L. E. Reinelt. 1993. Consequences of Urbanization on Aquatic Systems-Measured Effects, Degradation Thresholds, and Corrective Strategies. Pages 545-550 *in* Proceedings of the Watershed '93 Conference.
- Borin, J. M., M. L. Moser, A. G. Hansen, D. A. Beauchamp, S. C. Corbett, B. R. Dumbauld, C. Pruitt, J. L. Ruesink, and C. Donoghue. 2017. Energetic Requirements of Green Sturgeon (*Acipenser medirostris*) Feeding on Burrowing Shrimp (*Neotrypaea californiensis*) in Estuaries: Importance of Temperature, Reproductive Investment, and Residence Time. *Environmental Biology of Fishes* 100(12):1561-1573.
- Bork, K. S. 2010. Hatchery and Genetics Management Plan California Department of Fish and Game, 167 pp.
- Borthwick, S. M. and R. R. Corwin. 2001. Wild Fish Entrainment by Archimedes Lifts and an Internal Helical Pump at the Red Bluff Research Pumping Plant, Upper Sacramento River, California, February 1997-May 2000. U.S. Bureau of Reclamation.
- Botsford, L. W. 2009. Evaluation of Expert Report by D.H. Bennett, "Effect of Sport-Fishing Regulations on Striped Bass Population and Predation in the Delta", Expert Report, Coalition for a Sustainable Delta et al. V. Koch, E.D. Cal. Case No. 08-397.
- Botsford, L. W. and J. G. Brittnacher. 1998. Viability of Sacramento River Winter-Run Chinook Salmon. *Conservation Biology* 12(1):65-79.
- Botsford, L. W. and C. A. Lawrence. 2002. Patterns of Co-Variability among California Current Chinook Salmon, Coho Salmon, Dungeness Crab, and Physical Oceanographic Conditions. *Progress in Oceanography* 53(2-4):283-305.
- Bottom, D. L., G. Anderson, A. Baptista, J. Burke, M. Burla, M. Bhuthimethee, L. Campbell, E. Casillas, S. A. Hinton, K. Jacobson, D. Jay, R. McNatt, P. Moran, G. C. Roegner, C. A. Simenstad, V. Stamatiou, D. Teel, and J. E. Zamon. 2008. Salmon Life Histories, Habitat, and Food Webs in the Columbia River Estuary: An Overview of Research Results, 2002-2006. National Marine Fisheries Service Northwest Fisheries Science Center, 1-52 pp.
- Bottom, D. L., K. K. Jones, T. J. Cornwell, A. Gray, and C. A. Simenstad. 2005. Patterns of Chinook Salmon Migration and Residency in the Salmon River Estuary (Oregon). *Estuarine Coastal and Shelf Science* 64(1):79-93.

- Bottom, D. L., K. K. Jones, C. A. Simenstad, C. A. Smith, and R. Cooper. 2011. Pathways to Resilience: Sustaining Salmon Ecosystems in a Changing World: Corvallis, OR, Oregon Sea Grant.
- Bottom, D. L., C. A. Simenstad, J. Burke, A. M. Baptista, D. A. Jay, K. K. Jone, E. Casillas, and M. H. Schiewe. 2005. Salmon at River's End: The Role of the Estuary in the Decline and Recovery of Columbia River Salmon. 281.
- Bottom, D. L., C. S. Simenstad, A. M. Baptista, D. A. Jay, J. Burke, K. K. Jones, E. Casillas, and M. H. Schiewe. 2001. Salmon at River's End: The Role of the Estuary in the Decline and Recovery of Columbia River Salmon. Pages 1-16.
- Boughton, D. A., S. John, C. J. Legleiter, R. Richardson, and L. R. Harrison. 2018. On the Capacity of Upper Tuolumne and Merced Rivers for Reintroduction of Steelhead and Spring-Run Chinook Salmon. Southwest Fisheries Science Center and National Marine Fisheries Service, 72 pp.
- Boughton, D. A. and A. S. Pike. 2013. Floodplain Rehabilitation as a Hedge against Hydroclimatic Uncertainty in a Migration Corridor of Threatened Steelhead. *Conservation Biology* 27(6):1158-1168.
- Bouley, P. and W. J. Kimmerer. 2006. Ecology of a Highly Abundant, Introduced Cyclopoid Copepod in a Temperate Estuary. *Marine Ecology Progress Series* 324:219-228.
- Bovee, K. D. 1978. Probability of Use Criteria for the Family Salmonidae. Cooperative Instream Flow Service Group, Instream Flow Information Paper: No. 4, 1-96 pp.
- Bowen, L., I. Werner, and M. L. Johnson. 2006. Physiological and Behavioral Effects of Zinc and Temperature on Coho Salmon (*Oncorhynchus kisutch*). *Springer* 559(1):161-168.
- Bowen, M. D. and R. Bark. 2012. 2010 Effectiveness of a Non-Physical Fish Barrier at the Divergence of the Old and San Joaquin Rivers (CA). U.S. Department of the Interior, 49 pp.
- Bowen, M. D., M. Gard, R. Hilldale, K. Zehfuss, and R. Sutton. 2012. Stanislaus River Discharge-Habitat Relationships for Rearing Salmonids. U.S. Bureau of Reclamation, 193 pp.
- Bowen, M. D., M. Gard, R. Hilldale, K. Zehfuss, and R. Sutton. 2012. Stanislaus River Discharge-Habitat Relationships for Rearing Salmonids. U.S. Bureau of Reclamation, Denver, Colorado.
- Bowen, M. D. and S. Hiebert. 2009. 2009 Effectiveness of a Non-Physical Fish Barrier at the Divergence of the Old and San Joaquin Rivers (CA). U.S. Bureau of Reclamation, Technical Memorandum 86-68290-11, 26 pp.
- Boydston, L. B. 2001. Ocean Salmon Fishery Management. *Fish Bulletin* 179 - Contributions to the Biology of Central Valley Salmonids 2.
- Boysen, K. A. and J. J. Hoover. 2009. Swimming Performance of Juvenile White Sturgeon (*Acipenser transmontanus*): Training and the Probability of Entrainment Due to Dredging. *Journal of Applied Ichthyology* 25:54-59.
- Bradford, M. J. 1995. Comparative Review of Pacific Salmon Survival Rates. *Canadian Journal of Fisheries and Aquatic Sciences* 52(6):1327-1338.
- Bradford, M. J. 1997. Partitioning Mortality in Pacific Salmon. Page 5.
- Bradford, M. J. and J. R. Irvine. 2000. Land Use, Fishing, Climate Change, and the Decline of Thompson River, British Columbia, Coho Salmon. *Canadian Journal of Fisheries and Aquatic Sciences* 57(1):13-16.
- Brandes, P., R. Burmester, and J. Speegle. 2006. Estimating Relative Abundance and Survival of Juvenile Chinook Salmon in the Sacramento-San Joaquin Estuary. *IEP Newsletter* 19(2):41-46.

- Brandes, P. L. 2011. Review of the IEP Delta Juvenile Fishes Monitoring Program and Delta Juvenile Salmonid Survival Studies. Page 8.
- Brandes, P. L. and J. S. McLain. 1998. Juvenile Chinook Salmon Abundance, Distribution, and Survival in the Sacramento-San Joaquin Estuary. *Fish Bulletin* 179(2):39-138.
- Brandes, P. L. and J. S. McLain. 2001. Juvenile Chinook Salmon Abundance, Distribution, and Survival in the Sacramento-San Joaquin Estuary. *Fish Bulletin* 179(2):39-138.
- Bratovich, P. 2017. pers. comm. G. Sprague and N. Alston. May 16, 2017.
- Bratovich, P., C. R. Addley, D. Simodynes, and H. Bowen. 2012. Water Temperature Considerations for Yuba River Basin Anadromous Salmonid Reintroduction Evaluations. *Yuba Salmon Forum*:58.
- Bratovich, P., G. W. Link, B. J. Ellrott, and J. A. Pinero. 2005. Impacts on Lower American River Salmonids and Recommendations Associated with Folsom Reservoir Operations to Meet Delta Water Quality Objectives and Demands (Draft Report). Surface Water Resources Inc., Sacramento, California.
- Braun, C. B. and T. Grande. 2008. Evolution of Peripheral Mechanisms for the Enhancement of Sound Reception. Pages 99-144 *in* *Fish Bioacoustics*, J. F. Webb, R. R. Fay, and A. N. Popper, editors. Springer.
- Brege, D. A., L. G. Gilbreath, R. F. Absolon, B. P. Sandford, and G. M. Matthews. 2005. Studies to Evaluate the Effectiveness of Extended-Length Screens at John Day Dam, 2004. National Marine Fisheries Service Northwest Fisheries Science Center, 1-45 pp.
- Brekke, L. D. 2011. Addressing Climate Change in Long-Term Water Resources Planning and Management User Needs for Improving Tools and Information. U.S. Bureau of Reclamation, 160 pp.
- Brekke, L. D., J. E. Kiang, J. R. Olsen, R. S. Pulwarty, D. A. Raff, D. P. Turnipseed, R. S. Webb, and K. D. White. 2009. Climate Change and Water Resources Management: A Federal Perspective. U.S. Department of the Interior and U.S. Geological Survey, 76 pp.
- Brekke, L. D., E. P. Maurer, J. D. Anderson, M. D. Dettinger, E. S. Townsley, A. Harrison, and T. Pruitt. 2009. Assessing Reservoir Operations Risk under Climate Change. *Water Resources Research* 45(4):16.
- Brekke, L. D., B. L. Thrasher, E. P. Maurer, and T. Pruitt. 2013. Downscaled Cmp3 and Cmp5 Climate Projections. 104 pp.
- Brett, J. R. 1952. Temperature Tolerance in Young Pacific Salmon, Genus *Oncorhynchus*. *Journal of the Fisheries Research Board of Canada* 9(6):265-323.
- Brett, J. R., W. C. Clarke, and J. E. Shelbourn. 1982. Experiments on Thermal Requirements for Growth and Food Conversion Efficiency. Department of Fisheries and Oceans Fisheries Research Branch, Canadian Technical Report of Fisheries and Aquatic Sciences No. 1127, 35 pp.
- Brock, W. 2016. pers. comm. J. Ambrose. November 7, 2016.
- Brooks, M. L., E. Fleishman, L. R. Brown, P. W. Lehman, I. Werner, N. Scholz, C. Mitchelmore, J. R. Lowvorn, M. L. Johnson, D. Schlenk, S. van Drunick, J. I. Drever, D. M. Stoms, A. E. Parker, and R. Dugdale. 2012. Life Histories, Salinity Zones, and Sublethal Contributions of Contaminants to Pelagic Fish Declines Illustrated with a Case Study of San Francisco Estuary, California, USA. *Estuaries and Coasts* 35(2):603-621.
- Brooks, M. L., E. Fleishman, L. R. Brown, P. W. Lehman, I. Werner, N. L. Scholz, C. L. Mitchelmore, J. R. Lowvorn, M. L. Johnson, D. Schlenk, S. van Drunick, J. I. Drever, D. M. Stoms, A. E. Parker, and R. Dugdale. 2011. Life Histories,

Salinity Zones, and Sublethal Contributions of Contaminants to Pelagic Fish Declines Illustrated with a Case Study of San Francisco Estuary, California, USA. *Estuaries and Coasts* 35:603-621.

- Brown, C. 1947. Reservoir Sedimentation in the Sacramento-San Joaquin Drainage Basins, California, Special Report 10.
- Brown, J. J. and G. W. Murphy. 2010. Atlantic Sturgeon Vessel-Strike Mortalities in the Delaware Estuary. *Fisheries* 35(2):72-83.
- Brown, K. 2007. Evidence of Spawning by Green Sturgeon, *Acipenser medirostris*, in the Upper Sacramento River, California. *Environmental Biology of Fishes* 79(3-4):297-303.
- Brown, L. R. 1999. Fish Communities and Their Associations with Environmental Variables, Lower San Joaquin River Drainage, California. *Environmental Biology of Fishes* 57:251-269.
- Brown, L. R. 2003. Will Tidal Wetland Restoration Enhance Populations of Native Fishes? *San Francisco Estuary and Watershed Science* 1(1):1-42.
- Brown, L. R. and M. L. Bauer. 2009. Effects of Hydrologic Infrastructure on Flow Regimes of California's Central Valley Rivers: Implications for Fish Populations. *River Research and Applications*:15.
- Brown, L. R., W. Kimmerer, and R. Brown. 2006. A Novel Way of Managing Water to Protect Fish: A Review of California's Environmental Water Account.
- Brown, L. R. and D. Michniuk. 2007. Littoral Fish Assemblages of the Alien-Dominated Sacramento - San Joaquin Delta, California, 1980-1983 and 2001-2003. *Estuaries and Coasts* 30(1):186-200.
- Brown, M. R. and J. M. Newton. 2002. Monitoring Adult Chinook Salmon, Rainbow Trout, and Steelhead in Battle Creek, California from March through October 2001. Red Bluff, California.
- Brown, R. 2003. Oroville Facilities Relicensing (FERC Project No. 2100) Sp-F9 Evaluation of Project Effects on Natural Salmonid Populations: Phase 1 Interim Literature Review. California Department of Water Resources.
- Brown, R., B. Cavallo, and K. Jones. 2004. Oroville FERC Relicensing (Project Number 2100) Draft Report Sp-F9 Evaluation of the Feather River Effects of Naturally Spawning Salmonids. California Department of Water Resources.
- Brown, R. and W. Kimmerer. 2004. A Summary of the October 2003 Battle Creek Workshop.
- Brown, R. D. and P. W. Mote. 2009. The Response of Northern Hemisphere Snow Cover to a Changing Climate. *Journal of Climate* 22(8):2124-2145.
- Brown, R. L., S. Greene, P. Coulston, and S. Barrow. 1993. An Evaluation of the Effectiveness of Fish Salvage Operations at the Intake to the California Aqueduct, 1979-1993. Pages 497-518 *in* San Francisco Bay: The Ecosystem -- Further Investigations into the Natural History of San Francisco Bay and Delta with Reference to the Influence of Man, J. T. Hollibaugh, editor. American Association for the Advancement of Science, Pacific Division, San Francisco, California.
- Brown, R. L. N., Frederic H. 2003. The 2003 CALFED Science Conference: A Summary of Key Points and Findings. California Bay-Delta Authority.
- Bryan, M., P. Bratovich, W. Mitchell, S. Grinnell, and Y.-H. Sun. 2000. Expert Testimony on Yuba River Fisheries Issues by Surface Water Resources, Inc., Jones & Stokes Associates, and Bookman-Edmonston Engineering, Inc., Aquatic and Engineering Specialists for Yuba County Water Agency.

- Bryant, M. D. 2009. Global Climate Change and Potential Effects on Pacific Salmonids in Freshwater Ecosystems of Southeast Alaska. *Climatic Change* 95(1-2):169-193.
- Bryant, M. D., R. T. Edwards, and R. D. Woodsmith. 2005. An Approach to Effectiveness Monitoring of Floodplain Channel Aquatic Habitat: Salmonid Relationships. *Elsevier Science Direct* (72):157-176.
- Buchanan, D. V., R. M. Hooton, and J. R. Moring. 1981. Northern Squawfish (*Ptychocheilus Oregonensis*) Predation on Juvenile Salmonids in Sections of the Willamette River Basin, Oregon. *Canadian Journal of Fisheries and Aquatic Sciences* 38(3):360-364.
- Buchanan, R. A., J. R. Skalski, and A. E. Giorgi. 2010. Evaluating Surrogacy of Hatchery Releases for the Performance of Wild Yearling Chinook Salmon from the Snake River Basin. *North American Journal of Fisheries Management* 30(5):1258-1269.
- Buehler, J., D. R. Oestman, J. Reyff, K. Pommerenck, and B. Mitchell. 2015. Technical Guidance for Assessment and Mitigation of the Hydroacoustic Effects of Pile Driving on Fish. California Department of Transportation, 532 pp.
- Buell, J. W. 1992. Fish Entrainment Monitoring of the Western-Pacific Dredge R W Lofgren During Operations Outside the Preferred Work Period. Buell & Associates, Inc.
- Bunn, S. E. and A. H. Arthington. 2002. Basic Principles and Ecological Consequences of Altered Flow Regimes for Aquatic Biodiversity. *Environ Manage* 30(4):492-507.
- Burau, J., A. Blake, and R. Perry. 2007. Sacramento/San Joaquin River Delta Regional Salmon Outmigration Study Plan: Developing Understanding for Management and Restoration.
- Bureau of Economic Analysis. 2017. Personal Income Table 1. Per Capita by County, 2014 - 2016.
- Bureau of Indian Affairs. 2016. Pacifica Region - Tribes Served. <https://www.bia.gov/WhoWeAre/RegionalOffices/Pacific/WeAre/Tribes/index.htm>. March 2016.
- Bureau of Labor Statistics. 2016. Quarterly Census of Employment and Wages. U.S. Department of Labor, 3 pp.
- Bureau of Reclamation. 2000. Reclamation Manual Directives and Standards. <http://www.usbr.gov/recman/cmp/cmp09-02-AppA.pdf>. 11/04/2013.
- Bureau of Reclamation. 2008. Biological Assessment on the Continued Long-Term Operations of the Central Valley Project and the State Water Project. Bureau of Reclamation, 64 pp.
- Bureau of Reclamation. 2013. Draft Environmental Impact Statement, Shasta Lake Water Resources Investigation Bureau of Reclamation, 222 pp.
- Bureau of Reclamation. 2014. Rulemaking Designation of Non-Essential Experimental Population of Winter-Run Chinook Salmon in the Sacramento River above Shasta Dame. Letter from Bureau of Reclamation to National Marine Fisheries Service, 1 pp.
- Bureau of Reclamation. 2014a. Letter from Susan M. Fry to Maria Rea Requesting "Rule-Making Designation of Non-Essential Experimental Population of Winter-Run Chinook Salmon in the Sacramento River above Shasta Dam Pursuant to Section 10(J) of the ESA.
- Bureau of Reclamation. 2014c. Habitat Assessment Final Report for the Shasta Dam Fish Passage Evaluation.

- Bureau of Reclamation. 2015a. Shasta Lake Water Resources Investigation Environmental Impact Statement. Bureau of Reclamation, 250 pp.
- Bureau of Reclamation. 2015b. Shasta Lake Water Resources Investigation.
- Bureau of Reclamation. 2017. Shasta Dam Fish Passage Evaluation Preliminary Draft. Bureau of Reclamation, 99 pp.
- Bureau of Reclamation and California Department of Water Resources. 2011. Draft San Joaquin River Restoration Program Environmental Impact Statement/Environmental Impact Report. SCH # 2007081125, 170 pp.
- Burgess, W. C. and S. B. Blackwell. 2003. Acoustic Monitoring of Barrier Wall Installation at the Former Rhone-Poulenc Site, Tukwila, Washington. RCI Environmental, Inc., Santa Barbara, California.
- Burgner, R. L., J.T. Light, L. Margolis, T. Okazaki, A. Tautz, and S. Ito. 1993. Distributions and Origins of Steelhead Trout (*Onchorhynchus mykiss*) in Offshore Waters of the North Pacific Ocean. International North Pacific Fisheries Commission Bulletin 51:1-92.
- Burgner, R. L., J. T. Light, L. Margolis, T. Okazaki, A. Tautz, and S. Ito. 1992. Distributions and Origins of Steelhead Trout (*Onchorhynchus mykiss*) in Offshore Waters of the North Pacific Ocean. International North Pacific Fisheries Commission Bulletin Number 51:101.
- Burner, C. J. 1951. Characteristics of Spawning Nests of Columbia River. U.S. Department of the Interior, 16 pp.
- Busby, P. J., T. C. Wainwright, G. J. Bryant, L. J. Lierheimer, R. S. Waples, F. W. Waknitz, and I. V. Lagomarsino. 1996. Status Review of West Coast Steelhead from Washington, Idaho, Oregon and California. National Marine Fisheries Service, 275 pp.
- Busby, P. J., T. C. Wainwright, G. J. Bryant, L. J. Lierheimer, R. S. Waples, W. Waknitz, and I. Lagomarsino. 1996. Status Review of West Coast Steelhead from Washington, Idaho, Oregon and California. U.S. Department of Commerce, NOAA Technical Memorandum NMFS-NWFSC-27, 1-275 pp.
- CA, R. A. o. t. S. o. 2003. Sac River Conservation Forum Handbook.
- Cada, G. F. 1990. A Review of Studies Relating to the Effects of Propeller-Type Turbine Passage on Fish Early Life Stages. North American Journal of Fisheries Management 10(4):418-426.
- Cadrett, P. 2005. pers. comm.
- Cain, J. and C. Monohan. 2008. Estimating Ecologically Based Flow Targets for the Sacramento and Feather Rivers. Natural Heritage Institute.
- CALFED. 2005. Fish Passage Improvement, an Element of CALFED's Ecosystem Restoration Program. CALFED, 263 pp.
- CALFED Bay-Delta Program. 2000. Bay-Delta Program Programmatic Record of Decision. CALFED Bay Delta Program, 846 pp.
- CALFED Bay-Delta Program. 2000. Ecosystem Restoration Program Plan Volume I: Ecological Attributes of the San Francisco Bay-Delta Watershed: Final Programmatic Eis/Eir Technical Appendix. CALFED Bay-Delta Program.
- CALFED Bay-Delta Program. 2000. Ecosystem Restoration Program Plan Volume II: Ecological Management Zone Visions. CALFED, 427 pp.
- CALFED Bay-Delta Program. 2000. Ecosystem Restoration Program Plan Volume II: Ecological Management Zone Visions, Final Programmatic Eis/Eir Technical Appendix. CALFED Bay-Delta Program.

- CALFED Bay-Delta Program. 2000. Multispecies Conservation Program: Final Programmatic EIS/EIR Technical Appendix. CALFED Bay-Delta Program.
- CALFED Bay-Delta Program. 2006. Ecosystem Restoration Program Plan Year 7, Year 6 Annotated Budget, and Milestones Update. CALFED Bay-Delta Program.
- CALFED Bay-Delta Program. 2007. Ecosystem Restoration Program Year 8 and Year 8 Annotated Budget. CALFED Bay-Delta Program.
- CALFED Science Program. 2018. Sound, Air and Light Barrier Keeps Chinook Out of Old River. CALFED Science Program Science News. http://science.calwater.ca.gov/publications/sci_news_1209_bubble.html. 4/17/2018.
- California Advisory Committee on Salmon and Steelhead Trout. 1988. Restoring the Balance.
- California Association of Resource Conservation Districts. 2005. A District Runs through It: A Guide to Locally Led Conservation Projects.
- California Code of Regulations. 2016. California Regulations Related to Drinking Water California Code of Regulations, Title 22, Division 4, Chapter 15.
- California Department of Boating and Waterways. 2003. Sacramento - San Joaquin Delta Boating Needs Assessment 2000-2020. California Department of Parks and Recreation.
- California Department of Boating and Waterways. 2006. Egeria Densa Control Program (Edcp). Second Addendum to 2001 Environmental Impact Report with Five-Year Program Review and Future Operations Plan. 205 pp.
- California Department of Fish and Game. 1991. Lower Yuba River Fisheries Management Plan. California Department of Fish and Game, Stream Evaluation Report No. 91-1, 219 pp.
- California Department of Fish and Game. 1992. Sturgeon in Relation to Water Development in the Sacramento-San Joaquin Estuary. California Department of Fish and Game, 1-17 pp.
- California Department of Fish and Game. 1993. Restoring Central Valley Streams: A Plan for Action. California Department of Fish and Game.
- California Department of Fish and Game. 1996. Steelhead Restoration and Management Plan for California. California Department of Fish and Game, 246 pp.
- California Department of Fish and Game. 1998. A Status Review of the Spring-Run Chinook Salmon (*Oncorhynchus tshawytscha*) in the Sacramento River Drainage. Candidate Species Status Report 98-01, 1-394 pp.
- California Department of Fish and Game. 1998. A Status Review of the Spring-Run Chinook Salmon (*Oncorhynchus tshawytscha*) in the Sacramento River Drainage. Candidate Species Status Report 98-01. Sacramento, CA.
- California Department of Fish and Game. 1998. A Status Review of the Spring-Run Chinook Salmon [*Oncorhynchus tshawytscha*] in the Sacramento River Drainage. Candidate Species Status Report 98-01. California Department of Fish and Game, 394 pp.
- California Department of Fish and Game. 2000. Exhibit A: Department of Fish and Game Fish Screening Criteria. 1-4 pp.
- California Department of Fish and Game. 2000. Lower American River Pilot Salmon and Steelhead Spawning Habitat Improvement Project. California Department of Fish and Game.

- California Department of Fish and Game. 2000. Lower American River Pilot Salmon and Steelhead Spawning Habitat Improvement Project: Quarterly Status Report July 1999-March 2000. California Department of Fish and Game, 16 pp.
- California Department of Fish and Game. 2000b. Fishery Management Plan for the Upper Sacramento River (Box Canyon Dam to Lake Shasta). California Department of Fish and Game, 52 pp.
- California Department of Fish and Game. 2002. California Department of Fish and Game Comments to National Marine Fisheries Service Regarding Green Sturgeon Listing. 1-83 pp.
- California Department of Fish and Game. 2002. Comments to NMFS Regarding Green Sturgeon Listing.
- California Department of Fish and Game. 2004. Recovery Strategy for California Coho Salmon Report to the California Fish and Game Commission. California Department of Fish and Game.
- California Department of Fish and Game. 2004. Sacramento River Spring-Run Chinook Salmon 2002-2003 Biennial Report California Department of Fish and Game, 35 pp.
- California Department of Fish and Game. 2004. Sacramento River Winter-Run Chinook Salmon Biennial Report 2002 - 2003 Habitat Conservation Division Native Anadromous Fish and Watershed Branch.
- California Department of Fish and Game. 2004. Sacramento River Winter-Run Chinook Salmon Biennial Report 2002 - 2003 Prepared for the Fish and Game Commission. California Department of Fish and Game, 23 pp.
- California Department of Fish and Game. 2004. Sacramento River Winter-Run Chinook Salmon. Biennial Report 2002 - 2003. Prepared for the Fish and Game Commission. California Department of Fish and Game, 23 pp.
- California Department of Fish and Game. 2005. Draft Appendix B - Fy 2006 Afrp Restoration and Research Gap Analysis. California Department of Fish and Game, 20 pp.
- California Department of Fish and Game. 2006. Appendix A - Fy 2006 Afrp Program Status by Watershed California Department of Fish and Game, 22 pp.
- California Department of Fish and Game. 2007. California Steelhead Fishing Report-Restoration Card. California Department of Fish and Game.
- California Department of Fish and Game. 2007. Existing Program Summary - Central Valley Station and Steelhead Monitoring Programs. California Department of Fish and Game, 207 pp.
- California Department of Fish and Game. 2007. The Status of Rare, Threatened, and Endangered Animals and Plants of California, Winter-Run Salmon. http://www.dfg.ca.gov/hcpb/cgi-bin/read_one.asp?specy=fish&idNum=54.
- California Department of Fish and Game. 2008. California Aquatic Invasive Species Management Plan. California Department of Fish and Game, 153 pp.
- California Department of Fish and Game. 2009. California Endangered Species Act Incidental Take Permit No. 2081-2009-001-03 Issued to Department of Water Resources California State Water Project Delta Facilities and Operations. Bay Delta Region, 1-20 pp.
- California Department of Fish and Game. 2012. Don Pedro Project Relicensing W&Ar-5 Salmonid Information Synthesis Workshop No. 1 Final Meeting Notes. California Department of Fish and Game.
- California Department of Fish and Game. 2012. GrandTab Spreadsheet of Chinook Salmon Escapement in the Central Valley. Fisheries Branch, 1-21 pp.

California Department of Fish and Game, Habitat Conservation Division, and Native Anadromous Fish and Watershed Branch. 2004. Sacramento River Spring-Run Chinook Salmon 2002-2003 Biennial Report. California Department of Fish and Game.

California Department of Fish and Game - National Marine Fisheries Service Joint Hatchery Review Committee. 2001. Final Report on Anadromous Salmonid Fish Hatcheries in California. California Department of Fish and Game and U.S. Department of Commerce.

California Department of Fish and Game and National Marine Fisheries Service Joint Hatchery Review Committee. 2001. Final Report on Anadromous Salmonid Fish Hatcheries in California. California Department of Fish and Game and U.S. Department of Commerce, 40 pp.

California Department of Fish and Wildlife. 1999-2011. Knights Landing Rotary Screw Trap Data.

California Department of Fish and Wildlife. 2009. Correspondence: Tuolumne River Water Diversion at La Grange Powerhouse. California Department of Fish and Wildlife, 11 pp.

California Department of Fish and Wildlife. 2013. 4(d) Permit #15906 Annual Report - Mossdale Kodiak Trawl Operations.

California Department of Fish and Wildlife. 2013. 4(d) Permit #16877 Annual Report - Mossdale Kodiak Trawl Operations. La Grange, CA.

California Department of Fish and Wildlife. 2013. GrandTab.

California Department of Fish and Wildlife. 2013. GrandTab Spreadsheet of Chinook Salmon Escapement in the Central Valley. Fisheries Branch, 1-21 pp.

California Department of Fish and Wildlife. 2013. pers. comm. P. Doukakis. 12/19/2013.

California Department of Fish and Wildlife. 2013. Mossdale.

California Department of Fish and Wildlife. 2013. SalSim: Salmon Simulator, as Implemented for the San Joaquin River System, User's Manual

California Department of Fish and Wildlife. 2014. Daily Salvage Data 1981-2012. <ftp://ftp.dfg.ca.gov/salvage/>.

California Department of Fish and Wildlife. 2015. Aerial Salmon Redd Survey Excel Tables, Unpublished Data.

California Department of Fish and Wildlife. 2015. GrandTab.

California Department of Fish and Wildlife. 2016. GrandTab.

California Department of Fish and Wildlife. 2016. GrandTab Spreadsheet of Chinook Salmon Escapement in the Central Valley. Fisheries Branch, 1-21 pp.

California Department of Fish and Wildlife. 2016. Life History and Range. <https://www.wildlife.ca.gov/Data/CWHR/Life-History-and-Range>. March 2016.

California Department of Fish and Wildlife. 2016a. California Fish and Game Commission Designated Wild Trout Waters. <https://nrm.dfg.ca.gov/FileHandler.ashx?DocumentID=14563&inline>. April 5, 2016.

California Department of Fish and Wildlife. 2016b. Fishing for Brown Trout (Non-Native). <https://www.wildlife.ca.gov/Fishing/Inland/Brown-Trout#35703375-identification>. June 15, 2016.

California Department of Fish and Wildlife. 2016c. Species Summary Report. California Wildlife Habitat Relationship System. Database Version: 9.0.

California Department of Fish and Wildlife. 2016d. California Wildlife Habitat Relationships System, Life History Accounts and Range Maps, Common Loon. <https://www.dfg.ca.gov/biogeodata/cwhr/cawildlife.aspx>. June 20, 2016.

California Department of Fish and Wildlife. 2016d. Common Loon Life History, California Wildlife Habitat Relationships System. California Department of Fish and Wildlife, 2 pp.

California Department of Fish and Wildlife. 2016d. Common Loon Map, California Wildlife Habitat Relationships System. California Department of Fish and Wildlife.

California Department of Fish and Wildlife. 2016e. Gray Wolf. <https://www.wildlife.ca.gov/conservation/mammals/gray-wolf>. May 22, 2016.

California Department of Fish and Wildlife. 2016f. California Wildlife Habitat Relationships System, Northern River Otter, *Lutra Canadensis*. California Department of Fish and Wildlife, 2 pp.

California Department of Fish and Wildlife. 2016g. Battle Creek Winter-Run Chinook Salmon Reintroduction Plan. Sacramento, California.

California Department of Fish and Wildlife. 2017. Fishing for Brook Trout (Non-Native). <https://www.wildlife.ca.gov/Fishing/Inland/Brook-Trout#35600374-distribution>. December 7, 2017.

California Department of Fish and Wildlife. 2017. GrandTab Spreadsheet of Chinook Salmon Escapement in the Central Valley. Fisheries Branch, 1-21 pp.

California Department of Transportation. 2010. Standard Specifications. State of California Department of Transportation.

California Department of Transportation. 2014. Geotechnical Manual - Supplement A (Gmsa). State of California Department of Transportation.

California Department of Transportation. 2015. Compendium of Pile Driving Sound Data, Technical Guidance for Assessment and Mitigation of the Hydroacoustic Effects of Pile Driving on Fish. 1-215 pp.

California Department of Transportation. 2015. Technical Guidance for Assessment and Mitigation of the Hydroacoustic Effects of Pile Driving on Fish. State of California Department of Transportation.

California Department of Transportation. 2016. 7th Street Bridge Project Biological Assessment and Essential Fish Habitat Assessment. State of California Department of Transportation.

California Department of Transportation. 2016. Biological Assessment (National Oceanic and Atmospheric Administration National Marine Fisheries Service): California Department of Transportation's Bridge Seismic Retrofit Project 03-3f090 Mokelumne River Bridges I-5 in Sacramento County, Paintersville Bridge Sr-160 in Sacramento County, and North Sacramento Undercrossing Sr-160 in the City of Sacramento State of California Department of Transportation.

California Department of Transportation. 2016. Biological Assessment for the Miner Slough Bridge Replacement Project. California Department of Transportation, 91 pp.

- California Department of Transportation. 2016. Biological Assessment: Geotechnical Drilling Foundation Investigation and Navigational Fender Replacement Project 03-3f550 Tower Bridge Sr-275 in Sacramento County. State of California Department of Transportation.
- California Department of Transportation. 2016. Miner Slough Bridge Replacement Project Biological Assessment for National Marine Fisheries Service on Sacramento River Winter-Run and Central Valley Spring-Run Chinook Salmon (*Oncorhynchus tshawytscha*), Central Valley Steelhead (*Oncorhynchus mykiss irideus*) DPS, Green Sturgeon (*Acipenser medirostris*) Southern DPS, and Essential Fish Habitat Assessment for Chinook Salmon. U.S. Department of Transportation, 1-95 pp.
- California Department of Water Resources. 1994. San Joaquin River Tributaries Spawning Gravel Assessment Stanislaus, Tuolumne, Merced Rivers. 39 pp.
- California Department of Water Resources. 2002. Oroville Facilities Relicensing Project (FERC Project No. 2100) Sp-F9 Evaluation of the Feather River Hatchery Effects on Naturally Spawning Salmonids. California Department of Water Resources, 40 pp.
- California Department of Water Resources. 2004. Final Report - Characterization of Cold Water Pool Availability in the Thermalito Afterbay Oroville Facilities P-2100 Relicensing. Oroville Facilities Relicensing Team, SP-F3.1, Task 4b. Oroville Facilities Relicensing. FERC Project No. 2100.
- California Department of Water Resources. 2004. SPW6. Project Effects on Temperature Regime Oroville Facilities Relicensing FERC Project No. 2100. California Department of Water Resources, 151 pp.
- California Department of Water Resources. 2005. Fish Passage Improvement: An Element of Calfed's Ecosystem Restoration Program. . California Department of Water Resources
- California Department of Water Resources. 2006. Progress on Incorporating Climate Change into Management of California's Water Resources. California Department of Water Resources, 339 pp.
- California Department of Water Resources. 2007. Upper Yuba River Watershed Chinook Salmon and Steelhead Habitat Assessment.
- California Department of Water Resources. 2008. Quantification of Pre-Screen Loss of Juvenile Steelhead within Clifton Court Forebay. Fishery Improvements Section, 136 pp.
- California Department of Water Resources. 2008. Sacramento Stormwater Quality Partnership Annual Report 2007-2008. October 2008.
- California Department of Water Resources. 2009. Central Valley Spring-Run Chinook Salmon and Steelhead in the Sacramento River Basin Background Report. California Department of Water Resources.
- California Department of Water Resources. 2009. Habitat Expansion Agreement for Central Valley Spring-Run Chinook Salmon Appendix E: Central Valley Spring-Run Chinook Salmon and Steelhead in the Sacramento River Basin Background Report. California Department of Water Resources.
- California Department of Water Resources. 2010. 2009/2010 Salmonids and Green Sturgeon Incidental Take and Monitoring Program Annual Data Report.
- California Department of Water Resources. 2011. 2010/2011 Salmonids and Green Sturgeon Incidental Take and Monitoring Report. Division of Environmental Services, 1-24 pp.
- California Department of Water Resources. 2012. 2011/2012 Salmonids and Green Sturgeon Incidental Take and Monitoring Report. Division of Environmental Services, 1-49 pp.

- California Department of Water Resources. 2013. 2012/2013 Salmonids and Green Sturgeon Incidental Take and Monitoring Report. Division of Environmental Services, 1-63 pp.
- California Department of Water Resources. 2013. Draft Environmental Impact Report/Environmental Impact Statement for the Bay Delta Conservation Plan, Chapters 1-11. California Department of Water Resources, U.S. Bureau of Reclamation, U.S. Fish and Wildlife Service, and National Marine Fisheries Service, 32313 pp.
- California Department of Water Resources. 2013. Draft Environmental Impact Report/Environmental Impact Statement for the Bay Delta Conservation Plan, Chapters 12-End. California Department of Water Resources, 7725 pp.
- California Department of Water Resources. 2013. Public Draft Bay Delta Conservation Plan Habitat Conservation Plan. Department of Water Resources.
- California Department of Water Resources. 2014. 2013/2014 Salmonids and Green Sturgeon Incidental Take and Monitoring Report. Division of Environmental Services, 1-50 pp.
- California Department of Water Resources. 2015. 2014/2015 Salmonids and Green Sturgeon Incidental Take and Monitoring Report. Division of Environmental Services, 1-34 pp.
- California Department of Water Resources. 2015. California Climate Science and Data for Water Resources Management. California Department of Water Resources, 28 pp.
- California Department of Water Resources. 2016. 2015/2016 Salmonids and Green Sturgeon Incidental Take and Monitoring Report. Division of Environmental Services, 1-36 pp.
- California Department of Water Resources. 2016. Incidental Take Permit Application for the California State Water Project Delta Facilities and Operations: Comparison of Key Hydrological Variables for Proposed Project with Longfin Smelt Spring Outflow Criteria to No Action Alternative and Proposed Project Scenarios. Appendix 4.D. 1-8 pp.
- California Department of Water Resources. 2017. California WaterFix Biological Assessment: Updated Proposed Action. California Department of Water Resources.
- California Department of Water Resources and U.S. Bureau of Reclamation. 2012. Yolo Bypass Salmonid Habitat Restoration and Fish Passage Implementation Plan, Long-Term Operation of the Central Valley Project and State Water Project Biological Opinion Reasonable and Prudent Alternative Actions I.6.1 and I.7. 1-140 pp.
- California Environmental Protection Agency. 2010. 2010 Integrated Report (Clean Water Act Section 303(D) List / 305(B) Report). http://www.waterboards.ca.gov/water_issues/programs/tmdl/integrated2010.shtml. July 12, 2016.
- California Hatchery Scientific Review Group. 2012. California Hatchery Review Project Appendix VIII: Livingston Stone National Fish Hatchery, Winter Chinook Program Report.
- California Hatchery Scientific Review Group. 2012. California Hatchery Review Report.
- California National Resources Agency. 2017. Sacramento Valley Salmon Resiliency Strategy. California National Resources Agency, 1-16 pp.
- California Sportfishing Protection Alliance. 2018. California Sportfishing Protection Alliance. <http://calsport.org/about/whois.php>. 5/8/18.
- California, V. R. 2016. Redding for an Adventure. [http://visitredding.com/\[3/31/2017](http://visitredding.com/[3/31/2017) June 19, 2016.

- CaliforniaHelps.com. 2016a. Oregon Gartersnake - *Thamnophis Atratus Hydrophilus*.
<http://www.californiaherps.com/snakes/pages/t.a.hydrophilus.htm>. March 2016.
- Campbell, E. and P. Moyle. 1992. Effects of Temperature, Flow, and Disturbance on Adult Spring-Run Chinook Salmon.
- Campos, C. and D. Massa. 2012. Lower Yuba River Accord Monitoring and Evaluation Plan: Annual Redd Survey Report 2010-2011. 38 pp.
- Carlisle, D. M., D. M. Wolock, and M. R. Meador. 2011. Alteration of Streamflow Magnitudes and Potential Ecological Consequences: A Multiregional Assessment. *Frontiers in Ecology and the Environment* 9(5):264-270.
- Carlson, T. J. 2012. The Effects of Noise on Aquatic Life. Pages 229-233 in A. N. Popper and A. D. Hawkins, editors. Springer.
- Carlson, T. J., G. E. Johnson, C. M. Woodley, J. R. Skalski, and A. G. Seaburg. 2011. Compliance Monitoring of Underwater Blasting for Rock Removal at Warrior Point, Columbia River Channel Improvement Project. Prepared for the U.S. Army Corps of Engineers.
- Carlton, J. T., J. K. Thompson, L. E. Schemel, and F. H. Nichols. 1990. Remarkable Invasion of San-Francisco Bay (California, USA) by the Asian Clam *Potamocorbula-Amurensis* .1. Introduction and Dispersal. *Marine Ecology Progress Series* 66(1-2):81-94.
- Caroffino, D. C., T. M. Sutton, R. F. Elliott, and M. C. Donofrio. 2010. Predation on Early Life Stages of Lake Sturgeon in the Peshtigo River, Wisconsin. *Transactions of the American Fisheries Society* 139(6):1846-1856.
- Carrasquero, J. 2001. Executive Summary: Overwater Structures: Freshwater Issues. 129 pp.
- Carrasquero, J. 2001. White Paper on Over-Water Structures: Freshwater Issues. Washington Department of Fish and Wildlife.
- Carretta, J. V., K. A. Forney, E. Oleson, D. W. Weller, A. R. Lang, J. Baker, M. Muto, B. Hanson, A. J. Orr, H. Huber, M. S. Lowry, J. Barlow, J. E. Moore, D. Lynch, L. Carswell, and R. L. Brownell. 2017. U.S. Pacific Marine Mammal Stock Assessments 2016. U.S. Department of Commerce, NOAA Technical Memorandum NOAA-TM-NMFS-SWFSC-577, 414 pp.
- Carretta, J. V., E. M. Oleson, J. Baker, D. W. Weller, A. R. Lang, K. A. Forney, M. M. Muto, B. Hanson, A. J. Orr, H. Huber, M. S. Lowry, J. Barlow, J. E. Moore, D. Lynch, L. Carswell, and R. L. J. Brownell. 2015. U.S. Pacific Marine Mammal Stock Assessments: 2015. National Marine Fisheries Service, NOAA Technical Memorandum NMFS-SWFSC-561, 1-426 pp.
- Carter, J. A., G. A. McMichael, I. D. Welch, R. A. Harnish, and B. J. Bellgraph. 2009. Seasonal Juvenile Salmonid Presence and Migratory Behavior in the Lower Columbia River. Prepared for the U.S. Army Corps of Engineers.
- Carter, K. 2008. Effects of Temperature, Dissolved Oxygen/Total Dissolved Gas, Ammonia, and Ph on Salmonids. North Coast Regional Water Quality Control Board.
- Casper, B. M., A. N. Popper, F. Matthews, T. J. Carlson, and M. B. Halvorsen. 2012. Recovery of Barotrauma Injuries in Chinook Salmon, *Oncorhynchus tshawytscha* from Exposure to Pile Driving Sound. *PLoS ONE* 7(6):1-7.
- Cavallo, B., R. Brown, D. Lee, J. Kindopp, and R. Kurth. 2011. Hatchery and Genetic Management Plan for Feather River Hatchery Spring-Run Chinook Program. Prepared for the National Marine Fisheries Service.
- Cavallo, B., P. Gaskill, J. Melgo, and S. C. Zeug. 2015. Predicting Juvenile Chinook Routing in Riverine and Tidal Channels of a Freshwater Estuary. *Environmental Biology of Fishes* 98:1571-1582.

- Cavallo, B., J. Merz, and J. Setka. 2012. Effects of Predator and Flow Manipulation on Chinook Salmon (*Oncorhynchus tshawytscha*) Survival in an Imperiled Estuary. *Environmental Biology of Fishes* 96(2-3):393-403.
- Cavallo, B., J. Merz, and J. Setka. 2013. Effects of Predator and Flow Manipulation on Chinook Salmon (*Oncorhynchus tshawytscha*) Survival in an Imperiled Estuary. *Environmental Biology of Fishes* 96:393-403.
- Cayan, D. R., M. Tyree, M. D. Dettinger, H. Hidalgo, T. Das, E. P. Maurer, P. Bromirski, N. Graham, and R. Flick. 2009. Climate Change Scenarios and Sea Level Rise Estimates for the California 2008 Climate Change Scenarios Assessment. California Climate Change Center.
- Cayan, D. R., M. Tyree, K. E. Kunkel, C. Castro, A. Gershunov, A. Barsugli, J. Ray, A. J. Overpeck, J. T. Anderson, M. Russell, J. Rajagopalan, B. Rangwala, and P. Duffy. 2013. Chapter 6 Future Climate: Projected Average Assessment of Climate Change in the Southwest United States. Inland Press:101-125.
- Cayan, D. R., M. Tyree, D. W. Pierce, and T. Das. 2012. Climate Change and Sea Level Rise Scenarios for California Vulnerability and Adaptation Assessment. California Energy Commission, 36 pp.
- CDFW. 1998. A Status Review of the Spring-Run Chinook Salmon [*Oncorhynchus tshawytscha*] in the Sacramento River Drainage. Candidate Species Status Report 98-01. California Department of Fish and Wildlife.
- CDWR. 2009. Central Valley Spring-Run Chinook Salmon and Steelhead in the Sacramento River Basin Background Report. California Department of Water Resources.
- Cech, J. J., S. J. Mitchell, D. T. Castleberry, and M. McEnroe. 1990. Distribution of California Stream Fishes: Influence of Environmental Temperature and Hypoxia. *Environmental Biology of Fishes*,(29):95-105.
- Cech, J. J., S. I. Doroshov, G. P. Moberg, B. May, R. Schaffter, and D. M. Kohlhorst. 2002. Biological Assessment of Green Sturgeon in the Sacramento-San Joaquin Watershed (Phase 1). Final Report to the CALFED Bay-Delta Program. Project #98-C-15, Contract #B-81738.
- Cederholm, C. J., D. H. Johnson, R. E. Bilby, L. G. Dominguez, A. M. Garrett, W. H. Graeber, E. L. Greda, M. D. Kunze, B. G. Marcot, J. F. Palmisano, R. W. Plotnikoff, W. G. Percy, C. A. Simenstad, and T. P.C. 2000. Pacific Salmon and Wildlife - Ecological Contexts, Relationships and Implications for Management, Special Edition Technical Report.
- Center for Whale Research. 2008. The Historical Status of the Southern Resident Killer Whales. <http://www.whalereearch.com/thecenter/research0001.html>.
- Central Valley Region Water Quality Control Board. 2016. Water Quality Control Plan (Basin Plan) for the California Regional Water Quality Control Board, Central Valley Region. Fourth Edition. The Sacramento and San Joaquin River Basin. Central Valley Region Water Quality Control Board, 161 pp.
- Central Valley Regional Water Quality Control Board. 2013. Amending Waste Discharge Requirements Order R5-2010-0114-01 (NPDES Permit No. Ca0077682) and Time Schedule Order R5-2010-0115-01. Sacramento Regional County Sanitation District, Sacramento Regional Wastewater Treatment Plant, Sacramento County. . Sacramento, CA.
- Central Valley Regional Water Quality Control Board. 2013. Regional Water Quality Control Board Central Valley Region Amending Waste Discharge Requirements, Order R5-2010-0114-01 (NPDES Permit No. CA 0077682) and Time Schedule Order R5-2010-0115-01, Sacramento Regional County Sanitation District Sacramento Regional Wastewater Treatment Plant, Sacramento County. 1-237 pp.

- Central Valley Regional Water Quality Control Board. 2016. Regional Water Quality Control Board Central Valley Region Monitoring and Reporting Program No. R5-2003-0027 for Reclamation District Number 800, Discovery Bay Maintenance Dredging, Contra Costa County. 1-22 pp.
- Central Valley Regional Water Quality Control Board. 2016. The Water Quality Control Plan (Basin Plan) for the California Regional Water Quality Control Board, Central Valley Region. Fourth Edition (Revised July 2016, with Approved Amendments). The Sacramento River Basin and the San Joaquin River Basin.
- CEQ. 2010. Draft NEPA Guidance on Consideration of the Effects of Climate Change and Greenhouse Gas Emissions. 12 pp.
- CEQ. 2011. Federal Agency Climate Change Adaptation Planning: Implementing Instructions. 5 pp.
- CH2M HILL. 2001. Cottonwood Creek Watershed Assessment.
- CH2M HILL, EIP Associates, and Borcalli & Associates Inc. 1998. Central Valley Project Improvement Act Tributary Production Enhancement Report. Prepared for U.S. Fish and Wildlife Service.
- Chan, A. A., P. Giraldo-Perez, S. Smith, and D. T. Blumstein. 2010. Anthropogenic Noise Affects Risk Assessment and Attention: The Distracted Prey Hypothesis. *Biol Lett* 6(4):458-461.
- Chapman, D. W. and T. C. Bjornn. 1969. Distribution of Salmonids in Streams, with Special Reference to Food and Feeding. Page 24 *in* H.R. Macmillan Lectures in Fisheries, T. G. Northcote, editor. University of British Columbia, Vancouver.
- Chapman, E. P., A. R. Hearn, C. J. Michel, A. J. Ammann, S. T. Lindley, M. J. Thomas, P. T. Sandstrom, G. P. Singer, M. L. Peterson, R. B. MacFarlane, and A. P. Klimley. 2013. Diel Movements of Out-Migrating Chinook Salmon (*Oncorhynchus tshawytscha*) and Steelhead Trout (*Oncorhynchus mykiss*) Smolts in the Sacramento/San Joaquin Watershed. *Environmental Biology of Fishes* 96:273-286.
- Chapman, J. W., B. R. Dumbauld, G. Itani, and J. C. Markham. 2012. An Introduced Asian Parasite Threatens Northeastern Pacific Estuarine Ecosystems. *Biological Invasions* 14(6):1221-1236.
- Chapman, P. M. 2012. Adaptive Monitoring Based on Ecosystem Services. *Science of the Total Environment* 415:56-60.
- Chase, R. 2010. Lower American River Steelhead (*Oncorhynchus mykiss*) Spawning Surveys. U.S. Bureau of Reclamation, 17 pp.
- Chase, R. 2010. Lower American River Steelhead (*Oncorhynchus mykiss*) Spawning Surveys - 2010. U.S. Bureau of Reclamation, 1-17 pp.
- Chase, R. 2010. Lower American River Steelhead (*Oncorhynchus mykiss*) Spawning Surveys – 2010. Department of the Interior, US Bureau of Reclamation.
- Cherry, D. S., K.L. Dickson, and J. Cairns Jr. . 1975. Temperatures Selected and Avoided by Fish at Various Acclimation Temperatures. *Journal of the Fisheries Research Board of Canada*(32):485-491.
- Cherry, D. S., K. L. Dickson, and J. Cairns. 1975. Temperatures Selected and Avoided by Fish at Various Acclimation Temperatures. *J Fish Res Bd Can*:485-491.
- Cherry, D. S., K. L. Dickson, and J. Cairns Jr. 1975. Temperatures Selected and Avoided by Fish at Various Acclimation Temperatures. *Journal of the Fisheries Board of Canada* 32(4):485-491.

- Cherry, D. S., S. Walker, N. Fresco, S. Trainor, and A. Tidwell. 2010. Impacts of Climate Change and Variability on Hydropower on Southeast Alaska.31.
- Chilcote, M. W., S. A. Leider, and J. J. Loch. 1986. Differential Reproductive Success of Hatchery and Wild Summer-Run Steelhead under Natural Conditions. Transactions of the American Fisheries Society 115(5):726-735.
- Childs, J. R., N. P. Snyder, and M. A. Hampton. 2003. Bathymetric and Geophysical Surveys of Eglebright Lake, Yuba-Nevada Counties, California. U.S. Geological Survey, Open File Report 2003-383.
- Choe, K.-Y., G. A. Gill, and R. Lehman. 2003. Distribution of Particulate, Colloidal, and Dissolved Mercury in San Francisco Bay Estuary. 1. Total Mercury. Limnology and Oceanography 48(4):1535-1546.
- Christie, M. R., M. L. Marine, and M. S. Blouin. 2011. Who Are the Missing Parents? Grandparentage Analysis Identifies Multiple Sources of Gene Flow into a Wild Population. Molecular Ecology 20(6):1263-1276.
- Christopher A. Myrick and J. Joseph J. Cech. 2001. Temperature Effects on Chinook Salmon and Steelhead: A Review Focusing on California's Central Valley Populations. Bay-Delta Modeling Forum Technical Publication 01-1.
- Christopherson, A. and J. Lundberg. 2002. Underwater Sound Attenuation in Construction Projects: Applying Science to Pile Driving Permits. Pages 1-6, Anchorage, Alaska.
- City of London. 2015. Environmental Statement Appendix 14c (6.3.14.3): Assessment of Ground-Borne Noise and Vibration and Underwater Noise from the Tunnel Boring Machine.
- City of Mount Shasta. 2016. Welcome to Mount Shasta. <http://mtshastaca.gov>. June 19, 2016.
- City of Redding, C. 2016. Area Information and Demographics. <http://www.cityofredding.org/visit-redding/area-information-and-demographics>. June 19, 2016.
- City of Shasta Lake. 2016. Visitors. <http://www.cityofshastalake.org/index.aspx?NID=64>. June 19, 2016.
- City of Weed. 2016. About Us. <http://weedca.govoffice3.com/>. June 19, 2016.
- City of Yreka. 2016. Visitors. <http://ci.yreka.ca.us/visitors/visitor-information/>. June 19, 2016.
- Clancey, K., L. Saito, K. Hellmann, C. Svoboda, J. Hannon, and R. Beckwith. 2017. Evaluating Head-of-Reservoir Water Temperature for Juvenile Chinook Salmon and Steelhead at Shasta Lake with Modeled Temperature Curtains. North American Journal of Fisheries Management 37(5):1161-1175.
- Clark, G. H. 1929. Sacramento River Salmon Fishery. California Fish and Game 15(1):1-10.
- Clark, G. H. 1929. Sacramento-San Joaquin Salmon (*Oncorhynchus tshawytscha*) Fishery of California. Fish Bulletin 17:1-73.
- Clark, G. H. 1930. Salmon Spawning in Drainage Canals in the San Joaquin Valley. California Fish and Game 16(3):1.
- Clark, G. H. 1942. Salmon at Friant Dam-1942. California Fish and Game 29(3):1-3.
- Clark, G. H. 1943. Salmon at Friant Dam - 1942. California Fish and Game 29(3):1-3.
- Clark, K. W., M. D. Bowen, R. B. Mayfield, K. P. Zehfuss, J. D. Taplin, and C. H. Hanson. 2009. Quantification of Pre-Screen Loss of Juvenile Steelhead in Clifton Court Forebay. Department of Water Resources, 1-139 pp.

- Clark, T. D., E. Sandblom, and F. Jutfelt. 2013. Aerobic Scope Measurements of Fishes in an Era of Climate Change: Respirometry, Relevance and Recommendations. *J Exp Biol* 216(Pt 15):2771-2782.
- Clarke, W. C. and J. E. Shelbourn. 1985. Growth and Development of Seawater Adaptability by Juvenile Fall Chinook Salmon (*Oncorhynchus tshawytscha*) in Relation to Temperature. *Aquaculture* 45:21-31.
- Clifford, M. A., K. J. Eder, I. Werner, and R. P. Hedrick. 2005. Synergistic Effects of Esfenvalerate and Infectious Hematopoietic Necrosis Virus on Juvenile Chinook Salmon Mortality. *Environmental Toxicology and Chemistry* 24(7):1766-1772.
- Cloern, J. E. and A. D. Jassby. 2012. Drivers of Change in Estuarine-Coastal Ecosystems: Discoveries from Four Decades of Study in San Francisco Bay. *Reviews of Geophysics* 50:1-33.
- Cloern, J. E., N. Knowles, L. R. Brown, D. Cayan, M. D. Dettinger, T. L. Morgan, D. H. Schoellhamer, M. T. Stacey, M. van der Wegen, R. W. Wagner, and A. D. Jassby. 2011. Projected Evolution of California's San Francisco Bay-Delta-River System in a Century of Climate Change. *PLoS ONE* 6(9):e24465.
- Coble, D. W. 1961. Influence of Water Exchange and Dissolved Oxygen in Redds on Survival of Steelhead Trout Embryos. *Transactions of the American Fisheries Society* 90(4):469-474.
- Cochran-Biederman, J. L., K. E. Wyman, W. E. French, and G. L. Loppnow. 2014. Identifying Correlates of Success and Failure of Native Freshwater Fish Reintroductions. *Conserv Biol*.
- Cohen, A. 2005. Sturgeon Poaching and Black Market Caviar: A Case Study. *Underwater Naturalist* 27(1):23-26.
- Cohen, A. N. 1997. The Exotic Species Threat to California's Coastal Resources. Pages 1-6 *in* California and the World Ocean. San Diego, California.
- Cohen, S. J., K. A. Miller, A. F. Hamlet, and W. Avis. 2000. Climate Change and Resource Management in the Columbia River Basin. *Water International* 25(2):253-272.
- Coleman National Fish Hatchery. 2011. Biological Assessment of Artificial Propagation at Coleman National Fish Hatchery and Livingston Stone National Fish Hatchery: Program Description and Incidental Take of Chinook Salmon and Steelhead. U.S. Department of the Interior, 406 pp.
- Collaborative Adaptive Management Team. 2017. Memorandum to Collaborative Science and Adaptive Management Program (CSAMP) Policy Group: Workplan for Salmonids 2017. Collaborative Science and Adaptive Management Program, 1-10 pp.
- Collins, S. F., C. V. Baxter, A. M. Marcarelli, and M. S. Wipfli. 2016. Effects of Experimentally Added Salmon Subsidies on Resident Fishes via Direct and Indirect Pathways. *Ecosphere* 7(3):18.
- Colway, C. and D. E. Stevenson. 2007. Confirmed Records of Two Green Sturgeon from the Bering Sea and Gulf of Alaska. *Northwestern Naturalist* 88:188-192.
- Compton, J. E., C. P. Andersen, D. L. Phillips, J. R. Brooks, M. G. Johnson, M. R. Church, W. E. Hogsett, M. A. Cairns, P. T. Rygiewicz, B. C. McComb, and C. D. Shaff. 2006. Ecological and Water Quality Consequences of Nutrient Addition for Salmon Restoration in the Pacific Northwest. *Frontiers in Ecology and the Environment* 4(1):18-26.
- Connon, R. E., L. A. Deanovic, E. B. Fritsch, L. S. D'Abronzio, and I. Werner. 2011. Sublethal Responses to Ammonia Exposure in the Endangered Delta Smelt; *Hypomesus transpacificus* (Fam. Osmeridae). *Aquat Toxicol* 105(3-4):369-377.

- Conomos, T. J., R. E. Smith, and J. W. Gartner. 1985. Environmental Setting of San Francisco Bay. *Hydrobiologia* 129(Oct):1-12.
- Cook, K. V., R. S. Brown, Z. D. Deng, R. S. Klett, H. D. Li, A. G. Seaburg, and M. B. Eppard. 2014. A Comparison of Implantation Methods for Large Pit Tags or Injectable Acoustic Transmitters in Juvenile Chinook Salmon. *Fisheries Research* 154:213-223.
- Cordone, A. J. and D. W. Kelley. 1961. The Influences of Inorganic Sediment on the Aquatic Life of Streams. *California Fish and Game* 47(2):189-228.
- Council of Environmental Quality. 2012. Title 40: Protection of Environment Chapter V: Council on Environmental Quality Part 1502: Environmental Impact Statement. 40 CFR 1502.13.
- County of Siskiyou. 2016a. Siskiyou County Demographics. <https://www.co.siskiyou.ca.us/content/siskiyou-county-demographics>. June 19, 2016.
- County of Siskiyou. 2016b. Recreation, Travel & Tourism. <https://www.co.siskiyou.ca.us/content/recreation-travel-tourism>. June 19, 2016.
- Courter, I. I., D. B. Child, J. A. Hobbs, T. M. Garrison, J. J. G. Glessner, and S. Duery. 2013. Resident Rainbow Trout Produce Anadromous Offspring in a Large Interior Watershed. *Canadian Journal of Fisheries and Aquatic Sciences* 70(5):701-710.
- Courter, I. I., C. Justice, and S. Cramer. 2009. Flow and Temperature Effects on Life History Diversity of *Oncorhynchus mykiss* in the Yakima River Basin. *Cramer Fish Sciences*:46.
- Cowin, M. and D. G. Murillo. 2016. pers. comm. N. M. F. S. California Department of Water Resources and U.S. Bureau of Reclamation Letter to William Stelle. August 2, 2016.
- Cramer Fish Sciences. 2011. Memo: Green Sturgeon Observations at Daguerre Point Dam, Yuba River, CA. FWS Grant Number: 813329G011.
- Cramer Fish Sciences. 2011. Memo: Green Sturgeon Observations at Daguerre Point Dam, Yuba River, California. FWS Grant Number: 813329G011.
- Cramer Fish Sciences. 2016. Hallwood Side Channel and Floodplain Restoration Project Biological and Essential Fish Habitat Assessment, Prepared for United States Fish and Wildlife Service.
- Cramer, S. P., D. W. Alley, J. E. Baldrige, K. Barnard, D. B. Demko, D. H. Dettman, B. Farrel, J. Hagar, T. P. Keegan, A. Laird, W. T. Mitchell, R. C. Nuzum, R. Orton, J. J. Smith, T. L. Taylor, P. Unger, and E. S. Van Dyke. 1995. The Status of Steelhead Populations in California in Regards to the Endangered Species Act. S.P. Cramer & Associates, Inc., Gresham, OR.
- Cramer, S. P. and D. B. Demko. 1996. The Status of Late-Fall and Spring Chinook Salmon in the Sacramento River Basin Regarding the Endangered Species Act. S. P. Cramer & Associates, Inc., Gresham, Oregon.
- Cramer, S. P. and D. B. Demko. 1997. The Status of Late-Fall and Spring Chinook Salmon in the Sacramento River Basin Regarding the Endangered Species Act. S. P. Cramer & Associates, Inc., Gresham, Oregon.
- Crozier, L. G., A. P. Hendry, P. W. Lawson, T. P. Quinn, N. J. Mantua, J. Battin, R. G. Shaw, and R. B. Huey. 2008. Potential Responses to Climate Change in Organisms with Complex Life Histories: Evolution and Plasticity in Pacific Salmon. *Evolutionary Applications* 1(2):252-270.

- CSP. 2012. California State Parks, Division of Boating and Waterways: Biological Assessment: *Egeria densa* Control Program. Page 270.
- Cullon, D. L., M. B. Yunker, C. Alleyne, N. J. Dangerfield, S. O'Neill, M. J. Whitar, and P. S. Ross. 2009. Persistent Organic Pollutants in Chinook Salmon (*Oncorhynchus tshawytscha*): Implications for Resident Killer Whales of British Columbia and Adjacent Waters. *Environmental Toxicology Chemistry* 28(1):148-161.
- Cummins, K., C. Furey, A. Giorgi, S. Lindley, J. Nestler, and J. Shurts. 2008. Listen to the River: An Independent Review of the CVPIA Fisheries Program.
- Cummins, K., C. Furey, A. Giorgi, S. T. Lindley, J. Nestler, and J. Shurts. 2008. Listen to the River: An Independent Review of the CVPIA Fisheries Program. Prepared for the U.S. Bureau of Reclamation and U.S. Fish and Wildlife Service.
- Cummins, K. C., C. Furey, A. Giorgi, S. T. Lindley, J. Nestler, and J. Shurts. 2008. Listen to the River: An Independent Review of the CVPIA Fisheries Program. U.S. Bureau of Reclamation and U.S. Fish and Wildlife Service.
- Currie, D. R. and G. D. Parry. 1996. Effects of Scallop Dredging on a Soft Sediment Community: A Large-Scale Experimental Study. *Marine Ecology Progress Series* 134:131-150.
- Curry Cunningham, Noble Hendrix, Eva Dusek-Jennings, Robert Lessard, and Ray Hilborn. 2015. Delta Chinook Final Report.
- Curtis, J. A., L. E. Flint, C. N. Alpers, S. A. Wright, and N. P. Snyder. 2006. Use of Sediment Rating Curves and Optical Backscatter Data to Characterize Sediment Transport in the Upper Yuba River Watershed, California, 2001-03. U.S. Geological Survey, Scientific Investigations Report 2005-5246, 74 pp.
- Curtis, J. A., L. E. Flint, C. N. Alpers, and S. M. Yarnell. 2005. Conceptual Model of Sediment Processes in the Upper Yuba River Watershed, Sierra Nevada, CA. *Geomorphology* 68(3-4):149-166.
- Cuthbert, R., C. Becker, and A. Fuller. 2012. Fall/Winter Migration Monitoring at the Tuolumne River Weir.
- Cuthbertson, A., E. Lynn, M. Anderson, and K. T. Redmond. 2014. Estimating Historical California Precipitation Phase Trends Using Gridded Precipitation, Precipitation Phase, and Elevation Data. D. o. W. Resources, 23 pp.
- CVPIA. 1992. Central Valley Project Improvement Act (CVPIA). 170 pp.
- Daan, S., C. Deerenberg, and C. Dijkstra. 1996. Increased Daily Work Precipitates Natural Death in the Kestrel. *Journal of Animal Ecology* 65(5):539-544.
- Daniels, A. E., J. F. Morrison, L. A. Joyce, N. L. Crookston, S. Chen, and G. McNulty. 2012. Climate Projections Faq. U.S. Department of Agriculture, 41 pp.
- David Evans and Associates. 2012. Columbia River Crossing Test Pile Project Hydroacoustic Monitoring Final Report. Agreement Number Y-9246, Task AH, Amendment No. 7.
- Davidson, J., J. Bebak, and P. Mazik. 2009. The Effects of Aquaculture Production Noise on the Growth, Condition Factor, Feed Conversion, and Survival of Rainbow Trout, *Oncorhynchus mykiss*. *Aquaculture* 288(3-4):337-343.
- De Riu, N., J. W. Lee, S. S. Huang, G. Moniello, and S. S. Hung. 2014. Effect of Dietary Selenomethionine on Growth Performance, Tissue Burden, and Histopathology in Green and White Sturgeon. *Aquatic Toxicology* 148:65-73.

- Dean, M. 2005. Collection and Analysis of Scales from Rainbow Trout of the Sacramento River near Redding, CA. California Department of Fish and Game, 9 pp.
- Deas, M. and C. Lowney. 2001. Central Valley Water Temperature Modeling Review. Bay Delta Modeling Forum.
- Deas, M. L. 2004. Peer Review of Water Temperature Objectives Used as Evaluation Criteria for the Stanislaus – Lower San Joaquin River Water Temperature Modeling and Analysis. 54 pp.
- Dege, M. 2016. pers. comm. J. Ambrose. November 29, 2016.
- Dekar, M., P. L. Brandes, J. Kirsch, L. Smith, J. Speegle, P. Cadrett, and M. Marshall. 2013. USFWS Delta Juvenile Fish Monitoring Program Review, Background Report Prepared for Review by the IEP Science Advisory Group, June 2013.
- Del Rosario, R. B., Y. J. Redler, K. Newman, P. L. Brandes, T. Sommer, K. Reece, and R. Vincik. 2013. Migration Patterns of Juvenile Winter-Run-Sized Chinook Salmon (*Oncorhynchus tshawytscha*) through the Sacramento–San Joaquin Delta. *San Francisco Estuary and Watershed Science* 11(1):1-22.
- Delaney, D., P. Bergman, B. Cavallo, and J. Melgo. 2014. Stipulation Study: Steelhead Movement and Survival in the South Delta with Adaptive Management of Old and Middle River Flows. Department of Water Resources.
- Delta Independent Science Board. 2015. Flows and Fishes in the Sacramento-San Joaquin Delta: Research Needs in Support of Adaptive Management.
- Delta Protection Commission. 2012. Economic Sustainability Plan for the Sacramento-San Joaquin Delta. Delta Protection Commission.
- Demetras, N. J., D. D. Huff, C. J. Michel, J. M. Smith, G. R. Cutter, S. A. Hayes, and S. T. Lindley. 2016. Development of Underwater Recorders to Quantify Predation of Juvenile Chinook Salmon (*Oncorhynchus tshawytscha*) in a River Environment. *Fishery Bulletin* 114(2):179-185.
- Demko, D., M. Hellmair, M. Peterson, S. Ainsley, M. Palmer, and A. Fuller. 2012. Summary of Scientific Certainty Regarding San Joaquin Basin Chinook Salmon. Page 23.
- Deng, X., J. P. Van Eenennaam, and S. I. Doroshov. 2002. Comparison of Early Life Stages and Growth of Green and White Sturgeon. Pages 237-248 in *American Fisheries Society Symposium*.
- Deng, X., J. P. Van Eenennaam, and S. I. Doroshov. 2002. Comparison of Early Life Stages and Growth of Green and White Sturgeon. *American Fisheries Society Symposium* 28:237-248.
- Deng, X., H. J. Wagner, and A. N. Popper. 2011. The Inner Ear and Its Coupling to the Swim Bladder in the Deep-Sea Fish *Antimora rostrata* (Teleostei: Moridae). *Deep Sea Research Part 1: Oceanographic Research Papers* 58(1):27-37.
- Department of Defense, Environmental Protection Agency, Department of Agriculture, Department of Interior, and Department of Commerce. 1995. Federal Guidance for the Establishment, Use and Operation of Mitigation Banks. *Federal Register* 60(228):58605-58614.
- Department of Energy. 2001. Hydropower Licensing and Endangered Species , A Guide for Applicants, Contractors, and Staff. Department of Energy, 90 pp.
- Department of Energy. 2007. Draft Environmental Impact Report Oroville Facilities Relicensing. FERC Project No. 2100.

- Department of Fish and Game. 2008. Winter-Run Chinook Salmon Escapement Estimates for 2008. Department of Fish and Game, 3 pp.
- Department of Parks and Recreation Office of Historic Preservation. 2017. Section 106 Consultation for a Proposed Regulatory Action for the Release of Salmon from the Endangered Sacramento River Winter-Run Chinook Salmon Evolutionary Significant Unit (ESU) and Threatened Central Valley Spring-Run Chinook Salmon ESU into the McCloud and Upper Sacramento Rivers above Shasta Dam (Shasta and Siskiyou Counties, California). Department of Parks and Recreation Office of Historic Preservation, 2 pp.
- Department of Water Resources. 2004. California's Groundwater Bulletin 118 San Joaquin Valley Groundwater Basin, Modesto Subbasin. Sacramento, California. Department of Water Resources, 6 pp.
- Department of Water Resources. 2009. Central Valley Spring-Run Chinook Salmon and Steelhead in the Sacramento River Basin Background Report.
- Department of Water Resources. 2011. 2012 Central Valley Flood Protection Plan A Path for Improving Public Safety, Environmental Stewardship, and Long-Term Economic Stability. Department of Water Resources, 162 pp.
- Department of Water Resources. 2016. Clifton Court Forebay Predator Reduction: Electrofishing Annual Report 2016.
- Department of Water Resources. 2017. Clifton Court Forebay Predator Reduction Electrofishing Study Annual Report 2017. California Department of Water Resources, 133 pp.
- Dernie, K. M., M. J. Kaiser, and R. M. Warwick. 2003. Recovery Rates of Benthic Communities Following Physical Disturbance. *Journal of Animal Ecology* 72:1043-1056.
- Dettinger, M. D., Daniel R. Cayan, Mary K. Meyer, Anne E. Jeton. 2004. Simulated Hydrologic Responses to Climate Variations and Changes in the Merced, Carson and American River Basins, Sierra Nevada, California, 1900-2099. *Climatic Change* 62(62):283-317.
- Dettinger, M. D. 2005. From Climate-Change Spaghetti to Climate-Change Distributions for 21st Century California. *San Francisco Estuary and Watershed Science* 3(1):1-14.
- Dettinger, M. D. and D. R. Cayan. 1995. Large-Scale Atmospheric Forcing of Recent Trends toward Early Snowmelt Runoff in California. *Journal of Climate* 8(3):606-623.
- Dettinger, M. D., D. R. Cayan, M. K. Meyer, and A. E. Jeton. 2004. Simulated Hydrologic Responses to Climate Variations and Change in the Merced, Carson, and American River Basins. *Climatic Change* 62:283-317.
- Dettinger, M. D., D. R. Cayan, M. K. Meyer, and A. E. Jeton. 2004. Simulated Hydrologic Responses to Climate Variations and Changes in the Merced, Carson and American River Basins, Sierra Nevada, California, 1900-2099. *Climatic Change* 62(62):283-317.
- Dettman, D. H., D. W. Kelley, and W. T. Mitchell. 1987. The Influence of Flow on Central Valley Salmon. Department of Water Resources.
- DeVries, P. 1997. Riverine Salmonid Egg Burial Depths: Review of Published Data and Implications for Scour Studies. *Canadian Journal of Fisheries and Aquatic Sciences* 54(8):1685-1698.
- Dietrich, W. E., J. W. Kirchner, H. Ikeda, and F. Iseya. 1989. Sediment Supply and the Development of the Coarse Surface Layer in Gravel-Bedded Rivers. *Macmillan Magazines Ltd*,:3.

- DiGennaro, B., D. Reed, C. Swanson, L. Hastings, Z. Hymanson, M. Healey, S. Siegel, S. Cantrell, and B. Herbold. 2012. Using Conceptual Models in Ecosystem Restoration Decision Making: An Example from the Sacramento-San Joaquin River Delta, California. *San Francisco Estuary and Watershed Science* 10(3):1-15.
- Dimacali, R. L. 2013. A Modeling Study of Changes in the Sacramento River Winter-Run Chinook Salmon Population Due to Climate Change. Master's Thesis. California State University, Sacramento.
- Dolloff, C. A. 1983. The Relationships of Wood Debris to Juvenile Salmonid Production and Microhabitat Selection in Small Southeast Alaska Streams. Montana State University.
- Domagalski, J. and P. D. Dileanis. 2000. Water-Quality Assessment of the Sacramento River Basin, California—Water Quality of Fixed Sites, 1996–1998. U.S. Department of the Interior, 69 pp.
- Domagalski, J. L., D. L. Knifong, P. D. Dileanis, L. R. Brown, J. T. May, V. Connor, and C. N. Alpers. 2000. Water Quality in the Sacramento River Basin California, 1994–1998 U.S. Geological Survey Circular 1215. U.S. Department of the Interior, 44 pp.
- Domagalski, J. L., D. L. Knifong, P. D. Dileanis, L. R. Brown, J. T. May, V. Connor, and C. N. Alpers. 2000. Water Quality in the Sacramento River Basin, California, 1994–98. U.S. Geological Survey, U.S. Geological Survey Circular 1215, 1-44 pp.
- Domagalski, J. L., D. L. Knifong, P. D. Dileanis, L. R. Brown, J. T. May, V. Connor, and C. N. Alpers. 2000. Water Quality in the Sacramento River Basin, California, 1994–1998. U.S. Geological Survey Circular 1215.
- Donaldson, E. M., R. H. Devlin, I. I. Solar, and F. Piferrer. 1993. The Reproductive Containment of Genetically Altered Salmonids. Pages 113-129 *in*.
- Donohoe, C. J., P. B. Adams, and C. F. Royer. 2008. Influence of Water Chemistry and Migratory Distance on Ability to Distinguish Progeny of Sympatric Resident and Anadromous Rainbow Trout (*Oncorhynchus mykiss*). *Canadian Journal of Fisheries and Aquatic Sciences* 65(6):1060-1075.
- Doremus, H., W. L. Andreen, A. Camacho, D. A. Farber, R. L. Glicksman, D. Goble, B. C. Karkkainen, D. Rohlf, A. D. Tarlock, S. B. Zellmer, S. Jones, and Y. Huang. 2011. Making Good Use of Adaptive Management. Center for Progressive Reform,.
- Dosskey, M. G., P. Vidon, N. P. Gurwick, C. J. Allan, T. P. Duval, and R. Lowrance. 2010. The Role of Riparian Vegetation in Protecting and Improving Chemical Water Quality in Streams. *Journal of the American Water Resources Association* 46(2):261-277.
- Dosskey, M. G., P. Vidon, N. P. Gurwick, C. J. Allan, T. P. Duval, and R. Lowrance. 2010. The Role of Riparian Vegetation in Protecting and Improving Chemical Water Quality in Streams. Wiley Online Library.
- Douglas, P. L. 1995. Habitat Relationships of Overwintering Rainbow Trout in the Santa Ynez River Drainage. Page 84.
- Doull, J. and L. Cassaret. 1996. Cassaret and Doull's Toxicology: The Basic Science of Poisons *in*. McGraw-Hill Companies, Inc., United States.
- Dredging Today. 2011. USA Mercury Contamination in California's South Yuba River Causes Concern. <https://www.dredgingtoday.com/2011/01/26/usa-mercury-contamination-in-california%E2%80%99s-south-yuba-river-causes-concern>. 5/7/2018.
- Drennan, J. D., S. E. LaPatra, J. T. Siple, S. Ireland, and K. D. Cain. 2006. Transmission of White Sturgeon Iridovirus in Kootenai River White Sturgeon *Acipenser transmontanus*. *Dis Aquat Organ* 70:37-45.

- DuBois, C. 1935. Wintu Ethnography. University of California Publications in American Archaeology and Ethnology 36(1):148.
- Dubois, J. 2009. Factors Affecting Harvest and Fishing Effort in the Anadromous Striped Bass Fishery of California. California Department of Fish and Game, 17 pp.
- Dubois, J., B. Beckett, and T. Matt. 2010. 2009 Sturgeon Fishing Report Card: Preliminary Data Report. California Department of Fish and Game, 27 pp.
- DuBois, J. and A. Danos. 2017. 2016 Sturgeon Fishing Report Card: Preliminary Data Report. California Department of Fish and Wildlife, 16 pp.
- Dubois, J., M. Gingras, and R. Mayfield. 2009. 2008 Sturgeon Fishing Report Card: Preliminary Data Report. California Department of Fish and Game, 12 pp.
- DuBois, J. and M. D. Harris. 2015. 2014 Sturgeon Fishing Report Card: Preliminary Data Report. California Department of Fish and Wildlife, 14 pp.
- DuBois, J. and M. D. Harris. 2015. 2015 Field Season Summary for the Sturgeon Population Study. California Department of Fish and Wildlife, 1-11 pp.
- DuBois, J. and M. D. Harris. 2016. 2015 Sturgeon Fishing Report Card: Preliminary Data Report. California Department of Fish and Wildlife, 14 pp.
- DuBois, J., M. D. Harris, and J. Mauldin. 2014. 2013 Sturgeon Fishing Report Card: Preliminary Data Report. California Department of Fish and Wildlife, 14 pp.
- DuBois, J., T. Matt, and T. MacColl. 2011. 2010 Sturgeon Fishing Report Card: Preliminary Data Report. California Department of Fish and Game, 14 pp.
- DuBois, R. B. and S. P. Gloss. 1993. Mortality of Juvenile American Shad and Striped Bass Passed through Ossberger Crossflow Turbines at a Small-Scale Hydroelectric Site. North American Journal of Fisheries Management 13(1):178-185.
- Dubrovsky, N. M., D.L. Knifong, P.D. Dileanis, L.R. Brown, J.T. May, V. Connor, and C.N. Alpers. 1998. Water Quality in the Sacramento River Basin. U.S. Geological Survey Circular 1215. United States Geological Survey.
- Dugdale, R. C., F. P. Wilkerson, V. E. Hogue, and A. Marchi. 2007. The Role of Ammonium and Nitrate in Spring Bloom Development in San Francisco Bay. Estuarine Coastal and Shelf Science 73(1-2):17-29.
- Dumbauld, B. R., D. L. Holden, and O. P. Langness. 2008. Do Sturgeon Limit Burrowing Shrimp Populations in Pacific Northwest Estuaries? Environmental Biology of Fishes 83(3):283-296.
- Dunbrack, R. L. and L. M. Dill. 1984. Three-Dimensional Prey Reaction Field of the Juvenile Coho Salmon (*Oncorhynchus kisutch*). Canadian Journal of Fisheries and Aquatic Science 41(8):1176-1182.
- Dunford, W. E. 1975. Space and Food Utilization by Salmonids in Marsh Habitats of the Fraser River Estuary. Master's Thesis. University of British Columbia
- Dunham, J. B., M. K. Young, R. E. Gresswell, and B. E. Rieman. 2003. Effects of Fire on Fish Populations: Landscape Perspectives on Persistence of Native Fishes and Nonnative Fish Invasions. Forest Ecology and Management(178):183-196.

- Durand, J., W. Fleenor, R. McElreath, M. J. Santos, and P. Moyle. 2016. Physical Controls on the Distribution of the Submersed Aquatic Weed *Egeria densa* in the Sacramento-San Joaquin Delta, California and Implications for Habitat Restoration. *San Francisco Estuary and Watershed Science* 14(1):1-20.
- Dutta, L. and P. Sookachoff. 1975. Assessing the Impact of a 24" Suction Pipeline Dredge on Chum Salmon Fry in the Fraser River. Environment Canada, Technical Report Series No. PAC/T-75-26, 1-29 pp.
- DuVair, P. 2003. Climate Change and California: Staff Report. California Energy Commission, 46 pp.
- East Bay Municipal Utility District. 2008. Lower Mokelumne River Project Joint Settlement Agreement Ten-Year Review Partnership. California Department of Fish and Game and U.S. Fish and Wildlife Service.
- Eaton, J. G., J. H. McCormick, B. E. Goodno, D. G. O'Brien, H. G. Stefan, M. Hondzo, and R. M. Scheller. 1995. A Field Information-Based System for Estimating Fish Temperature Tolerances. *Fisheries* 20(4):10-18.
- Ebersole, J. L., W. J. Liss, and C. A. Frissell. 2001. Relationship between Stream Temperature, Thermal Refugia and Rainbow Trout *Oncorhynchus mykiss* Abundance in Arid-Land Streams in the Northwestern United States. *Ecology of Freshwater Fish* 10:1-10.
- Ecosystem Sciences. 2004. Feather River Watershed Management Strategy for Implementing the Monterey Settlement Agreement. Prepared for Plumas County Flood Control and Water Conservation District.
- EDAW. 2005. Lower Putah Creek Watershed Management Action Plan, Phase 1 Resource Assessments. Prepared for Lower Putah Creek Coordinating Committee.
- Edwards, P. E. T., A. E. Sutton-Grier, and G. E. Coyle. 2013. Investing in Nature: Restoring Coastal Habitat Blue Infrastructure and Green Job Creation. *Marine Policy* 38:65-71.
- Eilers, C. D. 2008. Review of Present Steelhead Monitoring Programs in the California Central Valley. Pacific States Marine Fisheries Commission, Agreement No. P0685619.
- Eilers, C. D. and J. Bergman. 2010. A Comprehensive Monitoring Plan for Steelhead in the California Central Valley.
- Eilers, C. D., J. Bergman, and R. Nelson. 2010. A Comprehensive Monitoring Plan for Steelhead in the California Central Valley. The Resources Agency: Department of Fish and Game: Fisheries Branch Administrative Report Number: 2010-2.
- Emlen, J. M. 1991. Heterosis and Outbreeding Depression: A Multilocus Model and an Application to Salmon Production. *Fisheries Research*:187-212.
- Emmett, R. L., S. A. Hinton, S. L. Stone, and M. E. Monaco. 1991. Distribution and Abundance of Fishes and Invertebrates in West Coast Estuaries Volume 11: Species Life History Summaries. National Oceanic and Atmospheric Administration Estuarine Living Marine Resources Program, ELMR Report Number 8, 1-8 pp.
- Emmett, R. L., S. L. Stone, S. A. Hinton, and M. E. Monaco. 1991. Distribution and Abundance of Fishes and Invertebrates in West Coast Estuaries Volume II: Species Life History Summaries. NOAA/NOS Strategic Environmental Assessments Division, ELMR Report Number 8, 329 pp.
- Engas, A. and S. Lokkeborg. 2002. Effects of Seismic Shooting and Vessel-Generated Noise on Fish Behaviour and Catch Rates. *Bioacoustics* 12(2-3):313-316.
- Engas, A., S. Lokkeborg, E. Ona, and A. V. Soldal. 1996. Effects of Seismic Shooting on Local Abundance and Catch Rates of Cod (*Gadus morhua*) and Haddock (*Melanogrammus aeglefinus*). *Canadian Journal of Fisheries and Aquatic Sciences* 53(10):2238-2249.

- Engas, A., O. A. Misund, A. V. Soldal, B. Horvei, and A. Solstad. 1995. Reactions of Pinned Herring and Cod to Playback of Original, Frequency-Filtered and Time-Smoothed Vessel Sound. *Fisheries Research* 22(3-4):243-254.
- Enger, P. S. 1981. Frequency Discrimination in Teleosts – Central or Peripheral? . Page 7 *in* Hearing and Sound Communication in Fishes. Proceedings in Life Sciences, W. N. Tavolga, A. N. Popper, and R. R. Fay, editors. Springer, New York.
- Enos, C., J. Sutherland, and M. Nobriga. 2007. Results of a Two Year Fish Entrainment Study at Morrow Island Distribution System in Suisun Marsh. *IEP Newsletter* 20:10-20.
- Environment and Climate Change Canada. 2018. The Effects of Non-Point Source Pollution in Small Urban and Agricultural Streams Interpretive Report. Environment and Climate Change.
- Environmental Protection Agency. 1998. Final Guidance for Incorporating Environmental Justice Concerns in EPA's NEPA Compliance Analyses April 1998. Environmental Protection Agency, 76 pp.
- EPRI (Electric Power Research Institute). 2013. EPRI Workshop on EMF and Aquatic Life, Technical Report.
- Erickson, D., J. North, J. Hightower, J. Weber, and L. Lauck. 2002. Movement and Habitat Use of Green Sturgeon *Acipenser medirostris* in the Rogue River, Oregon, USA. *Journal of Applied Ichthyology* 18(4-6):565-569.
- Erickson, D. L., J.A. North, J.E. Hightower, J. Weber, and L. Lauck. 2002. Movement and Habitat Use of Green Sturgeon *Acipenser medirostris* in the Rogue River, Oregon, USA. *Journal of Applied Ichthyology* 18:565-569.
- Erickson, D. L. and J. E. Hightower. 2007. Oceanic Distribution and Behavior of Green Sturgeon. *American Fisheries Society Symposium* 56:197-211.
- Erickson, D. L. and M. A. H. Webb. 2007. Spawning Periodicity, Spawning Migration, and Size at Maturity of Green Sturgeon, *Acipenser medirostris*, in the Rogue River, Oregon. *Environmental Biology of Fishes* 79(3-4):255-268.
- Escobar-Arias, M. I. and G. B. Pasternack. 2010. A Hydrogeomorphic Dynamics Approach to Assess in-Stream Ecological Functionality Using the Functional Flows Model, Part 1-Model Characteristics. *River Research and Applications* 26(9):1103-1128.
- Escobar-Arias, M. I. and G. B. Pasternack. 2011. Differences in River Ecological Functions Due to Rapid Channel Alteration Processes in Two California Rivers Using the Functional Flows Model, Part 2-Model Applications. *River Research and Applications* 27(1):1-22.
- Everest, F. H. 1973. Ecology and Management of Summer Steelhead in the Rogue River. Oregon State Game Commission, Federal Aid to Fish Restoration Project AFS 31 Final Report, 49 pp.
- Everest, F. H. and D. W. Chapman. 1972. Habitat Selection and Spatial Interaction by Juvenile Chinook Salmon and Steelhead Trout in Two Idaho Streams. *Journal of the Fisheries Research Board of Canada* 29(1):91-100.
- Ewen, J. G., K. Acevedo-Whitehouse, M. R. Alley, C. Carraro, A. W. Sainsbury, K. Swinnerton, and R. Woodroffe. 2012. Empirical Consideration of Parasites and Health in Reintroduction.
- Ewen, J. G., D. P. Armstrong, K. A. Parker, and P. J. Seddon. 2012. Reintroduction Biology, Integrating Science and Management. Page 4 *in*. Wiley-Blackwell.
- Ewing, R. 1999. Diminishing Returns: Salmon Decline and Pesticides. Oregon Pesticide Education Network.
- Executive Order. 2015a. Executive Order 13690 and the New Federal Flood Risk Management Standard. 2 pp.

- Fairey, R., K. Taberski, S. Lamerdin, E. Johnson, R. P. Clark, J. W. Downing, J. Newman, and M. Petreas. 1997. Organochlorines and Other Environmental Contaminants in Muscle Tissues of Sportfish Collected from San Francisco Bay. *Marine Pollution Bulletin* 34(12):1058-1071.
- Farr, R. A., M. L. Hughes, and T. A. Rien. 2005. Final Summary Report: Green Sturgeon Population Characteristics in Oregon
- Farrell, A. P. 2013. Aerobic Scope and Its Optimum Temperature: Clarifying Their Usefulness and Limitations - Correspondence on *J. Exp. Biol.* 216, 2771-2782. *J Exp Biol* 216(Pt 23):4493-4494.
- Farrell, A. P., N. A. Fanguie, C. E. Verhille, D. E. Cocherell, and K. K. English. 2015. Thermal Performance of Wild Juvenile *Oncorhynchus mykiss* in the Lower Tuolumne River: A Case for Local Adjustment to High River Temperature. 58 pp.
- Fausch, K. D. and R. J. White. 1986. Competition among Juveniles of Coho Salmon, Brook Trout, and Brown Trout in a Laboratory Stream, and Implications for Great Lakes Tributaries •. *Transactions of the American Fisheries Society* 115(3):363-381.
- Federal Energy Regulatory Commission. 1994. Impacts of Hydroelectric Plant Tailraces on Fish Passage, A Report on Effects of Tailraces on Migratory Fish and Use of Barriers, Modified Project Operations, and Spills for Reducing Impacts. 112 pp.
- Federal Energy Regulatory Commission. 2007. Final Environmental Impact Statement - Oroville Facilities California (FERC Project No. 2100). FERC/FEIS-0202F.
- Federal Energy Regulatory Commission. 2007. Final Environmental Impact Statement for Hydropower License: Oroville Facilities (FERC Project No. 2100-052) FERC/FEID-020F.
- Federal Energy Regulatory Commission. 2009. Order Amending License Project 1121-082 Pacific Gas and Electric Company Battle Creek Hydroelectric Project.
- Federal Energy Regulatory Commission. 2009. Order on Rehearing, Amending License, Denying Late Intervention, Denying Petition, and Directing Appointment of a Presiding Judge for a Proceeding on Interim Conditions. 46 pp.
- Federal Energy Regulatory Commission. 2011. Final Environmental Impact Statement for Hydropower License McCloud-Pit Hydroelectric Project FERC Project No. 2106, California. Federal Energy Regulatory Commission, 706 pp.
- Feely, R. A., C. L. Sabine, J. M. Hernandez-Ayon, D. Ianson, and B. Hales. 2008. Evidence for Upwelling of Corrosive "Acidified" Water onto the Continental Shelf. *Science* 320(5882):1490-1402.
- Feist, B. E., J. J. Anderson, and R. Miyamoto. 1992. Potential Impacts of Pile Driving on Juvenile Pink (*Oncorhynchus gorbuscha*) and Chum (*O. keta*) Salmon Behavior and Distribution. University of Washington.
- Feist, B. E., E. Buhle, P. Arnold, J. W. Davis, and N. L. Scholz. 2011. Landscape Ecotoxicology of Coho Salmon Spawner Mortality in Urban Streams. *PLoS ONE* 6(8):e23424.
- Feist, B. E., E. R. Buhle, P. Arnold, J. W. Davis, and N. L. Scholz. 2011. Landscape Ecotoxicology of Coho Salmon Spawner Mortality in Urban Streams. *PLoS ONE* 6(8):e23424.
- Feist, G. W., M. A. Webb, D. T. Gundersen, E. P. Foster, C. B. Schreck, A. G. Maule, and M. S. Fitzpatrick. 2005. Evidence of Detrimental Effects of Environmental Contaminants on Growth and Reproductive Physiology of White Sturgeon in Impounded Areas of the Columbia River. *Environmental Health Perspectives* 113(12):1675-1682.

- Feldhaus, J. W. 2006. Heat Shock Proteins and Physiological Stress in Redband Rainbow Trout. Oregon State University.
- Fewtrell, J. L. 2003. The Response of Finfish and Marine Invertebrates to Seismic Survey Noise. Ph.D. Dissertation. Curtin University of Technology, Perth, Australia.
- Fewtrell, J. L. and R. D. McCauley. 2012. Impact of Air Gun Noise on the Behaviour of Marine Fish and Squid. *Marine Pollution Bulletin* 64(5):984-993.
- Feyrer, F. and M. P. Healey. 2003. Fish Community Structure and Environmental Correlates in the Highly Altered Southern Sacramento-San Joaquin Delta. *Environmental Biology of Fishes* 66(2):123-132.
- Feyrer, F., B. Herbold, S. A. Matern, and P. B. Moyle. 2003. Dietary Shifts in a Stressed Fish Assemblage: Consequences of a Bivalve Invasion in the San Francisco Estuary. *Environmental Biology of Fishes* 67(3):277-288.
- Feyrer, F., T. Sommer, and W. Harrell. 2006. Importance of Flood Dynamics versus Intrinsic Physical Habitat in Structuring Fish Communities: Evidence from Two Adjacent Engineered Floodplains on the Sacramento River, California. *North American Journal of Fisheries Management* 26(2):408-417.
- Ficklin, D. L., I. T. Stewart, and E. P. Maurer. 2012. Projections of 21st Century Sierra Nevada Local Hydrologic Flow Components Using an Ensemble of General Circulation Models. *Journal of the American Water Resources Association* 48(6):1104-1125.
- Finneran, J. J. and A. K. Jenkins. 2012. Criteria and Thresholds for U.S. Navy Acoustic and Explosive Effects Analysis. SSC Pacific.
- Fish and Wildlife Service. 1981. U.S. Fish and Wildlife Service Mitigation Policy. *Federal Register* 46(15):7644-7663.
- Fish Facilities Technical Team. 2013. Work Plan: Intake Design Criteria and Performance Monitoring Development (Draft). 1-39 pp.
- Fish, M. A. 2010. A White Sturgeon Year-Class Index for the San Francisco Estuary and Its Relation to Delta Outflow. *IEP Newsletter* 23(2):80-84.
- FISHBIO. 2012. Sacramento River Bank Protection Project Long-Term Aquatic Monitoring Fish Sampling and Habitat Characterization Fiscal Years 2011 through 2015. Annual Report 2012 - Final.
- FISHBIO. 2012. San Joaquin Basin Update. *FISHBRO* 2012(15):18.
- FISHBIO. 2015. Adult Chinook Salmon Adults Observed in the Video Weir and Provided in Excel Tables During the Spring on the Stanislaus River, Unpublished Data.
- FISHBIO and Normandeau Associates. 2012. Draft Stanislaus River Chinook Fry Habitat Assessment 2007- 2011 Summary Report.
- FISHBIO, L. 2013. 4(d) Permit #16825 Annual Report - Tuolumne River Rotary Screw Trap (2012 Season). Oakdale, CA.
- FISHBIO, L. 2013. 10(a)(1)(A) Permit #16531 Annual Report - Merced River Salmonid Monitoring. Oakdale, CA.
- FISHBIO LLC. 2012. San Joaquin Basin Update. San Joaquin Basin Newsletter.
- FISHBIO LLC. 2013. 4(d) Permit #16822 Annual Report - Tuolumne River Weir (2012 Season).

- Fisher, F. 1992. Chinook Salmon, *Oncorhynchus tshawytscha*, Growth and Occurrence in the Sacramento-San Joaquin River System. California Department of Fish and Game, 1-45 pp.
- Fisher, F. W. 1992. Chinook Salmon, *Oncorhynchus tshawytscha*, Growth and Occurrence in the Sacramento-San Joaquin River System. California Department of Fish and Game, 45 pp.
- Fisher, F. W. 1994. Past and Present Status of Central Valley Chinook Salmon. *Conservation Biology* 8(3):870-873.
- Fisheries and Oceans Canada. 2014. Recovery Strategy for White Sturgeon (*Acipenser transmontanus*) in Canada (Final). In Species at Risk Act Recovery Strategy Series. Ottawa.
- Fisheries Hydroacoustic Working Group. 2008. Agreement in Principle for Interim Criteria for Injury to Fish from Pile Driving Activities. Page 3.
- Fisheries Hydroacoustic Working Group. 2008. Memo: Agreement in Principal for Interim Criteria for Injury to Fish from Pile Driving Activities.
- Fitzpatrick, J., J. Alley, J. Brigham-Grette, G. H. Miller, L. Polyak, and M. Serreze. 2009. Past Climate Variability and Change in the Arctic and at High Latitudes.
- Fleeger, J. W., K. R. Carman, and R. M. Nisbet. 2003. Indirect Effects of Contaminants in Aquatic Ecosystems. *Science of the Total Environment* 317:207-233.
- Fleit, G., S. Baranya, N. Ruthur, H. Bihs, T. Kramer, and J. Jozsa. 2016. Investigation of the Effects of Ship Induced Waves on the Littoral Zone with Field Measurements and CFD Modeling. *Water* 8(300):1-21.
- Flosi, G., S. Downie, J. Hopelain, M. Bird, R. Coey, and B. Collins. 1998. California Salmonid Stream Habitat Restoration Manual 2273 pp.
- Flosi, G., S. Downie, J. Hopelain, M. Bird, R. Coey, and B. Collins. 2010. California Salmonid Stream Habitat Restoration Manual. California Department of Fish and Game.
- Fontaine, B. L. 1987. An Evaluation of the Effectiveness of Instream Structures for Steelhead Trout Rearing Habitat. Oregon State University.
- Ford, J. K., G. M. Ellis, P. F. Olesiuk, and K. C. Balcomb. 2010. Linking Killer Whale Survival and Prey Abundance: Food Limitation in the Oceans' Apex Predator? *Biol Lett* 6(1):139-142.
- Ford, J. K. B. and G. M. Ellis. 2006. Selective Foraging by Fish-Eating Killer Whales *Orcinus orca* in British Columbia. *Marine Ecology Progress Series* 316:185-199.
- Ford, J. K. B., G. M. Ellis, and P. F. Olesiuk. 2005. Linking Prey and Population Dynamics: Did Food Limitation Cause Recent Declines of 'Resident' Killer Whales (*Orcinus orca*) in British Columbia? Fisheries and Oceans Canada, 1-31 pp.
- Ford, M. J. 2002. Selection in Captivity During Supportive Breeding May Reduce Fitness in the Wild. *Conservation Biology* 16(3):815-825.
- Ford, M. J., M. B. Hanson, J. A. Hempelmann, K. L. Ayres, C. K. Emmons, G. S. Schorr, R. W. Baird, K. C. Balcomb, S. K. Wasser, K. M. Parsons, and K. Balcomb-Bartok. 2011. Inferred Paternity and Male Reproductive Success in a Killer Whale (*Orcinus orca*) Population. *Journal of Heredity* 102(5):537-553.
- Ford, M. J., J. Hempelmann, M. B. Hanson, K. L. Ayres, R. W. Baird, C. K. Emmons, J. I. Lundin, G. S. Schorr, S. K. Wasser, and L. K. Park. 2016. Estimation of a Killer Whale (*Orcinus orca*) Population's Diet Using Sequencing Analysis of DNA from Feces. *PLoS ONE* 11(1):1-14.

- Ford, T. and L. R. Brown. 2012. Distribution and Abundance of Chinook Salmon and Resident Fishes of the Lower Tuolumne River. *Fish Bulletin* 179 2:254-304.
- Ford, T. and S. Kirihaara. 2009. Lower Tuolumne River Annual Report - 2009 Snorkel Report and Summary Update. Report 2009-5, Turlock and Modesto Irrigation Districts and Stillwater Sciences.
- Ford, T. and S. Kirihaara. 2010. 2009 Lower Tuolumne River Annual Report - Spawning Survey Summary Update. Report Number 2009-2.
- Ford, T. and S. Kirihaara. 2010. Tuolumne River *Oncorhynchus mykiss* Monitoring Report., 39 pp.
- Forest Guardians v U.S. Fish and Wildlife Service. 2010. Forest Guardians versus U.S. Fish and Wildlife Service. 611 F.3d 692 (10th Cir. 2010). 23 pp.
- Foster, E., M. Fitzpatrick, G. Feist, C. Schreck, and J. Yates. 2001. Gonad Organochlorine Concentrations and Plasma Steroid Levels in White Sturgeon (*Acipenser transmontanus*) from the Columbia River, USA. *Bulletin of Environmental Contamination and Toxicology* 67(2):239-245.
- Foster, E., M. Fitzpatrick, G. Feist, C. Schreck, J. Yates, J. Spitsbergen, and J. Heidel. 2001. Plasma Androgen Correlation, Erod Induction, Reduced Condition Factor, and the Occurrence of Organochlorine Pollutants in Reproductively Immature White Sturgeon (*Acipenser transmontanus*) from the Columbia River, USA. *Archives of Environmental Contamination and Toxicology* 41(2):182-191.
- Fowler, H. J., S. Blenkinsop, and C. Tebaldi. 2007. Linking Climate Change Modelling to Impacts Studies: Recent Advances in Downscaling Techniques for Hydrological Modelling. *International Journal of Climatology* 27(12):1547-1578.
- Fox, G. A. and B. E. Kendall. 2002. Demographic Stochasticity and the Variance Reduction Effect. *Ecology* 83(7):1928-1934.
- Francis, R. C. and S. R. Hare. 1994. Decadal Scale Regime Shifts in the Large Marine Ecosystems of the Northeast Pacific: A Case for Historical Science. *Fisheries Oceanography* 3 (4):279-291.
- Francis, R. C. and N. J. Mantua. 2003. Climatic Influences on Salmon Populations in the Northeast Pacific In: Assessing Extinction Risk for West Coast Salmon, Proceedings of the Workshop. National Marine Fisheries Service and Fisheries Research Institute Joint Institute for the Study of the Atmosphere and Oceans University of Washington, NOAA Technical Memorandum NMFS-NWFSC-56, 30 pp.
- Frankham, R. 2005. Genetics and Extinction. *Biological Conservation* 126(2):131-140.
- Franklin, I. R. 1980. Evolutionary Change in Small Populations. Pages 135-149 *in* Conservation Biology: An Evolutionary-Ecological Perspective, M. E. Soulé and B. A. Wilcox, editors. Sinauer Associates, Sunderland, MA.
- Franks, S. 2014. Possibility of Natural Producing Spring-Run Chinook Salmon in the Stanislaus and Tuolumne Rivers. National Marine Fisheries Service.
- Franks, S. 2014. Possibility of Natural Producing Spring-Run Chinook Salmon in the Stanislaus and Tuolumne Rivers, Unpublished Work. National Oceanic Atmospheric Administration.
- Franks, S. E. 2015. Spring-Running Salmon in the Stanislaus and Tuolumne Rivers and an Overview of Spring-Run Recovery. National Marine Fisheries Service Sacramento, CA.

- Franks, S. E. 2015. Spring-Running Salmon in the Stanislaus and Tuolumne Rivers and an Overview of Spring-Run Recovery. National Marine Fisheries Service.
- Fretwell, M. R. 1989. Homing Behavior of Adult Sockeye Salmon in Response to a Hydroelectric Diversion of Homestream Waters. International Pacific Salmon Fisheries Commission Bulletin 99:42.
- Frew, J. A. 2013. Environmental and Systemic Exposure Assessment for Green Sturgeon Following Application of Imidacloprid for the Control of Burrowing Shrimp in Willapa Bay, Washington. University of Washington.
- Frew, J. A., M. Sadilek, and C. E. Grue. 2015. Assessing the Risk to Green Sturgeon from Application of Imidacloprid to Control Burrowing Shrimp in Willapa Bay, Washington-Part I: Exposure Characterization. Environmental Toxicology and Chemistry 34(11):2533-2541.
- Friday, M. J. 2006. An Assessment of Growth of Young-of-the-Year Lake Sturgeon in the Kaministiquia River, Ontario, 2006. Technical Report No. 06.06, Upper Great Lakes Management Unit.
- Fry, D. H. 1961. King Salmon Spawning Stocks of the California Central Valley, 1940-1959. California Fish and Game 47.
- Fry, D. H., Jr., 1961. King Salmon Spawning Stocks of the California Central Valley, 1940-1959 California Fish and Game 47(1):55-71.
- Fry, F. E. J. and J. S. Hart. 1948. The Relation of Temperature to Oxygen Consumption in the Goldfish. University of Toronto, Toronto, Canada.
- Fukushima, L. and E. W. Lesh. 1998. Adult and Juvenile Anadromous Salmonid Migration Timing in California Streams. California Fish and Game 84(3):133-145.
- Fukushima, M., T. J. Quinn, and W. W. Smoker. 1998. Estimation of Eggs Lost from Superimposed Pink Salmon (*Oncorhynchus gorbuscha*) Redds. Canadian Journal of Fisheries and Aquatic Sciences 55(3):618-625.
- Furnish, J. 2007. Guide to Sensitive Aquatic Mollusks of the U.S. Forest Service Pacific Southwest Region. USDA Forest Service, Pacific Southwest Region. PCWA-L-568.
- Gabel, F., S. Stoll, P. Fischer, M. T. Pusch, and X. F. Garcia. 2011. Waves Affect Predator-Prey Interactions between Fish and Benthic Invertebrates. Oecologia 165(1):101-109.
- Gadomski, D. M. and M. J. Parsley. 2005. Effects of Turbidity, Light Level, and Cover on Predation of White Sturgeon Larvae by Prickly Sculpins. Transactions of the American Fisheries Society 134(2):369-374.
- Gale, R., D. Papoulias, and D. Tillitt. 2018. USGS Columbia Environmental Research Center Project: Reproductive Effects of Contaminants on Shovelnose Sturgeon. <http://www.cerc.usgs.gov/Projects.aspx?ProjectId=141> Accessed 4/17/18.
- Gale, S. B., A. V. Zale, and C. G. Clancy. 2008. Effectiveness of Fish Screens to Prevent Entrainment of Westslope Cutthroat Trout into Irrigation Canals. North American Journal of Fisheries Management 28:1541-1553.
- Game, C. D. o. F. a. 1998. Central Valley Anadromous Fish-Habitat Evaluations, October 1996 through September 1997.
- Gamel, C. M., R. W. Davis, J. H. M. David, and M. A. Meyer. 2005. Reproductive Energetics and Female Attendance Patterns of Cape Fur Seals (*Arctocephalus Pusillus Pusillus*) During Early Lactation. The American Midland Naturalist 153(1):152-170.

- Gamperl, A. K., K. J. Rodnick, H. A. Faust, E. C. Venn, M. T. Bennett, L. I. Crawshaw, E. R. Keeley, M. S. Powell, and H. W. Li. 2002. Metabolism, Swimming Performance, and Tissue Biochemistry of High Desert Redband Trout (*Oncorhynchus mykiss* Ssp.): Evidence for Phenotypic Differences in Physiological Function. *Physiological and Biochemical Zoology* 75:19.
- Ganssle, D. 1966. Fishes and Decapods of San Pablo and Suisun Bays. *Ecological Studies of the Sacramento-San Joaquin Estuary, Part I: Zooplankton, Zoobenthos, and Fishes of San Pablo and Suisun Bays, Zooplankton and Zoobenthos of the Delta.* *Fish Bulletin* 133:64-94.
- Gard, M. 2006. Modeling Changes in Salmon Spawning and Rearing Habitat Associated with River Channel Restoration. *International Journal of River Basin Management* 4(3):201-211.
- Gard, M. 2009. Direct Testimony of Mark F. Gard Page 22, Sacramento, California.
- Gargett, A. E. 1997. The Optimal Stability 'Window': A Mechanism Underlying Decadal Fluctuations in North Pacific Salmon Stocks? *Fisheries Oceanography* 6(2):109-117.
- Garman, C. 2015. Butte Creek Spring-Run Chinook Salmon, *Oncorhynchus Tshawytscha* Pre-Spawn Mortality Evaluation, 2014.
- Garman, C. E. and T. R. McReynolds. 2008. Butte and Big Chico Creeks Spring-Run Chinook Salmon, *Oncorhynchus Tshawytscha* Life History Investigation 2006-2007. 2008-1.
- Garza, J. C., S. M. Blankenship, C. Lemaire, and G. Charrier. 2008. Genetic Population Structure of Chinook Salmon (*Oncorhynchus tshawytscha*) in California's Central Valley. Final Report for Calfed Project "Comprehensive Evaluation of Population Structure and Diversity for Central Valley Chinook Salmon". 82 pp.
- Garza, J. C. and D. E. Pearse. 2008. Population Genetic Structure of *Oncorhynchus mykiss* in the California Central Valley. Santa Cruz, California.
- Garza, J. C. and D. E. Pearse. 2008. Population Genetic Structure of *Oncorhynchus mykiss* in the California Central Valley: Final Report for California Department of Fish and Game. University of California, Santa Cruz, and National Marine Fisheries Service, Santa Cruz, California.
- Garza, J. C. and D. E. Pearse. 2008. Population Genetic Structure of *Oncorhynchus mykiss* in the California Central Valley: Final Report for California Department of Fish and Game Contract #PO 485303. National Marine Fisheries Service Southwest Fisheries Science Center.
- Gaspin, J. B. 1975. Experimental Investigations of the Effects of Underwater Explosions on Swimbladder Fish. I. 1973 Chesapeake Bay Tests. DTIC Document.
- Geist, D. R., C. S. Abernethy, K. D. Hand, V. I. Cullinan, J. A. Chandler, and P. A. Groves. 2006. Survival, Development, and Growth of Fall Chinook Salmon Embryos, Alevins, and Fry Exposed to Variable Thermal and Dissolved Oxygen Regimes. *Transactions of the American Fisheries Society* 135(6):1462-1477.
- Gende, S. M., R. T. Edwards, M. F. Willson, and M. S. Wipfli. 2002. Pacific Salmon in Aquatic and Terrestrial Ecosystems. *BioScience* 52(10):917-928.
- GenOn Delta LLC. 2011. Pittsburg Generating Station Implementation Plan for the Statewide Water Quality Control Policy on the Use of Coastal and Estuarine Waters for Power Plant Cooling.
- Geraci, J. R. and D. J. St. Aubin. 1990. *Sea Mammals and Oil: Confronting the Risks* in Academic Press, Inc. Academic Press, Inc., San Diego, California.

- Gerasimov, Y. V. and V. D. Limik. 1989. Effects of the Presence of Ambush Predators on the Feeding Behavior of Nonpredatory Fishes. *Journal of Ichthyology* 29(5):110-115.
- Gerrity, P. C., C. S. Guy, and W. M. Gardner. 2006. Juvenile Pallid Sturgeon Are Piscivorous: A Call for Conserving Native Cyprinids. *Transactions of the American Fisheries Society* 135(3):604-609.
- Gerstung, E. 1971. Fish and Wildlife Resources of the American River to Be Affected by the Auburn Dam and Reservoir and the Folsom South Canal, and Measures Proposed to Maintain These Resources. California Department of Fish and Game.
- Gerstung, E. R. 1971. A Report to the California State Water Resources Control Board on the Fish and Wildlife Resources of the American River to Be Affected by the Auburn Dam and Reservoir and the Folsom South Canal and Measures Proposed to Maintain These Resources. C. D. o. F. a. Game, 104 pp.
- Gido, K. B. and J. H. Brown. 1999. Invasion of North American Drainages by Alien Fish Species. *Freshwater Biology* 42(2):387-399.
- Gilardi, K. V., D. Carlson-Bremer, J. A. June, K. Antonelis, G. Broadhurst, and T. Cowan. 2010. Marine Species Mortality in Derelict Fishing Nets in Puget Sound, WA and the Cost/Benefits of Derelict Net Removal. *Marine Pollution Bulletin* 60(3):376-382.
- Gilbert, G. K. 1917. Hydraulic Mining Debris in the Sierra Nevada. US Geological Survey Professional Paper.
- Gingras, M. 1997. Mark/Recapture Experiments at Clifton Court Forebay to Estimate Pre-Screening Loss to Juvenile Fishes: 1976-1993. California Department of Fish and Game, Technical Report 55, 1-26 pp.
- Gingras, M., J. DuBois, and M. A. Fish. 2013. Further Investigations into San Francisco Estuary White Sturgeon (*Acipenser transmontanus*) Year-Class Strength. *IEP Newsletter* 26(4):10-13.
- Giorgi, A., G. A. Swan, W. S. Zaugg, T. Coley, and T. Y. Barila. 1988. Susceptibility of Chinook Salmon Smolts to Bypass Systems at Hydroelectric Dams. *North American Journal of Fisheries Management* 8:25-29.
- Giovannetti, S. and M. Brown. 2007. Central Valley Steelhead and Late Fall Run Chinook Salmon Redd Surveys on Clear Creek, California 2007. U.S. Fish and Wildlife Service, 25 pp.
- Giovannetti, S. and M. Brown. 2008. Steelhead and Late-Fall Chinook Salmon Redd Surveys on Clear Creek, California 2008 Annual Report. U.S. Fish and Wildlife Service, 30 pp.
- Giovannetti, S. and M. R. Brown. 2009. Adult Spring Chinook Salmon Monitoring in Clear Creek, California, 2008 Annual Report. U.S. Fish and Wildlife Service, 38 pp.
- Gisbert, E. and P. Williot. 1997. Larval Behaviour and Effect of the Timing of Initial Feeding on Growth and Survival of Siberian Sturgeon (*Acipenser baeri*) Larvae under Small Scale Hatchery Production. *Aquaculture* 156:63-76.
- Gisiner, R. C. 1998. Proceedings: Workshop on the Effects of Anthropogenic Noise in the Marine Environment, 10-12 February 1998. Office of Naval Research Marine Mammal Science Program, 1-141 pp.
- Gisiner, R. C. 1998. Proceedings: Workshop on the Effects of Anthropogenic Noise in the Marine Environment, 10-12 February 1998. United States, Office of Naval Research.
- Glassner-Shwayder, K. 1996. A Model Comprehensive State Management Plan for the Prevention and Control of Nonindigenous Aquatic Nuisance Species: Report to the Great Lakes States. Great Lakes Commission.

- Gleason, E., M. Gingras, and J. DuBois. 2008. 2007 Sturgeon Fishing Report Card:Preliminary Data Report. California Department of Fish and Game Bay Delta Region, Stockton, CA.
- Glenn County Resource Conservation District. 2009. Lower Stony Creek Restoration Plan.
- Gloss, S. P. and D. H. Wahl. 1983. Mortality of Juvenile Salmonids Passing through Ossberger Crossflow Turbines at Small-Scale Hydroelectric Sites. *Transactions of the American Fisheries Society* 112:194-200.
- Glova, G. J. and M. S. Field-Dodgson. 1995. Behavioral Interaction between Chinook Salmon and Brown Trout Juveniles in a Simulated Stream. *Transactions of the American Fisheries Society* 124(2):194-206.
- Godard, D. R., L. Peters, R. Evans, K. Wautier, P. A. Cott, B. Hanna, and V. Palace. 2008. Development of Histopathology Tools to Assess Instantaneous Pressure Change-Induced Effects in Rainbow Trout (*Onchorhynchus mykiss*) Early Life Stages: Environmental Studies Research Funds Report #164. Environment Canada, 1-92 pp.
- Good, T. P., J. A. June, M. A. Etnier, and G. Broadhurst. 2010. Derelict Fishing Nets in Puget Sound and the Northwest Straits: Patterns and Threats to Marine Fauna. *Marine Pollution Bulletin* 60(1):39-50.
- Good, T. P., R. S. Waples, and P. Adams. 2005. Updated Status of Federally Listed ESUs of West Coast Salmon and Steelhead. National Marine Fisheries Service, NOAA Technical Memorandum NMFS-NWFSC-66, 1-598 pp.
- Goodman, D. 2005. Selection Equilibrium for Hatchery and Wild Spawning Fitness in Integrated Breeding Programs. *Canadian Journal Fisheries Aquatic Science* 62:374-389.
- Goodwin, R. A., J. M. Nestler, J. J. Anderson, and L. J. Weber. 2007. A New Tool to Forecast Fish Movement and Passage. *Hydro Review* 26(4):8.
- Govoni, J. J., L. R. Settle, and M. A. West. 2003. Trauma to Juvenile Pinfish and Spot Inflicted by Submarine Detonations. *Journal of Aquatic Animal Health* 15(2):111-119.
- Grabowski, S. J. 1973. Effects of Fluctuating and Constant Temperatures on Some Hematological Characteristics, Tissue Glycogen Levels, and Growth of Steelhead Trout (*Salmo gairdneri*). Ph.D. Dissertation. University of Idaho. As cited in EPA (2001) Issue Paper 5: Summary of Technical Literature Examining the Physiological Effects of Temperature on Salmonids. EPA-910-D-01-005.
- Graham Matthews & Associates. 2008. Churn Creek Fisheries Restoration Assessment: Constraints and Restoration Opportunities, A Reconnaissance Level Geomorphic Assessment and Limiting Factors Analysis.
- Grant, G. E., J. C. Schmidt, and S. L. Lewis. 2003. A Geological Framework for Interpreting Downstream Effects of Dams on Rivers. *American Geophysical Union*:209-225.
- Gray, J. S. 2002. Biomagnification in Marine Systems: The Perspective of an Ecologist. *Marine Pollution Bulletin* 45:46-52.
- Gray, L. 2004. Changes in Water Quality and Macroinvertebrate Communities Resulting from Urban Stormflows in the Provo River, Utah, U.S.A. *Hydrobiologia* 518(1-3):33-46.
- Greene, S. 2009. pers. comm. Garwin Yip. December 29, 2009.
- Greenwood, M. 2016. pers. comm. L. He. December 6, 2016.
- Gregory, R., J. Arvai, and L. R. Gerber. 2013. Structuring Decisions for Managing Threatened and Endangered Species in a Changing Climate. *Conservation Biology* 27(6):1212-1221.

- Gregory, R. S. 1992. Effect of Turbidity on the Predator Avoidance Behaviour of Juvenile Chinook Salmon (*Oncorhynchus tshawytscha*). Canadian Journal of Fisheries and Aquatic Sciences 50(2):241-246.
- Gregory, R. S. 1993. Effect of Turbidity on the Predator Avoidance Behaviour of Juvenile Chinook Salmon (*Oncorhynchus tshawytscha*). Canadian Journal of Fisheries and Aquatic Sciences 50(2):241-246.
- Greig, S. M., D. A. Sear, and P. A. Carling. 2007. A Review of Factors Influencing the Availability of Dissolved Oxygen to Incubating Salmonid Embryos. Hydrological Processes 21(3):323-334.
- Gresh, T., J. Lichatowich, and P. Schoonmaker. 2000. An Estimation of Historic and Current Levels of Salmon Production in the Northeast Pacific Ecosystem: Evidence of a Nutrient Deficit in the Freshwater Systems of the Pacific Northwest. Fisheries 25(1):15-21.
- Groot, C. and L. Margolis. 1991. Pacific Salmon Life Histories *in*. UBC Press Vancouver, Canada.
- Groot, C., L. Margolis, and W. C. Clarke. 1995. Physiological Ecology of Pacific Salmon. Page 3 *in*. UBC Press, Vancouver, Canada.
- Grosholz, E. D., L. A. Levin, A. C. Tyler, and C. Neira. 2009. Changes in Community Structure and Ecosystem Function Following *Spartina alterniflora* Invasion of Pacific Estuaries. Pages 23-40 *in* Human Impacts on Salt Marshes: A Global Perspective. University of California Press.
- Grossman, G., T. Lessington, B. Johnson, J. Miller, N. E. Monson, and T. N. Pearsons. 2013. Effects of Fish Predation on Salmonids in the Sacramento River-San Joaquin Delta and Associated Ecosystems.
- Grossman, G. D. 2016. Predation on Fishes in the Sacramento-San Joaquin Delta: Current Knowledge and Future Directions. San Francisco Estuary and Watershed Science 14(2):3-25.
- Grossman, G. D., P. B. Moyle, and J. O. Whitaker. 1982. Stochasticity in Structural and Functional-Characteristics of an Indiana Stream Fish Assemblage - A Test of Community Theory. American Naturalist 120(4):423-454.
- Group, F. H. W. 2008. Agreement in Principle for Interim Criteria for Injury to Fish from Pile Driving Activities. Page 3.
- Grover, A., A. Grover, A. Low, P. Ward, J. Smith, M. Mohr, D. Viele, and C. Tracy. 2004. Recommendations for Developing Fishery Management Plan Conservation Objectives for Sacramento River Winter Chinook and Sacramento River Spring Chinook. Interagency Workgroup.
- Groves, D. G., J. R. Fischbach, E. Bloom, D. Knopman, and R. Keefe. 2013. Adapting to a Changing Colorado River Making Future Water Deliveries More Reliable through Robust Management Strategies. RAND Corporation:15.
- Gruber, J. J., Z. J. Jackson, and J. P. Van Eenennaam. 2012. 2011 San Joaquin River Sturgeon Spawning Survey. Lodi Fish and Wildlife Office, Anadromous Fish Restoration Program, and U.S. Fish and Wildlife Service.
- Gruber, J. J., W. R. Poytress, C. E. Praetorius, and D. J. Ryan. 2017. 2014 and 2015 Juvenile Green Sturgeon Capture Feasibility Study. U.S. Fish and Wildlife Service, 1-35 pp.
- Gutreuter, S., J. M. Dettmers, and D. H. Wahl. 2003. Estimating Mortality Rates of Adult Fish from Entrainment through the Propellers of River Towboats. Transactions of the American Fisheries Society 132(4):646-661.
- Guy, D. J. 2011. pers. comm. F. Barajas, M. Tucker, and D. Castleberry. May 13, 2011.
- Habig, C. 2004. An Evaluation of Potential Effects of Fluridone on Pacific Salmon in the California Delta. . Page 12.

- Haller, L. Y., S. S. O. Hung, L. S., J. G. Fadel, J. H. Lee, M. McEnroe, and N. A. Fangue. 2015. Effect of Nutritional Status on the Osmoregulation of Green Sturgeon (*Acipenser medirostris*). *Physiological and Biochemical Zoology* 88(1):22-42.
- Hallock, R. J. 1989. Upper Sacramento River Steelhead, *Oncorhynchus mykiss*, 1952-1988. U.S. Fish and Wildlife Service.
- Hallock, R. J., R. F. Elwell, and D. H. Fry Jr. 1970. Migrations of Adult King Salmon (*Oncorhynchus tshawytscha*) in the San Joaquin Delta as Demonstrated by the Use of Sonic Tags. *Fish Bulletin* 151.
- Hallock, R. J. and F. W. Fisher. 1985. Status of Winter-Run Chinook Salmon, *Oncorhynchus tshawytscha*, in the Sacramento River. 1-29 pp.
- Hallock, R. J., D. H. Fry, and D. A. LaFauce. 1957. The Use of Wire Fyke Traps to Estimate the Runs of Adult Salmon and Steelhead in the Sacramento River.
- Hallock, R. J. and D. H. Fry Jr. 1967. Five Species of Salmon, *Oncorhynchus*, in Sacramento, California. *California Fish and Game* 53(1):5-22.
- Hallock, R. J., D. H. Fry Jr., and D. A. LaFauce. 1957. The Use of Wire Fyke Traps to Estimate the Runs of Adult Salmon and Steelhead in the Sacramento River. *California Fish and Game* 43(4):271-298.
- Hallock, R. J., W. F. Van Woert, and L. Shapovalov. 1961. An Evaluation of Stocking Hatchery-Reared Steelhead Rainbow Trout (*Salmo Gairdnerii Gairdnerii*) in the Sacramento River System. *Fish Bulletin* 114:3-74.
- Hallock, R. J., W. F. Van Woert, and L. Shapovalov. 1961. *Fish Bulletin* No. 114. An Evaluation of Stocking Hatchery-Reared Steelhead Rainbow Trout (*Salmo Gairdnerii Gairdnerii*) in the Sacramento River System. D. o. F. a. Wildlife, 75 pp.
- Halvorsen, M. B., B. M. Casper, F. Matthews, T. J. Carlson, and A. N. Popper. 2012. Effects of Exposure to Pile-Driving Sounds on the Lake Sturgeon, Nile Tilapia and Hogchoker. *Proceedings of The Royal Society Biological Sciences* 279(1748):4705-4714.
- Halvorsen, M. B., B. M. Casper, C. M. Woodley, T. J. Carlson, and A. N. Popper. 2012. Threshold for Onset of Injury in Chinook Salmon from Exposure to Impulsive Pile Driving Sounds. *PLoS ONE* 7(6):e38968.
- Hamelink, J. L., D. R. Buckler, F. L. Mayer, D. U. Palawski, and H. O. Sanders. 1986. Toxicity of Fluridone to Aquatic Invertebrates and Fish. *Environmental Toxicology and Chemistry* 5(1):87-94.
- Hamill, G. A., H. T. Johnston, and D. P. Stewart. 1999. Propeller Wash Scour near Quay Walls. *Journal of Waterway Port Coastal and Ocean Engineering* 125(4):170-175.
- Hamilton, J. B., G. L. Curtis, S. M. Snedaker, and D. K. White. 2005. Distribution of Anadromous Fishes in the Upper Klamath River Watershed Prior to Hydropower Dams -- A Synthesis of the Historical Evidence. *Fisheries* 30(4):10-20.
- Hamilton, S. J. 2003. Review of Residue-Based Selenium Toxicity Thresholds for Freshwater Fish. *Ecotoxicology and Environmental Safety* 56(2):201-210.
- Hannaford, M. J. 2000. Preliminary Water Quality Assessment of Cow Creek Tributaries. North State Institute for Sustainable Communities.
- Hannah, R. W., S. J. Parker, and T. V. Buell. 2011. Evaluation of a Selective Flatfish Trawl and Diel Variation in Rockfish Catchability as Bycatch Reduction Tools in the Deepwater Complex Fishery off the U.S. West Coast. *North American Journal of Fisheries Management* 25(2):581-593.

- Hannon, J. 2009. Appendix 3: Estimate of Change in Abundance of Fall-Run and Late Fall-Run Chinook Salmon Available to Killer Whales Due to CVP and SWP Operations. Supplemental Analysis to Support OCAP Opinion. U.S. Bureau of Reclamation, 1-18 pp.
- Hannon, J. 2013. American River Steelhead (*Oncorhynchus mykiss*) Spawning - 2013, with Comparison to Prior Years. U.S. Bureau of Reclamation, 1-32 pp.
- Hannon, J. 2017. pers. comm. J. Ambrose. April 11, 2017.
- Hannon, J. and B. Deason. 2001. American River Steelhead (*Oncorhynchus mykiss*) Spawning 2001 – 2007. U.S. Department of the Interior, 53 pp.
- Hannon, J. and B. Deason. 2008. American River Steelhead (*Oncorhynchus mykiss*) Spawning 2001–2007. U.S. Bureau of Reclamation, 1-53 pp.
- Hannon, J. and B. Deason. 2008. American River Steelhead (*Oncorhynchus mykiss*) Spawning 2001 – 2007. U.S. Department of the Interior, Bureau of Reclamation, Mid-Pacific Region.
- Hannon, J., M. Healey, and B. Deason. 2003. American River Steelhead (*Oncorhynchus mykiss*) Spawning 2001–2003. U.S. Bureau of Reclamation and California Department of Fish and Game, 3-36 pp.
- Hannon, J., M. Healey, and B. Deason. 2003. American River Steelhead (*Oncorhynchus mykiss*) Spawning 2001 – 2003. U.S. Bureau of Reclamation and California Department of Fish and Game, Sacramento, CA.
- Hannon, J., M. Healey, and B. Deason. 2003. American River Steelhead Spawning 2001 – 2003. U.S. Bureau of Reclamation and California Department of Fish and Game, 36 pp.
- Hansel, H. C., J. G. Romine, and R. W. Perry. 2017. Acoustic Tag Detections of Green Sturgeon in the Columbia River and Coos Bay Estuaries, Washington and Oregon, 2010–11. U.S. Geological Survey and U.S. Fish and Wildlife Service, 40 pp.
- Hanson, C. H. 2001. Are Juvenile Chinook Salmon Entrained at Unscreened Diversions in Direct Proportion to the Volume of Water Diverted? *Fish Bulletin* 179(2):331-342.
- Hanson, C. H. 2009. Striped Bass Predation on Listed Fish within the Bay-Delta Estuary and Tributary Rivers: Expert Report Coalition for a Sustainable Delta et al. v. Koch, E.D. Cal. Case No. CV 08-397-OWW.
- Hanson, H. A., O. R. Smith, and P. R. Needham. 1940. An Investigation of Fish-Salvage Problems in Relation to Shasta Dam. Bureau of Fisheries, Washington.
- Hanson, M. B., R. W. Baird, J. K. B. Ford, J. Hempelmann-Halos, D. M. Van Doornik, J. R. Candy, C. K. Emmons, G. S. Schorr, B. Gisborne, K. L. Ayres, S. K. Wasser, K. C. Balcomb, K. Balcomb-Bartok, J. G. Sneva, and M. J. Ford. 2010. Species and Stock Identification of Prey Consumed by Endangered Southern Resident Killer Whales in Their Summer Range. *Endangered Species Research* 11:69-82.
- Hanson, M. B., C. K. Emmons, E. J. Ward, J. A. Nystuen, and M. O. Lammers. 2013. Assessing the Coastal Occurrence of Endangered Killer Whales Using Autonomous Passive Acoustic Recorders. *Journal of the Acoustical Society of America* 134:3486-3495.
- Hartman, G. F. 1965. The Role of Behavior in the Ecology and Interaction of Underyearling Coho Salmon (*Oncorhynchus kisutch*) and Steelhead Trout (*Salmo gairdneri*). *Journal of the Fisheries Research Board of Canada* 22(4):1035-1081.

- Hartman, K. J. and S. B. Brandt. 1995. Comparative Energetics and the Development of Bioenergetics Models for Sympatric Estuarine Piscivores. *Canadian Journal of Fisheries and Aquatic Sciences* 52:1647-1666.
- Harvey, C. 1995. Adult Steelhead Counts in Mill and Deer Creeks, Tehama County, October 1993-June 1994. California Department of Fish and Game, Inland Fisheries Administrative Report Number 95-3.
- Harvey, C. D. 1995. Adult Steelhead Counts in Mill and Deer Creeks Tehama County October 1993-June 1994.
- Harvey, C. D. 1995. Adult Steelhead Counts in Mill and Deer Creeks, Tehama County, October 1993-June 1994. California Department of Fish and Game, Inland Fisheries Administrative Report Number 95-3, 1-10 pp.
- Harvey-Arrison, C. 2009. Surface Flow Criteria for Salmon Passage Lower Mill Creek Watershed Restoration Project. California Department of Fish and Game, 29 pp.
- Hassrick, J. 2016. pers. comm. L.-M. He. December 23, 2016.
- Hastings, M. C. 1995. Physical Effects of Noise on Fishes. *Inter-noise Congress and Conference Proceedings* 1995(2):979-984.
- Hastings, M. C. 2002. Clarification of the Meaning of Sound Pressure Levels and the Known Effects of Sound on Fish.
- Hastings, M. C. and A. N. Popper. 2005. Effects of Sound on Fish. California Department of Transportation.
- Hastings, M. C. and A. N. Popper. 2005. Effects of Sound on Fish. California Department of Transportation.
- Hastings, M. C., A. N. Popper, J. J. Finneran, and P. J. Lanford. 1996. Effects of Low-Frequency Underwater Sound on Hair Cells of the Inner Ear and Lateral Line of the Teleost Fish *Astronotus ocellatus*. *Journal of the Acoustical Society of America* 3:1759-1766.
- Hatin, D., S. Lachance, and D. Fournier. 2007. Effect of Dredged Sediment Deposition on Use by Atlantic Sturgeon and Lake Sturgeon at an Open-Water Disposal Site in the St. Lawrence Estuarine Transition Zone. *American Fisheries Society Symposium* 56:235-255.
- Hatton, S. R. 1940. Progress Report on the Central Valley Fisheries Investigations, 1939. California Fish and Game.
- Hawkins, A. D. 2012. Responses of Free-Living Coastal Pelagic Fish to Impulsive Sounds. *Proceedings of the 2nd International Conference on Environmental Interactions of Marine Renewable Energy Technologies* 28 April - 02 May 2014:1-3.
- Hayes, D. F., T. R. Crockett, T. J. Ward, and D. Averett. 2000. Sediment Resuspension During Cutterhead Dredging Operations. *Journal of Waterway Port Coastal and Ocean Engineering* 126(3):153-161.
- Hayes, M. F. and N. P. Banish. 2017. Translocation and Reintroduction of Native Fishes: A Review of Bull Trout *Salvelinus confluentus* with Applications for Future Reintroductions. *Endangered Species Research* 34:191-209.
- Hayes, S. A., M. H. Bond, C. V. Hanson, E. V. Freund, J. J. Smith, E. C. Anderson, A. J. Ammann, and R. B. Macfarlane. 2008. Steelhead Growth in a Small Central California Watershed: Upstream and Estuarine Rearing Patterns. *Transactions of the American Fisheries Society* 137(1):114-128.
- Hayhoe, K., D. Cayan, C. B. Field, P. C. Frumhoff, E. P. Maurer, N. L. Miller, S. C. Moser, S. H. Schneider, K. N. Cahill, E. E. Cleland, L. Dale, R. Drapek, R. M. Hanemann, L. S. Kalkstein, J. Lenihan, C. K. Lunch, R. P. Neilson, S. C. Sheridan, and J. H. Verville. 2004. Emissions Pathways, Climate Change, and Impacts on California. *Proceedings of the National Academy of Sciences of the United States of America* 101(34):6.

- Haynes, J. M. and R. H. Gray. 1980. Influence of Little Goose Dam on Upstream Movements of Adult Chinook Salmon (*Oncorhynchus tshawytscha*). National Marine Fisheries Service Fishery Bulletin 78:185-190.
- HDR/Surface Water Resources Inc. 2007. Draft Environmental Impact Report/Environmental Impact Statement for the Proposed Lower Yuba River Accord.
- He, L. and J. Stuart. 2016. Comprehensive Analyses of Water Export, Flow, Tide Height, and the Salvage and Abundance of Juvenile Salmonids in the Sacramento-San Joaquin Delta. National Marine Fisheries Service California Central Valley Office, 1-176 pp.
- Healey, M. C. 1980. Utilization of the Nanaimo River Estuary by Juvenile Chinook Salmon, *Oncorhynchus tshawytscha*. Fishery Bulletin 77(3):653-668.
- Healey, M. C. 1982. Juvenile Pacific Salmon in Estuaries: The Life System. Pages 315-341 in *Estuarine Comparisons*, V. S. Kennedy, editor. Academic Press, New York.
- Healey, M. C. 1991. Life History of Chinook Salmon (*Oncorhynchus tshawytscha*). Pages 311-394 in C. Groot and L. Margolis, editors. UBC Press, UBC Press, Vancouver.
- Healey, T. P. 1980. The Effect of High Temperature on the Survival of Sacramento River Chinook (King) Salmon, *Oncorhynchus tshawytscha*, Eggs and Fry. California Department of Fish and Game, Administrative Report No. 79-10.
- Hecht, S. A., D. H. Baldwin, C. A. Mebane, T. Hawkes, S. J. Gross, and N. L. Scholz. 2007. An Overview of Sensory Effects on Juvenile Salmonids Exposed to Dissolved Copper: Applying a Benchmark Concentration, Approach to Evaluate Sublethal Neurobehavioral Toxicity. National Marine Fisheries Service, NOAA Technical Memorandum NMFS-NWFSC-83, 1-55 pp.
- Hedgecock, D., M. A. Banks, V. K. Rashbrook, C. A. Dean, and S. M. Blankenship. 2001. Applications of Population Genetics to Conservation of Chinook Salmon Diversity in the Central Valley. Fish Bulletin 179(1):45-70.
- Hedrick, R. and S. E. LaPatra. 2001. Characteristics of Viral Diseases of Sturgeon and Their Impacts on Aquaculture, Conservation, and International Trade.
- Heery, E., M. A. Bellman, and J. Hastie. 2009. Observed and Estimated Total Bycatch of Green Sturgeon in the 2002-2007 U.S. West Coast Groundfish Fisheries. Northwest Fisheries Science Center (NWFSC), 25 pp.
- Helfield, J. M. and R. J. Naiman. 2001. Effects of Salmon-Derived Nitrogen on Riparian Forest Growth and Implications for Stream Productivity. Ecology 82(9):2403-2409.
- Hellmair, M., M. Peterson, B. Mulvey, K. Young, J. Montgomery, and A. Fuller. 2018. Physical Characteristics Influencing Nearshore Habitat Use by Juvenile Chinook Salmon in the Sacramento River, California. North American Journal of Fisheries Management:12.
- Hendrix, N., A. Criss, E. Danner, C. M. Greene, H. Imaki, A. Pike, and S. T. Lindley. 2014. Life Cycle Modeling Framework for Sacramento River Winter-Run Chinook Salmon. National Marine Fisheries Service, NOAA Technical Memorandum NOAA-TM-NMFS-SWFSC-530, 1-30 pp.
- Henley, W., M. Patterson, R. Neves, and A. D. Lemly. 2000. Effects of Sedimentation and Turbidity on Lotic Food Webs: A Concise Review for Natural Resource Managers. Reviews in Fisheries Science 8(2):125-139.
- Heppell, S. S. 2007. Elasticity Analysis of Green Sturgeon Life History. Environmental Biology of Fishes 79(3-4):357-368.

- Herren, J. R. and S. Kawasaki. 2001. Inventory of Water Diversions in Four Geographic Areas in California's Central Valley. *Fish Bulletin* 2:343-355.
- Herren, J. R. and S. S. Kawasaki. 2001. Inventory of Water Diversions in Four Geographic Areas in California's Central Valley. *Fish Bulletin* 179:14.
- Hershler, R. and T. J. Frest. 1996. A Review of the North American Freshwater Snail Genus *Fluminicola* (Hydrobiidae). *Smithsonian Contributions to Zoology*, Number 583:41.
- Heublein, J. in review. Increasing the Management Value of Life Stage Monitoring Networks for Three Imperiled Fishes in California's Regulated Rivers: Case Studies Southern Distinct Population Segment of Green Sturgeon and Sacramento-San Joaquin River White Sturgeon.
- Heublein, J., R. Bellmer, R. Chase, P. Doukakis, M. Gingras, D. Hampton, J. A. Israel, Z. J. Jackson, R. C. Johnson, O. P. Langness, S. Luis, E. A. Mora, M. L. Moser, A. M. Seesholtz, and T. Sommer. in review. Improved Fisheries Management through Life Stage Monitoring: The Case for Southern Green Sturgeon and Sacramento-San Joaquin White Sturgeon. 1-58.
- Heublein, J., B. R., R. D. Chase, P. Doukakis, M. Gingras, D. Hampton, J. A. Israel, Z. J. Jackson, R. C. Johnson, O. P. Langness, S. Luis, E. Mora, M. L. Moser, L. Rohrbach, A. M. Seesholtz, and T. Sommer. 2017b. Improved Fisheries Management through Life Stage Monitoring: The Case for the Southern Distinct Population Segment of North American Green Sturgeon and the Sacramento-San Joaquin River White Sturgeon. National Marine Fisheries Service, NOAA Technical Memorandum NOAA-TM-NMFS-SWFSC-588, 1-43 pp.
- Heublein, J., B. R., R. D. Chase, P. Doukakis, M. Gingras, D. Hampton, J. A. Israel, Z. J. Jackson, R. C. Johnson, O. P. Langness, S. Luis, E. Mora, M. L. Moser, L. Rohrbach, A. M. Seesholtz, T. Sommer, and J. S. Stuart. 2017a. Life History and Current Monitoring Inventory of San Francisco Estuary Sturgeon. National Marine Fisheries Service, NOAA Technical Memorandum NOAA-TM-NMFS-SWFSC-589, 1-47 pp.
- Heublein, J. C., J. T. Kelly, C. E. Crocker, A. P. Klimley, and S. T. Lindley. 2008. Migration of Green Sturgeon, *Acipenser medirostris*, in the Sacramento River. *Environmental Biology of Fishes* 84(3):245-258.
- Heublein, J. C., J. T. Kelly, C. E. Crocker, A. P. Klimley, and S. T. Lindley. 2009. Migration of Green Sturgeon, *Acipenser medirostris*, in the Sacramento River. *Environmental Biology of Fishes* 84(3):245-258.
- Hickman, J. 1993. The Jepson Manual - Higher Plants of California. Pages 39-45 in J. Hickman, editor. University of California Press, Berkeley.
- Hilborn, R. 1992. Hatcheries and the Future of Salmon in the Northwest. *Fisheries* 17(1):5-8.
- Hilborn, R., S. Cox, F. Gulland, D. Hankin, T. Hobbs, D. E. Schindler, and A. Trites. 2012. The Effects of Salmon Fisheries on Southern Resident Killer Whales: Final Report of the Independent Science Panel. Independent Science Panel of the Bilateral Scientific Workshop Process to Evaluate the Effects of Salmon Fisheries on Southern Resident Killer Whales, Vancouver, B.C.
- Hilborn, R., T. P. Quinn, D. E. Schindler, and D. E. Rogers. 2003. Biocomplexity and Fisheries Sustainability. *Proceedings of the National Academy of Sciences* 100(11):6564-6568.
- Hildebrand, L. R. and M. Parsley. 2013. Upper Columbia White Sturgeon Recovery Plan - 2012 Revision, White Sturgeon Recovery Initiative.
- Hilderbrand, G. V., S. D. Farley, C. C. Schwartz, and C. T. Robbins. 2004. Importance of Salmon to Wildlife: Implications for Integrated Management. *Ursus* 15(1):1-9.

- Hilton, S. and T. E. Lisle. 1993. Measuring the Fraction of Pool Volume Filled with Fine Sediment U.S. Department of Agriculture, 12 pp.
- Hindar, K., N. Ryman, and F. Utter. 1991. Genetic Effects of Cultured Fish on Natural Fish Populations. *Canadian Journal of Fisheries and Aquatic Sciences* 48(5):945-957.
- Hoar, W. S. 1988. The Physiology of Smolting Salmonids. Pages 275-343 *in* The Physiology of Developing Fish: Viviparity and Posthatching Juveniles, W. S. Hoar and D. J. Randall, editors. Academic Press, Inc, San Diego.
- Hoelzel, A. R., J. Hey, M. E. Dahlheim, C. Nicholson, V. Burkanov, and N. Black. 2007. Evolution of Population Structure in a Highly Social Top Predator, the Killer Whale. *Molecular Biology and Evolution* 24(6):1407-1415.
- Hoerling, M. P. 2013. Present Weather and Climate: Evolving Conditions. Page 27.
- Hokanson, K. E., C. F. Kleiner, and T. W. Thorslund. 1977. Effects of Constant Temperatures and Diel Temperature Fluctuations on Specific Growth and Mortality Rates and Yield of Juvenile Rainbow Trout, *Salmo gairdneri*. *Journal of the Fisheries Board of Canada* 34(5):639-648.
- Holbrook, C. M., R. W. Perry, and N. S. Adams. 2009. Distribution and Joint Fish-Tag Survival of Juvenile Chinook Salmon Migrating through the Sacramento-San Joaquin River Delta, California, 2008. U.S. Geological Survey, 40 pp.
- Holecek, D. E., D. L. Scarnecchia, and S. E. Miller. 2012. Smoltification in an Impounded, Adfluvial Redband Trout Population Upstream from an Impassable Dam: Does It Persist? *Transactions of the American Fisheries Society* 141(1):68-75.
- Holland, L. E. 1986. Effects of Barge Traffic on Distribution and Survival of Ichthyoplankton and Small Fishes in the Upper Mississippi River. *Transactions of the American Fisheries Society* 115(1):162-165.
- Holt, M. M. 2008. Sound Exposure and Southern Resident Killer Whales (*Orcinus orca*): A Review of Current Knowledge and Data Gaps. National Marine Fisheries Service, NOAA Technical Memorandum NMFS-NWFSC-89, 1-77 pp.
- Holt, M. M., D. P. Noren, and C. K. Emmons. 2011. Effects of Noise Levels and Call Types on the Source Levels of Killer Whale Calls. *Journal of the Acoustical Society of America* 130(5):3100-3106.
- Hoover, M. B., H. E. Rensch, E. G. Rensch, and W. N. Abeloe. 2002. Historic Spots in California.3.
- Horn, M. J. and A. Blake. 2004. Acoustic Tracking of Juvenile Chinook Salmon Movement in the Vicinity of the Delta Cross Channel. U.S. Bureau of Reclamation and U.S. Geological Survey, 1-139 pp.
- Houghton, J., M. M. Holt, D. A. Giles, M. B. Hanson, C. K. Emmons, J. T. Hogan, T. A. Branch, and G. R. VanBlaricom. 2015. The Relationship between Vessel Traffic and Noise Levels Received by Killer Whales (*Orcinus orca*). *PLoS ONE* 10(12):1-20.
- House of Representatives Committee of Conference. 1982. Joint Explanatory Statement of the Committee of Conference, H.R. Conf. Rep No. 97-835, at 15.
- Hu, J., Z. Zhang, Q. Wei, H. Zhen, Y. Zhao, H. Peng, Y. Wan, J. P. Giesy, L. Li, and B. Zhang. 2009. Malformations of the Endangered Chinese Sturgeon, *Acipenser sinensis*, and Its Causal Agent. *Proceedings of the National Academy of Sciences of the United States* 106(23):9339-9344.
- Hubbs, C. L. and A. B. Rehnitzer. 1952. Report on Experiments Designed to Determine Effects of Underwater Explosions on Fish Life. *California Fish and Game* 38(3):333-366.

- Huber, E. R. and S. M. Carlson. 2015. Temporal Trends in Hatchery Releases of Fall-Run Chinook Salmon in California's Central Valley. *San Francisco Estuary and Watershed Science* 13(2):3-25.
- Huff, D. D., S. T. Lindley, P. S. Rankin, and E. A. Mora. 2011. Green Sturgeon Physical Habitat Use in the Coastal Pacific Ocean. *PLoS ONE* 6(9):e25156.
- Huff, D. D., S. T. Lindley, B. K. Wells, and F. Chai. 2012. Green Sturgeon Distribution in the Pacific Ocean Estimated from Modeled Oceanographic Features and Migration Behavior. *PLoS ONE* 7(9):e45852.
- Hughes, R. M., G. E. Davis, and C. E. Warren. 1978. Temperature Requirements of Salmonids in Relation to Their Feeding, Bioenergetics, Growth, and Behavior. Corvallis, Oregon.
- Hunerlach, M. P., Alpers, C. N., Marvin-DiPasquale, M., Taylor, H. E., & De Wild, J. F. 2004. Geochemistry of Mercury and Other Trace Elements in Fluvial Tailings Upstream of Daguerre Point Dam, Yuba River, California, August 2001.
- Hunter, M. A. 1992. Hydropower Flow Fluctuations and Salmonids: A Review of the Biological Effects, Mechanical Causes, and Options for Mitigation. State of Washington Department of Fisheries.
- Hymanson, Z., D. Mayer, and J. Steinbeck. 1994. Long-Term Trends in Benthos Abundance and Persistence in the Upper Sacramento-San Joaquin Estuary. Summary Report: 1980-1990. Technical Report 38. Interagency Ecological Program for the San Francisco Bay/Delta Estuary, Sacramento, CA.
- ICF International. 2015. 2012-2014 Fish Entrainment, Impingement, and Predator Monitoring Results for Freeport Regional Water Authority's New Water Intake Fish Screen. Freeport Regional Water Authority and Sacramento County Water Agency.
- IEA Hydropower. IEA Hydropower Implementing Agreement Annex VIII - Hydropower Good Practices: Environmental Mitigation Measures and Benefits Case Study 05-08. U. S. Bureau of Reclamation, 12 pp.
- Incardona, J. P., M. G. Carls, H. Teraoka, C. A. Sloan, T. K. Collier, and N. L. Scholz. 2005. Aryl Hydrocarbon Receptor-Independent Toxicity of Weathered Crude Oil During Fish Development. *Environ. Health Perspect.* 113(12):1755.
- Interagency Ecological Program. 2007. Existing Program Summary: Central Valley Salmon and Steelhead Monitoring Programs.
- Intergovernmental Panel on Climate Change. 2007. Climate Change 2007: Climate Change. Contribution of Working Group III to Fourth Assessment Report of the Intergovernmental Panel on Climate Change. 863 pp.
- Intergovernmental Panel on Climate Change. 2007. Climate Change 2007: Synthesis Report. Contribution of Working Groups I, II, and III to the Fourth Assessment Report of the Intergovernmental Panel on Climate Change. 52 pp.
- Intergovernmental Panel on Climate Change. 2007. Summary for Policymakers: Contribution of Working Group I to the Fourth Assessment Report of the Intergovernmental Panel on Climate Change. IPCC, 18 pp.
- Intergovernmental Panel on Climate Change. 2007. Working Group I: The Physical Basis Report of the Intergovernmental Panel on Climate Change. IPCC, 996 pp.
- Intergovernmental Panel on Climate Change (IPCC). 2007. Climate Change 2007: Climate Change. Contribution of Working Group III to Fourth Assessment Report of the Intergovernmental Panel on Climate Change., 863 pp.

- Intergovernmental Panel on Climate Change (IPCC). 2007. Climate Change 2007: Synthesis Report. Contribution of Working Groups I, II, and III to the Fourth Assessment Report of the Intergovernmental Panel on Climate Change. 52 pp.
- Intergovernmental Panel on Climate Change (IPCC). 2007. Climate Change 2007: The Physical Science Basis. Summary for Policy Makers. Contribution of Working Group I to the Fourth Assessment Report of the IPCC. 19 pp.
- Interior Columbia Basin Technical Recovery Team. 2005. Interior Columbia Basin TRT: Viability Criteria for Application to Interior Columbia Basin Salmonid ESUs.
- International Union for Conservation of Nature. 2016. Red List of Threatened Species, *Fluminicola seminalis*. <http://www.iucnredlist.org/details/189592/0>. 2016.
- IPCC. 2007. Climate Change 2007, the Physical Science Basis. Cambridge University Press:1007.
- IPCC. 2013. Climate Change 2013, the Physical Science Basis. 1552 pp.
- IPCC (Intergovernmental Panel on Climate Change). 2007. Climate Change 2007 the Physical Science Basis, Contribution of Working Group I to the Fourth Assessment. Report of the Intergovernmental Panel on Climate Change. Cambridge University Press, Cambridge.
- Isaak, D. J., C. H. Luce, B. E. Rieman, D. E. Nagel, E. E. Petersen, D. L. Horan, S. Parkes, and G. L. Chandler. 2010. Effects of Climate Change and Wildfire on Stream Temperatures and Salmonid Thermal Habitat in a Mountain River Network. *Ecological Society of America* 20:22.
- Isaak, D. J., M. K. Young, C. H. Luce, S. W. Hostetler, S. J. Wenger, E. E. Peterson, J. M. Ver Hoef, M. C. Groce, D. L. Horan, and D. E. Nagel. 2016. Slow Climate Velocities of Mountain Streams Portend Their Role as Refugia for Cold-Water Biodiversity. *Proc Natl Acad Sci U S A* 113(16):4374-4379.
- Israel, J., M. Thomas, A. Hearn, P. Klimley, and B. May. 2009. Sacramento River Green Sturgeon Migration and Population Assessment. Annual Program Performance Report to U.S. Bureau of Reclamation.
- Israel, J. A., K. J. Bando, E. C. Anderson, and B. May. 2009. Polyploid Microsatellite Data Reveal Stock Complexity Among Estuarine North American Green Sturgeon (*Acipenser medirostris*). *Canadian Journal of Fisheries and Aquatic Sciences* 66(9):1491-1504.
- Israel, J. A., J. F. Cordes, M. A. Blumberg, and B. May. 2004. Geographic Patterns of Genetic Differentiation among Collections of Green Sturgeon. *North American Journal of Fisheries Management* 24(3):922-931.
- Israel, J. A. and A. P. Klimley. 2008. Life History Conceptual Model for North American Green Sturgeon (*Acipenser medirostris*). University of California, Davis.
- Israel, J. A. and A. P. Klimley. 2008. Life History Conceptual Model for North American Green Sturgeon (*Acipenser medirostris*). California Department of Fish and Game, Delta Regional Ecosystem Restoration and Implementation Program.
- Israel, J. A. and B. May. 2010. Indirect Genetic Estimates of Breeding Population Size in the Polyploid Green Sturgeon (*Acipenser medirostris*). *Molecular Ecology* 19(5):1058-1070.
- Israel, J. A., M. J. Thomas, R. Corwin, A. Hearn, R. D. Chase, and A. P. Klimley. 2010. Implications of Seasonal Migration Impediments in Green Sturgeon on the Sacramento River. Poster presented at 6th Biennial Bay-Delta Science Conference. September 27-29, 2010. Sacramento, CA.

- IUCN (International Union for Conservation of Nature). 2001. IUCN Red List Categories and Criteria: Version 3.1, Second Edition.38.
- Iwana, G. K., P. T. Thomas, R. B. Forsyth, and M. M. Vijayan. 1998. Heat Shock Protein Expression in Fish. *Reviews in Fish Biology and Fisheries* 8:35-56.
- Jackson, J. R., A. J. Van De Valk, T. E. Brooking, O. A. Van Keeken, and L. G. Rudstam. 2002. Growth and Feeding Dynamics of Lake Sturgeon, *Acipenser fulvescens*, in Oneida Lake, New York: Results from the First Five Years of a Restoration Program. *Journal of Applied Ichthyology* 18(4-6):439-443.
- Jackson, T. A. 2007. California Steelhead Fishing Report-Restoration Card: A Report to the Legislature. California Department of Fish and Game, 91 pp.
- Jackson, Z. J., J. J. Gruber, and J. P. Van Eenennaam. 2016. White Sturgeon Spawning in the San Joaquin River, California, and Effects of Water Management. *Journal of Fish and Wildlife Management* 7(1):171-180.
- Jackson, Z. J. and J. P. Van Eenennaarn. 2013. 2012 San Joaquin River Sturgeon Spawning Survey. U.S. Fish and Wildlife Service Anadromous Fish and Restoration Program, 1-34 pp.
- Jager, H. I. 2003. Designing Optimal Flow Patterns for Fall Chinook Salmon in a Central Valley, California, River. *North American Journal of Aquaculture* 23:1-21.
- Jager, H. I. 2014. Thinking Outside the Channel: Timing Pulse Flows to Benefit Salmon via Indirect Pathways. *Ecological Modelling* 273:117-127.
- Jager, H. I., H. E. Cardwell, M. J. Sale, M. S. Bevelhimer, C. C. Coutant, and W. V. Winkle. 1997. Modelling the Linkages between Flow Management and Salmon Recruitment in Rivers
Elsevier Science B.V.
- Jameson, E. W. and H. J. Peeters. 1988. California Mammals *in* A. C. Smith, editor. University of California Press, Berkeley, CA.
- Jamieson, G. S., E. D. Grosholz, D. A. Armstrong, and R. W. Elner. 1998. Potential Ecological Implications from the Introduction of the European Green Crab, *Carcinus maenas* (Linnaeus), to British Columbia, Canada, and Washington, USA. *Journal of Natural History* 32(10-11):1587-1598.
- Janetos, A., L. Hansen, D. Inouye, B. P. Kelly, L. Meyerson, B. Peterson, and R. Shaw. 2008. Biodiversity. In: *The Effects of Climate Change on Agriculture, Land Resources, Water Resources, and Biodiversity*. A Report by the U.S. Climate Change Science Program and the Subcommittee on Global Change Research. 362 pp.
- Jarrett, P., D. Killam. 2014. Redd Dewatering and Juvenile Stranding in the Upper Sacramento River Year 2013-2014. C. D. o. F. a. Wildlife, RBFO Technical Report No. 01-2014, 59 pp.
- Jarrett, P. and D. Killam. 2014. Redd Dewatering and Juvenile Stranding in the Upper Sacramento River Year 2013-2014. California Department of Fish and Wildlife, RBFO Technical Report No. 01-2014, 1-59 pp.
- Jarrett, P. and D. Killam. 2015. Redd Dewatering and Juvenile Stranding in the Upper Sacramento River Year 2014-2015. California Department of Fish and Wildlife, RBFO Technical Report No. 02-2015, 1-86 pp.
- Jassby, A. D., J. E. Cloern, and B. E. Cole. 2002. Annual Primary Production: Patterns and Mechanisms of Change in a Nutrient-Rich Tidal Ecosystem. *Limnology and Oceanography* 47(3):698-712.

- Jeffres, C. A., J. J. Opperman, and P. B. Moyle. 2008. Ephemeral Floodplain Habitats Provide Best Growth Conditions for Juvenile Chinook Salmon in a California River. *Environmental Biology of Fishes* 83(4):449-458.
- Jeffries, K. M., L. J. Jackson, M. G. Ikonomou, and H. R. Habibi. 2010. Presence of Natural and Anthropogenic Organic Contaminants and Potential Fish Health Impacts Along Two River Gradients in Alberta, Canada. *Environmental Toxicology and Chemistry* 29(10):2379-2387.
- Jensen, J. O. and E. P. Groot. 1991. The Effect of Moist Air Incubation Conditions and Temperature on Chinook Salmon Egg Survival. *American Fisheries Society Symposium* 10:529-538.
- Jewell, M. S. 2015. pers. comm. M. Banonis. April 2, 2015.
- Johnsgard, P. 1990. *Hawks, Eagles, & Falcons of North America: Biology and Natural History*. Smithsonian Institution Press.
- Johnson, L. L., T. K. Collier, and J. E. Stein. 2002. An Analysis in Support of Sediment Quality Thresholds for Polycyclic Aromatic Hydrocarbons (Pahs) to Protect Estuarine Fish. *Aquatic Conservation: Marine and Freshwater Ecosystems* 12(5):517-538.
- Johnson, L. L., G. M. Ylitalo, M. R. Arkoosh, A. N. Kagley, C. Stafford, J. L. Bolton, J. Buzitis, B. F. Anulacion, and T. K. Collier. 2007. Contaminant Exposure in Outmigrant Juvenile Salmon from Pacific Northwest Estuaries of the United States. *Environmental Monitoring and Assessment* 124(1-3):167-194.
- Johnson, M. L., I. Werner, S. Teh, and F. Loge. 2010. Evaluation of Chemical, Toxicological, and Histopathologic Data to Determine Their Role in the Pelagic Organism Decline. University of California, Davis, Davis, CA
- Johnson, M. R. and K. Merrick. 2012. Juvenile Salmonid Monitoring Using Rotary Screw Traps in Deer Creek and Mill Creek, Tehama County, California 1994-2010. Department of Fish and Wildlife, 105 pp.
- Johnson, M. R. and K. Merrick. 2012. Juvenile Salmonid Monitoring Using Rotary Screw Traps in Deer Creek and Mill Creek, Tehama County, California Summary Report: 1994-2010. California Department of Fish and Wildlife, RBFO Technical Report No. 04-2012, 1-105 pp.
- Johnson, M. R. and K. Merrick. 2012. Juvenile Salmonid Monitoring Using Rotary Screw Traps in Deer Creek and Mill Creek, Tehama County, California. Summary Report: 1994-2010. California Department of Fish and Wildlife, Red Bluff Fisheries Office - Red Bluff, California.
- Johnson, R. C., J. C. Garza, R. B. MacFarlane, C. B. Grimes, C. C. Phillis, P. L. Koch, P. K. Weber, and M. H. Carr. 2016. Isotopes and Genes Reveal Freshwater Origins of Chinook Salmon *Oncorhynchus tshawytscha* Aggregations in California's Coastal Ocean. *Marine Ecology Progress Series* 548:181-196.
- Jones and Stokes. 2005. Battle Creek Salmon and Steelhead Restoration Project Final Environmental Impact Statement/Environmental Impact Report.
- Jones and Stokes. 2005. Battle Creek Salmon and Steelhead Restoration Project Final Environmental Impact Statement/Environmental Impact Report. Volume II: Appendices. U.S. Bureau of Reclamation and California State Water Resources Control Board.
- Jones and Stokes. 2005. Battle Creek Salmon and Steelhead Restoration Project Final Environmental Impact Statement/Environmental Impact Report: Appendices A-U and Appendix F, L and M.
- Jones and Stokes Associates Inc. 2004. Bear River and Western Pacific Interceptor Canal Levee Improvements Project Environmental Impact Report. Sacramento, CA.

- Jones and Stokes. 2002. Foundation for San Joaquin River Restoration (Revision to the Foundation Runs Report for Restoration Actions Gaming Trials). Sacramento, California.
- Jones, K., P. S. Bergman, and B. Cavallo. 2014. A Revised Sacramento River Winter Chinook Salmon Juvenile Production Model. National Oceanic and Atmospheric Association.
- Jones, K. K., T. J. Cornwell, D. L. Bottom, L. A. Campbell, and S. Stein. 2014. The Contribution of Estuary-Resident Life Histories to the Return of Adult *Oncorhynchus kisutch*. *Journal of Fish Biology* 85(1):52-80.
- Jones, R. 2015. Letter to Chris Yates, Assistant Regional Administrator, Protected Resources Division, National Marine Fisheries Service. From Rob Jones, Branch Chief, Anadromous Production and Inland Fisheries, Sustainable Fisheries Division, National Marine Fisheries Service 2pp.
- Jordan, C. 2016. pers. comm. J. Ambrose. November 8, 2016.
- Jorgensen, J. C., M. M. McClure, M. B. Sheer, and N. L. Munn. 2013. Combined Effects of Climate Change and Bank Stabilization on Shallow Water Habitats of Chinook Salmon. *Conservation Biology* 27(6):1201-1211.
- Juvenile Salmonid Project Work Team. 2005. Notes from February 15, 2005 Meeting.
- Kahler, T., M. Grassley, and D. Beauchamp. 2000. A Summary of the Effects of Bulkheads, Piers, and Other Artificial Structures and Shorezone Development on ESA-Listed Salmonids in Lakes. City of Bellevue, Washington.
- Kammerer, B. D. and S. A. Heppell. 2012. Individual Condition Indicators of Thermal Habitat Quality in Field Populations of Redband Trout (*Oncorhynchus mykiss gairdneri*). *Environmental Biology of Fishes* 96(7):823-835.
- Kammerer, B. D. and S. A. Heppell. 2013. The Effects of Semichronic Thermal Stress on Physiological Indicators in Steelhead. *Transactions of the American Fisheries Society* 142(5):1299-1307.
- Kapnick, S. and A. Hall. 2009. Observed Changes in the Sierra Nevada Snowpack: Potential Causes and Concerns. California Climate Change Center, Public Interest Energy Research Program, and California Energy Commission, 26 pp.
- Karl, T. R., J. M. Melillo, and T. C. Peterson. 2009. *Global Climate Change Impacts in the United States*. Cambridge University Press.
- Karl, T. R., J. M. Melillo, and T. C. Peterson. 2009. *Global Climate Change Impacts in the United States A State of Knowledge Report from the U.S. Global Change Research Program*. 196.
- Karrigan, S., J. D. Börk, and P. D. Adelizi. 2010. Hatchery and Genetic Management Plan. California Department of Fish and Game, 167 pp.
- Karrigan, S., J. D. Börk, and P. D. Adelizi. 2010. Hatchery and Genetic Management Plan: San Joaquin River Salmon Conservation and Research Facility. California Department of Fish and Game, 167 pp.
- Kastner, A. 2003. Annual Report: Feather River Hatchery 2002-2003. California Department of Fish and Game, 16 pp.
- Kasumyan, A. O. 2001. Effects of Chemical Pollutants on Foraging Behavior and Sensitivity of Fish to Food Stimuli. *Journal of Ichthyology* 41(1):76-87.
- Katopodis, C., L. Cai, and D. H. Johnson. 2019. Sturgeon Survival: The Role of Swimming Performance and Fish Passage Research. *Science Direct* 212:162-171.

- Kaufman, R. C., A. G. Houck, and J. J. Cech. 2008. Effects of Dietary Selenium and Methylmercury on Green and White Sturgeon Bioenergetics in Response to Changed Environmental Conditions in 5th Biennial CALFED Science Conference.
- KDH Environmental Services. 2008. Lover's Leap Restoration Project: Salmon Habitat Restoration in the Lower Stanislaus River.
- Keefer, M. L. and C. C. Caudill. 2014. Homing and Straying by Anadromous Salmonids: A Review of Mechanisms and Rates. *Reviews in Fish Biology and Fisheries* 24(1):333-368.
- Keefer, M. L., R. J. Stansell, S. C. Tackley, W. T. Nagy, K. M. Gibbons, C. A. Peery, and C. C. Caudill. 2012. Use of Radiotelemetry and Direct Observations to Evaluate Sea Lion Predation on Adult Pacific Salmonids at Bonneville Dam. *Transactions of the American Fisheries Society* 141(5):1236-1251.
- Kefford, B. J., L. Zaluzniak, J. E. Dunlop, D. Nugegoda, and S. C. Choy. 2010. How Are Macroinvertebrates of Slow Flowing Lotic Systems Directly Affected by Suspended and Deposited Sediments? *Environmental Pollution* 158(2):543-550.
- Keleher, C. J. and F. J. Rahel. 1996. Thermal Limits to Salmonid Distributions in the Rocky Mountain Region and Potential Habitat Loss Due to Global Warming: A Geographic Information System (Gis) Approach. *Transactions of the American Fisheries Society*, 125(1):1-13.
- Keller, A. A., B. H. Horness, E. L. Fruh, V. H. Simon, V. J. Tuttle, K. L. Bosley, J. C. Buchannan, D. J. Kamikawa, and J. R. Wallace. 2008. The 2005 U.S. West Coast Bottom Trawl Survey of Groundfish Resources off Washington, Oregon, and California: Estimates of Distribution, Abundance, and Length Composition. National Marine Fisheries Service, NOAA Technical Memorandum NMFS-NWFSC-93, 1-153 pp.
- Kelly, J. T., A. P. Klimley, and C. E. Crocker. 2006. Movements of Green Sturgeon, *Acipenser medirostris*, in the San Francisco Bay Estuary, California. *Environmental Biology of Fishes* 79(3-4):281-295.
- Kelly, J. T., A. P. Klimley, and C. E. Crocker. 2007. Movements of Green Sturgeon, *Acipenser medirostris*, in the San Francisco Bay Estuary, California. *Environmental Biology of Fishes* 79(3-4):281-295.
- Kelsey, H. M., R. Lamberson, and M. Madej. 1987. Stochastic Model for the Long-Term Transport of Stored Sediment in a River Channel. *Water Resources Research* 23(9):1738-1750.
- Kemp, P., D. Sear, A. Collins, P. Naden, and I. Jones. 2011. The Impacts of Fine Sediment on Riverine Fish. *Hydrological Processes* 25(11):1800-1821.
- Kemp, W. M., R. R. Twilley, J. C. Stevenson, W. R. Boynton, and J. C. Means. 1983. The Decline of Submerged Vascular Plants in Upper Chesapeake Bay: Summary of Results Concerning Possible Causes. *Marine Technology Society Journal* 17(2):78-89.
- Kendall, B. E. and G. A. Fox. 1998. Spatial Structure, Environmental Heterogeneity, and Population Dynamics: Analysis of the Coupled Logistic Map. *Theoretical Population Biology* 54(1):11-37.
- Kendall, B. E. and G. A. Fox. 2002. Variation among Individuals and Reduced Demographic Stochasticity. *Conservation Biology* 16(1):109-116.
- Kendall, N. W., J. R. McMillan, M. R. Sloat, T. W. Buehrens, T. P. Quinn, G. R. Pess, K. V. Kuzishchin, M. M. McClure, and R. W. Zabel. 2015. Anadromy and Residency in Steelhead and Rainbow Trout (*Oncorhynchus mykiss*): A Review of the Processes and Patterns. *Canadian Journal of Fisheries and Aquatic Sciences* 72(3):319-342.

- Kennedy, T. A., J. D. Muehlbauer, C. B. Yackulic, D. A. Lytle, S. W. Miller, K. L. Dibble, E. W. Kortenhoeven, A. N. Metcalfe, and C. V. Baxter. 2016. Flow Management for Hydropower Extirpates Aquatic Insects, Undermining River Food Webs. *BioScience* 66(7):561-575.
- Kenny, A. J. and H. L. Rees. 1994. The Effects of Marine Gravel Extraction on the Macroenthos - Early Post-Dredging Recolonization. *Marine Pollution Bulletin* 28(7):442-447.
- Kershner, J. L. 1997. Setting Riparian/Aquatic Restoration Objectives within a Watershed Context. *Restoration Ecology* 5(4S):15-24.
- Kier Associates. 1999. Battle Creek Salmon and Steelhead Restoration Plan. Prepared for the Battle Creek Working Group.
- Kier Associates. 1999. Maximizing Compatibility between Coleman National Fish Hatchery Operations, Management of Lower Battle Creek, and Salmon and Steelhead Restoration.
- Kier, W. and M. Ward. 1999. Battle Creek Salmon and Steelhead Restoration Plan. Sausalito, California.
- Killgore, K. J. and S. T. Maynard. 2001. Evaluation of Propeller-Induced Mortality on Early Life Stages of Selected Fish Species. *North American Journal of Fisheries Management* 21:947-955.
- Kimmerer, W. 2004. Open Water Processes of the San Francisco Estuary: From Physical Forcing to Biological Responses. *San Francisco Estuary and Watershed Science* 2(1):142.
- Kimmerer, W. J. 2002. Effects of Freshwater Flow on Abundance of Estuarine Organisms: Physical Effects or Trophic Linkages? *Marine Ecology Progress Series* 243:39-55.
- Kimmerer, W. J. 2002. Physical, Biological, and Management Responses to Variable Freshwater Flow into the San Francisco Estuary. *Estuaries* 25(6b):1275-1290.
- Kimmerer, W. J., E. Gartside, and J. J. Orsi. 1994. Predation by an Introduction Clam as the Likely Cause of Substantial Declines in Zooplankton of San-Francisco Bay. *Marine Ecology Progress Series* 113(1-2):81-93.
- Kipple, B. and C. Gabriele. 2007. Underwater Noise from Skiffs to Ships. Pages 172-175 in J. F. Piatt and S. M. Gende, editors. *Proceedings of the Fourth Glacier Bay Science Symposium, October 26-28, 2004*.
- Kjelson, M., S. Greene, and P. L. Brandes. 1981. A Model for Estimating Mortality and Survival of Fall-Run Chinook Salmon Smolts in the Sacramento River Delta between Sacramento and Chipps Island. U.S. Fish and Wildlife Service and Department of Water Resources, 51 pp.
- Kjelson, M. A. and P. L. Brandes. 1989. The Use of Smolt Survival Estimates to Quantify the Effects of Habitat Changes on Salmonid Stocks in the Sacramento-San Joaquin Rivers, California. Pages 100-115 in *Proceedings of the National Workshop on Effects of Habitat Alteration on Salmonid Stocks*, C. D. Levings, L. B. Holtby, and M. A. Henderson, editors. Fisheries and Oceans, Canada.
- Kjelson, M. A. and P. L. Brandes. 1989. The Use of Smolt Survival Estimates to Quantify the Effects of Habitat Changes on Salmonid Stocks in the Sacramento-San Joaquin Rivers, California In: *Proceedings of the National Workshop on the Effects of Habitat Alteration on Salmonid Stocks*. Canadian Special Publications in Fisheries and Aquatic Sciences, 105:100-115.
- Kjelson, M. A., P. F. Raquel, and F. Fisher. 1982. Life History of Fall-Run Juvenile Chinook Salmon, *Oncorhynchus tshawytscha*, in the Sacramento-San Joaquin Estuary, California. Pages 393-411 in *Estuarine Comparisons*, V. S. Kennedy, editor. Academic Press.

- Kjelson, M. A., P. F. Raquel, and F. W. Fisher. 1981. The Life History of Fall Run Juvenile Chinook Salmon, *Oncorhynchus tshawytscha*, in the Sacramento-San Joaquin Estuary of California *in* Comparisons of Anadromous Fishes in Estuaries.
- Kjelson, M. A., P. F. Raquel, and F. W. Fisher. 1982. The Life History of Fall Run Juvenile Chinook Salmon, *Oncorhynchus tshawytscha*, in the Sacramento-San Joaquin Estuary of California *in* Estuarine Comparisons: Sixth Biennial International Estuarine Research Conference, Gleneden Beach. Academic Press. New York.
- Klimley, A. P. 2004. Survival and Migratory Patterns of Central Valley Juvenile Salmonids. University of California, Davis, and National Marine Fisheries Service.
- Klimley, A. P., E. D. Chapman, J. J. Cech Jr, D. E. Cocherell, N. A. Fanguie, M. Gingras, Z. Jackson, E. A. Miller, E. A. Mora, and J. B. Poletto. 2015. Sturgeon in the Sacramento-San Joaquin Watershed: New Insights to Support Conservation and Management. *San Francisco Estuary and Watershed Science* 13(4):1-21.
- Klimley, A. P., M. J. Thomas, and A. Hearn. 2015b. Juvenile Green Sturgeon Movements and Identification of Critical Rearing Habitat. U.S. Bureau of Reclamation, 8 pp.
- Klimley, A. P., M. T. Wyman, and R. Kavet. 2017. Chinook Salmon and Green Sturgeon Migrate through San Francisco Estuary Despite Large Distortions in the Local Magnetic Field Produced by Bridges. *PLoS ONE* 12(6):16.
- Klimley, P., D. Tu, A. Hearn, W. Brostoff, P. LaCivita, A. Bremner, and T. Keegan. 2010. Juvenile Salmonid Outmigration and Distribution in the San Francisco Estuary: 2006-2008 Interim Draft Report. University of California, Davis, and U.S. Army Corps of Engineers.
- Klimley, P. A., E. D. Chapman, J. J. Cech, D. E. Cocherell, N. A. Fanguie, M. Gingras, Z. Jackson, E. A. Miller, E. A. Mora, J. B. Poletto, A. M. Schreier, A. Seesholtz, K. J. Sulak, M. J. Thomas, D. Woodbury, and M. T. Wyman. 2015a. Sturgeon in the Sacramento-San Joaquin Watershed: New Insights to Support Conservation and Management. *San Francisco Estuary and Watershed Science* 13(4):1-19.
- Knight, S. S. and K. L. Boyer. 2007. Effects of Conservation Practices on Aquatic Habitats and Fauna. 19 pp.
- Knowles, N. and D. R. Cayan. 2002. Potential Effects of Global Warming on the Sacramento/San Joaquin Watershed and the San Francisco Estuary. *Geophysical Research Letters* 29(18):1891-1895.
- Knowles, N., M. D. Dettinger, and D. R. Cayan. 2006. Trends in Snowfall Versus Rainfall in the Western United States. *Journal of Climate* 19(18):4545-4559.
- Knudsen, F. R., P. S. Enger, and O. Sand. 1994. Avoidance Responses to Low-Frequency Sound in Downstream Migrating Atlantic Salmon Smolt, *Salmo salar*. *Journal of Fish Biology* 45(2):227-233.
- Knudsen, F. R., C. B. Schreck, S. M. Knapp, P. S. Enger, and O. Sand. 1997. Infrasound Produces Flight and Avoidance Responses in Pacific Juvenile Salmonids. *Journal of Fish Biology* 51(4):824-829.
- Koellner, T. and O. J. Schmitz. 2006. Biodiversity, Ecosystem Function, and Investment Risk. *BioScience* 56(12):977-985.
- Kogut, N. J. 2008. Overbite Claims, *Corbula amurensis* Defecated Alive by White Sturgeon, *Acipenser transmontanus*. *California Department of Fish and Game* 94:143-149.
- Kogut, N. J. 2008. Overbite Claims, *Corbula amurensis*, Defecated Alive by White Sturgeon, *Acipenser transmontanus*. *California Department of Fish and Game*, 143-149 pp.
- Kogut, N. J. 2008. Overbite Claims, *Corbula amurensis*, Defecated Alive by White Sturgeon, *Acipenser transmontanus*. Page 7. *California Fish and Game*.

- Kohler, A. E., A. Rugenski, and D. Taki. 2008. Stream Food Web Response to a Salmon Carcass Analogue Addition in Two Central Idaho, U.S.A. Streams. *Freshwater Biology* 53(3):446-460.
- Kohlhorst, D. W., L. W. Botsford, J. S. Brennan, and G. M. Cailliet. 1991. Aspects of the Structure and Dynamics of an Exploited Central California Population of White Sturgeon (*Acipenser transmontanus*). Pages 277-293 *in* Proceedings of the First International Symposium on the Sturgeon. CEMAGREF. Bordeaux, France.
- Kolkman, G. 2002. American River Pump Station Project Final Environmental Impact Statement/Environmental Impact Report. Federal Register, 67(119).
- Kondolf, G. M. 1997. Effects of Dams and Gravel Mining on River Channels. *Springer-Verlag* 21(4):533-551.
- Kondolf, G. M. 2000. Assessing Salmonid Spawning Gravel Quality. *Transactions of the American Fisheries Society* 129(1):262-281.
- Kondolf, G. M. 2000. Some Suggested Guidelines for Geomorphic Aspects of Anadromous Salmonid Habitat Restoration Proposals. Page 9.
- Kondolf, G. M., G. F. Cada, M. J. Sale, and T. Felando. 1991. Distribution and Stability of Potential Salmonid Spawning Gravels in Steep Boulder-Bed Streams of the Eastern Sierra Nevada. *Transactions of the American Fisheries Society*(120):177-186.
- Kondolf, G. M. and M. G. Wolman. 1993. The Size of Salmonid Spawning Gravels. *Water Resources Research* 29(7):2275-2285.
- Kondolf, G. M. and M. G. Wolman. 1993. The Sizes of Salmonid Spawning Gravels. *Water Resources Research* 29(7):2275-2285.
- Kondolf, M. G., G. F. Cada, M. J. Sale, and T. Felando. 1991. Distribution and Stability of Potential Salmonid Spawning Gravels in Steep Boulder-Bed Streams of the Eastern Sierra Nevada. *Transactions of the American Fisheries Society*,(120):177-186.
- Kope, R. G. and C. K. Parken. 2011. Recent Trends in Abundance of Chinook Salmon Stocks from British Columbia, Washington, Oregon, and California. Presentation at Science Panel Evaluating the Effects of Salmon Fisheries on Southern Resident Killer Whales. September, 2011. Pages 1-17.
- Kormos, B., M. Palmer-Zwahlen, and A. Low. 2012. Recovery of Coded-Wire Tags from Chinook Salmon in California's Central Valley Escapement and Ocean Harvest in 2010. Fisheries Branch Administrative Report 2012-02, California Department of Fish and Game.
- Kormos, B., M. Palmer-Zwahlen, and A. Low. 2012. Recovery of Coded-Wire Tags from Chinook Salmon in California's Central Valley Escapement and Ocean Harvest in 2010. California Department of Fish and Game, Fisheries Branch Administrative Report 2012-02, 1-44 pp.
- Kostow, K. E. 2004. Differences in Juvenile Phenotypes and Survival between Hatchery Stocks and a Natural Population Provide Evidence for Modified Selection Due to Captive Breeding. *Canadian Journal of Fisheries and Aquatic Sciences* 61(4):577-589.
- Krahn, M. M., M. B. Hanson, R. W. Baird, R. H. Boyer, D. G. Burrows, C. K. Emmons, J. K. Ford, L. L. Jones, D. P. Noren, P. S. Ross, G. S. Schorr, and T. K. Collier. 2007. Persistent Organic Pollutants and Stable Isotopes in Biopsy Samples (2004/2006) from Southern Resident Killer Whales. *Marine Pollution Bulletin* 54(12):1903-1911.

- Krahn, M. M., M. B. Hanson, G. S. Schorr, C. K. Emmons, D. G. Burrows, J. L. Bolton, R. W. Baird, and G. M. Ylitalo. 2009. Effects of Age, Sex and Reproductive Status on Persistent Organic Pollutant Concentrations in "Southern Resident" Killer Whales. *Marine Pollution Bulletin* 58(10):1522-1529.
- Krahn, M. M., P. R. Wade, S. T. Kalinoski, M. E. Dahlheim, B. L. Taylor, M. B. Hanson, G. M. Ylitalo, P. P. Angliss, J. E. Stein, and R. S. Waples. 2002. 2004 Status Review of Southern Resident Killer Whales (*Orcinus orca*) under the Endangered Species Act. National Marine Fisheries Service, NOAA Technical Memorandum NMFS-NWFSC-54, 1-95 pp.
- Krueger, D. M., E. S. Rutherford, and D. M. Mason. 2011. Influence of Predation Mortality on Survival of Chinook Salmon Parr in a Lake Michigan Tributary. *Transactions of the American Fisheries Society* 140(1):147-163.
- Kruse, G. and D. Scarnecchia. 2002. Assessment of Bioaccumulated Metal and Organochlorine Compounds in Relation to Physiological Biomarkers in Kootenai River White Sturgeon. *Journal of Applied Ichthyology* 18(4-6):430-438.
- Kruse, G. H. 1998. Salmon Run Failures in 1997-1998: A Link to Anomalous Ocean Conditions? *Alaska Fishery Research Bulletin* 5(1):55-63.
- Kruse, G. O. a. D. L. S. 2002. Assessment of Bioaccumulated Metal and Organochlorine Compounds in Relation to Physiological Biomarkers in Kootenai River White Sturgeon. *Journal of Applied Ichthyology* 18:430-438.
- Kuivila, K. M. and G. E. Moon. 2004. Potential Exposure of Larval and Juvenile Delta Smelt to Dissolved Pesticides in the Sacramento-San Joaquin Delta, California. *American Fisheries Society Symposium* 39:229-241.
- Kurth, R. 2018. pers. comm. L. Krasnow and P. Doukakis. April 26, 2018.
- Kyle, R. E. and T. P. Brabets. 2001. Water Temperature of Streams in the Cook Inlet Basin, Alaska, and Implications of Climate Change. U.S. Department of the Interior and U.S. Geological Survey, 32 pp.
- Kynard, B. and E. Parker. 2005. Ontogenetic Behavior and Dispersal of Sacramento River White Sturgeon, *Acipenser transmontanus*, with a Note on Body Color. *Environmental Biology of Fishes* 74(1):19-30.
- Kynard, B., E. Parker, and T. Parker. 2005. Behavior of Early Life Intervals of Klamath River Green Sturgeon, *Acipenser medirostris*, with a Note on Body Color. *Environmental Biology of Fishes* 72(1):85-97.
- Labenia, J. S., D. H. Baldwin, B. L. French, J. W. Davis, and N. L. Scholz. 2007. Behavioral Impairment and Increased Predation Mortality in Cutthroat Trout Exposed to Carbaryl. *Mar. Ecol.: Prog. Ser.* 329:1.
- Laetz, C. A., D. H. Baldwin, T. K. Collier, V. Hebert, J. D. Stark, and N. L. Scholz. 2009. The Synergistic Toxicity of Pesticide Mixtures: Implications for Risk Assessment and the Conservation of Endangered Pacific Salmon. *Environ Health Perspect* 117(3):348-353.
- Laetz, C. A., D. H. Baldwin, V. Hebert, J. D. Stark, and N. L. Scholz. 2013. Interactive Neurobehavioral Toxicity of Diazinon, Malathion, and Ethoprop to Juvenile Coho Salmon. *Environmental Science Technology* 47(6):2925-2931.
- Laetz, C. A., D. H. Baldwin, V. R. Hebert, J. D. Stark, and N. L. Scholz. 2014. Elevated Temperatures Increase the Toxicity of Pesticide Mixtures to Juvenile Coho Salmon. *Aquat Toxicol* 146:38-44.
- Langness, O. P. 2005. Green Sturgeon Utilization of the Coastal Estuaries of Washington State. Department of Fish and Wildlife, 42 pp.

- Langness, O. P. 2007. Risk Assessment of Green Sturgeon in Washington. Standard Final Performance Report (Corrected) of Washington Department of Fish and Wildlife to U.S. Fish and Wildlife Service, Portland, Oregon. DOI Grant T-1-4. Performance Period 9/19/2002 through 9/30/2006.
- Larson, K. W. and C. E. Moehl. 1990. Entrainment of Anadromous Fish by Hopper Dredge at the Mouth of the Columbia River. Pages 102-112 *in* Effects of Dredging on Anadromous Pacific Coast Fishes: Workshop Proceedings, Seattle, September 8-9, 1988, C. A. Simenstad, editor. Washington Sea Grant Program, Seattle.
- Latta, F. F. 1977. Handbook of Yokuts Indians. Pages 503-513 *in*. Santa Cruz, California Bear State Books.
- Leary, R. F., F. W. Allendorf, and G. K. Sage. 1995. Hybridization and Introgression between Introduced and Native Fish. Pages 91-101 *in* American Fisheries Society Symposium.
- Lawless, A. S. 2008. Effects of Shoreline Development and Oyster Reefs on Benthic Communities in Lynnhaven, Virginia. Master's Thesis. The College of William and Mary in Virginia.
- Leatherbarrow, J. E., L. J. McKee, D. H. Schoellhamer, N. K. Ganju, and A. R. Flegal. 2005. Concentrations and Loads of Organic Contaminants and Mercury Associated with Suspended Sediment Discharged to San Francisco Bay from the Sacramento-San Joaquin River Delta. San Francisco Estuary Institute, Oakland, CA
- Lee, G. F. and A. Jones-Lee. 1994. Does Meeting Cleanup Standards Mean Protection of Public Health and the Environment. Research Gate:531-540.
- Lee, J., N. De Riu, L. Seunghyung, S. C. Bai, G. Moniello, and S. O. Hung. 2011. Effects of Dietary Methylmercury on Growth Performance and Tissue Burden in Juvenile Green (*Acipenser medirostris*) and White Sturgeon (*A. transmontanus*). *Aquatic Toxicology* 105:227-234.
- Lehman, P. W., S. Teh, R. H. Boyer, M. Nobriga, E. Bass, and C. Hogle. 2009. Initial Impacts of Microcystis Aeruginosa Blooms on the Aquatic Food Web in the San Francisco Estuary. *Hydrobiologia* 637(1):229-248.
- Leider, S. A., M. W. Chilcote, and J. J. Loch. 1986. Movement and Survival of Presmolt Steelhead in a Tributary and the Main Stem of a Washington River. *North American Journal of Fisheries Management* 6(4):526-531.
- Leitritz, E. and R. Lewis. 1980. Trout and Salmon Culture: Hatchery Methods. *California Fish Bulletin* 164:1-199.
- Leonard, W. P., H. A. Brown, L. L. C. Jones, K. R. McAllister, and R. M. Storm. 1993. Amphibians of Washington and Oregon *in*, Seattle Audubon Society.
- Lepland, A., T. J. Andersen, A. Lepland, H. P. Arp, E. Alve, G. D. Breedveld, and A. Rindby. 2010. Sedimentation and Chronology of Heavy Metal Pollution in Oslo Harbor, Norway. *Marine Pollution Bulletin* 60(9):1512-1522.
- Lessard, J. L. and D. B. Hayes. 2003. Effects of Elevated Water Temperature on Fish and Macroinvertebrate Communities Below Small Dams. *River Research and Applications* 19(7):721-732.
- Levin, P. S., S. Achord, B. E. Feist, and R. W. Zabel. 2002. Non-Indigenous Brook Trout and the Demise of Pacific Salmon: A Forgotten Threat? *Proc Biol Sci* 269(1501):1663-1670.
- Levings, C. D. 1982. Short Term Use of a Low Tide Refuge in a Sandflat by Juvenile Chinook, *Oncorhynchus tshawytscha*, Fraser River Estuary. 1111, Department of Fisheries and Oceans, Fisheries Research Branch, West Vancouver, British Columbia.
- Levings, C. D., C. D. McAllister, and B. D. Chang. 1986. Differential Use of the Campbell River Estuary, British Columbia by Wild and Hatchery-Reared Juvenile Chinook Salmon (*Oncorhynchus tshawytscha*). *Canadian Journal of Fisheries and Aquatic Sciences* 43(7):1386-1397.

- Levy, D. A. and T. G. Northcote. 1981. The Distribution and Abundance of Juvenile Salmon in Marsh Habitats of the Fraser River Estuary. Westwater Research Centre, University of British Columbia, Vancouver.
- Li, H. W., J. L. Li, and J. C. Buckhouse. 1994. Cumulative Effects of Riparian Disturbances Along High Desert Trout Streams of the John Day Basin, Oregon. *Transactions of the American Fisheries Society* 123:627-640.
- Liberoff, A. L., A. P. Quiroga, C. M. Riva-Rossi, J. A. Miller, and M. A. Pascual. 2014. Influence of Maternal Habitat Choice, Environment and Spatial Distribution of Juveniles on Their Propensity for Anadromy in a Partially Anadromous Population of Rainbow Trout (*Oncorhynchus mykiss*). *Ecology of Freshwater Fish*:n/a-n/a.
- Library of Congress. 1982. H.R. 6133 -Endangered Species Act Amendments of 1982. <https://www.congress.gov/bill/97th-congress/house-bill/6133>.
- Limburg, K., R. Brown, R. Johnson, B. Pine, R. Rulifson, D. Secor, K. Timchak, B. Walther, and K. Wilson. 2016. Round-the-Coast: Snapshots of Estuarine Climate Change Effects. *Fisheries* 41(7):392-394.
- Limm, M. P. and M. P. Marchetti. 2009. Juvenile Chinook Salmon (*Oncorhynchus tshawytscha*) Growth in off-Channel and Main-Channel Habitats on the Sacramento River, CA Using Otolith Increment Widths. *Environmental Biology of Fishes* 85(2):141-151.
- Linares-Casenave, J., R. Linville, J. P. Van Eenennaam, J. B. Muguet, and S. I. Doroshov. 2015. Selenium Tissue Burden Compartmentalization in Resident White Sturgeon (*Acipenser transmontanus*) of the San Francisco Bay Delta Estuary. *Environmental Toxicology and Chemistry* 34(1):152-160.
- Linares-Casenave, J., I. Werner, J. P. Van Eenennaam, and S. I. Doroshov. 2013. Temperature Stress Induces Notochord Abnormalities and Heat Shock Proteins Expression in Larval Green Sturgeon (*Acipenser medirostris* Ayres 1854). *Journal of Applied Ichthyology* 29(5):958-967.
- Lincoln, R. F. and A. P. Scott. 1984. Sexual-Maturation in Triploid Rainbow Trout, *Salmo-Gairdneri* Richardson. *Journal of Fish Biology* 25(4):385-392.
- Lind, A. J. and H. Welsh. 1994. Ontogenetic Changes in Foraging Behaviour and Habitat Use by the Oregon Garter Snake, *Thamnophis Atratus Hydrophilus*. *Animal Behaviour* 48:1261-1273.
- Lindenmayer, D. B. and G. E. Likens. 2010. The Science and Application of Ecological Monitoring. *Biological Conservation* 143(6):1317-1328.
- Lindley, S. 2008. California Salmon in a Changing Climate. Sacramento, California.
- Lindley, S. 2008. California Salmon in a Changing Climate Presentation. National Marine Fisheries Service, 20 pp.
- Lindley, S. T. 2003. Estimation of Population Growth and Extinction Parameters from Noisy Data. *Ecological Applications* 13(3):806-813.
- Lindley, S. T., M. S. M. C. B. Grimes, W. Peterson, J. Stein, J. T. Anderson, L. W. Botsford, , D. L. Bottom, C. A. Busack, T. K. Collier, J. Ferguson, J. C. Garza, A. M. Grover, D. G. Hankin, R. G. Kope, P. W. Lawson, A. Low, R. B. MacFarlane, K. Moore, , and F. B. S. M. Palmer-Zwahlen, J. Smith, C. Tracy, R. Webb, B. K. Wells, T. H. Williams. 2009. What Caused the Sacramento River Fall Chinook Stock Collapse?
- Lindley, S. T., D. L. Erickson, M. L. Moser, G. Williams, O. P. Langness, B. W. McCovey, M. Belchik, D. Vogel, W. Pinnix, J. T. Kelly, J. C. Heublein, and A. P. Klimley. 2011. Electronic Tagging of Green Sturgeon Reveals Population Structure and Movement among Estuaries. *Transactions of the American Fisheries Society* 140(1):108-122.

- Lindley, S. T., C. B. Grimes, M. S. Mohr, W. Peterson, J. Stein, J. T. Anderson, L. W. Botsford, D. L. Bottom, C. A. Busack, T. K. Collier, J. Ferguson, J. C. Garza, A. M. Grover, D. G. Hankin, R. G. Kope, P. W. Lawson, A. Low, R. B. Macfarlane, K. Moore, M. Palmer-Zwahlen, F. B. Schwing, J. Smith, C. Tracy, R. Webb, B. K. Wells, and T. H. Williams. 2009. What Caused the Sacramento River Fall Chinook Stock Collapse?
- Lindley, S. T. and M. S. Mohr. 2003. Modeling the Effect of Striped Bass (*Morone saxatilis*) on the Population Viability of Sacramento River Winter-Run Chinook Salmon (*Oncorhynchus tshawytscha*). Fishery Bulletin 101(2):321-331.
- Lindley, S. T., M. L. Moser, D. L. Erickson, M. Belchik, D. W. Welch, E. L. Rechisky, J. T. Kelly, J. Heublein, and A. P. Klimley. 2008. Marine Migration of North American Green Sturgeon. Transactions of the American Fisheries Society 137(1):182-194.
- Lindley, S. T., R. Schick, A. Agrawal, M. Goslin, T. E. Pearson, E. Mora, J. J. Anderson, B. P. May, S. Greene, C. V. Hanson, A. Low, D. McEwan, R. B. Macfarlane, C. Swanson, and J. G. Williams. 2006. Historic Population Structure of the Central Valley Steelhead and Its Alternation by Dams. San Francisco Estuary and Watershed Science 4:19.
- Lindley, S. T., R. Schick, B. P. May, J. J. Anderson, S. Greene, C. V. Hanson, A. Low, D. McEwan, R. B. MacFarlane, C. Swanson, and J. G. Williams. 2004. Population Structure of Threatened and Endangered Chinook Salmon ESUs in California's Central Valley Basin. U.S. Department of Commerce, 67 pp.
- Lindley, S. T., R. Schick, E. Mora, P. B. Adams, J. J. Anderson, S. Greene, C. V. Hanson, B. P. May, D. McEwan, R. B. Macfarlane, C. Swanson, and J. G. Williams. 2007. Framework for Assessing Viability of Threatened and Endangered Chinook Salmon and Steelhead in the Sacramento-San Joaquin Basin. San Francisco Estuary and Watershed Science 5(1).
- Lindley, S. T., R. S. Schick, A. Agrawal, M. Goslin, T. E. Pearson, E. Mora, J. J. Anderson, B. May, S. Greene, C. Hanson, A. Low, D. McEwan, R. B. MacFarlane, C. Swanson, and J. G. Williams. 2006. Historical Population Structure of Central Valley Steelhead and Its Alteration by Dams. San Francisco Estuary and Watershed Science 4(1):1-19.
- Lindley, S. T., R. S. Schick, B. P. May, J. J. Anderson, S. Greene, C. Hanson, A. Low, D. McEwan, R. B. MacFarlane, C. Swanson, and J. G. Williams. 2004. Population Structure of Threatened and Endangered Chinook Salmon ESUs in California's Central Valley Basin. U.S. Department of Commerce, NOAA-TM-NMFS-SWFSC-360, 1-56 pp.
- Lindley, S. T., R. S. Schick, E. Mora, P. B. Adams, J. J. Anderson, S. Greene, C. Hanson, B. P. May, D. McEwan, R. B. MacFarlane, C. Swanson, and J. G. Williams. 2007. Framework for Assessing Viability of Threatened and Endangered Chinook Salmon and Steelhead in the Sacramento-San Joaquin Basin. San Francisco Estuary and Watershed Science 5(1):26.
- Lindsay, R. B., R. K. Schroeder, K. R. Kenaston, R. N. Toman, and M. A. Buckman. 2004. Hooking Mortality by Anatomical Location and Its Use in Estimating Mortality of Spring Chinook Salmon Caught and Released in a River Sport Fishery. North American Journal of Fisheries Management 24(2):367-378.
- Link, J. S., R. Griffis, and S. Busch. 2015. NOAA Fisheries Climate Science Strategy. NOAA Technical Memorandum NMFS-Fspo-155.82.
- Linton, T. L., A. M. Landry, J. E. Buckner, and R. L. Berry. 1985. Effects Upon Selected Marine Organisms of Explosives Used for Sound Production in Geophysical Exploration. Texas Journal of Science 37(4):341-353.
- Linville, R. G., S. N. Luoma, L. Cutter, and G. A. Cutter. 2002. Increased Selenium Threat as a Result of Invasion of the Exotic Bivalve *Potamocorbula amurensis* into the San Francisco Bay-Delta. Aquatic Toxicology 57(1-2):51-64.

- Lisle, T. E. 1982. Effects of Aggradation and Degradation on Riffle-Pool Morphology in Natural Gravel Channels, Northwestern California. *Water Resources Research* 18(6):1643-1651.
- Lisle, T. E. and R. E. Eads. 1991. Methods to Measure Sedimentation of Spawning Gravels. U.S. Forest Service Pacific Southwest Research Station, Res. Note PSW-411, 1-7 pp.
- Littell, J. S., D. L. Peterson, K. L. Riley, Y. Liu, and C. H. Luce. 2016. A Review of the Relationships between Drought and Forest Fire in the United States. *Glob Chang Biol* 22(7):2353-2369.
- Liu, Z. and B. Huang. 2000. Cause of Tropical Pacific Warming Trend. *Geophysical Research Letters* 27(13):1935-1938.
- Lloyd, D. S. 1987. Turbidity as a Water Quality Standard for Salmonid Habitats in Alaska. *North American Journal of Fisheries Management* 7(1):34-45.
- Loch, J. J., S. A. Leider, M. W. Chilcote, R. Cooper, and T. H. Johnson. 1988. Differences in Yield, Emigration Timing, Size, and Age Structure of Juvenile Steelhead from Two Small Western Washington Streams. *California Fish and Game* 74:106-118.
- Loch, J. J., S. A. Leider, M. W. Chilcote, R. Cooper, and T. H. Johnson. 1988. Differences in Yield, Emigration-Timinh, Size, and Age Structure of Juvenile Steelhead from Two Small Western Washington Streams. *California Fish and Wildlife*, 106-118 pp.
- Lockington, W. N. 1879. Report of the Commissioners of Fisheries of the State of California for the Years of 1878-1879.
- Loew, E. R. and A. J. Sillman. 1998. An Action Spectrum for the Light-Dependent Inhibition of Swimming Behavior in Newly Hatched White Sturgeon, *Acipenser transmontanus*. *Vision Research* 38(1):111-114.
- Lovell, J. M., M. M. Findlay, R. M. Moate, J. R. Nedwell, and M. A. Pegg. 2005. The Inner Ear Morphology and Hearing Abilities of the Paddlefish (*Polyodon spathula*) and the Lake Sturgeon (*Acipenser fulvescens*). *Science Direct* 142(3):286-296.
- Lower Yuba River Accord River Management Team Planning Group. 2010. Lower Yuba River Water Temperature Objectives Technical Memorandum. 75 pp.
- Lower Yuba River Fisheries Technical Working Group, CALFED Bay-Delta Program, and Yuba County Water Agency. 2005. Draft Implementation Plan for Lower Yuba River Anadromous Fish Habitat Restoration.
- Lufkin, A., editor. 1991. California's Salmon and Steelhead: The Struggle to Restore an Imperiled Resource. University of California Press, Berkeley.
- Lundin, J. I., R. L. Dills, G. M. Ylitalo, M. B. Hanson, C. K. Emmons, G. S. Schorr, J. Ahmad, J. A. Hempelmann, K. M. Parsons, and S. K. Wasser. 2016. Persistent Organic Pollutant Determination in Killer Whale Scat Samples: Optimization of a Gas Chromatography/Mass Spectrometry Method and Application to Field Samples. *Archives of Environmental Contamination and Toxicology* 70(1):9-19.
- Luoma, S. N., C. N. Dahm, M. Healey, and J. N. Moore. 2015. Challenges Facing the Sacramento-San Joaquin Delta: Complex, Chaotic, or Simply Cantankerous? *San Francisco Estuary and Watershed Science* 13(3):1-25.
- Luoma, S. N. and T. S. Presser. 2000. Forecasting Selenium Discharges to the San Francisco Bay-Delta Estuary: Ecological Effects of a Proposed San Luis Drain Extension. U.S. Geological Survey, Professional Paper 1646, 209 pp.
- Lynch, M. and M. O'Hely. 2001. Captive Breeding and the Genetic Fitness of Natural Populations. 2:363-378.

- MacCall, A. D. and T. C. Wainwright. 2003. Assessing Extinction Risk for West Coast Salmon. U.S. Department of Commerce, NOAA Technical Memorandum NMFS-NWFSC-56, 198 pp.
- MacFarlane, R. B. and E. C. Norton. 2002. Physiological Ecology of Juvenile Chinook Salmon (*Oncorhynchus tshawytscha*) at the Southern End of Their Distribution, the San Francisco Estuary and Gulf of the Farallones, California. Fisheries Bulletin 100:244-257.
- Mackay, R. J. 1992. Colonization by Lotic Macroinvertebrates: A Review of Processes and Patterns. Canadian Journal of Fisheries and Aquatic Sciences 49(3):617-628.
- Macneale, K. H., P.M. Kiffney, and N.L. Scholz. 2010. Pesticides, Aquatic Food Webs, and the Conservation of Pacific Salmon. . Frontiers in Ecology and the Environment 8:475-482.
- Macneale, K. H., J. A. Spromberg, D. H. Baldwin, and N. L. Scholz. 2014. A Modeled Comparison of Direct and Food Web-Mediated Impacts of Common Pesticides on Pacific Salmon. PLoS ONE 9(3):1-15.
- MacWilliams, M. L., R. L. Street, and P. K. Kitanidis. 2004. Modeling Floodplain Flow on Lower Deer Creek, CA. Environmental Fluid Mechanics Laboratory, Department of Civil and Environmental Engineering, Stanford University 2 1429-1439.
- Mangel, M. 2004. Life History Variation in the Steelhead Trout and the Implications for Water Management. University of California, Santa Cruz, National Marine Fisheries Service, and California Department of Fish and Game.
- Mangel, M. and W. H. Satterthwaite. 2008. Combining Proximate and Ultimate Approaches to Understand Life History Variation in Salmonids with Application to Fisheries, Conservation, and Aquaculture. Bulletin of Marine Science(83):107-130.
- Mantua, N., I. Tohver, and A. Hamlet. 2009. Impacts of Climate Change on Key Aspects of Freshwater Salmon Habitat in Washington State. Chapter 6 in Washington Climate Change Impacts Assessment: Evaluating Washington's Future in a Changing Climate. Climate Impacts Group. Pages 217-253 in, University of Washington, Seattle, Washington.
- Marchetti, M. P. and P. B. Moyle. 2001. Effects of Flow Regime on Fish Assemblages in a Regulated California Stream. Ecological Applications 11(2):530-539.
- Marcinkevage, C. and K. Kundargi. 2016. Technical Memorandum: Interagency North Delta Diversion Real-Time Operations Transitional Criteria Workgroup Summary. National Marine Fisheries Service and California Department of Fish and Wildlife, 1-5 pp.
- Marine, K. R. and J. J. Cech. 2004. Effects of High Water Temperature on Growth, Smoltification, and Predator Avoidance in Juvenile Sacramento River Chinook Salmon. North American Journal of Fisheries Management 24(1):198-210.
- Markowitz, H. 1952. Portfolio Selection. The Journal of Finance 7(1):77-91.
- Marsh, G. D. 2007. Historic and Present Distribution of Chinook Salmon and Steelhead in the Calaveras River. San Francisco Estuary and Watershed Science 5(3):33.
- Marston, D. 2003. Stanislaus River Water Temperature Modeling and Analysis.
- Marston, D. 2005. San Joaquin River Fall-Run Chinook Salmon Population Model.
- Marston, D. 2007. San Joaquin River Fall-Run Chinook Salmon and Steelhead Rainbow Trout Historical Population Trend Summary. California Department of Fish and Game, 31 pp.

- Martarano, S. 2018. Confirmed in Stanislaus River for the First Time, a Green Sturgeon Highlights Benefits of Longtime Research and Restoration Efforts. https://www.fws.gov/cno/newsroom/highlights/2018/green_sturgeon/03/01/2018.
- Martin, B. T., A. Pike, S. N. John, N. Hamda, J. Roberts, S. T. Lindley, and E. M. Danner. 2016. Phenomenological Vs. Biophysical Models of Thermal Stress in Aquatic Eggs. *Ecology Letters* 20(1):50-59.
- Martin, C. D., P. D. Gaines, and R. R. Johnson. 2001. Estimating the Abundance of Sacramento River Juvenile Winter Chinook Salmon with Comparisons to Adult Escapement. U.S. Fish and Wildlife Service, Red Bluff Research Pumping Plant Report Series: Volume 5, 1-55 pp.
- Martin, D. J. and L. E. Benda. 2001. Patterns of Instream Wood Recruitment and Transport at the Watershed Scale. *Transactions of the American Fisheries Society* 130(5):940-958.
- Maser, C. 1998. Mammals of the Pacific Northwest, from the Coast to the High Cascades. Page 406 *in*. Oregon State University Press.
- Maslin, P. E., W. R. McKinney, and M. T. L. 1997. Intermittent Streams as Rearing Habitat for Sacramento River Chinook Salmon. California State University, Chico, Department of Biological Sciences.
- Matala, A. P., S. R. Narum, W. Young, and J. L. Vogel. 2012. Influences of Hatchery Supplementation, Spawner Distribution, and Habitat on Genetic Structure of Chinook Salmon in the South Fork Salmon River, Idaho. *North American Journal of Fisheries Management* 32(2):346-359.
- Matkin, C. O., E. L. Saulifis, G. M. Ellis, P. Olesiuk, and S. D. Rice. 2008. Ongoing Population-Level Impacts on Killer Whales *Orcinus orca* Following the 'Exxon Valdez' Oil Spill in Prince William Sound, Alaska. *Marine Ecology Progress Series* 356:269-281.
- Matthews, K. R. and N. H. Berg. 1997. Rainbow Trout Responses to Water Temperature and Dissolved Oxygen Stress in Two Southern California Stream Pools. *Journal of Fish Biology* 50:50-67.
- Matthews, M. and P. Newcombe. 1991. The Synchronous Digital Hierarchy .1. The Origin of the Species. *IEEE Review* 37(5):185-189.
- Mayfield, R. B. and J. J. Cech. 2004. Temperature Effects on Green Sturgeon Bioenergetics. *Transactions of the American Fisheries Society* 133(4):961-970.
- Mazumder, B. S., N. G. Bhowmik, and T. W. Soong. 1993. Turbulence in Rivers Due to Navigation Traffic. *Journal of Hydraulic Engineering* 119(5):581-597.
- McAdam, S. O. 2011. Effects of Substrate Condition on Habitat Use and Survival by White Sturgeon (*Acipenser transmontanus*) Larvae and Potential Implications for Recruitment. *Canadian Journal of Fisheries and Aquatic Sciences* 68(5):812-822.
- McBain & Trush Inc. 2000. Habitat Restoration Plan for the Lower Tuolumne River Corridor. Arcata, California.
- McBain & Trush Inc. 2004. Coarse Sediment Management Plan for the Lower Tuolumne River. Revised Final Report.
- McBain & Trush Inc. 2006. Upper Tuolumne River Available Data Sources, Field Work Plan, and Initial Hydrology Analysis.
- McBain & Trush Inc. 2007. Upper Tuolumne River: Description of River Ecosystem and Recommended Monitoring Actions. 299.

- McBain and Trush. 2001. Final Report: Geomorphic Evaluation of Lower Clear Creek Downstream of Whiskeytown Dam, California.
- McBain and Trush, I. 2002. San Joaquin River Restoration Study Background Report. Friant Water Users Authority (Lindsay, California), Natural Resources Defense Council (San Francisco, California).
- McBeath, J. H. 1984. The Potential Effects of Carbon Dioxide-Induced Climatic Changes in Alaska. Page 208. University of Alaska.
- McCaffrey, W. F., J. C. Blodgett, and J. L. Thornton. 1988. Channel Morphology of Cottonwood Creek near Cottonwood, California, from 1940 to 1985. U.S. Geological Survey and U.S. Army Corps of Engineers, USGS Water Resources Investigations Report 87-4251, 37 pp.
- McCarthy, S. G., J. P. Incardona, and N. L. Scholz. 2008. Coastal Storms, Toxic Runoff, and the Sustainable Conservation of Fish and Fisheries. American Fisheries Society Symposium 64:1-21.
- McCauley, J. E., R. A. Parr, and D. R. Hancock. 1977 Benthic Infauna and Maintenance Dredging: A Case Study. Water Research 11(2):233-242.
- McCauley, R. D., J. Fewtrell, and A. N. Popper. 2003. High Intensity Anthropogenic Sound Damages Fish Ears. Journal of the Acoustical Society of America 113(1):638-642.
- McClure, M. 2011. Climate Change. Page 307 in Status Review Update for Pacific Salmon and Steelhead Listed under the ESA: Pacific Northwest., M. J. Ford, editor, NMFS-NWFCS-113, 281 p.
- McClure, M. M. 2011. Status Review Update for Pacific Salmon and Steelhead Listed under the Endangered Species Act: Pacific Northwest. N. F. S. Center, 281 pp.
- McClure, M. M., M. Alexander, D. Borggaard, D. Boughton, L. Crozier, R. Griffis, J. C. Jorgensen, S. T. Lindley, J. Nye, M. J. Rowland, E. E. Seney, A. Snover, C. Toole, and V. A. N. H. K. 2013. Incorporating Climate Science in Applications of the Us Endangered Species Act for Aquatic Species. Conserv Biol 27(6):1222-1233.
- McCormick, D. P. and S. S. C. Harrison. 2011. Direct and Indirect Effects of Riparian Canopy on Juvenile Atlantic Salmon, *Salmo salar*, and Brown Trout, *Salmo Trutta*, in South-West Ireland. Fisheries Management and Ecology 18(6):444-455.
- McCullough, D. A. 1999. A Review and Synthesis of Effects of Alterations to the Water Temperature Regime on Freshwater Life Stages of Salmonids, with Special Reference to Chinook Salmon. 291 pp.
- McCullough, D. A., J. M. Bartholow, H. I. Jager, R. L. Beschta, E. F. Cheslak, M. L. Deas, J. L. Ebersole, J. S. Foott, S. L. Johnson, K. R. Marine, M. G. Mesa, J. H. Petersen, Y. Souchon, K. F. Tiffan, and W. A. Wurtsbaugh. 2009. Research in Thermal Biology: Burning Questions for Coldwater Stream Fishes. Reviews in Fisheries Science 17(1):90-115.
- McDaniel, J. 2011. pers. comm. Richard Kent of KentCo Construction. September 21, 2011.
- McDonald, J. 1960. The Behaviour of Pacific Salmon Fry During Their Downstream Migration to Freshwater and Saltwater Nursery Areas. Journal of the Fisheries Research Board of Canada 17(5):655-676.
- McDonald-Madden, E., P. W. Baxter, R. A. Fuller, T. G. Martin, E. T. Game, J. Montambault, and H. P. Possingham. 2010. Monitoring Does Not Always Count. Cell Press 25(10):547-550.
- McDowell, R. M. 1994. The Origins of New Zealand's Chinook Salmon, *Oncorhynchus tshawytscha*. Marine Fisheries Review 52(1):1-7.

- McElhany, O. 2003. Interim Report on Viability Criteria for Willamette and Lower Columbia Basin Pacific Salmonids.
- McElhany, O., M. H. Ruckelshaus, M. J. Ford, T. C. Wainwright, and E. P. Bjorkstedt. 2000. Viable Salmonid Populations and the Recovery of Evolutionarily Significant Units, NOAA Technical Memorandum NMFS-NWFSC-42. 174 pp.
- McElhany, P., T. Backman, C. Busack, S. Heppell, S. Kolmes, A. Maule, J. Myers, D. Rawding, D. Shively, A. Steel, C. Steward, and T. Whitesel. 2003. Interim Report on Viability Criteria for Willamette and Lower Columbia Basin Pacific Salmonids. Willamette/Lower Columbia Technical Recovery Team.
- McElhany, P., C. Busack, M. Chilcote, S. Kolmes, B. McIntosh, J. Myers, D. Rawding, A. Steel, C. Steward, D. Ward, T. Whitesel, and C. Willis. 2006. Revised Viability Criteria for Salmon and Steelhead in the Willamette and Lower Columbia Basins: Review Draft. Willamette/Lower Columbia Technical Recovery Team And Oregon Department of Fish and Wildlife.
- McElhany, P., M. H. Ruckelshaus, M. J. Ford, T. C. Wainwright, and E. P. Bjorkstedt. 2000. Viable Salmonid Populations and the Recovery of Evolutionarily Significant Units. National Marine Fisheries Service, NOAA Technical Memorandum NMFS-NWFSC-42, 1-174 pp.
- McElhany, P., M. H. Ruckelshaus, M. J. Ford, T. C. Wainwright, and E. P. Bjorkstedt. 2000. Viable Salmonid Populations and the Recovery of Evolutionarily Significant Units, NOAA Technical Memorandum NMFS-NWFSC-42.
- McEwan, D. 2001. Contributions to the Biology of Central Valley Salmonids. Fish Bulletin 179:44.
- McEwan, D. and T. A. Jackson. 1996. Steelhead Restoration and Management Plan for California. California Department of Fish and Game, 1-234 pp.
- McEwan, D. and J. Nelson. 1991. Steelhead Restoration Plan for the American River. California Department of Fish and Game, 24 pp.
- McEwan, D. R. 2001. Central Valley Steelhead. Fish Bulletin 179(1):1-44.
- McEwan, D. R. 2001. Contributions to the Biology of Central Valley Salmonids. Fish Bulletin 1:1-44.
- McGowan, C. P. and M. R. Ryan. 2010. Arguments for Using Population Models in Incidental Take Assessments for Endangered Species. Journal of Fish and Wildlife Management 1(2):183-188.
- McGraw, K. A. and D. A. Armstrong. 1990. Fish Entrainment by Dredges in Grays Harbor, Washington. Pages 113-131 *in* Effects of Dredging of Anadromous Pacific Coast Fishes: Workshop Proceedings, Seattle, September 8-9, 1988, C. A. Simenstad, editor. Washington Sea Grant Program, Seattle.
- McIntyre, J. K., D. H. Baldwin, D. Beauchamp, and N. L. Scholz. 2012. Low-Level Copper Exposures Increase Visibility and Vulnerability of Juvenile Coho Salmon to Cutthroat Trout Predators. Ecological Applications 22:1460-1471.
- McIntyre, J. K., J. W. Davis, C. Hinman, K. H. Macneale, B. F. Anulacion, N. L. Scholz, and J. D. Stark. 2015. Soil Bioretention Protects Juvenile Salmon and Their Prey from the Toxic Impacts of Urban Stormwater Runoff. Chemosphere 132:213-219.
- McIntyre, J. K., J. W. Davis, J. P. Incardona, J. D. Stark, B. F. Anulacion, and N. L. Scholz. 2014. Zebrafish and Clean Water Technology: Assessing Soil Bioretention as a Protective Treatment for Toxic Urban Runoff. Science of the Total Environment 500-501:173-180.

- McKechnie, R. J. and R. B. Fenner. 1971. Food Habits of White Sturgeon (*Acipenser transmontanus*) in San Pablo and Suisun Bays, California. California Department of Fish and Game, 209-212 pp.
- McLain, J. and G. Castillo. 2010. Nearshore Areas Used by Fry Chinook Salmon, *Oncorhynchus tshawytscha*, in the Northwestern Sacramento-San Joaquin Delta, California. San Francisco Estuary and Watershed Science 7(2):1-12.
- McLean, J. E., P. Bentzen, and T. P. Quinn. 2003. Differential Reproductive Success of Sympatric, Naturally Spawning Hatchery and Wild Steelhead Trout (*Oncorhynchus mykiss*) through the Adult Stage. Canadian Journal of Fisheries and Aquatic Sciences 60(4):433-440.
- McMichael, G. A. and T. N. Pearsons. 1998. Effects of Wild Juvenile Spring Chinook Salmon on Growth and Abundance of Wild Rainbow Trout. Transactions of the American Fisheries Society 127(2):261-274.
- McReynolds, T. R., C. E. Garman, P. D. Ward, and S. L. Plemons. 2007. Butte and Big Chico Creeks Spring-Run Chinook Salmon, *Oncorhynchus tshawytscha*, Life History Investigation 2005-2006. California Department of Fish and Game, Administrative Report No. 2007-2, 1-37 pp.
- McReynolds, T. R., C. E. Garman, P. D. Ward, and S. L. Plemons. 2007. Butte and Big Chico Creeks Spring-Run Chinook Salmon, *Oncorhynchus tshawytscha*, Life History Investigation 2005-2006. California Department of Fish and Game, Administrative Report No. 2007-2.
- McReynolds, T. R., C. E. Garman, P. D. Ward, and M. C. Schommer. 2005. Butte and Big Chico Creeks Spring-Run Chinook Salmon, *Oncorhynchus tshawytscha* Life History Investigation, 2003-2004. California Department of Fish and Game, Inland Fisheries Administrative Report No. 2005-1.
- Meador, J. P., F. C. Sommers, G. M. Ylitalo, and C. A. Sloan. 2006. Altered Growth and Related Physiological Responses in Juvenile Chinook Salmon (*Oncorhynchus tshawytscha*) from Dietary Exposure to Polycyclic Aromatic Hydrocarbons (PAHs). Canadian Journal of Fisheries and Aquatic Sciences 63(10):2364-2376.
- Means, E., M. Laugier, and J. Daw. 2010. Decision Support Planning Methods Incorporating Climate Change Uncertainties into Water Planning 113.
- Mearns, L. O., A. Giorgi, P. Whetton, D. Pabon, M. Hulme, and M. Lal. 2003. Guidelines for Use of Climate Scenarios Developed from Regional Climate Model Experiments.38.
- Meehan, W. R. 1991. Influences of Forest and Rangeland Management on Salmonid Fishes and Their Habitats in W. R. Meehan, editor. American Fisheries Society.
- Meehan, W. R. and T. C. Bjornn. 1991. Salmonid Distributions and Life Histories. Page 36 in.
- Meek, M. H., M. R. Stephens, and K. M. Tomalty. 2014. Genetic Considerations for Sourcing Steelhead Reintroductions: Investigating Possibilities for the San Joaquin River. San Francisco Estuary and Watershed Science:27.
- Meier, W., C. Bonjour, A. Wuest, and P. Reichert. 2003. Modeling the Effect of Water Diversion on the Temperature of Mountain Streams. Journal of Environmental Engineering 129(8):755-764.
- Melnychuk, M. C., J. Korman, S. Hausch, D. W. Welch, D. J. F. McCubbing, C. J. Walters, and J. Grant. 2014. Marine Survival Difference between Wild and Hatchery-Reared Steelhead Trout Determined During Early Downstream Migration. Canadian Journal of Fisheries and Aquatic Sciences:1-16.
- Meridian Farms Water Company. 2001. Positive Barrier Fish Screen Project. Page 36. CALFED Proposal, Meridian, CA.

- Merz, J. E. 2002. Seasonal Feeding Habits, Growth, and Movement of Steelhead Trout in the Lower Mokelumne River, California. *California Fish and Game* 88(3):95-111.
- Merz, J. E. 2002. Seasonal Feeding Habits, Growth, and Movement of Steelhead Trout in the Lower Mokelumne River, California. *California Fish and Game*, 95-111 pp.
- Merz, J. E. and L. K. O. Chan. 2005. Effects of Gravel Augmentation on Macroinvertebrate Assemblages in a Regulated California River. *River Research and Applications* 21(1):61-74.
- Merz, J. E., D. G. Delaney, J. D. Setka, and M. L. Workman. 2015. Seasonal Rearing Habitat in a Large Mediterranean-Climate River: Management Implications at the Southern Extent of Pacific Salmon (*Oncorhynchus Spp.*). *River Research and Applications* 32(6):1220-1231.
- Merz, J. E. and P. B. Moyle. 2006. Salmon, Wildlife, and Wine Marine-Derived Nutrients in Human-Dominated Ecosystems of Central California. *Ecological Applications* 16(3):999-1009.
- Merz, J. E. and J. D. Setka. 2004. Evaluation of a Spawning Habitat Enhancement Site for Chinook Salmon in a Regulated California River. *North American Journal of Fisheries Management* 24(2):397-407.
- Merz, J. E., J. D. Setka, G. B. Pasternack, and J. M. Wheaton. 2004. Predicting Benefits of Spawning-Habitat Rehabilitation to Salmonid (*Oncorhynchus Spp.*) Fry Production in a Regulated California River. *Canadian Journal of Fisheries and Aquatic Sciences* 61(8):1433-1446.
- Mesick, C. 2009. The High Risk of Extinction for the Natural Fall-Run Chinook Salmon Population in the Lower Tuolumne River Due to Insufficient Onstream Flow Releases. U.S. Fish and Wildlife Service, 43 pp.
- Mesick, C. 2010a. Instream Flow Recommendations for the Stanislaus, Tuolumne, and Merced Rivers to Maintain the Viability of the Fall-Run Chinook Salmon Populations. Page 29, El Dorado, California.
- Mesick, C. 2010b. The High Risk of Extinction for the Natural Fall-Run Chinook Salmon Population in the Lower Merced River Due to Insufficient Instream Flow Releases. 111.
- Mesick, C., J. McLain, J. Marston, and T. Heyne. 2007. Limiting Factor Analyses & Recommended Studies for Fall-Run Chinook Salmon and Rainbow Trout in the Tuolumne River. 92.
- Mesick, C. F. and D. Marston. 2007. Relationships between Fall-Run Chinook Salmon Recruitment to the Major San Joaquin River Tributaries and Streamflow, Delta Exports, the Head of the Old River Barrier, and Tributary Restoration Projects from the Early 1980s to 2003. U. S. F. a. W. Service and C. D. o. F. a. Game, 35 pp.
- Metcalfe, N. B., T. E. Van Leeuwen, and S. S. Killen. 2016. Does Individual Variation in Metabolic Phenotype Predict Fish Behaviour and Performance? *J Fish Biol* 88(1):298-321.
- Meyer Resources. 1988. Benefits from Present and Future Salmon and Steelhead Production in California. A Report to the California Advisory Committee on Salmon and Steelhead. Page 83.
- MHW Global. 2016. Livingston Stone National Fish Hatchery, Shasta Reservoir Water Supply Treatment Study.
- Michael, A., R.D. Johnson, S.O. Duke and B. E. Scheffler. 2004. Dose-Response Relationships between Herbicides with Different Modes of Action and Growth of *Lemna Paucicostata*: An Improved Ecotoxicological Method. *Environmental Toxicology and Chemistry* 23(4):1074-1079.
- Michael, J. 2009. Employment Impacts of Reduced Water Supplies to San Joaquin Valley Agriculture. University of the Pacific Eberhardt School of Business: Business Forecasting Center.

- Michael, J. 2009. Unemployment in the San Joaquin Valley in 2009: Fish or Foreclosure? , University of the Pacific Eberhardt School of Business: Business Forecasting Center.
- Michael, J. 2010. Employment Impacts of California Salmon Fishery Closures in 2008 and 2009. University of the Pacific Eberhardt School of Business: Business Forecasting Center.
- Michel, A., R. D. Johnson, S. O. Duke, and B. E. Scheffler. 2004. Dose-Response Relationships between Herbicides with Different Modes of Action and Growth of *Lemna Paucicostata*: An Improved Ecotoxicological Method. *Environmental Toxicology and Chemistry* 23(4):1074-1079.
- Michel, C. J. 2010. River and Estuarine Survival and Migration of Yearling Sacramento River Chinook Salmon (*Oncorhynchus tshawytscha*) Smolts and the Influence of Environment. Master's Thesis. University of California, Santa Cruz, Santa Cruz.
- Michel, C. J., A. J. Ammann, E. D. Chapman, P. T. Sandstrom, H. E. Fish, M. J. Thomas, G. P. Singer, S. T. Lindley, A. P. Klimley, and R. B. MacFarlane. 2013. The Effects of Environmental Factors on the Migratory Movement Patterns of Sacramento River Yearling Late-Fall Run Chinook Salmon (*Oncorhynchus tshawytscha*). *Environmental Biology of Fishes* 96(2-3):257-271.
- Michel, C. J., A. J. Ammann, S. T. Lindley, P. T. Sandstrom, E. D. Chapman, M. J. Thomas, G. P. Singer, A. P. Klimley, and R. B. MacFarlane. 2015. Chinook Salmon Outmigration Survival in Wet and Dry Years in California's Sacramento River. *Canadian Journal of Fisheries and Aquatic Sciences* 72(11):1749-1759.
- Mill Creek Watershed Conservancy, Mattole Restoration Council, and K. Crockett. 2005. The Community Plan for the Mill Creek Watershed.
- Miller, J. A., A. Gray, and J. Merz. 2010. Quantifying the Contribution of Juvenile Migratory Phenotypes in a Population of Chinook Salmon *Oncorhynchus tshawytscha*. *Marine Ecology Progress Series* 408:227-240.
- Miller, K. M. and D. Yates. 2006. Climate Change and Water Resources-A Primer for Municipal Water Providers.96.
- Miller, N. L., K. E. Bashford, and E. Strem. 2003. Potential Impacts of Climate Change on California Hydrology. *Journal of the American Water Resources Association* 39(4):771-784.
- Miller, N. L., J. Jin, N. J. Schlegel, M. A. Snyder, T. O'Brien, L. C. Sloan, P. Duffy, H. Hidalgo, H. Kanamaru, M. Kanamitsu, K. Yoshimura, and D. R. Cayan. 2009. An Analysis of Simulated California Climate Using Multiple Dynamical and Statistical Techniques. California Energy Commission, 47 pp.
- Miller, R. J. and E. L. Brannon. 1982. The Origin and Development of Life History Patterns in Pacific Salmonids. Page 14 *in* Proceedings of the Salmon and Trout Migratory Behavior Symposium, E. L. Brannon and E. O. Salo, editors. University of Washington, School of Fisheries, Seattle, Washington.
- Mills, T. J. and P. D. Ward. 1996. Status of Actions to Restore Central Valley Spring-Run Chinook Salmon. California Department of Fish and Game, 61 pp.
- Milly, P. C. D., J. Betancourt, M. Falkenmark, R. M. Hirsch, Z. W. Kundzewicz, D. P. Lettenmaier, and R. J. Stouffer. 2008. Stationarity Is Dead Whither Water Management? *Climatic Change* 319(5863):573-574.
- Miranda, J., R. Padilla, G. Aasen, J. Morinaka, J. Dubois, B. Mefford, D. Sisneros, J. Boutwell, and M. Horn. 2009. Survival of Fish in the Release Phase of the Fish Salvage Process. California Department of Water Resources, 274 pp.
- Missildine, B., R. Peters, R. Piaskowski, and R. Tabor. 2001. Habitat Complexity, Salmonid Use and Predation of Salmonids at the Bioengineered Revetment at the Maplewood Golf Course on the Cedar River, Washington. U. S. Fish and Wildlife Service, 1-48 pp.

- Mitchell, G. H., C. J. Lazauski, N. Lange, C. P. Damon, and J. M. Frederickson. 2008. Assessing Risk from Underwater Sound Using Simulation of Live-Fire/Antisubmarine Warfare Naval Exercises in the Presence of Protected Marine Species. *Bioacoustics* 17(1-3):257-259.
- Mitson, R. B. and H. P. Knudsen. 2003. Causes and Effects of Underwater Noise on Fish Abundance Estimation. *Aquatic Living Resources* 16(3):255-263.
- Moir, H. J. and G. B. Pasternack. 2010. Substrate Requirements of Spawning Chinook Salmon (*Oncorhynchus tshawytscha*) Are Dependent on Local Channel Hydraulics. *River Research and Applications* 26(4):456-468.
- Mongillo, T. M., G. M. Ylitalo, L. D. Rhodes, S. M. O'Neill, D. P. Noren, and M. B. Hanson. 2016. Exposure to a Mixture of Toxic Chemicals: Implications for the Health of Endangered Southern Resident Killer Whales. National Marine Fisheries Service, NOAA Technical Memorandum NMFS-NWFSC-135, 118 pp.
- Monismith, S., M. Fabrizio, M. Healey, J. Nestler, K. Rose, and J. Van Sickle. 2014. Workshop on the Interior Delta Flows and Related Stressors Panel Summary Report. Delta Stewardship Council.
- Monroe, J. 1997. Predation and Habitat: A Review of the Scientific Literature. Metropolitan Water District of Southern California.
- Montgomery, D. R., E. M. Beamer, G. R. Pess, and T. P. Quinn. 1999. Channel Type and Salmonid Spawning Distribution and Abundance. *Canadian Journal of Fisheries and Aquatic Sciences* 56(3):377-387.
- Montgomery, J., A. Gray, C. B. Watry, and B. Pyper. 2007. Using Rotary Screw Traps to Determine Juvenile Chinook Salmon Out-Migration Abundance, Size and Timing in the Lower Merced River, California 2007. Anadromous Fish Restoration Program Grant No. 813326G009, Cramer Fish Sciences.
- Moore, A. and C. P. Waring. 1996. Sublethal Effects of the Pesticide Diazinon on Olfactory Function in Mature Male Atlantic Salmon Parr. *Journal of Fish Biology* 48(4):758-775.
- Moore, J. W., M. Beakes, N. Retford, S. Sogard, and J. E. Merz. 2010. Evaluating and Predicting Habitat Suitability for California Salmon: Improving Models through a Holistic Perspective. University of California, Santa Cruz, Santa Cruz, California.
- Moore, T. L. 2001. Steelhead Survey Report for Antelope, Deer, Beegum, and Mill Creeks, 2001. California Department of Fish and Game.
- Mora, E. 2016. A Confluence of Sturgeon Migration: Adult Abundance and Juvenile Survival. Ph.D. Dissertation. University of California, Davis.
- Mora, E. A. 2016. Measuring the Abundance and Distribution of Green Sturgeon, A Confluence of Sturgeon Migration: Adult Abundance and Juvenile Survival. Ph.D. Dissertation. University of California, Davis.
- Mora, E. A., R. D. Battleson, S. T. Lindley, M. J. Thomas, R. Bellmer, L. J. Zarri, and A. P. Klimley. 2018. Estimating the Annual Spawning Run Size and Population Size of the Southern Distinct Population Segment of Green Sturgeon. *Transactions of the American Fisheries Society* 147(1):195-203.
- Mora, E. A., S. T. Lindley, D. L. Erickson, and A. P. Klimley. 2009. Do Impassable Dams and Flow Regulation Constrain the Distribution of Green Sturgeon in the Sacramento River, California? *Journal of Applied Ichthyology* 25:39-47.

- Mora, E. A., S. T. Lindley, D. L. Erickson, and A. P. Klimley. 2015. Estimating the Riverine Abundance of Green Sturgeon Using a Dual-Frequency Identification Sonar. *North American Journal of Fisheries Management* 35(3):557-566.
- Morin, P. A., G. Luikart, R. K. Wayne, and S. W. Grp. 2004. Snps in Ecology, Evolution and Conservation. *Trends Ecol Evol* 19(4):208-216.
- Mork, L. and G. Crump. 2015. Zebrafish Craniofacial Development: A Window into Early Patterning. *Current Topics in Developmental Biology* 115:235-269.
- Mortsch, L. D., M. Alden, and J. Klaassen. 2005. Development of Climate Change Scenarios for Impact and Adaptation Studies in the Great Lakes. Downsview, Ontario.
- Moser, M. L., J. A. Israel, M. Neuman, S. T. Lindley, D. L. Erickson, B. W. McCovey Jr., and A. P. Klimley. 2016. Biology and Life History of Green Sturgeon (*Acipenser medirostris* Ayres, 1854): State of the Science. *Journal of Applied Ichthyology* 32(Suppl. 1):67-86.
- Moser, M. L. and S. T. Lindley. 2006. Use of Washington Estuaries by Subadult and Adult Green Sturgeon. *Environmental Biology of Fishes* 79(3-4):243-253.
- Moser, M. L. and S. T. Lindley. 2007. Use of Washington Estuaries by Subadult and Adult Green Sturgeon. *Environmental Biology of Fishes* 79(3-4):243-253.
- Moser, M. L., K. Patten, S. C. Corbett, B. E. Feist, and S. T. Lindley. 2017. Abundance and Distribution of Sturgeon Feeding Pits in a Washington Estuary. *Environmental Biology of Fishes* 100(5):597-609.
- Moser, S., G. Franco, S. Pittiglio, W. Chou, and D. Cayan. 2009. The Future Is Now: An Update on Climate Change Science Impacts and Response Options for California. California Energy Commission Public Interest Energy Research Program CEC-500-2008-071.
- Mosser, C. M., L. C. Thompson, and J. S. Strange. 2013. Survival of Captured and Relocated Adult Spring-Run Chinook Salmon *Oncorhynchus tshawytscha* in a Sacramento River Tributary after Cessation of Migration. *Environmental Biology of Fishes* 96(2-3):405-417.
- Mote, P., E. Salathe, V. Dulière, and E. Jump. 2008. Scenarios of Future Climate for the Pacific Northwest. Climate Impacts Group. University of Washington. Seattle. 12 pp. URL: <http://ces.washington.edu/db/pubs/abstract628.shtml>.
- Mote, P. W., A. F. Hamlet, M. P. Clark, and D. P. Lettenmaier. 2005. Declining Mountain Snowpack in Western North America.
- Mount, J., W. Bennett, J. Durand, W. Fleenor, E. Hanak, J. Lund, and P. Moyle. 2012. Aquatic Ecosystem Stressors in the Sacramento-San Joaquin Delta. Public Policy Institute of California.
- Moyle, P. B. 1976. *Inland Fishes of California*, University of California Press, Berkeley.
- Moyle, P. B. 1995. Conservation of Native Freshwater Fishes in the Mediterranean-Type Climate of California, USA: A Review. *Biological Conservation* 72:271-279.
- Moyle, P. B. 2002. *Inland Fishes of California*. Pages 1-413 *in*. University of California Press, Berkeley and Los Angeles.
- Moyle, P. B. 2002. *Inland Fishes of California*, University of California Press, Berkeley.

- Moyle, P. B. and W. A. Bennett. 2008. The Future of the Delta Ecosystem and Its Fish: Technical Appendix D. Public Policy Institute of California, San Francisco, CA.
- Moyle, P. B. and J. A. Israel. 2005. Untested Assumptions: Effectiveness of Screening Diversions for Conservation of Fish Populations. *Fisheries* 30(5):20-28.
- Moyle, P. B., J. A. Israel, and S. E. Purdy. 2008. Improving Environmental Flow Methods Used in California Federal Energy Regulatory Commission Relicensing. California Energy Commission, 241 pp.
- Moyle, P. B., J. A. Israel, and S. E. Purdy. 2008. Salmon, Steelhead, and Trout in California. Status of an Emblematic Fauna. Center for Watershed Sciences, 316.
- Moyle, P. B., J. A. Israel, and S. E. Purdy. 2008. Salmon, Steelhead, and Trout in California: Status of an Emblematic Fauna. UC Davis Center for Watershed Sciences, University of California, Davis.
- Moyle, P. B., J. A. Israel, and S. E. Purdy. 2008. SOS: California's Native Fish Crisis, Status of and Solutions for Restoring Our Vital Salmon, Steelhead and Trout Populations. Status of and Solutions for Restoring Our Vital Salmon, Steelhead and Trout Populations.
- Moyle, P. B., J. V. E. Katz, and R. M. Quiñones. 2011. Rapid Decline of California's Native Inland Fishes: A Status Assessment. *Biological Conservation* 144(10):2414-2423.
- Moyle, P. B., J. D. Kiernan, P. K. Crain, and R. M. Quinones. 2013. Climate Change Vulnerability of Native and Alien Freshwater Fishes of California: A Systematic Assessment Approach. *PLoS ONE* 8(5):12.
- Moyle, P. B. and T. Light. 1996. Biological Invasions of Fresh Water: Empirical Rules and Assembly Theory. *Biological Conservation* 78(1):13.
- Moyle, P. B. and T. Light. 1996. Fish Invasions in California: Do Abiotic Factors Determine Success? *Ecology* 77(6):1666-1670.
- Moyle, P. B. and M. P. Marchetti. 2006. Predicting Invasion Success: Freshwater Fishes in California as a Model. *BioScience* 56(6):515-524.
- Moyle, P. B. and R. D. Nichols. 1973. Ecology of Some Native and Introduced Fishes of the Sierra Nevada Foothills in Central California. Page 14 *in*.
- Moyle, P. B., R. M. Quinones, J. V. Katz, and J. Weaver. 2015. Fish Species of Special Concern in California, Third Edition. California Department of Fish and Wildlife, 25 pp.
- Moyle, P. B., R. M. Quinones, and J. V. Katz. 2015. Fish Species of Special Concern in California. California Department of Fish and Wildlife.
- Moyle, P. B., J. E. Williams, and E. D. Wikramanayake. 1995. Fish Species of Special Concern in California. California Department of Fish and Game.
- Moyle, P. B., R. M. Yoshiyama, J. E. Williams, and E. D. Wikramanayake. 1995. Fish Species of Special Concern in California. California Department of Fish and Game.
- Moyle, P. B., R. M. Yoshiyama, J. E. Williams, and E. D. Wikramanayake. 1995. Fish Species of Special Concern in California, Second Edition. California Department of Fish and Game.

- Muehlberg, C. D. 2015. Letter to Maria Rea, Assistant Regional Administrator, Additional Designation of Central Valley Spring-Run Chinook Salmon to the Rulemaking of Non-Essential Experimental Population above Shasta Dam Pursuant to Section 10(J) of the Endangered Species Act. Bureau of Reclamation, 1 pp.
- Mueller, R. P., C. S. Abernethy, and D. A. Neitzel. 1995. Fisheries Evaluation of the Dryden Fish Screening Facility Annual Report 1994. Project Number 1985-06200, BPA Report DOE/BP-00029-2.
- Muir, W. D., R. L. Emmett, and R. J. McConnell. 1986. Diet of Juvenile and Subadult White Sturgeon in the Lower Columbia River and Its Estuary. National Marine Fisheries Service, 19 pp.
- Muir, W. D., G. T. McCabe, M. J. Parsley, and S. A. Hinton. 2000. Diet of First-Feeding Larval and Young-of-the-Year White Sturgeon in the Lower Columbia River. *Northwest Science* 74(1):25-33.
- Muir, W. D., G. T. McCabe Jr, S. A. Hinton, and M. J. Parsley. 2000. Diet of First-Feeding Larval and Young-of-the-Year White Sturgeon in the Lower Columbia River.
- Muir, W. D., M. J. Parsley, and S. A. Hinton. 2000. Diet of First-Feeding Larval and Young-of-the-Year White Sturgeon in the Lower Columbia River. *Northwest Science* 74(1):25-33.
- Murillo, D. G. 2016. pers. comm. J. Stelle, William. August 2, 2016.
- Mussen, T. D., D. Cocherell, Z. Hockett, A. Ercan, H. Bandeh, M. L. Kavvas, J. J. Cech, and N. A. Fangue. 2013. Assessing Juvenile Chinook Salmon Behavior and Entrainment Risk near Unscreened Water Diversions: Large Flume Simulations. *Transactions of the American Fisheries Society* (142) 142(1):130-142.
- Mussen, T. D., D. Cocherell, J. B. Poletto, J. S. Reardon, Z. Hockett, A. Ercan, H. Bandeh, M. L. Kavvas, J. J. Cech, Jr., and N. A. Fangue. 2014. Unscreened Water-Diversion Pipes Pose an Entrainment Risk to the Threatened Green Sturgeon, *Acipenser medirostris*. *PLoS ONE* 9(1):e86321.
- Mussen, T. D., O. Patton, D. Cocherell, A. Ercan, H. Bandeh, M. L. Kavvas, J. J. Cech, N. A. Fangue, and J. Post. 2014. Can Behavioral Fish-Guidance Devices Protect Juvenile Chinook Salmon (*Oncorhynchus tshawytscha*) from Entrainment into Unscreened Water-Diversion Pipes? *Canadian Journal of Fisheries and Aquatic Sciences* 71(8):1209-1219.
- Muthukumarana, S., C. J. Schwarz, and T. B. Swartz. 2008. Bayesian Analysis of Mark-Recapture Data with Travel Time-Dependent Survival Probabilities. *Canadian Journal of Statistics* 36(1):5-21.
- Muto, M., V. T. Helker, R. P. Angliss, B. A. Allen, P. L. Boveng, J. M. Breiwick, M. F. Cameron, P. J. Clapham, S. P. Dahle, M. E. Dahlheim, B. S. Fadely, M. C. Ferguson, L. W. Fritz, R. C. Hobbs, Y. V. Ivashchenko, A. S. Kennedy, J. M. London, S. A. Mizroch, R. R. Ream, E. L. Richmond, K. E. W. Sheldon, R. G. Towell, P. R. Wade, J. M. Waite, and A. N. Zerbini. 2017. Alaska Marine Mammal Stock Assessments, 2016. National Marine Fisheries Service, NOAA Technical Memorandum NMFS-AFSC-355, 1-375 pp.
- Myers, J. A. 2008. pers. comm. National Marine Fisheries Service and U.S. Fish and Wildlife Service. March 21, 2008.
- Myers, J. M., R. G. Kope, G. J. Bryant, D. Teel, L. J. Lierheimer, T. C. Wainwright, W. S. Grant, F. W. Waknitz, K. Neely, S. Lindley, and R. S. Waples. 1998. Status Review of Chinook Salmon from Washington, Idaho, Oregon, and California., U.S. Department of Commerce Report No. NMFSNWFC-35. NOAA Tech. Memo.
- Myers, J. M., R. G. Kope, G. J. Bryant, D. Teel, L. J. Lierheimer, T. C. Wainwright, W. S. Grant, F. W. Waknitz, K. Neely, S. T. Lindley, and R. S. Waples. 1998. Status Review of Chinook Salmon from Washington, Idaho, Oregon, and California, Nom Technical Memorandum NMFS-NWFC-35. U.S. Department of Commerce, 443 pp.

- Myers, R. A. and B. Worm. 2003. Rapid Worldwide Depletion of Predatory Fish Communities. *Nature* 423(6937):280-283.
- Myrick, C. and J. Cech Jr. 2000. Growth and Thermal Biology of Feather River Steelhead under Constant and Cyclical Temperatures. University of California, Davis, Department of Wildlife, Fish, and Conservation Biology.
- Myrick, C. A. 1998. Temperature, Genetic, and Ration Effects in Juvenile Rainbow Trout (*Oncorhynchus mykiss*) Bioenergetics. Ph.D. Dissertation. University of California, Davis.
- Myrick, C. A. and J. J. Cech. 1998. Bay-Delta Modeling Forum Technical Publication 01-1 Temperature Effects on Chinook Salmon and Steelhead: A Review Focusing on California's Central Valley Populations.59.
- Myrick, C. A. and J. J. Cech. 2004. Temperature Effects on Juvenile Anadromous Salmonids in California's Central Valley What Don't We Know? *Reviews in Fish Biology and Fisheries*(14):113-123.
- Myrick, C. A. and J. J. Cech. 2005. Effects of Temperature on the Growth, Food Consumption, and Thermal Tolerance of Age-0 Nimbus-Strain Steelhead. *North American Journal of Aquaculture* 67(4):324-330.
- Myrick, C. A. and J. Cech Jr. 2002. Growth of American River Fall-Run Chinook Salmon in California's Central Valley: Temperature and Ration Effects. *California Fish and Game* 88(1):35-44.
- Naiman, R. J., R. E. Bilby, D. E. Schindler, and J. M. Helfield. 2002. Pacific Salmon, Nutrients, and the Dynamics of Freshwater and Riparian Ecosystems. *Ecosystems* 5(4):399-417.
- Naiman, R. J. and M. G. Turner. 2000. A Future Perspective on North America's Freshwater Ecosystems. *Ecological Applications* 10(4):958-970.
- Nakamoto, R. J., T.T. Kisanuki, and G.H. Goldsmith. 1995. Age and Growth of Klamath River Green Sturgeon (*Acipenser medirostris*) U.S. Fish and Wildlife Service Yreka, CA.
- Nakamoto, R. J., T. T. Kisanuki, and G. H. Goldsmith. 1995. Age and Growth of Klamath River Green Sturgeon (*Acipenser medirostris*) U.S. Fish and Wildlife Service Yreka, CA.
- Nakamoto, R. J., T. T. Kisanuki, and G. H. Goldsmith. 1995. Age and Growth of Klamath River Green Sturgeon (*Acipenser medirostris*) U.S. Forest Service and U.S. Fish and Wildlife Service, Project #93-FP-13, 1-27 pp.
- Narum, S. R., M. Banks, T. D. Beacham, M. R. Bellinger, M. R. Campbell, J. Dekoning, A. Elz, C. M. Guthrie, C. Kozfkay, K. M. Miller, P. Moran, R. Phillips, L. W. Seeb, C. T. Smith, K. Warheit, S. F. Young, and J. C. Garza. 2008. Differentiating Salmon Populations at Broad and Fine Geographical Scales with Microsatellites and Single Nucleotide Polymorphisms. *Molecular Ecology* 17(15):3464-3477.
- National Audubon Society. 2016a. Audubon Guide to North American Birds, Common Loon (*Gavia Immer*). <http://www.audubon.org/field-guide/bird/common-loon>. May 17, 2016.
- National Audubon Society. 2016b. Audubon Guide to North American Birds, Bald Eagle (*Haliaeetus Leucocephalus*). <http://www.audubon.org/field-guide/bird/bald-eagle>. May 17, 2016.
- National Audubon Society. 2016c. Audubon Guide to North American Birds, Golden Eagle (*Aquila Chrysaetos*). <http://www.audubon.org/field-guide/bird/golden-eagle>. May 17, 2016.
- National Audubon Society. 2016d. Audubon Guide to North American Birds, Osprey (*Pandion Haliaeetus*). <http://www.audubon.org/field-guide/bird/osprey#>. . August 11, 2016.

- National Audubon Society. 2016e. Audubon Guide to North American Birds, Caspian Tern (*Hydroprogne Caspia*). <http://www.audubon.org/field-guide/bird/caspian-tern>. August 12, 2016.
- National Audubon Society. 2016f. Audubon Guide to North American Birds, Turkey Vulture (*Cathartes Aura*). <http://www.audubon.org/field-guide/bird/turkey-vulture>. August 12, 2016.
- National Audubon Society. 2016g. Audubon Guide to North American Birds, Pied-Billed Grebe (*Podilymbus Podiceps*). <http://www.audubon.org/field-guide/bird/pied-billed-grebe>. August 12, 2016.
- National Audubon Society. 2016h. Audubon Guide to North American Birds, Western Grebe (*Aechmophorus Occidentalis*). <http://www.audubon.org/field-guide/bird/western-grebe>. August 12, 2016.
- National Audubon Society. 2016i. Audubon Guide to North American Birds, Clark's Grebe (*Aechmophorus Clarkii*). <http://www.audubon.org/field-guide/bird/clarks-grebe>. August 12, 2016.
- National Audubon Society. 2016j. Audubon Guide to North American Birds, Double-Crested Cormorant (*Phalacrocorax Auritus*). <http://www.audubon.org/field-guide/bird/double-crested-cormorant>. August 12, 2016.
- National Audubon Society. 2016k. Audubon Guide to North American Birds, Black-Crowned Night Heron (*Nycticorax Nycticorax*). <http://www.audubon.org/field-guide/bird/black-crowned-night-heron>. August 12, 2016.
- National Audubon Society. 2016l. Audubon Guide to North American Birds, American Dipper (*Cinclus Mexicanus*). <http://www.audubon.org/field-guide/bird/american-dipper>. August 12, 2016.
- National Audubon Society. 2016m. Audubon Guide to North American Birds, Common Merganser (*Mergus Merganser*). <http://www.audubon.org/field-guide/bird/common-merganser>. August 12, 2016.
- National Audubon Society. 2016n. Audubon Guide to North American Birds, Hooded Merganser (*Lophodytes Cucullatus*). <http://www.audubon.org/field-guide/bird/hooded-merganser>. August 12, 2016.
- National Audubon Society. 2016o. Audubon Guide to North American Birds, Red-Breasted Merganser (*Mergus Serrator*). <http://www.audubon.org/field-guide/bird/red-breasted-merganser>. August 12, 2016.
- National Audubon Society. 2016p. Audubon Guide to North American Birds, Great Blue Heron (*Ardea Herodias*). <http://www.audubon.org/field-guide/bird/great-blue-heron>. August 12, 2016.
- National Audubon Society. 2016q. Audubon Guide to North American Birds, Snowy Egret (*Egretta Thula*). <http://www.audubon.org/field-guide/bird/snowy-egret>. August 12, 2016.
- National Audubon Society. 2016r. Audubon Guide to North American Birds, Herring Gull (*Larus Argentatus*). <http://www.audubon.org/field-guide/bird/herring-gull>. August 12, 2016.
- National Audubon Society. 2016s. Audubon Guide to North American Birds, Ring-Billed Gull (*Larus Delawarensis*). <http://www.audubon.org/field-guide/bird/ring-billed-gull>. August 13, 2016.
- National Audubon Society. 2016t. Audubon Guide to North American Birds, California Gull (*Larus Californicus*). <http://www.audubon.org/field-guide/bird/california-gull>. August 13, 2016.
- National Audubon Society. 2016u. Audubon Guide to North American Birds, Belted Kingfisher, (*Megaceryle Alcyon*). <http://www.audubon.org/field-guide/bird/belted-kingfisher>. August 13, 2016.
- National Audubon Society. 2016v. Audubon Guide to North American Birds, American Crow (*Corvus Brachyrhynchos*). <http://www.audubon.org/field-guide/bird/american-crow>. August 13, 2016.

- National Audubon Society. 2016w. Audubon Guide to North American Birds, Common Raven (*Corvus Corax*). <http://www.audubon.org/field-guide/bird/common-raven>. August 13, 2016.
- National Marine Fisheries Service. Central Valley Chinook Salmon Current Stream Habitat Distribution Table. Available online at: <http://swr.nmfs.noaa.gov/hcd/dist2.htm> Accessed May 4, 2009.
- National Marine Fisheries Service. 1992. Designated Critical Habitat; Sacramento River Winter-Run Chinook Salmon. Federal Register 57(158):36626-36632.
- National Marine Fisheries Service. 1993. Designated Critical Habitat; Sacramento River Winter-Run Chinook Salmon. Federal Register 58(114):33212-33219.
- National Marine Fisheries Service. 1993. The Use of Barriers to Prevent Adult Salmon Delay and Injury at Hydroelectric Powerhouses and Wasteways. National Marine Fisheries Service, 32 pp.
- National Marine Fisheries Service. 1996. Factors for Steelhead Decline A Supplement to the Notice of Determination for West Coast Steelhead under the Endangered Species Act.83.
- National Marine Fisheries Service. 1996. Factors for Steelhead Decline: A Supplement to the Notice of Determination for West Coast Steelhead under the Endangered Species Act. U.S. Department of Commerce, 83 pp.
- National Marine Fisheries Service. 1996. Recommendations for the Recovery of the Sacramento River Winter-Run Chinook Salmon. U.S. Department of Commerce.
- National Marine Fisheries Service. 1996. Status Review of West Coast Steelhead from Washington, Idaho, Oregon, and California. Technical Memorandum - NOAA Fisheries-NWFSC-27.
- National Marine Fisheries Service. 1997. Fish Screening Criteria for Anadromous Salmonids. 1-12 pp.
- National Marine Fisheries Service. 1997. NMFS Proposed Recovery Plan for the Sacramento River Winter-Run Chinook Salmon. 1-340 pp.
- National Marine Fisheries Service. 1998. Factors Contributing to the Decline of Chinook Salmon: An Addendum to the 1996 West Coast Steelhead Factors for Decline Report. U.S. Department of Commerce, 74 pp.
- National Marine Fisheries Service. 1998. Status Review of Chinook Salmon from Washington, Idaho, Oregon, and California. U.S. Department of Commerce, NOAA Tech. Memo. NMFS-NWFSC-35.
- National Marine Fisheries Service. 1999. A Conceptual Framework for Conservation Hatchery Strategies for Pacific Salmonids. National Marine Fisheries Service, 45 pp.
- National Marine Fisheries Service. 1999. Recovery Planning for West Coast Salmon. U.S. Department of Commerce, 4 pp.
- National Marine Fisheries Service. 2000. Central Valley Project and State Water Project Section 7 Biological Opinion. U.S. Department of Commerce, 84 pp.
- National Marine Fisheries Service. 2000. Guidelines for Electrofishing Waters Containing Salmonids Listed under the Endangered Species Act. National Marine Fisheries Service, 5 pp.
- National Marine Fisheries Service. 2000. Operation of the Federal Central Valley Project and the California State Water Project from December 1, 1999 through March 31, 2000 Biological Opinion. U.S. Department of Commerce.

National Marine Fisheries Service. 2001. Environmental Defense Center, et al. Vs. Donald Evans, et al. Document Index. 123 pp.

National Marine Fisheries Service. 2002. Biological Opinion on Interim Operations of the Central Valley Project (CVP) and State Water Project (SWP) between April 1, 2002, and March 31, 2004, U.S. Department of Commerce. National Marine Fisheries Service.

National Marine Fisheries Service. 2002. Biological Opinion on Interim Operations of the Central Valley Project and State Water Project. National Marine Fisheries Service, 844 pp.

National Marine Fisheries Service. 2002. Interim OCAP for Central Valley Project (CVP) and State Water Project (SWP). National Marine Fisheries Service, 116 pp.

National Marine Fisheries Service. 2003. Biological Opinion on the Santa Fe Pacific Partners Concord to Sacramento Petroleum Products Pipeline Project. U.S. Department of Commerce.

National Marine Fisheries Service. 2003. Captain's Table Resort and Marina Project Biological Opinion. U.S. Department of Commerce, 41 pp.

National Marine Fisheries Service. 2003. Issuance of Section 10(a)(1)(A) Permits in the California Central Valley Biological Opinion. U.S. Department of Commerce.

National Marine Fisheries Service. 2003. NOAA Fisheries Report to the Board of Forestry on Salmonid Enumeration. U.S. Department of Commerce.

National Marine Fisheries Service. 2003. Preliminary Conclusions Regarding the Updated Status of Listed ESUs of West Coast Salmon and Steelhead. U.S. Department of Commerce.

National Marine Fisheries Service. 2003. Preliminary Conclusions Regarding the Updated Status of Listed ESUs of West Coast Salmon and Steelhead (Co-Manager Review Draft). U.S. Department of Commerce.

National Marine Fisheries Service. 2003. South Delta Diversions Dredging and Modification Project Biological Opinion. U.S. Department of Commerce.

National Marine Fisheries Service. 2004. Biological Opinion on the Long-Term Central Valley Project and State Water Project Operations Criteria and Plan. U.S. Department of Commerce.

National Marine Fisheries Service. 2005. Biological Opinion - Reclamation's Battle Creek Salmon and Steelhead Restoration Project.

National Marine Fisheries Service. 2005. Final Assessment of the National Marine Fisheries Service's Critical Habitat Analytical Review Teams (Charts) for Seven Salmon and Steelhead Evolutionarily Significant Units (ESUs) in California.

National Marine Fisheries Service. 2005. Policy on the Consideration of Hatchery-Origin Fish in Endangered Species Act Listing Determinations for Pacific Salmon and Steelhead. Federal Register 70(123):37204-37216.

National Marine Fisheries Service. 2005. Updated Status of Federally Listed ESUs of West Coast Salmon and Steelhead. National Marine Fisheries Service, NOAA Technical Memorandum NMFS-NWFSC-66, 1-637 pp.

National Marine Fisheries Service. 2006. 2006 Report to Congress: Pacific Coastal Salmon Recovery Fund Fy 2000–2005. U.S. Department of Commerce, 56 pp.

National Marine Fisheries Service. 2006. Biological and Conference Opinion for the Stockton Deep Water Ship Channel Maintenance Dredging and Levee Stabilization Project. U.S. Department of Commerce, File Number: 151422SWR2004SA9121:JSS, 137 pp.

National Marine Fisheries Service. 2006. Biological Opinion - USFWS' Coleman National Fish Hatchery Fish Barrier Weir and Ladder Modification Project.

National Marine Fisheries Service. 2006. Biological Opinion for Coleman National Fish Hatchery Fish Barrier Wier and Ladder Modification. DOC, SWR2005SA00838.

National Marine Fisheries Service. 2006. Final Supplement to the Shared Strategy's Puget Sound Salmon Recovery Plan. U.S. Department of Commerce, 47 pp.

National Marine Fisheries Service. 2006. Interim Endangered and Threatened Species Recovery Planning Guidance. U.S. Department of Commerce.

National Marine Fisheries Service. 2006. Interim Endangered and Threatened Species Recovery Planning Guidance Appendix A: 1994 Fish and Wildlife Service and National Marine Fisheries Service Cooperative ESA Policies. U.S. Department of Commerce.

National Marine Fisheries Service. 2006. NOAA's National Marine Fisheries Service Southwest Region – Protected Resources Division Strategic Plan. Fiscal Years 2007 through 2011.

National Marine Fisheries Service. 2006. Proposed Recovery Plan for Southern Resident Killer Whales (*Orcinus orca*). U.S. Department of Commerce.

National Marine Fisheries Service. 2006. Recovery Plan for the Puget Sound Chinook Salmon (*Oncorhynchus tshawytscha*). U.S. Department of Commerce.

National Marine Fisheries Service. 2007. Adaptive Management for ESA-Listed Salmon and Steelhead Recovery: Decision Framework and Monitoring Guidance. U.S. Department of Commerce, 66 pp.

National Marine Fisheries Service. 2007. Biological Opinion on the Eight California Department of Water Resources Critical Levee Erosion Repairs. U.S. Department of Commerce.

National Marine Fisheries Service. 2007. Biological Opinion on the Operation of Englebright and Daguerre Point Dams on the Yuba River, California, for a 1-Year Period. U.S. Department of Commerce.

National Marine Fisheries Service. 2007. Central Valley Steelhead Recovery Breakout Group Notes. U.S. Department of Commerce, 6 pp.

National Marine Fisheries Service. 2007. Federal Recovery Outline for the Evolutionarily Significant Units of Sacramento River Winter-Run Chinook Salmon and Central Valley Spring-Run Chinook Salmon and the Distinct Population Segment of California Central Valley Steelhead. U.S. Department of Commerce, 42 pp.

National Marine Fisheries Service. 2007. Magnuson-Stevens Reauthorization Act Klamath River Coho Salmon Recovery Plan. U.S. Department of Commerce.

National Marine Fisheries Service. 2007. Monitoring and Research Needed to Manage the Recovery of Threatened and Endangered Chinook and Steelhead in the Sacramento-San Joaquin Basin. Prepared by J.G. Williams, J.J. Anderson, S. Greene, C. Hanson, S.T. Lindley, A. Low, B.P. May, D., McEwan, M.S. Mohr, R. B MacFarlane, C. Swanson. NOAA Technical Memorandum NMFS. NOAA-TM-NMFS-SWFSC-399.

National Marine Fisheries Service. 2007. Summary of Threats and Recovery Actions for Spring-Run Chinook Salmon. U.S. Department of Commerce, 7 pp.

National Marine Fisheries Service. 2008. Climate Impacts on U.S. Living Marine Resources: National Marine Fisheries Service Concerns, Activities and Needs. U.S. Department of Commerce, .

National Marine Fisheries Service. 2008. Endangered Species Act Section 7(a)(2) Consultation Biological Opinion and Magnuson-Stevens Fishery Conservation and Management Act Essential Fish Habitat Consultation: Consultation on the Approval of Revised Regimes under the Pacific Salmon Treaty and the Deferral of Management to Alaska of Certain Fisheries Included in Those Regimes. F/NWR/2008/07706, 1-422 pp.

National Marine Fisheries Service. 2008. Endangered Species Act Section 7(a)(2) Consultation Biological Opinion and Magnuson-Stevens Fishery Conservation and Management Act Essential Fish Habitat Consultation: Consultation on Treaty Indian and Non-Indian Fisheries in the Columbia River Basin Subject to the 2008-2017 U.S. v. Oregon Management Agreement F/NWR/2008/02406, 1-685 pp.

National Marine Fisheries Service. 2008. Recovery Plan for Southern Resident Killer Whales (*Orcinus orca*). Northwest Region Protected Resources Division, 1-251 pp.

National Marine Fisheries Service. 2009. Appendix A: Watershed Profiles. U.S. Department of Commerce, 262 pp.

National Marine Fisheries Service. 2009. Biological Opinion and Conference Opinion on the Long-Term Operations of the Central Valley Project and State Water Project. National Marine Fisheries Service, 844 pp.

National Marine Fisheries Service. 2009. Endangered Species Act Section 7 Consultation Biological Opinion and Conference Opinion on the Long-Term Operations of the Central Valley Project and State Water Project. ARN 151422SWR2004SA9116, 1-844 pp.

National Marine Fisheries Service. 2009. Endangered Species Act Section 7(a)(2) Consultation Biological Opinion: Effects of the Pacific Coast Salmon Plan on the Southern Resident Killer Whale (*Orcinus orca*) Distinct Population Segment. F/NWR/2009/02298, 1-82 pp.

National Marine Fisheries Service. 2009. pers. comm. D. Glaser. June 4, 2009.

National Marine Fisheries Service. 2009. pers. comm. D. B. Holt. March 5, 2009.

National Marine Fisheries Service. 2009. Public Draft Central Valley Recovery Plan for the Evolutionarily Significant Units of Sacramento River Winter-Run Chinook Salmon and Central Valley Spring-Run Chinook Salmon, and the Distinct Population Segment of California Central Valley Steelhead. U.S. Department of Commerce, 273 pp.

National Marine Fisheries Service. 2009. Southern California Steelhead Recovery Plan: Public Review Draft Version. U.S. Department of Commerce.

National Marine Fisheries Service. 2009 Biological Opinion - PG&E's License Amendment with FERC for Their Battle Creek Hydroelectric Project (1121-087) - Phase 1a.

National Marine Fisheries Service. 2009a. NMFS Biological and Conference Opinion on the Long-Term Operations of the Central Valley Project and State Water Project. 844 pp.

National Marine Fisheries Service. 2009b. Biological Opinion on Nationwide Permit 48 Washington. U.S. Fish and Wildlife Service, 198 pp.

National Marine Fisheries Service. 2009c. Final Biological Report. Designation of Critical Habitat for the Threatened Southern Distinct Population Segment of North American Green Sturgeon. U.S. Department of Commerce, 144 pp.

National Marine Fisheries Service. 2010. Biennial Report to Congress on the Recovery Program for Threatened and Endangered Species: October 1, 2008-September 30, 2010. 1-200 pp.

National Marine Fisheries Service. 2010. Biological Opinion - PG&E's License Amendment with FERC for Their Battle Creek Hydroelectric Project (1121-087) - Phase 1b.

National Marine Fisheries Service. 2010. Biological Opinion on the Authorization of Ocean Salmon Fisheries Pursuant to the Pacific Coast Salmon Fishery Management Plan and Additional Protective Measures as It Affects Sacramento River Winter Chinook Salmon. U.S. Department of Commerce, 95 pp.

National Marine Fisheries Service. 2010. Federal Recovery Outline: North American Green Sturgeon Southern Distinct Population Segment. NMFS California Coastal Office, 20 pp.

National Marine Fisheries Service. 2010. Fisheries Economics of the United States, 2008. U.S. Department of Commerce, NOAA Technical Memorandum NMFS-F/SPO-109, 185 pp.

National Marine Fisheries Service. 2010. Interim Recovery Planning Guidance for Federally Endangered and Threatened Species Version 1.3. U.S. Department of Commerce.

National Marine Fisheries Service. 2010. Placer Vineyards Specific Plan (PVSP). National Marine Fisheries Service, 2 pp.

National Marine Fisheries Service. 2011. 5-Year Review: Summary and Evaluation of Central Valley Steelhead. U.S. Department of Commerce, 34 pp.

National Marine Fisheries Service. 2011. 5-Year Review: Summary and Evaluation of Sacramento River Winter-Run Chinook Salmon. U.S. Department of Commerce, 38 pp.

National Marine Fisheries Service. 2011. Amendment to the 2009 Reasonable and Prudent Alternative of the Biological Opinion and Conference Opinion on the Long-Term Operations of the Central Valley Project and State Water Project. Department of Commerce.

National Marine Fisheries Service. 2011. Anadromous Salmonid Passage Facility Design. 1-140 pp.

National Marine Fisheries Service. 2011. Biennial Report to Congress on the Recovery Program for Threatened and Endangered Species October 1, 2008-September 30, 2010.

National Marine Fisheries Service. 2011. Central Valley Recovery Domain 5-Year Review Summary and Evaluation of Central Valley Steelhead Distinct Population Segment.44.

National Marine Fisheries Service. 2011. Central Valley Recovery Domain 5-Year Review: Summary and Evaluation of Central Valley Spring-Run Chinook Salmon ESU. 1-34 pp.

National Marine Fisheries Service. 2011. Central Valley Recovery Domain 5-Year Review: Summary and Evaluation of Central Valley Steelhead DPS. Department of Commerce.

National Marine Fisheries Service. 2011. Central Valley Recovery Domain 5-Year Review: Summary and Evaluation of Sacramento River Winter-Run Chinook Salmon ESU. 1-38 pp.

National Marine Fisheries Service. 2011. Endangered Species Act Section 7 Consultation Biological Opinion for Environmental Protection Agency Registration of Pesticides 2, 4-D, Triclopyr BEE, Diuron, Linuron, Captan, and Chlorothalonil. 1-1129 pp.

National Marine Fisheries Service. 2011. Endangered Species Act Section 7 Consultation Draft Conference and Biological Opinion for United States Environmental Protection Agency Registration of 2, 4-D, Triclopyr BEE, Diuron, Linuron, Captan, and Chlorothalonil. National Marine Fisheries Service, 1131 pp.

National Marine Fisheries Service. 2011. Federal Pacific Coast Groundfish Regulations for Commercial and Recreational Fishing 3-200 Nautical Miles off Washington, Oregon, and California. Northwest Region 343 pp.

National Marine Fisheries Service. 2011. North-Central California Coast Recovery Domain 5-Year Review: Summary and Evaluation of California Coastal Chinook Salmon ESU and Central California Coast Coho Salmon ESU. 1-54 pp.

National Marine Fisheries Service. 2011. North-Central California Coast Recovery Domain 5-Year Review: Summary and Evaluation of Central California Coastal Steelhead DPS and Northern California Steelhead DPS. 1-67 pp.

National Marine Fisheries Service. 2011. Southern Resident Killer Whales (*Orcinus orca*) 5-Year Review: Summary and Evaluation. 1-70 pp.

National Marine Fisheries Service. 2012. Authorizations and Permits for Protected Species Permit 16822 Tuolumne River Weir.

National Marine Fisheries Service. 2012. Bay Delta Conservation Plan: Proposed Interim Delta Survival Objectives for Juvenile Salmonids. Final Tech Memo Oct 29. National Marine Fisheries Service, 22 pp.

National Marine Fisheries Service. 2012. Biological Opinion for the U.S. Army Corps of Engineers Ongoing Operation and Maintenance of Englebright Dam and Reservoir and Daguerre Point Dam on the Lower Yuba River. Department of Commerce.

National Marine Fisheries Service. 2012. Documentation of Endangered Species Act Section 7 Consultation (PCTS Tn2012/03733) for the Issuance of Section 10(a)(1)(A) Scientific Research and Enhancement Permit 14868, Authorizing Take of Central Valley Spring-Run Chinook Salmon (*Oncorhynchus tshawytscha*). National Marine Fisheries Service.

National Marine Fisheries Service. 2012. Final Recovery Plan for the Evolutionarily Significant Unit of Central California Coast Coho Salmon Chapter 3.0: Overview of the CCC Coho Salmon ESU. 1-38 pp.

National Marine Fisheries Service. 2012. Fishbio Permit 16825 Tuolumne River Rotary Screw Trap.

National Marine Fisheries Service. 2012. Listing Endangered and Threatened Species; 12-Month Finding on a Petition to List Chinook Salmon in the Upper Klamath and Trinity Rivers Basin as Threatened or Endangered under the Endangered Species Act. Federal Register 77(63):19597-19605.

National Marine Fisheries Service. 2012. Merced River Salmonid Monitoring. 11 pp.

National Marine Fisheries Service. 2013. Endangered Species Act Section 7 Consultation Conference and Biological Opinion: Environmental Protection Agency's Registration of Pesticides Containing Diflurbenzuron, Fenbutatin Oxide, and Propargite. 1-832 pp.

National Marine Fisheries Service. 2013. Endangered Species Act Section 7 Consultation Draft Conference and Biological Opinion for United States Environmental Protection Agency Registrations of Pesticides Containing Diflurbenzuron, Fenbutatin Oxide, and Propargite., 924 pp.

National Marine Fisheries Service. 2013. Endangered Species Act Section 7 Consultation Draft Conference and Biological Opinion for United States Environmental Protection Agency Registrations of Pesticides Containing Diflurbenzuron, Fenbutatin Oxide, and Propargite. National Marine Fisheries Service, 924 pp.

National Marine Fisheries Service. 2013. Estimating the Impacts of Chinook Salmon Abundance and Prey Removal by Ocean Fishing on Southern Resident Killer Whale Population Dynamics. National Marine Fisheries Service, 85 pp.

National Marine Fisheries Service. 2014. Biological Opinion - USFWS' Coleman National Fish Hatchery and Livingston Stone National Fish Hatchery Complex.

National Marine Fisheries Service. 2014. Biological Opinion for the Jellys Ferry Bridge Replacement Project N. C. C. V. Office, 144 pp.

National Marine Fisheries Service. 2014. Final Recovery Plan for the Evolutionarily Significant Units of Sacramento River Winter-Run Chinook Salmon and Central Valley Spring-Run Chinook Salmon and the Distinct Population Segment of California Central Valley Steelhead. 1-427 pp.

National Marine Fisheries Service. 2014. Recovery Plan for the Evolutionarily Significant Units of Sacramento River Winter-Run Chinook Salmon and Central Valley Spring-Run Chinook Salmon and the Distinct Population Segment of California Central Valley Steelhead. California Central Valley Area Office.

National Marine Fisheries Service. 2014. Recovery Plan for the Evolutionarily Significant Units of Sacramento River Winter-Run Chinook Salmon and Central Valley Spring-Run Chinook Salmon and the Distinct Population Segment of California Central Valley Steelhead. California Central Valley Area Office. . National Marine Fisheries Service, 428 pp.

National Marine Fisheries Service. 2015. 5-Year Summary and Evaluation: Southern Distinct Population Segment of the North American Green Sturgeon. U.S. Department of Commerce, 42 pp.

National Marine Fisheries Service. 2015. 2015 5-Year Review - Listing Status under the Endangered Species Act for Hatchery Programs Associated with 28 Salmon Evolutionarily Significant Units and Steelhead Distinct Population Segments. National Marine Fisheries Service, 54 pp.

National Marine Fisheries Service. 2015. Captive Broodstock Program (CBP) at Livingston Stone National Fish Hatchery. National Marine Fisheries Service, 2 pp.

National Marine Fisheries Service. 2015. Endangered Species Act Section 7(a)(2) Consultation Biological Opinion, Magnuson-Stevens Fishery Conservation and Management Act Essential Fish Habitat Response and Fish and Wildlife Coordination Act Recommendations for the Lower American River Anadromous Fish Habitat Restoration Program. 151422WCR2015SA00122, 1-99 pp.

National Marine Fisheries Service. 2015. Endangered Species Act Section 7(a)(2) Consultation Biological Opinion, Magnuson-Stevens Fishery Conservation and Management Act Essential Fish Habitat Response and Fish and Wildlife Coordination Act Recommendations for the Upper Sacramento River Anadromous Fish Habitat Restoration Programmatic, in Shasta and Tehama Counties. ARN 151422WCR2015SA00123, 1-75 pp.

National Marine Fisheries Service. 2015. Letter to Mr. Don Alley (D.W. Alley and Associates) from Maria Rea, Assistant Regional Administrator, California Central Valley Area Office, NMFS. National Marine Fisheries Service, 4 pp.

National Marine Fisheries Service. 2015. Recovering Threatened and Endangered Species Fy 2013-2014 Report to Congress.

National Marine Fisheries Service. 2015. Response Re: Chinook Salmon (*Oncorhynchus tshawytscha*) in New Zealand. National Marine Fisheries Service, 4 pp.

National Marine Fisheries Service. 2015. Southern Distinct Population Segment of the North American Green Sturgeon (*Acipenser medirostris*) 5-Year Review: Summary and Evaluation. 1-42 pp.

National Marine Fisheries Service. 2016. 5-Year Review: Summary and Evaluation of California Central Valley Steelhead Distinct Population Segment. NOAA.

National Marine Fisheries Service. 2016. 5-Year Review: Summary and Evaluation of Central Valley Spring-Run Chinook Salmon Evolutionarily Significant Unit. National Marine Fisheries Service, 41 pp.

National Marine Fisheries Service. 2016. 2016 5-Year Review: Summary & Evaluation of Central California Coast Coho Salmon. 1-48 pp.

National Marine Fisheries Service. 2016. 2016 5-Year Review: Summary & Evaluation of Central California Coast Steelhead. 1-55 pp.

National Marine Fisheries Service. 2016. Biological Opinion on Oroville Facilities Hydroelectric Project Relicensing. 439 pp.

National Marine Fisheries Service. 2016. California Central Valley Recovery Domain 5-Year Review: Summary and Evaluation of Central Valley Spring-Run Chinook Salmon ESU. 1-41 pp.

National Marine Fisheries Service. 2016. California Central Valley Recovery Domain 5-Year Status Review: Summary and Evaluation of Sacramento River Winter-Run Chinook Salmon ESU. 1-41 pp.

National Marine Fisheries Service. 2016. Central Valley Recovery Domain 5-Year Review Summary and Evaluation of Central Valley Spring-Run Chinook Salmon.

National Marine Fisheries Service. 2016. Central Valley Recovery Domain 5-Year Review: Summary and Evaluation of California Central Valley Steelhead Distinct Population Segment. 1-44 pp.

National Marine Fisheries Service. 2016. Hatchery - Genetic Management Plans for Livingston Stone National Fish Hatchery-NR Sufficiency Letter. National Marine Fisheries Service, 2 pp.

National Marine Fisheries Service. 2016. Letter from NMFS to Honorable James Edwards, Government-to-Government Consultation on the Draft Shasta Dam Fish Passage. National Marine Fisheries Service, 2 pp.

National Marine Fisheries Service. 2016. Southern Resident Killer Whales (*Orcinus orca*) 5-Year Review: Summary and Evaluation. 1-74 pp.

National Marine Fisheries Service. 2016. Viability Assessment for Pacific Salmon and Steelhead Listed under the Endangered Species Act: Southwest. National Marine Fisheries Service, 170 pp.

National Marine Fisheries Service. 2017. Biological Opinion on the Environmental Protection Agency's Registration of Pesticides Containing Chlorpyrifos, Diazinon, and Malathion. 3749 pp.

National Marine Fisheries Service. 2017. Endangered Species Act (ESA) Section 7(a)(2) Biological Opinion and Magnuson-Stevens Fishery Conservation and Management Act Essential Fish Habitat (Efh) Consultation on NOAA's National Marine Fisheries Service's Implementation of the Mitchell Act Final Environmental Impact Statement Preferred Alternative and Administration of Mitchell Act Hatchery Funding. NWR-2014-697, 1-535 pp.

National Marine Fisheries Service. 2017. Final BiOp Endangered Species Act Section 7(a)(2) Biological Opinion for the Issuance of an ESA Section 10(a)(L)(A) Enhancement Permit to the United States Fish and Wildlife Service for Implementation of Two Hatchery and Genetic Management Plans at Livingston Stone National Fish Hatchery. National Marine Fisheries Service, 144 pp.

National Marine Fisheries Service. 2017. Genetic Analysis of *Oncorhynchus mykiss* in the Upper Tuolumne and Merced Rivers to Evaluate Ancestry and Adaptive Genetic Variation. National Marine Fisheries Service, 36 pp.

National Marine Fisheries Service. 2017. Letter from Maria Rea to Julianne Polanco, State of California Office of Historic Preservation. National Marine Fisheries Service, 86 pp.

National Marine Fisheries Service. 2017. pers. comm. D. G. Murillo. January 19, 2017.

National Marine Fisheries Service. 2018. Transmittal of March Reservoir Operations Forecast Per RPA I.2.3.B(3). National Marine Fisheries Service, 26 pp.

National Marine Fisheries Service and Northwest Fisheries Science Center. 2008. Data Report and Summary Analyses of the West Coast California Halibut Trawl Fishery. Seattle, Washington.

National Marine Fisheries Service and Northwest Fisheries Science Center (NWFSC). 2010. Data Report and Summary Analyses of the U.S. West Coast California Halibut Trawl Fishery. U.S. Department of Commerce.

National Marine Fisheries Service Northwest Fisheries Science Center. 2017. Southern Resident Killer Whale Tagging. https://www.nwfsc.noaa.gov/research/divisions/cb/ecosystem/marinemammal/satellite_tagging/index.cfm. 2017.

National Park Service. 2005. Merced Wild and Scenic River Revised Comprehensive Management Plan and Supplemental Environmental Impact Statement. U.S. Department of the Interior, 1107 pp.

National Research Council. 2003. Ocean Noise and Marine Mammals. National Academies Press:221.

National Research Council. 2010. A Scientific Assessment of Alternatives for Reducing Water Management Effects on Threatened and Endangered Fishes in California's Bay-Delta. The National Academies Press, Washington, D.C.

National Research Council. 2011. A Review of the Use of Science and Adaptive Management in California's Draft Bay Delta Conservation Plan.

National Research Council. 2013. Assessing Risks to Endangered and Threatened Species from Pesticides. The National Academic Press:176.

National Wildlife Federation. 2016. Gray Wolf. <https://www.nwf.org/Wildlife/Wildlife-Library/Mammals/Gray-Wolf.aspx>. May 22, 2016.

Natural Resources Defense Council (NRDC). 2006. Stipulation of Settlement in Nrdc Vs. Rodgers, et al. Draft Program Environmental Impact Statement/Report. 572 pp.

Nature Serve Explorer. 2016. *Rhyacophila Lineata*. Nature Serve Explorer:1.

Nelson, B. 2016. pers. comm. A. Berg. March 3, 2016.

Nelson, J. A. 2016. Oxygen Consumption Rate v. Rate of Energy Utilization of Fishes: A Comparison and Brief History of the Two Measurements. *J Fish Biol* 88(1):10-25.

- Nelson, P. A., D. Behrens, J. Castle, G. Crawford, R. N. Gaddam, S. C. Hackett, D. Largier, P. Lohse, K. L. Mills, P. T. Raimondi, M. Robart, W. J. Sydeman, S. A. Thompson, and S. Woo. 2008. Developing Wave Energy in Coastal California: Potential Socio-Economic and Environmental Effects. California Energy Commission, 182 pp.
- Neo, Y. Y., J. Seitz, R. A. Kastelein, H. V. Winter, C. Ten Cate, and H. Slabbekoorn. 2014. Temporal Structure of Sound Affects Behavioural Recovery from Noise Impact in European Seabass. *Biological Conservation* 178:65-73.
- Nestler, J. M., R. A. Goodwin, D. L. Smith, J. J. Anderson, and S. Li. 2008. Optimum Fish Passage and Guidance Designs Are Based in the Hydrogeomorphology of Natural Rivers. *River Research and Applications* 24(2):148-168.
- Newcombe, C. P. and J. O. T. Jensen. 1996. Channel Suspended Sediment and Fisheries: A Synthesis for Quantitative Assessment of Risk and Impact. *North American Journal of Fisheries Management* 16:693-727.
- Newcombe, C. P. and O. T. Jensen. 1996. Channel Suspended Sediment and Fisheries: A Synthesis for Quantitative Assessment of Risk and Impact. *North American Journal of Fisheries Management* 16:693-727.
- Newcombe, C. P. and D. D. MacDonald. 1991. Effects of Suspended Sediments on Aquatic Ecosystems. *North American Journal of Fisheries Management* 11:72-82.
- Newman, K. B. 2003. Modeling Paired Release-Recovery Data in the Presence of Survival and Capture Heterogeneity with Application to Marked Juvenile Salmon. *Statistical Modelling* 3(3):157-177.
- Newman, K. B. 2008. An Evaluation of Four Sacramento-San Joaquin River Delta Juvenile Salmon Survival Studies. U.S. Fish and Wildlife Service, CalFed Science Program Project Number SCI-06-G06-299, 1-182 pp.
- Newman, K. B. and P. L. Brandes. 2010. Hierarchical Modeling of Juvenile Chinook Salmon Survival as a Function of Sacramento-San Joaquin Delta Water Exports. *North American Journal of Fisheries Management* 30(1):157-169.
- Newman, K. B. and S. T. Lindley. 2006. Accounting for Demographic and Environmental Stochasticity, Observation Error, and Parameter Uncertainty in Fish Population Dynamics Models. 0275-5947
1548-8675, 685-701 pp.
- Newman, K. B. and J. Rice. 2002. Modeling the Survival of Chinook Salmon Smolts Outmigrating through the Lower Sacramento River System. *Journal of the American Statistical Association* 97(460):983-993.
- Newton, J. M. and M. R. Brown. 2004. Adult Spring Chinook Salmon Monitoring in Clear Creek, California, 1999-2002. U.S. Fish and Wildlife Service, 80 pp.
- Newton, J. M., L. A. Stafford, and M. R. Brown. 2008. Monitoring Adult Chinook Salmon Rainbow Trout and Steelhead in Battle Creek, California, from March through November 2007. U.S. Fish and Wildlife Service, 99 pp.
- Nguyen, R. M. and C. E. Crocker. 2007. The Effects of Substrate Composition on Foraging Behavior and Growth Rate of Larval Green Sturgeon, *Acipenser medirostris*. *Environmental Biology of Fishes* 76:129-138.
- Nichols, F. H. and M. M. Pamatmat. 1988. The Ecology of the Soft-Bottom Benthos of San Francisco Bay: A Community Profile. U.S. Fish and Wildlife Service, Biological Report 85 (7.19), 1-86 pp.
- Nichols, F. H., J. K. Thompson, and L. E. Schemel. 1990. Remarkable Invasion of San-Francisco Bay (California, USA) by the Asian Clam *Potamocorbula-Amurensis*. II. Displacement of a Former Community. *Marine Ecology-Progress Series* 66(1-2):95-101.

- Nichols, T. A., T. W. Anderson, and A. Sirovic. 2015. Intermittent Noise Induces Physiological Stress in a Coastal Marine Fish. *PLoS ONE* 10(9):1-10.
- Nickel, D. K. 2004. Factors Regulating Shasta Lake (California) Cold Water Accumulation, a Resource for Endangered Salmon Conservation. *Water Resources Research* 40(5).
- Nickelson, T. E., J. W. Nicholas, A. M. McGie, R. B. Lindsay, D. L. Bottom, R. J. Kaiser, and S. E. Jacobs. 1992. Status of Anadromous Salmonids in Oregon Coastal Basins. Oregon Department of Fish and Wildlife, 83 pp.
- Nielsen, J. L., T. E. Lisle, and V. Ozaki. 1994. Thermally Stratified Pools and Their Use by Steelhead in Northern California Streams. *Transactions of the American Fisheries Society* 123(4):613-626.
- Nielsen, L. W. and I. Dahllof. 2007. Direct and Indirect Effects of the Herbicides Glyphosate, Bentazone and Mcpa on Eelgrass (*Zostera Marina*). *Aquat Toxicol* 82(1):47-54.
- Nielsen, L. W. a. I. D. 2007. Direct and Indirect Effects of Herbicides Glyphosate, Bentazone and Mcpa on Eelgrass (*Zostera Marina*). *Aquatic Toxicology* 82(1):47-54.
- Nielson, J. L., S. Pavey, and T. Wiacek. 2005. Genetics of Central Valley, O. mykiss, Populations: Drainage and Watershed-Scale Analyses. *San Francisco Estuary and Watershed Science*:32.
- Nielson, J. L., S. Pavey, T. Wiacek, G. K. Sage, and I. Williams. 2003. Genetic Analyses of Central Valley Trout Populations 1999-2003. California Department of Fish and Game and U. S. Fish and Wildlife Service, 44 pp.
- Niggemyer, A. and T. Duster. 2003. Final Assessment of Potential Sturgeon Passage Impediments, SP-F3.2 Task 3A. California Department of Water Resources, 27 pp.
- Nightingale, B. and C. A. Simenstad. 2001. Dredging Activities: Marine Issues. Research Project T1802, Task 35, Overwater Whitepaper, Washington State Transportation Commission.
- Nilo, P., S. Tremblay, A. Bolon, J. Dodson, P. Dumont, and R. Fortin. 2006. Feeding Ecology of Juvenile Lake Sturgeon in the St. Lawrence River System. *Transactions of the American Fisheries Society* 135(4):1044-1055.
- NOAA Fisheries. 2017. Killer Whale (*Orcinus orca*). <http://www.nmfs.noaa.gov/pr/species/mammals/whales/killer-whale.html>. December 7, 2017.
- Noakes, D., R. Beamish, L. Klyashtorin, and G. McFarlane. 1998. On the Coherence of Salmon Abundance Trends and Environmental Factors. *North Pacific Anadromous Fish Commission Bulletin* 1:454-463.
- Nobriga, M. and P. Cadrett. 2001. Differences Among Hatchery and Wild Steelhead: Evidence from Delta Fish Monitoring Programs. *IEP Newsletter* 14(3):30-38.
- Nobriga, M. L. 2009. A Synopsis of the State of Science Regarding the Feeding Ecology of San Francisco Estuary Striped Bass and Its Effects on Listed Fishes. California Department of Fish and Game.
- Nobriga, M. L. and P. Cadrett. 2001. Differences among Hatchery and Wild Steelhead; Evidence from Delta Fish Monitoring Programs 56 pp.
- Nobriga, M. L. and F. Feyrer. 2007. Shallow-Water Piscivore-Prey Dynamics in the Sacramento-San Joaquin Delta. *San Francisco Estuary and Watershed Science* 5(2):1-13.
- Noren, D. P., A. H. Johnson, D. Rehder, and A. Larson. 2009. Close Approaches by Vessels Elicit Surface Active Behaviors by Southern Resident Killer Whales. *Endangered Species Research* 8(3):179-192.

- Norin, T. and T. D. Clark. 2016. Measurement and Relevance of Maximum Metabolic Rate in Fishes. *J Fish Biol* 88(1):122-151.
- Norin, T., H. Malte, and T. D. Clark. 2014. Aerobic Scope Does Not Predict the Performance of a Tropical Eurythermal Fish at Elevated Temperatures. *J Exp Biol* 217(Pt 2):244-251.
- Norin, T., H. Malte, and T. D. Clark. 2016. Differential Plasticity of Metabolic Rate Phenotypes in a Tropical Fish Facing Environmental Change. *Functional Ecology* 30(3):369-378.
- Normandeau, E., T. Tricas, and A. Gill. 2011. Effects of EMFs from Undersea Power Cables on Elasmobranches and Other Marine Species. U. S. Department of the Interior, Bureau of Ocean Energy Management, Regulation, and Enforcement, Bedford, NH.
- North, J. A., R. A. Farr, and P. Vescei. 2002. A Comparison of Meristic and Morphometric Characters of Green Sturgeon *Acipenser medirostris*. *Journal of Applied Ichthyology* 18(4-6):234-239.
- North State Resources Inc. 2010. Upper Sacramento River Watershed Assessment and Management Strategy. North State Resources Inc., 421 pp.
- Null, R. E., K. S. Niemela, and S. F. Hamelberg. 2012. Post-Spawn Migrations of Hatchery-Origin *Oncorhynchus mykiss* Kelts in the Central Valley of California. *Environmental Biology of Fishes* 96(2-3):341-353.
- Null, R. E., K. S. Niemela, and S. F. Hamelberg. 2013. Post-Spawn Migrations of Hatchery-Origin *Oncorhynchus mykiss* Kelts in the Central Valley of California. *Environmental Biology of Fishes*(96):341-353.
- Null, S. E., J. H. Viers, M. L. Deas, S. K. Tanaka, and J. F. Mount. 2012. Stream Temperature Sensitivity to Climate Warming in California's Sierra Nevada: Impacts to Coldwater Habitat. *Climatic Change* 116(1):149-170.
- Null, S. E., J. H. Viers, and J. F. Mount. 2010. Hydrologic Response and Watershed Sensitivity to Climate Warming in California's Sierra Nevada. *PLoS ONE* 5(4):e9932.
- O'Neill, S. M., G. M. Ylitalo, and J. E. West. 2014. Energy Content of Pacific Salmon as Prey of Northern and Southern Resident Killer Whales. *Endangered Species Research* 25:265-281.
- O'Brien, B. and W. Loya. 2009. Climate Change Impacts on Water Availability in Alaska. *The Wilderness Society*:4.
- Ocean Mammalist Institute. 2018. Intense Ocean Noise Effects on Fish www.oceanmammalinst.com/ocean-noise-fish-fact-sheet.htm. 4/17/2018.
- Olesiuk, P. F., M. A. Bigg, and G. M. Ellis. 1990. Life History and Population Dynamics of Resident Killer Whales (*Orcinus orca*) in the Coastal Waters of British Columbia and Washington State. *Rep. Int. Whale Commission*(12):209-243.
- Oliver, J. S., P. N. Slattery, L. W. Hulberg, and J. W. Nybakken. 1977. Patterns of Succession in Benthic Infaunal Communities Following Dredging and Dredged Material Disposal in Monterey Bay. Technical Report D-77-27, California State University Consortium, Moss Landing Marine Laboratories, Moss Landing, California.
- Olsen, J. B., K. Wuttig, D. Fleming, E. J. Kretschmer, and J. K. Wenburg. 2006. Evidence of Partial Anadromy and Resident-Form Dispersal Bias on a Fine Scale in Populations of *Oncorhynchus mykiss*. *Conservation Genetics* 7(4):613-619.
- O'Neill, S., D. Herman, E. Ward, D. G. Burrows, and G. M. Ylitalo. 2012. Integrating Stable Isotope, Genetic, and Scale Sample Data to Improve Estimates of Killer Whale Diets *in* Evaluating the Effects of Salmon Fisheries on Southern Resident Killer Whales: Workshop 3, September 18-20, 2012. Seattle, WA.

- O'Neill, S., G. M. Ylitalo, D. Herman, and J. West. 2012. Using Chemical Fingerprints in Salmon and Whales to Infer Prey Preferences and Foraging Habitat of SRKWs *in* Evaluating the Effects of Salmon Fisheries on Southern Resident Killer Whales: Workshop 3, September 18-20, 2012. Seattle, WA.
- O'Neill, S. M. and J. E. West. 2009. Marine Distribution, Life History Traits, and the Accumulation of Polychlorinated Biphenyls in Chinook Salmon from Puget Sound, Washington. *Transactions of the American Fisheries Society* 138(3):616-632.
- O'Neill, S. M., G. M. Ylitalo, and J. E. West. 2014. Energy Content of Pacific Salmon as Prey of Northern and Southern Resident Killer Whales. *Endangered Species Research* 25(3):265-281.
- O'Neill, S. M., G. M. Ylitalo, J. E. West, J. L. Bolton, C. A. Sloan, and M. M. Krahn. 2006. Regional Patterns of Persistent Organic Pollutants in Five Pacific Salmon Species (*Oncorhynchus Spp*) and Their Contributions to Contaminant Levels in Northern and Southern Resident Killer Whales (*Orcinus orca*) *in* 2006 Southern Resident Killer Whale Symposium. Seattle, WA.
- Opperman, J. J. 2012. A Conceptual Model for Floodplains in the Sacramento-San Joaquin Delta. *San Francisco Estuary and Watershed Science*, 10(3):29.
- Opperman, J. J., R. Luster, B. A. McKenney, M. Roberts, and A. W. Meadows. 2010. Ecologically Functional Floodplains: Connectivity Flow Regime and Scale. *Journal of the American Water Resources Association* 46(2):211-226.
- Orcutt, D. R., B. R. Pulliam, and A. Arp. 1968. Characteristics of Steelhead Trout Redds in Idaho Streams. *Transactions of the American Fisheries Society*(97):42-45.
- Oregon Department of Fish and Wildlife. 2017. Comments Submitted to NMFS Regarding Draft Recovery Plan for the Southern DPS of Green Sturgeon. Oregon Department of Fish and Wildlife, 2 pp.
- Oregon State University. 2017. liib 9. Fish Diseases in the Pacific Northwest Region. <http://archive.is/L7Mjz>. March 23, 2018.
- Oreskes, N. 2005. The Scientific Consensus on Climate Change. *Science*, 306:2.
- Oros, D. R. and I. Werner. 2005. Pyrethroid Insecticides: An Analysis of Use Patterns, Distributions, Potential Toxicity and Fate in the Sacramento-San Joaquin Delta and Central Valley. White Paper for the Interagency Ecological Program. Page 113. San Francisco Estuary Institute, Oakland, California.
- Orr, J. C., V. J. Fabry, O. Aumont, L. Bopp, S. C. Doney, R. A. Feely, A. Gnanadesikan, N. Gruber, A. Ishida, F. Joos, R. M. Key, K. Lindsay, E. Maier-Reimer, R. Matear, P. Monfray, A. Mouchet, R. G. Najjar, G.-K. Plattner, K. B. Rodgers, C. L. Sabine, J. L. Sarmiento, R. Schlitzer, R. D. Slater, I. J. Totterdell, M.-F. Weirig, Y. Yamanaka, and A. Yool. 2005. Anthropogenic Ocean Acidification Over the Twenty-First Century and Its Impacts on Calcifying Organisms. *Nature*, 437(7059):681-686.
- Ostrand, K. G., W. G. Simpson, C. D. Suski, and A. J. Bryson. 2009. Behavioral and Physiological Response of White Sturgeon to an Electrical Sea Lion Barrier System. *Marine and Coastal Fisheries* 1(1):363-377.
- Overstreet, B. T., C. S. Riebe, J. K. Wooster, L. S. Sklar, and D. Bellugi. 2016. Tools for Gauging the Capacity of Salmon Spawning Substrates. *Earth Surface Processes and Landforms* 41(1):130-142.
- P.A. Klimley, E. D. Chapman, J. J. Cech, D. E. Cocherell, N. A. Fague, M. Gingras, Z. Jackson, E. A. Miller, E. A. Mora, J. B. Poletto, A. M. Schreier, A. Seesholtz, K. J. Sulak, M. J. Thomas, D. Woodbury, and M. T. Wyman. 2015. Sturgeon in the Sacramento-San Joaquin Watershed: New Insights to Support Conservation and Management. *San Francisco Estuary and Watershed Science* 13(4).

- Pacific Fishery Management Council. 1998. Appendix D - Description and Identification of Essential Fish Habitat for the Coastal Pelagic Species Fishery Management Plan. Pacific Fishery Management Council, 1-42 pp.
- Pacific Fishery Management Council. 1999. Identification and Description of Essential Fish Habitat, Adverse Impacts, and Recommended Conservation Measures for Salmon. Page 153, Portland, OR.
- Pacific Fishery Management Council. 2003. Fishery Management Plan for Commercial and Recreational Salmon Fisheries off the Coasts of Washington, Oregon and California as Revised through Amendment 14. Pacific Fishery Management Council, 78 pp.
- Pacific Fishery Management Council. 2012. Stock Assessment and Fishery Evaluation (Safe) Documents: Review of 2011 Ocean Salmon Fisheries. 363 pp.
- Pacific Fishery Management Council. 2013. Pre-Season Report 1: Stock Abundance Analysis and Environmental Assessment Part 1 for the 2013 Ocean Salmon Fishery Regulations. Pacific Fishery Management Council, 1-143 pp.
- Pacific Fishery Management Council. 2014. Appendix A to the Pacific Coast Salmon Fishery Management Plan - as Modified by Amendment 18 - Identification and Description of Essential Fish Habitat, Adverse Impacts, and Recommended Conservation Measures for Salmon.
- Pacific Fishery Management Council. 2014. Environmental Assessment and Regulatory Impact Review, Pacific Coast Salmon Plan Amendment 18: Incorporating Revisions to Pacific Salmon Essential Fish Habitat. Pacific Fishery Management Council, 1-351 pp.
- Pacific Fishery Management Council. 2016. Pacific Coast Groundfish Fishery Management Plan for the California, Oregon, and Washington Groundfish Fishery. Pacific Fishery Management Council, 1-160 pp.
- Pacific Fishery Management Council. 2016. Pacific Coast Salmon Fishery Management Plan - for Commercial and Recreational Salmon Fisheries off the Coasts of Washington, Oregon, and California as Revised through Amendment 19.
- Pacific Fishery Management Council. 2016. Review of 2015 Ocean Salmon Fisheries: Stock Assessment and Fishery Evaluation Document for the Pacific Coast Salmon Fishery Management Plan.
- Pacific Fishery Management Council. 2016. Review of 2015 Ocean Salmon Fishery, Stock Assessment and Fishery Evaluation Document for the Pacific Coast Salmon Management Plan. Pacific Fishery Management Council, 1-351 pp.
- Pacific Fishery Management Council (PFMC). 2011. Active West Coast Hydrokinetic Projects. Supplemental Information Report 4. 5 pp.
- Pacific Gas and Electric. 2014. Battle Creek Hydroelectric Project Phase 2 FERC No.1121, Draft Application for Amendment of License.
- Pacific Gas and Electric. 2014. Draft Application for License Amendment for FERC Project No. 1121 - Battle Creek Hydroelectric Project - Phase 2.
- Pacific Gas and Electric Company. 2008. Survey for Special-Status Aquatic Molluscs and Invasive Crayfish within Project Reservoirs and Project-Affected Streams, Technical Memorandum 69 (TM-69). 1076-2752 (Print), 1076-2752 (Linking), 194-199 pp.
- Pacific Gas and Electric Company. 2009. Technical Memorandum 66 (TM-66) Water Temperature Monitoring Program Report for 2008 McCloud-Pit Project. 1076-2752 (Print), 1076-2752 (Linking), 337 pp.

- Pacific Gas and Electric Company. 2014. Battle Creek Hydroelectric Project Phase 2, FERC No.1121, Draft Application for Amendment of License.
- Pacific Gas and Electric Company (PG&E). 2009. Water Quality in Project Reservoirs and Project-Affected Stream Reaches (WR-S4) Updated January 2009 Technical Memorandum (TM-26).
- Pacific States Marine Fisheries Commission. 2014. Juvenile Salmonid Emigration Monitoring in the Lower American River, California January – June 2013. Published for the U.S. Fish and Wildlife Service and California Department of Fish and Wildlife, 1-54 pp.
- Paerl, H. W., N. S. Hall, and E. S. Calandrino. 2011. Controlling Harmful Cyanobacterial Blooms in a World Experiencing Anthropogenic and Climatic-Induced Change. *Sci Total Environ* 409(10):1739-1745.
- Page, L. M. and B. M. Burr. 1991. A Field Guide to Freshwater Fishes: North America North of Mexico, Peterson Field Guide Series, 2nd Edition. Peterson Field Guides:432.
- Painter, R. E., L. H. Wixom, and S. N. Taylor. 1977. An Evaluation of Fish Populations and Fisheries in the Post-Oroville Project Feather River. Department of Fish and Game, 1-40 pp.
- Palacios, D. M., S. J. Bograd, R. Mendelsohn, and F. B. Scwing. 2004. Long-Term and Seasonal Trends in Stratification in the California Current, 1950-1933. *Journal of Geophysical Research* 109.
- Palmer, M. A. 2008. Reforming Watershed Restoration: Science in Need of Application and Applications in Need of Science. *Estuaries and Coasts* 32(1):1-17.
- Palmer-Zwahlen, M. and B. Kormos. 2013. Recovery of Coded-Wire Tags from Chinook Salmon in California's Central Valley Escapement and Ocean Harvest in 2011.
- Parchure, T. M., W. H. McAnally, and A. M. Teeter. 2001. Desktop Method for Estimating Vessel-Induced Sediment Suspension. *Journal of Hydraulic Engineering* 127(7):577-587.
- Parsley, M. J., N. D. Popoff, and J. G. Romine. 2011. Short-Term Response of Subadult White Sturgeon to Hopper Dredge Disposal Operations. *North American Journal of Fisheries Management* 31(1):1-11.
- Pasternack, G. 2009. Current Status of an on-Going Gravel Injection Experiment on the Lower Yuba River, CA. 26 pp.
- Pasternack, G. B. 2009. Current Status of an on-Going Gravel Injection Experiment on the Lower Yuba River, California.
- Pasternack, G. B. 2009. Shira-Based River Analysis and Field-Based Manipulative Sediment Transport Experiments to Balance Habitat and Geomorphic Goals on the Lower Yuba River. University of California, Davis.
- Patten, K. 2014. The Impacts of Nonnative Japanese Eelgrass (*Zostera japonica*) on Commercial Shellfish Production in Willapa Bay, WA. *Agricultural Sciences* 5(7):625-633.
- Paul, E. A., H. A. Simonin, J. Symula, and R. W. Bauer. 1994. Toxicity of Diquat, Endothall, and Fluridone to the Early-Life Stages of Fish. *Journal of Freshwater Ecology* 9(3):229-239.
- Paul, E. A., H. A. Simonin, J. Symula, and R. W. Bauer. 1994. Toxicity of Diquat, Endothall, and Fluridone to the Early-Life Stages of Fish. *Journal of Freshwater Ecology* 9(3):229-239.
- Paul, M. J. and J. L. Meyer. 2008. Streams in the Urban Landscape. Pages 207-231 *in* Urban Ecology. Springer.

- Pearcy, W. G., R. D. Brodeur, and J. P. Fisher. 1990. Distribution and Biology of Juvenile Cutthroat Trout *Oncorhynchus Clarki Clarki* and Steelhead *O. mykiss* in Coastal Waters off Oregon and Washington. *Fishery Bulletin* 88:697-711.
- Pearcy, W. G., R. D. Brodeur, and J. P. Fisher. 1990. Distribution and Biology of Juvenile Cutthroat Trout *Oncorhynchus-Clarki-Clarki* and Steelhead *O-Mykiss* in Coastal Waters Off Oregon and Washington. *Fishery Bulletin* 88(4):697-711.
- Pearse, D. E. and J. C. Garza. 2015. You Can't Unscramble an Egg: Population Genetic Structure of *Oncorhynchus mykiss* in the California Central Valley Inferred from Combined Microsatellite and Single Nucleotide Polymorphism Data. *San Francisco Estuary and Watershed Science* 13(4):18.
- Pearse, D. E., S. L. Gunckel, and S. E. Jacobs. 2011. Population Structure and Genetic Divergence of Coastal Rainbow and Redband Trout in the Upper Klamath Basin. *Transactions of the American Fisheries Society* 140(3):587-597.
- Pearse, D. E., M. R. Miller, A. Abadia-Cardoso, and J. C. Garza. 2014. Rapid Parallel Evolution of Standing Variation in a Single, Complex, Genomic Region Is Associated with Life History in Steelhead/Rainbow Trout. *Proc Biol Sci* 281(1783):20140012.
- Pearson, W. H., J. R. Skalski, and C. I. Malme. 1992. Effects of Sound from a Geophysical Survey Device on Behavior of Captive Rockfish. *Canadian Journal of Fisheries and Aquatic Science* 49:1343-1356.
- Pederson, D., S. Wilcox, G. Geary, and J. Klobas. 2012. Lower McCloud River Salmon and Steelhead Spawning Gravel Mapping. Stillwater Sciences and PG&E.
- Perry, R. W. 2010. Survival and Migration Dynamics of Juvenile Chinook Salmon (*Oncorhynchus tshawytscha*) in the Sacramento-San Joaquin River Delta. Ph.D. Dissertation. University of Washington.
- Perry, R. W. 2016. Draft Summary of Methods Used to Simulate Travel Time, Survival, and Routing of Juvenile Chinook Salmon for the California WaterFix Effects Analysis. U.S. Geological Survey, 1-21 pp.
- Perry, R. W., P. L. Brandes, J. R. Burau, A. P. Klimley, B. MacFarlane, C. Michel, and J. R. Skalski. 2012. Sensitivity of Survival to Migration Routes Used by Juvenile Chinook Salmon to Negotiate the Sacramento-San Joaquin River Delta. *Environmental Biology of Fishes* 96(2-3):381-392.
- Perry, R. W., P. L. Brandes, J. R. Burau, P. T. Sandstrom, and J. R. Skalski. 2015. Effect of Tides, River Flow, and Gate Operations on Entrainment of Juvenile Salmon into the Interior Sacramento-San Joaquin River Delta. *Transactions of the American Fisheries Society* 144(3):445-455.
- Perry, R. W., J. G. Romine, N. S. Adams, A. R. Blake, J. R. Burau, S. V. Johnston, and T. L. Liedtke. 2012. Using a Non-Physical Behavioural Barrier to Alter Migration Routing of Juvenile Chinook Salmon in the Sacramento-San Joaquin River Delta. *River Research and Applications* 30(2):192-203.
- Perry, R. W., J. G. Romine, S. J. Brewer, P. E. LaCivita, W. N. Brostoff, and E. D. Chapman. 2012. Survival and Migration Route Probabilities of Juvenile Chinook Salmon in the Sacramento-San Joaquin River Delta During the Winter of 2009–10. Open-File Report 2012-1200, U.S. Geological Survey.
- Perry, R. W., J. G. Romine, A. C. Pope, and S. D. Evans. 2016. Evaluating the Effect of the North Delta Diversion on Flow Reversals and Entrainment of Juvenile Chinook Salmon into Georgiana Slough and the Delta Cross Channel. U.S. Geological Survey, Draft Open File Report 2016-XXXX-XX, 1-49 pp.
- Perry, R. W. and J. R. Skalski. 2008. Migration and Survival of Juvenile Chinook Salmon through the Sacramento–San Joaquin River Delta During the Winter of 2006-2007. University of Washington, Seattle, Washington.

- Perry, R. W. and J. R. Skalski. 2008. Survival and Migration Route Probabilities of Juvenile Chinook Salmon in the Sacramento – San Joaquin River Delta During the Winter of 2007-2008. University of Washington, Seattle, Washington.
- Perry, R. W. and J. R. Skalski. 2010. Individual-, Release-, and Route-Specific Variation in Survival of Juvenile Chinook Salmon Migrating through the Sacramento–San Joaquin River Delta. University of Washington, Seattle, Washington.
- Perry, R. W., J. R. Skalski, P. L. Brandes, P. T. Sandstrom, A. P. Klimley, A. J. Ammann, and B. MacFarlane. 2010. Estimating Survival and Migration Route Probabilities of Juvenile Chinook Salmon in the Sacramento–San Joaquin River Delta. *North American Journal of Fisheries Management* 30:142-156.
- Pess, G. R., M. C. Liermann, M. L. McHenry, R. J. Peters, and T. R. Bennett. 2012. Juvenile Salmon Response to the Placement of Engineered Log Jams (Elj) in the Elwha River, Washington State, USA. *River Research and Applications* 28(7):872-881.
- Petersen, J. H. and J. F. Kitchell. 2001. Climate Regimes and Water Temperature Changes in the Columbia River: Bioenergetic Implications for Predators of Juvenile Salmon. *Canadian Journal of Fisheries and Aquatic Sciences* 58(9):1831-1841.
- Peterson, H. A. and M. Vayssières. 2010. Benthic Assemblage Variability in the Upper San Francisco Estuary: A 27-Year Retrospective. *San Francisco Estuary and Watershed Science* 8(1):27.
- Peterson, W. T., E. Casillas, J. W. Ferguson, R. C. Hooff, C. A. Morgan, and K. L. Hunter. 2006. Ocean Conditions and Salmon Survival in the Northern California Current.
- Peterson, W. T. and F. B. Schwing. 2003. A New Climate Regime in Northeast Pacific Ecosystems. *Geophysical Research Letters*, 30(17):4.
- Petts, G. E. 2009. Instream Flow Science for Sustainable River Management. *Journal of the American Water Resources Association* 45(5):1071-1086.
- Peven, C. M., R. R. Whitney, and K. R. Williams. 1994. Age and Length of Steelhead Smolts from the Mid-Columbia River Basin, Washington. *North American Journal of Fisheries Management* 14:77-86.
- Phillip Williams and Associates, w. E., UW School of Fisheries, Brown and Caldwell, Hultgren-Tillis Engineers, MBK Engineers. 2006. Dutch Slough Tidal Marsh Restoration Conceptual Plan and Feasibility Report.
- Phillips, R. W. and H. J. Campbell. 1961. The Embryonic Survival of Coho Salmon and Steelhead Trout as Influenced by Some Environmental Conditions in Gravel Beds. Pages 60-72 *in* Fourteenth Annual Report. Pacific Marine Fisheries Commission, Portland, Oregon.
- Phipps, G. L., V. R. Mattson, and G. T. Ankley. 1995. Relative Sensitivity of Three Freshwater Benthic Macroinvertebrates to Ten Contaminants. *Archives of Environmental Contamination and Toxicology* 28:281-286.
- Pickard, A., A. M. Grover, and F. A. J. Hall. 1982. An Evaluation of Predator Composition at Three Locations on the Sacramento River. Interagency Ecological Study Program for the Sacramento-San Joaquin Estuary, Technical Report 2, 21 pp.
- Pierce, D. W., D. R. Cayan, and B. L. Thrasher. 2014. Statistical Downscaling Using Localized Constructed Analogs (Loca). *Journal of Hydrometeorology* 15(6):2558-2585.

- Pierce, D. W., T. Das, D. R. Cayan, E. P. Maurer, N. L. Miller, Y. Bao, M. Kanamitsu, K. Yoshimura, M. A. Snyder, L. C. Sloan, G. Franco, and M. Tyree. 2013. Probabilistic Estimates of Future Changes in California Temperature and Precipitation Using Statistical and Dynamical Downscaling. Springer:18.
- Pike, A., E. Danner, D. Boughton, F. Melton, R. Nemani, B. Rajagopalan, and S. Lindley. 2013. Forecasting River Temperatures in Real Time Using a Stochastic Dynamics Approach. *Water Resources Research* 49(9):5168-5182.
- Pikitch, E. K., D. L. Erickson, and J. R. Wallace. 1988. An Evaluation of the Effectiveness of Trip Limits as a Management Tool. NWAFC Processed Report 88-27. National Marine Fisheries Service Northwest and Alaska Fisheries Center.
- Pittman, S. 2007. Executive Summary of the 2006 Update to the Clear Creek Gravel Management Plan. Weaverville, CA 96093.
- Pittman, S. and Graham Matthews & Associates. 2007. 2006 Update to the Clear Creek Gravel Management Plan. Western Shasta Resource Conservation District and Clear Creek Restoration Team.
- Platts, W. S. and M. L. McHenry. 1988. Density and Biomass of Trout and Char in Western Streams.
- Poddubny, A. G. 1967. Sonic Tags and Floats as a Means of Studying Fish Response to Natural Environmental Changes to Fishing Gears. Pages 793-802 in Conference on Fish Behaviour in Relation to Fishing Techniques and Tactics, Bergen, Norway FAO, Rome.
- Poff, N. L., J. D. Allan, M. B. Bain, J. R. Karr, K. L. Prestegard, B. D. Richter, R. E. Sparks, and J. C. Stromberg. 1997. The Natural Flow Regime. *BioScience* 47(11):769-784.
- Poff, N. L., J. D. Allan, M. B. Bain, J. R. Karr, K. L. Prestegard, B. D. Richter, R. E. Sparks, and J. C. Stromberg. 1997. The Natural Flow Regime A Paradigm for River Conservation and Restoration. *BioScience*:16.
- Poff, N. L. and J. V. Ward. 1989. Implications of Streamflow Variability and Predictability for Lotic Community Structure: A Regional Analysis of Streamflow Patterns. *Canadian Journal of Fisheries and Aquatic Sciences* 46:13.
- Poff, N. L. and J. K. H. Zimmerman. 2010. Ecological Responses to Altered Flow Regimes: A Literature Review to Inform the Science and Management of Environmental Flows. *Freshwater Biology* 55(1):194-205.
- Polagye, B., M. Kawase, and P. Malte. 2009. In-Stream Tidal Energy Potential of Puget Sound, Washington. *Proceedings of the Institution of Mechanical Engineers, Part A: Journal of Power and Energy* 223(5):571-587.
- Polanco, J., State Historic Preservation Officer, Department of Parks and Recreation Office of Historic Preservation,. 2017. Letter from Julianne Polanco, State Historic Preservation Officer to Maria Rea, National Oceanic and Atmospheric Administration (NOAA). Department of Parks and Recreation Office of Historic Preservation, 2 pp.
- Poletto, J. B., D. E. Cocherell, and N. A. Fanguie. 2016. Thermal Performance in Juvenile Hatchery *Oncorhynchus tshawytscha*: Aerobic Scope Tests over a Range of Environmental Temperatures.29.
- Poletto, J. B., D. E. Cocherell, N. Ho, J. J. Cech, A. P. Klimley, and N. A. Fanguie. 2014a. Juvenile Green Sturgeon (*Acipenser medirostris*) and White Sturgeon (*Acipenser transmontanus*) Behavior near Water-Diversion Fish Screens: Experiments in a Laboratory Swimming Flume. *Canadian Journal of Fisheries and Aquatic Sciences* 71(7):1030-1038.
- Poletto, J. B., D. E. Cocherell, N. Ho, J. J. Cech Jr., A. P. Klimley, and N. A. Fanguie. 2014. Juvenile Green Sturgeon (*Acipenser medirostris*) and White Sturgeon (*Acipenser transmontanus*) Behavior near Water-Diversion Fish

- Screens: Experiments in a Laboratory Swimming Flume. *Canadian Journal of Fisheries and Aquatic Science* 71(7):1030-1038.
- Poletto, J. B., D. E. Cocherell, T. D. Mussen, A. Ercan, H. Bandeh, M. L. Kavvas, J. J. Cech, and N. A. Fangue. 2014b. Efficacy of a Sensory Deterrent and Pipe Modifications in Decreasing Entrainment of Juvenile Green Sturgeon (*Acipenser medirostris*) at Unscreened Water Diversions. *Conservation Physiology* 2(1):1-2.
- Popper, A. N. 1997. Sound Detection by Fish: Structure and Function in Using Sound to Modify Fish Behavior at Power Production and Water-Control Facilities. Portland State University, Portland, OR.
- Popper, A. N. 1997. Using Sound to Modify Fish Behavior at Power Production and Water-Control Facilities: A Workshop December 12-13, 1995. Phase II: Final Report. Contract No. 1986BP62611, DOE/BP-62611-11.
- Popper, A. N. 2003. Effects of Anthropogenic Sounds on Fishes. *Fisheries Research* 28(10):24-31.
- Popper, A. N., T. J. Carlson, A. D. Hawkins, B. L. Southall, and R. L. Gentry. 2006. Interim Criteria for Injury of Fish Exposed to Pile Driving Operations: A White Paper. Report to the Fisheries Hydroacoustic Working Group, California Department of Transportation, USA.
- Popper, A. N. and N. L. Clarke. 1976. The Auditory System of the Goldfish (*Carassius auratus*): Effects of Intense Acoustic Stimulation. *Comparative Biochemistry and Physiology* 53(1):11-18.
- Popper, A. N. and R. R. Fay. 1973. Sound Detection and Processing by Teleost Fishes: A Critical Review. *Journal of the Acoustical Society of America* 53(6):1515-1529.
- Popper, A. N., R. R. Fay, C. Platt, and O. Sand. 2003. Sound Detection Mechanisms and Capabilities of Teleost Fishes. Pages 3-38 in *Sensory Processing in Aquatic Environments*, S. P. Collin and N. J. Marshall, editors. Springer.
- Popper, A. N. and M. C. Hastings. 2009. The Effects of Human-Generated Sound on Fish. *Integr Zool* 4(1):43-52.
- Popper, A. N., A. D. Hawkins, R. R. Fay, D. A. Mann, S. Bartol, T. J. Carlson, S. Coombs, W. T. Ellison, R. Gentry, and M. B. Halvorsen. 2014. Sound Exposure Guidelines for Fishes and Sea Turtles: A Technical Report Prepared by ANSI-Accredited Standards Committee S3/SC1 and Registered with ANSI. ASA S3/SC1:1-87.
- Powers, P. D. and J. F. Orsborn. 1985. Analysis of Barriers to Upstream Fish Migration. An Investigation of the Physical and Biological Conditions Affecting Fish Passage Success at Culverts and Waterfalls Portland, Oregon.
- Poytress, B., J. J. Gruber, A. J. Ammann, A. McHuron, B. Mulvey, D. Colby, R. Bellmer, and M. Thomas. 2017. 2016 Juvenile Green Sturgeon Upper Sacramento River to Delta Migration Pilot-Effort Investigation.
- Poytress, W. R., J. J. Gruber, F. D. Carrillo, S. D. Voss. 2014. Compendium Report of Red Bluff Diversion Dam Rotary Trap Juvenile Anadromous Fish Production Indices for Years 2002-2012. U. S. F. a. W. Service, 138 pp.
- Poytress, W. R. 2016. Brood-Year 2014 Winter Chinook Juvenile Production Indices with Comparisons to Juvenile Production Estimates Derived from Adult Escapement. U.S. Fish and Wildlife Service, 1-47 pp.
- Poytress, W. R. 2016. Brood-Year 2014 Winter Chinook Juvenile Production Indices with Comparisons to Juvenile Production Estimates Derived from Adult Escapement. Report of U.S. Fish and Wildlife Service to U.S. Bureau of Reclamation, Sacramento, CA. U.S. Fish and Wildlife Service.
- Poytress, W. R. and F. D. Carrillo. 2010. Brood-Year 2007 Winter Chinook Juvenile Production Indices with Comparisons to Juvenile Production Estimates Derived from Adult Escapement. Report of U.S. Fish and Wildlife Service to GCAP Services, Inc., and California Department of Fish and Game. U.S. Fish and Wildlife Service, 40 pp.

- Poytress, W. R. and F. D. Carrillo. 2010. Brood-Year 2007 Winter Chinook Juvenile Production Indices with Comparisons to Juvenile Production Estimates Derived from Adult Escapement. Report of U.S. Fish and Wildlife Service to GCAP Services, Inc., and California Department of Fish and Game. Sacramento, California.
- Poytress, W. R. and F. D. Carrillo. 2011. Brood-Year 2008 and 2009 Winter Chinook Juvenile Production Indices with Comparisons to Juvenile Production Estimates Derived from Adult Escapement. U.S. Fish and Wildlife Service, 1-51 pp.
- Poytress, W. R. and F. D. Carrillo. 2011. Brood-Year 2008 and 2009 Winter Chinook Juvenile Production Indices with Comparisons to Juvenile Production Estimates Derived from Adult Escapement. Report of U.S. Fish and Wildlife Service to GCAP Services, Inc., and California Department of Fish and Game. Sacramento, CA.
- Poytress, W. R. and F. D. Carrillo. 2012. Brood-Year 2010 Winter Chinook Juvenile Production Indices with Comparisons to Juvenile Production Estimates Derived from Adult Escapement. Report of U.S. Fish and Wildlife Service to California Department of Fish and Game and U.S. Bureau of Reclamation. U.S. Fish and Wildlife Service, 42 pp.
- Poytress, W. R. and F. D. Carrillo. 2012. Brood-Year 2010 Winter Chinook Juvenile Production Indices with Comparisons to Juvenile Production Estimates Derived from Adult Escapement. Report of U.S. Fish and Wildlife Service to California Department of Fish and Game and U.S. Bureau of Reclamation.
- Poytress, W. R., J. J. Gruber, F. D. Carrillo, and S. D. Voss. 2014. Compendium Report of Red Bluff Diversion Dam Rotary Trap Juvenile Anadromous Fish Production Indices for Years 2002–2012. U.S. Fish and Wildlife Service, 1-151 pp.
- Poytress, W. R., J. J. Gruber, D. A. Trachtenberg, and J. van Eenennaam. 2009. 2008 Upper Sacramento River Green Sturgeon Spawning Habitat and Larval Migration Surveys. U.S. Fish and Wildlife Service and University of California Davis, 1-52 pp.
- Poytress, W. R., J. J. Gruber, and J. P. Van Eenennaam. 2010. 2009 Upper Sacramento River Green Sturgeon Spawning Habitat and Larval Migration Surveys. U.S. Fish and Wildlife Service and University of California Davis, 1-48 pp.
- Poytress, W. R., J. J. Gruber, and J. P. Van Eenennaam. 2011. 2010 Upper Sacramento River Green Sturgeon Spawning Habitat and Larval Migration Surveys U.S. Fish and Wildlife Service and University of California Davis, 1-48 pp.
- Poytress, W. R., J. J. Gruber, and J. P. Van Eenennaam. 2012. 2011 Upper Sacramento River Green Sturgeon Spawning Habitat and Larval Migration Surveys U.S. Fish and Wildlife Service and University of California Davis, 1-46 pp.
- Poytress, W. R., J. J. Gruber, and J. P. Van Eenennaam. 2013. 2012 Upper Sacramento River Green Sturgeon Spawning Habitat and Young-of-the-Year Migration Surveys U.S. Fish and Wildlife Service and University of California Davis, 1-41 pp.
- Poytress, W. R., J. J. Gruber, J. P. Van Eenennaam, and M. Gard. 2015. Spatial and Temporal Distribution of Spawning Events and Habitat Characteristics of Sacramento River Green Sturgeon. *Transactions of the American Fisheries Society* 144(6):1129-1142.
- Poytress, W. R., J. J. Gruber, and J. P. Van Eenennaam. 2013. 2012 Upper Sacramento River Green Sturgeon Spawning Habitat and Young-of-the-Year Migration Surveys
- Pratt, J. M., R. A. Coler, and P. J. Godfrey. 1981. Ecological Effects of Urban Stormwater Runoff on Benthic Macroinvertebrates Inhabiting the Green River, Massachusetts. *Hydrobiologia* 83(1):29-42.

- PRBO Conservation Science. 2011. Projected Effects of Climate Change in California: Ecoregional Summaries Emphasizing Consequences for Wildlife.
- Presser, T. and S. N. Luoma. 2010. Ecosystem-Scale Selenium Modeling in Support of Fish and Wildlife Criteria Development for the San Francisco Bay-Delta Estuary, California. U.S. Geological Survey, 1-56 pp.
- Presser, T. S. and S. N. Luoma. 2010. A Methodology for Ecosystem-Scale Modeling of Selenium. *Integrated Environmental Assessment and Management* 6(4):685-710.
- Presser, T. S. and S. N. Luoma. 2013. Ecosystem-Scale Selenium Model for the San Francisco Bay-Delta Regional Ecosystem Restoration Implementation Plan. *San Francisco Estuary and Watershed Science* 11(1):1-39.
- Prince, D. J., S. M. O'Rourke, T. Q. Thompson, O. A. Ali, H. S. Lyman, I. K. Saglam, T. J. Hotaling, A. P. Spidle, and M. R. Miller. 2017. The Evolutionary Basis of Premature Migration in Pacific Salmon Highlights the Utility of Genomics for Informing Conservation. *Sci Adv* 3(8):e1603198.
- Pusey, B. J. and A. H. Arthington. 2003. Importance of the Riparian Zone to the Conservation and Management of Freshwater Fish: A Review. *Marine and Freshwater Research* 54(1):1-16.
- Pyper, B., T. Garrison, S. Cramer, P. L. Brandes, D. P. Jacobson, and M. A. Banks. 2013. Absolute Abundance Estimates of Juvenile Spring-Run and Winter-Run Chinook Salmon at Chipps Island. Delta Science of Delta Stewardship Council, Sacramento-San Joaquin Delta, Grant Agreement Number 1049, Delta Science of the Delta Stewardship Council.
- Quinn, T. P. 2005. The Behavior and Ecology of Pacific Salmon and Trout. Page 3 *in*. American Fisheries Society.
- Quinn, T. P. 2005. The Behavior and Ecology of Pacific Salmon Trout, the Ecology of Dead Salmon. Page 10 *in* The Behavior and Ecology of Pacific Salmon Trout.
- Quinn, T. P., J. L. Nielsen, C. Gan, M. J. Unwin, R. Wilmot, C. Guthrie, and F. M. Utter. 1996. Origin and Genetic Structure of Chinook Salmon, *Oncorhynchus tshawytscha*, Transplanted from California to New Zealand: Allozyme and Mtdna Evidence. *Fishery Bulletin* 94(3):506-521.
- Radford, A. N., E. Kerridge, and S. D. Simpson. 2014. Acoustic Communication in a Noisy World: Can Fish Compete with Anthropogenic Noise? *Behavioral Ecology* 25(5):1022-1030.
- Radtke, L. D. 1966. Distribution of Smelt, Juvenile Sturgeon, and Starry Flounder in the Sacramento-San Joaquin Delta with Observations on Food of Sturgeon. *Fish Bulletin - Ecological Studies of the Sacramento-San Joaquin Delta. Part II: Fishes of the Delta*(136).
- Radtke, L. D. 1966. Ecological Studies of the Sacramento-San Joaquin Delta. Part II: Fishes of the Delta: Distribution of Smelt, Juvenile Sturgeon, and Starry Flounder in the Sacramento-San Joaquin Delta with Observations on Food of Sturgeon. *Fish Bulletin* 136:115-129.
- Rahmstorf, S. 2007. A Semi-Empirical Approach to Projecting Future Sea-Level Rise. *Science*, 315(5810):368-370.
- Raleigh, R. F., T. Hickman, R. C. Solomon, and P. C. Nelson. 1984. Habitat Suitability Information: Rainbow Trout. U.S. Fish and Wildlife Service, FWS/OBS-82/10.60, 1-74 pp.
- Ramcharitar, J. U., D. M. Higgs, and A. N. Popper. 2006. Audition in Sciaenid Fishes with Different Swim Bladder-Inner Ear Configurations. *Journal of the Acoustical Society of America* 119(1):439-443.
- Rand, G. M. 1995. Fundamentals of Aquatic Toxicology: Effects, Environmental Fate, and Risk Assessment *in*. Taylor & Francis, Washington, DC.

- Raper, S. C. B. and R. J. Braithwaite. 2006. Low Sea Level Rise Projections from Mountain Glaciers and Icecaps under Global Warming. *Nature*, 439:311-313.
- Ratti, F. 1979. Natural Resources of Roque Estuary, Oregon Department of Fish and Wildlife Estuary Inventory Report.
- Ray, A. J. 2016. Water Policy and Planning in a Variable and Changing Climate. 141-160.
- Ray, A. J., A. Barsugli, K. B. Averyt, K. Wolter, M. P. Hoerling, N. Doesken, B. Udall, and R. Webb. 2008. Climate Change in Colorado: A Synthesis to Support Water Resources Management and Adaptation. Intermountain West Climate Summary:3.
- Reclamation, B. o. 2009. San Joaquin River Restoration Settlement Act. Page 468 Public Law 111-11
- Redband Core Group. 2016. Conservation Agreement for Upper McCloud River Redband Trout. 104 pp.
- Redding, J. M. and C. B. Schreck. 1979. Possible Adaptive Significance of Certain Enzyme Polymorphisms in Steelhead Trout (*Salmo gairdneri*). *Journal of the Fisheries Research Board of Canada* 36:544-551.
- Redler, Y. J. 2015. pers. comm. R. Perry. May 22, 2015.
- Redler, Y. J. and R. B. Del Rosario. 2015. Making Use of a Big Estuary - Chinook Salmon Fry and Salty Water in 33rd Annual Salmonid Restoration Conference.
- Reed, D. H. and R. Frankham. 2003. Correlation between Fitness and Genetic Diversity. *Conservation Biology* 17(1):230-237.
- Reed, R. 2009. Documentation on the Development of the Reasonable and Prudent Alternatives (RPA) to Avoid Jeopardy to CV Steelhead in the Stanislaus River, Specifically as Relates to Flow and Temperature.
- Reedsport OPT Wave Park. 2008a. Reedsport OPT Wave Park, FERC Project No. 12713. Draft Application for a Major License. An Oregon Corporation, 55 pp.
- Reedsport OPT Wave Park (ROPT). 2008b. Reedsport OPT Wave Park, FERC No. 12713, Aquatic Species Sub Group. Draft Issue Assessment Issue No. 2 EMF. Rev 1 - January 11, 2008. 19 pp.
- Reese, C. D. and B. C. Harvey. 2002. Temperature-Dependent Interactions between Juvenile Steelhead and Sacramento Pikeminnow in Laboratory Streams. *Transactions of the American Fisheries Society*(131):599-606.
- Regional Water Quality Control Board. 2002. Upper Sacramento River Tmdl for Cadmium, Copper, and Zinc, Final Report. EPA.
- Regional Water Quality Control Board. 2007. Amendment to the Water Quality Control Plan for Sacramento River and San Joaquin River Basins for Control of Diazinon and Chlorpyrifos Runoff into the Sacramento and Feather Rivers. EPA.
- Reid, L. M. and T. Dunne. 1996. Rapid Evaluation of Sediment Budgets.
- Reid, L. M. and T. Dunne. 2003. Sediment Budgets as an Organizing Framework in Fluvial Geomorphology.23.
- Reine, K. J. and C. Clark. 1998. Entrainment by Hydraulic Dredges—A Review of Potential Impacts. U.S. Army Engineer Research and Development Center, Technical Note DOER-E1, 1-14 pp.

- Reine, K. J., D. Clarke, C. Dickerson, C. Alcoba, J. Gallo, B. Wisemiller, and S. Zappala. 2015. Sediment Resuspension by Ship Traffic in Newark Bay, New Jersey. U.S. Army Corps of Engineers, ERDC/EL TR-15-1, 1-80 pp.
- Reisenbichler, R. and J. D. McIntyre. 1977. Genetic Differences in Growth and Survival of Juvenile Hatchery and Wild Steelhead Trout, *Salmo gairdneri*. *J. Fish Res Board* 34:123-128.
- Reisenbichler, R. R. and S. P. Rubin. 1999. Genetic Changes from Artificial Propagation of Pacific Salmon Affect the Productivity and Viability of Supplemented Populations. *ICES Journal of Marine Science* 56(4):459-466.
- Reiser, D. W. and T. C. Bjornn. 1979. Habitat Requirements of Anadromous Salmonids.
- Reiser, D. W. and T. C. Bjornn. 1979. Influence of Forest and Rangeland Management on Anadromous Fish Habitat in the Western United States and Canada. U.S. Department of Agriculture, General Technical Report PNW-96.
- Reiser, D. W., C. M. Huang, S. Beck, M. Gagner, and E. Jeanes. 2006. Defining Flow Windows for Upstream Passage of Adult Anadromous Salmonids at Cascades and Falls. *Transactions of the American Fisheries Society* 135(3):668-679.
- Reiser, D. W. and R. G. White. 1983. Effects of Complete Redd Dewatering on Salmonid Egg-Hatching Success and Development of Juveniles. *Transactions of the American Fisheries Society* 112(4):532-540.
- Reiser, D. W. and R. G. White. 1988. Effects of Two Sediment Size-Classses on Survival of Steelhead and Chinook Salmon Eggs. *North American Journal of Fisheries Management* 8:432-437.
- Relyea, R. A. 2009. A Cocktail of Contaminants: How Mixtures of Pesticides at Low Concentration Affect Aquatic Communities. *Oecologia* 159(2):363-376.
- Reynolds, F., T. Mills, R. Benthin, and A. Low. 1993. Restoring Central Vally Streams: A Plan for Action. California Department of Fish and Game, 217 pp.
- Reynolds, F. L., T. J. Mills, R. Benthin, and A. Low. 1993. Restoring Central Valley Streams; a Plan for Action. California Department of Fish and Game, 71-176 pp.
- Rhymer, J. M. and D. Simberloff. 1996. Extinction by Hybridization and Introgression. *Annual Review of Ecology and Systematics* 27(27):83-109.
- Rich, A. A. 1997. Testimony of Alice A. Rich, Ph.D. Submitted to the State Water Resources Control Board Regarding Water Right Applications for the Delta Wetlands, Bouldin Island, and Holland Tract in Contra Costa and San Joaquin Counties.
- Rich, A. A. 2007. Impacts of Water Temperature on Fall-Run Chinook Salmon (*Oncorhynchus tshawytscha*) and Steelhead (*O. mykiss*) in the San Joaquin River System.46.
- Richardson, D. M., P. M. Holmes, K. J. Esler, S. M. Galatowitsch, J. C. Stromberg, S. P. Kirkman, P. Pysek, and R. J. Hobbs. 2007. Riparian Vegetation: Degradation, Alien Plant Invasions, and Restoration Prospects. *Diversity and Distributions* 13(1):126-139.
- Richter, A. and S. A. Kolmes. 2005. Maximum Temperature Limits for Chinook, Coho, and Chum Salmon, and Steelhead Trout in the Pacific Northwest. *Reviews in Fisheries Science* 13(1):23-49.
- Richter, A. and S. A. Kolmes. 2006. Maximum Temperature Limits for Chinook, Coho, and Chum Salmon, and Steelhead Trout in the Pacific Northwest. *Reviews in Fisheries Science* 13(1):23-49.

- Riebe, C. S., L. S. Sklar, B. T. Overstreet, and J. K. Wooster. 2014. Optimal Reproduction in Salmon Spawning Substrates Linked to Grain Size and Fish Length. *Water Resources Research*:n/a-n/a.
- Riverkeeper Inc. 2010. Scoping Comments for the Champlain Hudson Power Express Transmission Line Project Draft Environmental Impact Statement, Docket No. PP-362.
- Roberts, D. A. 2012. Causes and Ecological Effects of Resuspended Contaminated Sediments (RCS) in Marine Environments. *Environment International* 40:230-243.
- Robinson, D. A. 1993. *Monitoring Northern Hemisphere Snow Cover*. New Brunswick, New Jersey.
- Rodnick, K. J., A. K. Gamperl, K. R. Lizars, M. T. Bennett, R. N. Rausch, and E. R. Keeley. 2002. Thermal Tolerance and Metabolic Physiology among Redband Trout Populations in South-Eastern Oregon. *Journal of Fish Biology* (64):310-335.
- Roemmich, D. and J. McGowan. 1995. Climatic Warming and the Decline of Zooplankton in the California Current. *Science* 267(5202):1324-1326.
- Romanuk, T. N. and C. D. Levings. 2003. Associations between Arthropods and the Supralittoral Ecotone: Dependence of Aquatic and Terrestrial Taxa on Riparian Vegetation. *Environmental Entomology* 32(6):1343-1353.
- Rombough, P. J. 1988. Growth, Aerobic Metabolism, and Dissolved Oxygen Requirements of Embryos and Alevins of Steelhead, *Salmo Gairdneri*. *Canadian Journal of Zoology-Revue Canadienne De Zoologie*(66):651-660.
- Rombough, P. J. 1988. Growth, Aerobic Metabolism, and Dissolved Oxygen Requirements of Embryos and Alevins of Steelhead, *Salmo gairdneri*
Canadian Journal of Zoology 66:651-660.
- Rondorf, D. 1983. Effects of Hydropower Development on Columbia River Salmonids, Cook, Washington in *Environmental Impacts*.8.
- Roni, P., T. J. Beechie, R. E. Bilby, F. E. Leonetti, M. M. Pollock, and G. R. Pess. 2002. A Review of Stream Restoration Techniques and a Hierarchical Strategy for Prioritizing Restoration in Pacific Northwest Watersheds. *North American Journal of Fisheries Management* 22:1-20.
- Roni, P. and T. P. Quinn. 2001. Density and Size of Juvenile Salmonids in Response to Placement of Large Woody Debris in Western Oregon and Washington Streams. *Canadian Journal of Fisheries and Aquatic Sciences*.
- Roos, M. 1987. 4th Workshop on Climate Variability of the Eastern North Pacific and Western North America. Pacific Grove, CA.
- Roos, M. 1987. Possible Changes in California Snowmelt Runoff Patterns. Pages 22-31 in 4th Workshop on Climate Variability of the Eastern North Pacific and Western North America. (PACLIM). PACIFIC CLIMATE.
- Roos, M. 1991. A Trend of Decreasing Snowmelt Runoff in Northern California. Pages 29-36 in Western Snow Conference, April 1991, Washington to Alaska.
- Roos, M. 1991. A Trend of Decreasing Snowmelt Runoff in Northern California. Page 36 Western Snow Conference, April 1991, Washington to Alaska.
- Rosales-Cassian, J. R. and C. Almeda-Juaregui. 2009. Unusual Occurrence of a Green Sturgeon (*Acipenser medirostris*) at El Socorro Bay, Baja California, Mexico *California Cooperative Fisheries Investigations*. CalCOFI Reports 50:169-171.

- Rose, K. A., J. J. Anderson, M. McClure, and G. Ruggerone. 2011. Salmonid Integrated Life Cycle Models Workshop: Report of the Independent Workshop Panel. Delta Science Program.
- Rosenfield, J. 2012. Additional Scientific Information, Recommended Changes to the Delta Water Quality Control Plan, and Recommendations to Address Scientific Uncertainty and Changing Circumstances. Workshop 1: Ecosystem Changes and the Low Salinity Zone. The Bay Institute.
- Ross, P. S., G. M. Ellis, M. G. Ikononou, L. G. Barrett-Lennard, and R. F. Addison. 2000. High PCB Concentrations in Free-Ranging Pacific Killer Whales, *Orcinus orca*: Effects of Age, Sex and Dietary Preference. Marine Pollution Bulletin 40(6):504-515.
- Ruckelshaus, M., K. Currens, R. Fuerstenberg, W. Graeber, K. Rawson, N. Sands, and J. Scott. 2002. Planning Ranges and Preliminary Guidelines for the Delisting and Recovery of the Puget Sound Chinook Salmon Evolutionarily Significant Unit. National Marine Fisheries Service, 1-20 pp.
- Ruckelshaus, M., K. Currens, R. Fuerstenberg, W. Graeber, K. Rawson, N. Sands, and J. Scott. 2002. Planning Ranges and Preliminary Guidelines for the Delisting and Recovery of the Puget Sound Chinook Salmon Evolutionary Significant Unit. Department of Commerce, NOAA Technical Memorandum.
- Ruckelshaus, M., P. Levin, J. B. Johnson, and P. M. Kareiva. 2002. The Pacific Salmon Wars: What Science Brings to the Challenge of Recovering Species. Annual Review of Ecology and Systematics 33:665-706.
- Ruckelshaus, M. H., P. Levin, J. B. Johnson, and P. M. Kareiva. 2002. The Pacific Salmon Wars: What Science Brings to the Challenge of Recovering Species. Annual Review of Ecology and Systematics 33(1):665-706.
- Ruediger, R. and J. Ward. 1996. Abundance and Function of Large Woody Debris in Central Sierra Nevada Streams. Fish Habitat Relationships:18.
- Rueth, J. 2015. pers. comm. Naseem Alston and R. Johnson.
- Rutter, C. 1902. Natural History of the Quinnat Salmon: A Report of Investigations in the Sacramento River, 1896-1901 in. Government Printing Office, Washington, DC.
- Rutter, C. 1904. Natural History of the Quinnat Salmon. A Report of Investigations in the Sacramento River, 1896-1901. Fish Bulletin 22(1902):66-141.
- Rutter, C. 1904. Notes on Fishes from the Gulf of California, with the Description of a New Genus and Species. Pages 251-254 in Proceedings of the California Academy of Sciences, Third Series: Zoology, San Francisco, CA.
- Ryu, D., D. Sinha, B. Mallick, S. L. Lipsitz, and S. Lipshultz. 2007. Longitudinal Studies with Outcome-Dependent Follow-Up: Models and Bayesian Regression. J Am Stat Assoc 102:952-967.
- S.P. Cramer & Associates. 2000. Stanislaus River Data Report Final Data. Chico, CA.
- Sabal, M., S. Hayes, J. Merz, and J. Setka. 2016. Habitat Alterations and a Nonnative Predator, the Striped Bass, Increase Native Chinook Salmon Mortality in the Central Valley, California. North American Journal of Fisheries Management 36(2):309-320.
- Sacramento Regional County Sanitation District. 2015. Progress Report Method of Compliance Work Plan and Schedule for Ammonia Effluent Limitations and Title 22 or Equivalent Disinfection Requirements. Sacramento Regional County Sanitation District and Sacramento Regional Wastewater Treatment Plant.

- Sacramento Regional County Sanitation District. 2015. Sacramento Regional Wastewater Treatment Plant Progress Report: Method of Compliance Work Plan and Schedule for Ammonia Effluent Limitations and Title 22 or Equivalent Disinfection Requirements
- Sacramento River Advisory Council. 2002. Sacramento River Conservation Area Handbook: Sb1086.
- Sacramento River Advisory Council. 2003. Sacramento River Conservation Area Forum Handbook.
- Sacramento River Advisory Council. 2003. Sacramento River Conservation Area Forum Handbook. The Resources Agency, 239 pp.
- Sacramento River Watershed Program. 2016a. Upper Sacramento River Watershed.
<http://www.sacriver.org/aboutwatershed/roadmap/watersheds/northeast/upper-sacramento-river>. April 10, 2016.
- Sacramento River Watershed Program. 2016b. Lower Pit River Watershed.
<http://www.sacriver.org/aboutwatershed/roadmap/watersheds/northeast/pit/lower-pit-river-watershed>. June 18, 2016.
- Sacramento River Watershed Program. 2016c. Sacramento River Watershed Program.
<http://www.sacriver.org/aboutwatershed/roadmap/watersheds/northeast/mccloud-river-watershed>. June 18, 2016.
- Sacramento River Watershed Program. 2018. Sacramento Valley Subregion Sacramento River Basin Watersheds.
<http://www.sacriver.org/aboutwatershed/roadmap/watersheds/sacramento-valley-subregion>. 4/17/2018.
- Sacred Sites International Foundation. 2016. Sacred Sites International Foundation. The McCloud River Watershed.
<http://www.sacred-sites.org/threatened-sacred-sites/the-mccloud-river-watershed>. June 19, 2016.
- Salathe, E. P. 2005. Downscaling Simulations of Future Global Climate with Application to Hydrologic Modeling. *International Journal of Climatology* 25(4):419-436.
- Salathe, E. P., P. W. Mote, and M. W. Wiley. 2007. Review of Scenario Selection and Downscaling Methods for the Assessment of Climate Change Impacts on Hydrology in the United States Pacific Northwest. *International Journal of Climatology* 27(12):1611-1621.
- Salmon and Steelhead Hatchery Assessment Group. 2003. Hatchery Broodstock Summaries and Assessments for Chum, Coho, and Chinook Salmon and Steelhead Stocks within Evolutionarily Significant Units Listed under the Endangered Species Act.
- Salmonid Scoping Team. 2017. Effects of Water Project Operations on Juvenile Salmonid Migration and Survival in the South Delta. Volume 1: Findings and Recommendations. Collaborative Adaptive Management Team.
- San Francisco Bay RWQCB. 2006. Water Quality Control Plan for the San Francisco Bay Basin.
- San Francisco Baykeeper. 2010. Protecting Marine Life at California Power Plants.
<https://baykeeper.org/articles/protecting-marine-life-california-power-plants>. 1/13/2017.
- San Francisco Estuary Institute. 2007. The Fish Mercury Project: Monitoring and Reducing Methylmercury Exposure in the Bay-Delta Watershed. SFEI Contribution 531, San Francisco Estuary Institute, Oakland, California.
- San Francisco Estuary Institute. 2007. The Pulse of the Estuary; Monitoring and Managing Water Quality in the San Francisco Estuary. SFEI Contribution 532, San Francisco Estuary Institute, Oakland, California.

- San Francisco Estuary Project. 1999. San Francisco Bay-Delta Estuary. San Francisco Estuary Project.
- San Joaquin River Exchange Contractors Water Authority. 2010. San Joaquin River Exchange Contractors Water Authority 18 pp.
- San Joaquin River Restoration Program. 2008. Quantitative Fisheries Model Selection Recommendation Process Draft Technical Memo.
- San Joaquin River Restoration Program. 2009. Draft Fisheries Management Plan: A Framework for Adaptive Management in the San Joaquin River Restoration Program. San Joaquin River Restoration Program.
- San Joaquin River Restoration Program. 2009. San Joaquin River Restoration Settlement Act- San Joaquin River Restoration Settlement Act, Pubic Law No. 111-11.466.
- San Joaquin River Restoration Program. 2010. A Framework for Adaptive Management in the San Joaquin River Restoration Program. San Joaquin River Restoration Program,.
- San Joaquin River Restoration Program. 2011. Draft Program Environmental Impact Statement/Environmental Impact Report. Bureau of Reclamation and California Department of Water Resources, SCH # 2007081125, 170 pp.
- San Joaquin River Restoration Program. 2012. San Joaquin River Restoration Program 2012 Annual Technical Report.
- San Joaquin River Restoration Program. 2015. Revised Framework for Implementation
- San Joaquin River Restoration Program Fisheries Management Work Group. 2009. Fisheries Implementation Plan 2009-2010.
- San Joaquin River Restoration Program Fisheries Management Work Group. 2010. Stock Selection Strategy: Spring-Run Chinook Salmon.
- Sand, O. and H. Bleckmann. 2008. Orientation to Auditory and Lateral Line Stimuli. Pages 183-231 *in* Fish Bioacoustics, J. F. Webb, R. R. Fay, and A. N. Popper, editors. Springer.
- Sand, O., P. S. Enger, H. E. Karlsen, and F. R. Knudsen. 2001. Detection of Infrasound in Fish and Behavioral Responses to Intense Infrasound in Juvenile Salmonids and European Silver Eels: A Minireview. American Fisheries Society Symposium 26:183-193.
- Sand, O., P. S. Enger, H. E. Karlsen, F. R. Knudsen, and T. Kvernstuen. 2000. Avoidance Responses to Infrasound in Downstream Migrating European Silver Eels, *Anguilla anguilla*. Environmental Biology of Fishes 57:327-336.
- Sandahl, J. F., D. H. Baldwin, J. J. Jenkins, and N. L. Scholz. 2005. Comparative Thresholds for Acetylcholinesterase Inhibition and Behavioral Impairment in Coho Salmon Exposed to Chlorpyrifos. Environ Toxicol Chem 24(1):136-145.
- Sandahl, J. F., D. H. Baldwin, J. J. Jenkins, and N. L. Scholz. 2007. A Sensory System at the Interface between Urban Stormwater Runoff and Salmon Survival. Environmental Science & Technology 41(8):2998-3004.
- Sand-Jensen, K. A. J., E. Jeppesen, K. Nielsen, L. Bjil, L. Hjerminde, L. W. Nielsen, and T. M. Iversen. 1989. Growth of Macrophytes and Ecosystem Consequences in a Lowland Danish Stream. Freshwater Biology 22(1):15-32.
- Santos, M. J., L. W. Anderson, and S. L. Ustin. 2011. Effects of Invasive Species on Plant Communities: An Example Using Submersed Aquatic Plants a the Regional Scale. Biological Invasions 13:443-457.

- Santos, M. J., S. Khanna, E. L. Hestir, M. E. Andrew, S. S. Rajapakse, J. A. Greenberg, L. W. J. Anderson, and S. L. Ustin. 2009. Use of Hyperspectral Remote Sensing to Evaluate Efficacy of Aquatic Plant Management. *Invasive Plant Science and Management* 2(3):216-229.
- Santulli, A., A. Modica, C. Messina, L. Ceffa, A. Curatolo, G. Rivas, G. Fabi, and V. D'Amelio. 1999. Biochemical Responses of European Sea Bass (*Dicentrarchus labrax* L.) to the Stress Induced by Off Shore Experimental Seismic Prospecting. *Marine Pollution Bulletin* 38(12):1105-1114.
- Sardella, B. A. and D. Kultz. 2014. The Physiological Responses of Green Sturgeon (*Acipenser medirostris*) to Potential Global Climate Change Stressors. *Physiological and Biochemical Zoology* 87(3):456-463.
- Sasaki, S. 1966. Distribution and Food Habits of King Salmon (*Oncorhynchus tshawytscha*) and Steelhead Rainbow Trout, *Salmo Gairdnerii*, in the Sacramento-San Joaquin Delta. *Fish Bulletin* 136:108-114.
- Satterthwaite, W., S. M. Carlson, S. D. Allen-Moran, S. Vincenzi, S. J. Bograd, and B. K. Wells. 2014. Match-Mismatch Dynamics and the Relationship between Ocean-Entry Timing and Relative Ocean Recoveries of Central Valley Fall Run Chinook Salmon. *Marine Ecology Progress Series* 511:237-248.
- Satterthwaite, W. H., M. P. Beakes, E. M. Collins, D. R. Swank, J. E. Merz, R. G. Titus, S. M. Sogard, and M. Mangel. 2009. Steelhead Life History on California's Central Coast: Insights from a State-Dependent Model. *Transactions of the American Fisheries Society* 138(3):532-548.
- Satterthwaite, W. H., M. P. Beakes, E. M. Collins, D. R. Swank, J. E. Merz, R. G. Titus, S. M. Sogard, and M. Mangel. 2010. State-Dependent Life History Models in a Changing (and Regulated) Environment: Steelhead in the California Central Valley. *Evol Appl* 3(3):221-243.
- Satterthwaite, W. H. and S. M. Carlson. 2015. Weakening Portfolio Effect Strength in a Hatchery-Supplemented Chinook Salmon Population Complex. *Canadian Journal of Fisheries and Aquatic Sciences* 72(12):1860-1875.
- Sauter, S. T., J. McMillan, and J. Dunham. 2001. Salmonid Behavior and Water Temperature: Prepared as Part of EPA Region 10 Temperature Water Quality Criteria Guidance Development Project. U.S. Environmental Protection Agency, EPA-910-D-01-001, 1-38 pp.
- Scavia, D., J. C. Field, D. F. Boesch, R. W. Buddemeier, V. Burkett, D. R. Cayan, M. Fogarty, M. A. Harwell, R. W. Howarth, C. Mason, D. J. Reed, T. C. Royer, A. H. Sallenger, and J. G. Titus. 2002. Climate Change Impacts on U. S. Coastal and Marine Ecosystems. *Estuarine Research Federation* 25(2):149-164.
- Schadt, T. H., R. G. Metzgar, R. E. Carman, and J. H. Neuner. 1985. Background and Assessment of a Berm/Fish Passageway Designed to Facilitate Upstream Migration Past a Tailrace Area. Pages 409-415 *in*, Aurora, Colorado.
- Schaffter, R. 1980. Fish Occurrence, Size, and Distribution in the Sacramento River near Hood, California During 1973 and 1974. California Department of Fish and Game Anadromous Fisheries Branch, Administrative Report No. 80-3, 1-78 pp.
- Schaffter, R. 1997. White Sturgeon Spawning Migrations and Location of Spawning Habitat in the Sacramento River, California. California Department of Fish and Game, 1-20 pp.
- Schaffter, R. G. 1980. Fish Occurrence, Size, and Distribution in the Sacramento River near Hood, California During 1973 and 1974. State of California The Resources Agency Department of Fish and Game, 79 pp.
- Schaffter, R. G. 1997. White Sturgeon Spawning Migrations and Location of Spawning Habitat in the Sacramento River, California. *California Fish and Game* 83(1):1-20.

- Scheuerell, M. D., R. Hilborn, M. H. Ruckelshaus, K. K. Bartz, K. M. Lagueux, A. D. Haas, and K. Rawson. 2006. The Shiraz Model: A Tool for Incorporating Anthropogenic Effects and Fish–Habitat Relationships in Conservation Planning. *Canadian Journal of Fisheries and Aquatic Sciences* 63(7):1596-1607.
- Scheuerell, M. D., P. S. Levin, R. W. Zabel, J. G. Williams, and B. L. Sanderson. 2005. A New Perspective on the Importance of Marine-Derived Nutrients to Threatened Stocks of Pacific Salmon (*Oncorhynchus* Spp.). *Canadian Journal of Fisheries and Aquatic Sciences* 62(5):961-964.
- Scheuerell, M. D. and J. G. Williams. 2005. Forecasting Climate-Induced Changes in the Survival of Snake River Spring/Summer Chinook Salmon (*Oncorhynchus tshawytscha*). *Fisheries Oceanography* 14(6):448-457.
- Schick, R. S. and S. T. Lindley. 2007. Directed Connectivity among Fish Populations in a Riverine Network. *Journal of Applied Ecology* 44(6):1116-1126.
- Schindler, D. E., R. Hilborn, B. Chasco, C. P. Boatright, T. P. Quinn, L. A. Rogers, and M. S. Webster. 2010. Population Diversity and the Portfolio Effect in an Exploited Species. *Nature* 465(7298):609-612.
- Schlenk, D., R. Lavado, J. E. Loyo-Rosales, W. Jones, L. Maryoung, N. Riar, I. Werner, and D. Sedlak. 2012. Reconstitution Studies of Pesticides and Surfactants Exploring the Cause of Estrogenic Activity Observed in Surface Waters of the San Francisco Bay Delta. *Environ Sci Technol* 46(16):9106-9111.
- Schlenk, D., R. Lavado, J.E. Loyo-Rosales, W. Jones, L. Maryoung, N. Riar, I. Werner, and a. D. Sedlak. 2012. Reconstitution Studies of Pesticides and Surfactants Exploring the Cause of Estrgoenic Activity Observed in Surface Waters of the San Francisco Bay Delta. *Environmental Science and Technology* 46(16):9106-9111.
- Schlosser, I. J. and J. R. Karr. 1981. Riparian Vegetation and Channel Morphology Impact on Spatial Patterns of Water Quality in Agricultural Watersheds. *Environmental Management* 5(3):233-243.
- Schlosser, I. J. and J. R. Karr. 1981. Riparian Vegetation and Channel Morphology Impact on Spatial Patterns of Water-Quality in Agricultural Watersheds. *Environmental Management* 5(3):233-243.
- Schmidt, J. C. and P. R. Wilcock. 2008. Metrics for Assessing the Downstream Effects of Dams. *Water Resources Research* 44(4):19.
- Schoellhamer, D. H., S. A. Wright, and J. Drexler. 2012. Conceptual Model of Sedimentation in the Sacramento–San Joaquin Delta. *San Francisco Estuary and Watershed Science* 10(3):1-25.
- Scholz, N. L., E. Fleishman, L. Brown, I. Werner, M.L. Johnson, M.L. Brooks, C. L. Mitchelmore, and D. Schlenk. 2012. A Perspective on Modern Pesticides, Pelagic Fish Declines, and Unknown Ecological Resilience in Highly Managed Ecosystems. *BioScience* 62(4):428-434.
- Scholz, N. L., E. Fleishman, I. W. L. Brown, M.L. Johnson, M.L. Brooks, C. L. Mitchelmore, and a. D. Schlenk. 2012. A Perspective on Modern Pesticides, Pelagic Fish Declines, and Unknown Ecological Resilience in Highly Managed Ecosystems. *Biosciences* 62(4):428-434.
- Scholz, N. L., E. Fleishman, L. Brown, I. Werner, M. L. Johnson, M. L. Brooks, C. L. Mitchelmore, and D. Schlenk. 2012. A Perspective on Modern Pesticides, Pelagic Fish Declines, and Unknown Ecological Resilience in Highly Managed Ecosystems. *BioScience* 62(4):428-434.
- Scholz, N. L. and J. K. McIntyre. 2015. Chapter 5. Chemical Pollution. Pages 150-165 *in* Conservation of Freshwater Fishes. Cambridge University Press.
- Scholz, N. L., M. S. Myers, S. G. McCarthy, J. S. Labenia, J. K. McIntyre, G. M. Ylitalo, L. D. Rhodes, C. A. Laetz, C. M. Stehr, B. L. French, B. McMillan, D. Wilson, L. Reed, K. D. Lynch, S. Damm, J. W. Davis, and T. K. Collier. 2011.

- Recurrent Die-Offs of Adult Coho Salmon Returning to Spawn in Puget Sound Lowland Urban Streams. *PLoS ONE* 6(12):e28013.
- Scholz, N. L., N. K. Truelove, B. L. French, B. A. Berejikian, T. P. Quinn, E. Casillas, and T. K. Collier. 2000. Diazinon Disrupts Antipredator and Homing Behaviors in Chinook Salmon (*Oncorhynchus tshawytscha*). *Canadian Journal of Fisheries and Aquatic Sciences* 57(9):1911-1918.
- Schreiber, M. R. 1962. Observations on the Food Habits of Juvenile White Sturgeon. *California Department of Fish and Game* 48:79-80.
- Schreier, A., O. P. Langness, J. A. Israel, and E. Van Dyke. 2016. Further Investigation of Green Sturgeon (*Acipenser medirostris*) Distinct Population Segment Composition in Non-Natal Estuaries and Preliminary Evidence of Columbia River Spawning. *Environmental Biology of Fishes* 99(12):1021-1032.
- Schultz, I. R., W. J. Pratt, D. L. Woodruff, G. Roesijadi, and K. E. Marshall. 2010. Effects of Electromagnetic Fields on Fish and Invertebrates Task 2.1.3: Effects on Aquatic Organisms –Fiscal Year 2010 Progress Report Environmental Effects of Marine and Hydrokinetic Energy.
- Schulz, R., G. Thiery, and J. M. Dabrowski. 2002. A Combined Microcosm and Field Approach to Evaluate the Aquatic Toxicology of Azinphosmethyl to Stream Communities. *Environmental Toxicology and Chemistry* 21(10):2172-2178.
- Schwartz, P. 1991. *The Art of the Long View, Planning for the Future in an Uncertain World*.
- Scott, G. R. and K. A. Sloman. 2004. The Effects of Environmental Pollutants on Complex Fish Behaviour: Integrating Behavioural and Physiological Indicators of Toxicity. *Aquatic Toxicology* 68(4):369-392.
- Scott, J. M., D. D. Goble, J. A. Wiens, D. S. Wilcove, M. Bean, and T. Male. 2005. Recovery of Imperiled Species under the Endangered Species Act: The Need for a New Approach. *Frontiers in Ecology and the Environment* 3(7):383-389.
- Seedall, M. A. 2015. Rock Slough Fish Screen Log Boom Relocation. Notice of Exemption to Contra Costa County from Contra Costa Water District. 1-4 pp.
- Seelbach, P. W. 1993. Population Biology of Steelhead in a Stable-Flow, Low-Gradient Tributary of Lake Michigan. *Transactions of the American Fisheries Society* 22:179-198.
- Seelbach, P. W. 1993. Population Biology of Steelhead in a Stable-Flow, Low-Gradient Tributary of Lake-Michigan. *Transactions of the American Fisheries Society* 122(2):179-198.
- Seelig, B. 2002. Ship Waves & Passing Ship Effects on Moored Ships. NFESC TR-6022-OCN, Naval Facilities Engineering Service Center.
- Seelye, J. G. and M. J. Mac. 1984. *Bioaccumulation of Toxic Substances Associated with Dredging and Dredged Material Disposal*. Chicago, Illinois.
- Seesholtz, A., B. Cavallo, J. Kindopp, R. Kurth, and M. Perrone. 2003. Lower Feather River Juvenile Fish Communities: Distribution, Emigration Patterns, and Association with Environmental Variables. Page 50 *Early Life History of Fishes in the San Francisco Estuary and Watershed*, Santa Cruz, California.
- Seesholtz, A. M. 2016. Literature Review Related to Potential for Green Sturgeon Take at the Proposed North Delta Diversion Intakes. Department of Water Resources, 1-6 pp.

- Seesholtz, A. M., M. J. Manuel, and J. P. Van Eenennaam. 2014. First Documented Spawning and Associated Habitat Conditions for Green Sturgeon in the Feather River, California. *Environmental Biology of Fishes* 98(3):905-912.
- Seesholtz, A. M., M. J. Manuel, and J. P. Van Eenennaam. 2014. First Documented Spawning and Associated Habitat Conditions for Green Sturgeon in the Feather River, California (Pre-Publication). *Environmental Biology of Fishes* 98(3):905-912.
- Seesholtz, A. M., M. J. Manuel, and J. P. Van Eenennaam. 2015. First Documented Spawning and Associated Habitat Conditions for Green Sturgeon in the Feather River, California. *Environmental Biology of Fishes* 98(3):905-912.
- Sellheim, K. L., C. B. Watry, B. Rook, S. C. Zeug, J. Hannon, J. Zimmerman, K. Dove, and J. E. Merz. 2016. Juvenile Salmonid Utilization of Floodplain Rearing Habitat after Gravel Augmentation in a Regulated River. *River Research and Applications* 32(4):610-621.
- Semmens, B. X. 2008. Acoustically Derived Fine-Scale Behaviors of Juvenile Chinook Salmon (*Oncorhynchus tshawytscha*) Associated with Intertidal Benthic Habitats in an Estuary. *Canadian Journal of Fisheries and Aquatic Sciences* 65(9):2053-2062.
- Seney, E. E., M. J. Rowland, R. A. Lowery, R. B. Griffis, and M. M. McClure. 2013. Climate Change, Marine Environments, and the Us Endangered Species Act. *Conservation Biology* 27(6):1138-1146.
- Senter, A. E. and G. B. Pasternack. 1954. The Life Histories of the Steelhead Rainbow Trout (*Salmo gairdneri*) and Silver Salmon (*Oncorhynchus kisutch*) with Special References to Waddell Creek, California, and Recommendations Regarding Their Management. *Fish Bulletin No. 98*:271.
- Senter, A. E. and G. B. Pasternack. 2011. Large Wood Aids Spawning Chinook Salmon (*Oncorhynchus Tshawytscha*) in Marginal Habitat on a Regulated River in California. *River Research and Applications* 27(5):550-565.
- Service, N. M. F. 2010. Biennial Report to Congress on the Recovery Program for Threatened and Endangered Species U. S. D. o. Commerce, 194 pp.
- Service, N. M. F. 2010 Federal Recovery Outline North American Green Sturgeon Souther Distinct Population Segment U. S. D. o. Commerce, 23 pp.
- Service, N. M. F. 2013. Modeling Habitat Capacity and Population Productivity for Spring-Run Chinook Salmon and Steelhead in the Upper Yuba River Watershed.
- Service, U. S. F. a. W. 2002. Spawning Areas of Green Sturgeon (*Acipenser medirostris*) in the Upper Sacramento River, California U.S. Fish and Wildlife Service, Red Bluff, CA Red Bluff, CA.
- Service, U. S. F. a. W. 2015. Clear Creek Habitat Synthesis Report USFWS Anadromous Fish Restoration Program Sacramento, CA
- Service, U. S. F. a. W. 2016. Chipps Island Trawl Data (1976 - 2016).in U. S. D. o. t. Interior, editor., Lodi, CA.
- Servizi, J. A. and D. W. Martens. 1992. Sublethal Responses of Coho Salmon (*Oncorhynchus-Kisutch*) to Suspended Sediments. *Canadian Journal of Fisheries and Aquatic Sciences* 49(7):1389-1395.
- Seymour, A. H. 1956. Effects of Temperature Upon Young Chinook Salmon. Ph.D. Dissertation. University of Washington.

- Shapovalov, L. 1946. Report on Fisheries Resources in Connection with the Proposed Solano Project of the United States Bureau of Reclamation, Bureau of Fisheries Conservation, California Division of Fish and Game. As Cited In: USFWS. 1993. Reconnaissance Planning Report: Fish and Wildlife Resource Management Options for Lower Putah Creek, California. Department of the Interior, 128 pp.
- Shapovalov, L. and A. C. Taft. 1954. The Life Histories of the Steelhead Rainbow Trout (*Salmo gairdneri gairdneri*) and Silver Salmon (*Oncorhynchus kisutch*). Fish Bulletin 98:375.
- Shardlow, T. F. 2013. Isotopic Evidence of Salmon, *Oncorhynchus* Spp., in the Diet of the Wolverine, *Gulo Gulo*, on Princess Royal Island, British Columbia. The Canadian Field-Naturalist 127:338-342.
- Shared Strategy Development Committee. 2006. Chapter 1: One Strategy Shared by Many. Pages 1-34 in Puget Sound Salmon Recovery Plan. Shared Strategy for Puget Sound, Seattle, Washington.
- Shared Strategy Development Committee. 2006. Chapter 4: Technical Recovery Criteria and Goals for Puget Sound Chinook Salmon and Bull Trout. Pages 131-148 in Puget Sound Salmon Recovery Plan. Shared Strategy for Puget Sound, Seattle, Washington.
- Shasta County. 2011. Shasta County 2009-2014 Housing Element, Prepared by Shasta County Department of Resource Management,. http://www.co.shasta.ca.us/index/drm_index/planning_index/housing_element.aspx. March 22, 2011.
- Shasta County. 2016a. Shasta County Sports and Recreation. http://www.co.shasta.ca.us/index/community_index/sports_rec.aspx. June 19, 2016.
- Shasta County. 2016b. Government. at http://www.co.shasta.ca.us/index/gov_index.aspx. June 20, 2016.
- Shelton, J. M. 1955. The Hatching of Chinook Salmon Eggs under Simulated Stream Conditions. The Progressive Fish-Culturist 17(1):20-35.
- Shin, H. O. 1995. Effect of the Piling Work Noise on the Behavior of Snakehead (*Channa Argus*) in the Aquafarm. Journal of the Korean Fisheries Society 28(4):492-502.
- SHN Consulting Engineers and Geologists. 2001. Cow Creek Watershed Assessment.
- Short, R. A. and P. E. Maslin. 1977. Leaf Litter by a Stream Detritivore: Effect on Nutrient Availability to Collectors. Ecological Society of America 58(1):935-938.
- Siegel, S. W. 2007. Foundation Concepts and Some Initial Activities to Restore Ecosystem Functions to the California Delta.
- Sigler, J. W., T. Bjornn, and F. H. Everest. 1984. Effects of Chronic Turbidity on Density and Growth of Steelheads and Coho Salmon. Transactions of the American Fisheries Society 113(2):142-150.
- Sigler, J. W., T. C. Bjornn, and F. H. Everest. Effects of Chronic Turbidity on Density and Growth of Steelheads and Coho Salmon. Transactions of the American Fisheries Society 113:142-150.
- Sigler, J. W., T. C. Bjornn, and F. H. Everest. 1984. Effects of Chronic Turbidity on Density and Growth of Steelheads and Coho Salmon. Transactions of the American Fisheries Society 113(2):142-150.
- Silvestre, F., J. Linares-Casenave, S. I. Doroshov, and D. Kultz. 2010. A Proteomic Analysis of Green and White Sturgeon Larvae Exposed to Heat Stress and Selenium. Science of the Total Environment 408(16):3176-3188.

- Simenstad, C. A., N. Monsen, H. Gosnell, E. Peebles, G. Ruggerone, and J. Van Sickle. 2016. Independent Review Panel Report for the 2016-2017 California WaterFix Aquatic Science Peer Review Phase 2A. Delta Science Program.
- Simenstad, C. A., N. Monsen, H. Gosnell, E. Peebles, G. Ruggerone, and J. Van Sickle. 2017. Independent Review Panel Report for the 2016-2017 California WaterFix Aquatic Science Peer Review Phase 2B. Delta Science Program.
- Simmons, R. E., P. Lavretsky, and B. May. 2010. Introgressive Hybridization of Redband Trout in the Upper McCloud River Watershed. *Transactions of the American Fisheries Society* 139:201-213.
- Simon, A., M. Doyle, M. G. Kondolf, J. F. D. Shields, B. Rhoads, G. E. Grant, F. Fitzpatrick, K. Juracek, M. McPhillips, and J. MacBroom. 2005. How Well Do the Rosgen Classification and Associated "Natural Channel Design" Methods Integrate and Quantify Fluvial Processes and Channel Response? *ASCE*:12.
- Simonis, J., S. Zeug, and K. Ross. 2016. Estimating Loss of Chinook Salmon and Central Valley Steelhead at the Central Valley Project and State Water Project. Department of Water Resources.
- Simpson, S. D., J. Purser, and A. N. Radford. 2015. Anthropogenic Noise Compromises Anti-Predator Behaviour in European Eels. *Global Change Biology* 21(2):586-593.
- Simpson, S. D., A. N. Radford, S. L. Nedelec, M. C. Ferrari, D. P. Chivers, M. I. McCormick, and M. G. Meekan. 2016. Anthropogenic Noise Increases Fish Mortality by Predation. *Nature Communications* 7:1-7.
- Siskiyou County Economic Development Council. 2015. Siskiyou County Industry Report. June 20, 2016.
- Skalski, J. R., W. H. Pearson, and C. I. Malme. 1992. Effects of Sounds from a Geophysical Survey Device on Catch-Per-Unit-Effort in a Hook-and-Line Fishery for Rockfish (*Sebastes* Spp). *Canadian Journal of Fisheries and Aquatic Sciences* 49(7):1357-1365.
- Skinner, J. E. 1958. Some Observations Regarding the King Salmon Runs of the Central Valley. California Department of Fish and Game, 14 pp.
- Skinner, J. E. 1958. Some Observations Regarding the King Salmon Runs of the Central Valley.
- Slabbekoorn, H., N. Bouton, I. van Opzeeland, A. Coers, C. ten Cate, and A. N. Popper. 2010. A Noisy Spring: The Impact of Globally Rising Underwater Sound Levels on Fish. *Cell Press* 25(1-9):419-427.
- Sloat, M. R. and G. H. Reeves. 2014. Individual Condition, Standard Metabolic Rate, and Rearing Temperature Influence Steelhead and Rainbow Trout (*Oncorhynchus mykiss*) Life Histories. *Canadian Journal of Fisheries and Aquatic Sciences* 71(4):491-501.
- Slotte, A., K. Hansen, J. Dalen, and E. Ona. 2004. Acoustic Mapping of Pelagic Fish Distribution and Abundance in Relation to a Seismic Shooting Area Off the Norwegian West Coast. *Fisheries Research* 67(2):143-150.
- Smith, A. K. 1973. Development and Application of Spawning Velocity and Depth Criteria for Oregon Salmonids. *Transactions of the American Fisheries Society* 102(2):312-316.
- Smith, D. 2016. The History of the Indians in Shasta County. http://shastacountyhistory.com/indian_history. June 22, 2016.
- Smith, D. L., J. M. Nestler, G. E. Johnson, and R. A. Goodwin. 2010. Species-Specific Spatial and Temporal Distribution Patterns of Emigrating Juvenile Salmonids in the Pacific Northwest. *Reviews in Fisheries Science* 18(1):40-64.
- Smith, M. E., A. B. Coffin, D. L. Miller, and A. N. Popper. 2006. Anatomical and Functional Recovery of the Goldfish (*Carassius auratus*) Ear Following Noise Exposure. *The Journal of Experimental Biology*, 209:4193-4202.

- Smith, M. E., A. S. Kane, and A. N. Popper. 2004. Noise-Induced Stress Response and Hearing Loss in Goldfish (*Carassius auratus*). *The Journal of Experimental Biology* 207(Pt 3):427-435.
- Smythe, W. E., M. Manson, J. M. Wilson, C. D. Marx, F. Soule, C. E. Grunsky, E. M. Boggs, and J. D. Schuyler. 1901. Report on Irrigation Investigations in California. U.S. Department of Agriculture, Bulletin No. 100, 486 pp.
- Snider, B., B. Reavis, and S. Hill. 2001. Upper Sacramento River Winter-Run Chinook Salmon Escapement Survey, May-August 2000. California Department of Fish and Game, Stream Evaluation Program Technical Report No. 01-1.
- Snider, B., R. Titus, and K. Vyberberg. 2001. Evaluation of Effects of Flow Fluctuations on the Anadromous Fish Populations in the Lower American River. California Department of Fish and Game, Habitat Conservation Division. Stream Evaluation Program. Tech. Reports No. 1 and 2 with appendices 1-3.
- Snider, B. and R. G. Titus. 2000. Lower American River Emigration Survey: October 1996-September 1997. California Department of Fish and Game, Stream Evaluation Program Technical Report No. 00-2.
- Snider, B. and R. G. Titus. 2000. Timing, Composition and Abundance of Juvenile Anadromous Salmonid Emigration in the Sacramento River near Knights Landing October 1998-September 1999. California Department of Fish and Game, Stream Evaluation Program Technical Report No. 00-6.
- Snider, B. and R. G. Titus. 2000. Timing, Composition, and Abundance of Juvenile Anadromous Salmonid Emigration in the Sacramento River near Knights Landing October 1996 - September 1997. California Department of Fish and Game, Stream Evaluation Program Technical Report No. 00-04.
- Snider, B. and R. G. Titus. 2000a. Timing, Composition, and Abundance of Juvenile Anadromous Salmonid Emigration in the Sacramento River near Knights Landing October 1997-September 1998.
- Snider, B. and R. G. Titus. 2000b. Timing, Composition, and Abundance of Juvenile Anadromous Salmonid Emigration in the Sacramento River near Knights Landing October 1999-September 1999.
- Snover, A. K., N. J. Mantua, J. S. Littell, M. A. Alexander, M. M. McClure, and J. Nye. 2013. Choosing and Using Climate-Change Scenarios for Ecological-Impact Assessments and Conservation Decisions. *Conservation Biology* 27(6):1147-1157.
- Snyder, N. P., J. R. Allen, C. Dare, M. A. Hampton, G. Schneider, R. J. Wooley, C. N. Alpers, and M. C. Marvin-DiPasquale. 2004. Sediment Grain-Size and Loss-on-Ignition Analyses from 2002 Englebright Lake Coring and Sampling Campaigns. Department of the Interior, U.S. Geological Survey Open-File Report 2004-1080.
- Snyder, N. P., C. N. Alpers, L. E. Flint, J. A. Curtis, M. A. Hampton, B. J. Haskell, and D. L. Nielsen. 2004. Report on the May-June 2002 Englebright Lake Deep Coring Campaign. Department of the Interior, U.S. Geological Survey Open-File Report 2004-1061.
- Snyder, N. P., D. M. Rubin, C. N. Alpers, J. R. Childs, J. A. Curtis, L. E. Flint, and S. A. Wright. 2004. Estimating Accumulation Rates and Physical Properties of Sediment Behind a Dam: Englebright Lake, Yuba River, Northern California. *Water Resources Research* 40:19.
- Snyder, N. P., L. Sloan, N. Diffenbaugh, and J. Bell. 2003. Future Climate Change and Upwelling in the California Coast. *Geophysical Research Letters* 30(15):4.
- Sobeck, E. 2016. Guidance for Treatment of Climate Change in NMFS Endangered Species Act Decisions. National Marine Fisheries Service, 1-10 pp.

- Sogard, S. M., J. E. Merz, W. H. Satterthwaite, M. P. Beakes, D. R. Swank, E. M. Collins, R. G. Titus, and M. Mangel. 2012. Contrasts in Habitat Characteristics and Life History Patterns of *Oncorhynchus mykiss* in California's Central Coast and Central Valley. *Transactions of the American Fisheries Society* 141(3):747-760.
- Solomon, K. R., J. P. Giesy, and P. Jones. 2000. Probabilistic Risk Assessment of Agrochemicals in the Environment. *Crop Prot.* 19:649.
- Sommer, T., B. Harrell, M. Nobriga, R. Brown, P. Moyle, W. Kimmerer, and L. Schemel. 2001. California's Yolo Bypass: Evidence That Flood Control Can Be Compatible with Fisheries, Wetlands, Wildlife, and Agriculture. *Fisheries* 26(8):6-16.
- Sommer, T., W. Harrell, M. Nobriga, R. Brown, P. Moyle, W. Kimmerer, and L. Schemel. 2011. California's Yolo Bypass: Evidence That Flood Control Can Be Compatible with Fisheries, Wetlands, Wildlife, and Agriculture. *Fisheries* 26(8):6-16.
- Sommer, T., D. McEwan, and R. Brown. 2001. Factors Affecting Chinook Salmon Spawning in the Lower Feather River. *Fish Bulletin* 2(179).
- Sommer, T. R., M. L. Nobriga, W. C. Harrell, W. Batham, and W. J. Kimmerer. 2001. Floodplain Rearing of Juvenile Chinook Salmon: Evidence of Enhanced Growth and Survival. *Canadian Journal of Fisheries and Aquatic Sciences* 58(2):325-333.
- Song, J., D. A. Mann, P. A. Cott, B. W. Hanna, and A. N. Popper. 2008. The Inner Ears of Northern Canadian Freshwater Fishes Following Exposure to Seismic Air Gun Sounds. *Journal of the Acoustical Society of America* 124(2):1360-1366.
- Soule, M. E. 1980. Thresholds for Survival: Maintaining Fitness and Evolutionary Potential. Pages 151-170 *in* Conservation Biology: An Evolutionary-Ecological Perspective, W. E. Soule and B. A. Wilcox, editors. Sinauer Associates, Sunderland, MA.
- Speegle, J. 2016. Delta Fish Density 1977-2016, Chipps Island. U. S. Fish and Wildlife Service.
- Spence, B. C. and T. H. Williams. 2011. Status Review Update for Pacific Salmon and Steelhead Listed under the Endangered Species Act: Central California Coast Coho Salmon ESU. NOAA Technical Memorandum NOAA-TM-NMFS-SWFSC-475, 1-23 pp.
- Spina, A., M. R. McGoogan, and T. S. Gaffney. 2006. Influence of Surface-Water Withdrawal on Juvenile Steelhead and Their Habitat in a South-Central California Nursery Stream. *California Fish and Game* 92(2):81-90.
- Spina, A. P., M. R. McGoogan, and T. S. Gaffney. 2006. Influence of Surface-Water Withdrawal on Juvenile Steelhead and Their Habitat in a South-Central California Nursery Stream. *California Fish and Game*, 81-90 pp.
- Spromberg, J. A., D. H. Baldwin, S. E. Damm, J. K. McIntyre, M. Huff, C. A. Sloan, B. F. Anulacion, J. W. Davis, and N. L. Scholz. 2016. Coho Salmon Spawner Mortality in Western Us Urban Watersheds: Bioinfiltration Prevents Lethal Storm Water Impacts. *Journal of Applied Ecology* 53(2):398-407.
- Spromberg, J. A. and N. L. Scholz. 2011. Estimating the Future Decline of Wild Coho Salmon Populations Resulting from Early Spawner Die-Offs in Urbanizing Watersheds of the Pacific Northwest, USA. *Integrated Environmental Assessment and Management* 7(4):648-656.
- Stachowicz, J. J., H. Fried, R. W. Osman, and R. B. Whitlatch. 2002. Biodiversity, Invasion Resistance, and Marine Ecosystem Function: Reconciling Pattern and Process. *Ecology* 83(9):2575-2590.

Stafford, L. A. and K. M. Newton. 2010. Monitoring Adult Chinook Salmon, Rainbow Trout, and Steelhead in Battle Creek, California, from March through November 2008. U.S. Fish and Wildlife Service, 78 pp.

Staley, J. R. 1976. American River Steelhead (*Salmo Gairdnerii Gairdnerii*) Management, 1956-1974. California Department of Fish and Game, Administrative Report No. 76-2, 44 pp.

Stanislaus County. 2009. River and Fishing Accesses. Stanislaus County Department of Parks and Recreation.

Stanislaus County. 2009. Stanislaus County Parks. Stanislaus County Department of Parks and Recreation.

State of California. 1970. Public Resources Code Section 21000. State of California.

State of California. 1984. Fish and Game Code Section 2050. State of California.

State of California. 2010. Standard Specifications. Department of Transportation.

State of California. 2012. Compendium of Pile Driving Sound Data. Department of Transportation.

State of California. 2014. Geotechnical Manual - Supplement A (Gmsa). Department of Transportation.

State of California. 2016. Biological Assessment: Geotechnical Drilling Foundation Investigation and Navigational Fender Replacement Project 03-3f550 Tower Bridge Sr-275 in Sacramento County. Department of Transportation.

State of California. 2016. Unemployment Rate and Labor Force, Employment Development Department. State of California, 2 pp.

State Water Contractors. 2017. pers. comm. B. Thom. February 28, 2017.

State Water Resources Control Board. 1995. Water Quality Control Plan for the San Francisco Bay/Sacramento-San Joaquin Delta Estuary. State Water Resources Control Board, 95-1WR, 1-55 pp.

State Water Resources Control Board. 2003. Augmentation of the Administrative Record and to Reconsider D1641 in Relation to Lower Yuba River. Sacramento, California.

State Water Resources Control Board. 2003. Revised Water Right Decision 1644 in the Matter of Fishery Resources and Water Right Issues of the Lower Yuba River. California Environmental Protection Agency, 245 pp.

State Water Resources Control Board. 2006. Water Quality Control Plan for the San Francisco Bay/Sacramento-San Joaquin Delta Estuary. State Water Resources Control Board and California Environmental Protection Agency, 60 pp.

State Water Resources Control Board. 2009. Amendments to the 1994 Water Quality Control Plan for the Sacramento River and San Joaquin River Basins Fourth Edition.161.

State Water Resources Control Board. 2009. Amendments to the 1994 Water Quality Control Plan for the Sacramento River and San Joaquin River Basins Fourth Edition. State Water Resources Control Board, 161 pp.

State Water Resources Control Board. 2010. pers. comm. R. Kino. November 30, 2010.

State Water Resources Control Board. 2010. Resolution No. 2010-0020: Adopt a Proposed "Water Quality Control Policy on the Use of Coastal and Estuarine Waters for Power Plant Cooling" and Associated Certified Regulatory Program Environmental Analysis.

- State Water Resources Control Board. 2010a. Development of Flow Criteria for the Sacramento-San Joaquin Delta Ecosystem. State Water Resources Control Board and California Environmental Protection Agency, 191 pp.
- State Water Resources Control Board. 2010b. Draft Technical Report on the Scientific Basis for Alternative San Joaquin River Flow and Delta Salinity Objectives. State Water Resources Control Board and California Environmental Protection Agency, 114 pp.
- State Water Resources Control Board and California Environmental Protection Agency. 2016. Working Draft Scientific Basis Report for New and Revised Flow Requirements on the Sacramento River and Tributaries, Eastside Tributaries to the Delta, Delta Outflow, and Interior Delta Operations. State Water Resources Control Board and California Environmental Protection Agency, 388 pp.
- State Water Resources Control Board (SWRCB). 1999. Revised Water Right Decision 1641. State Water Resources Control Board and California Environmental Protection Agency, 225 pp.
- Stearns, S. C. 1992. The Evolution of Life Histories. Oxford University Press.
- Steel, A. E., M. J. Thomas, and A. P. Klimley. 2018. Reach Specific Use of Spawning Habitat by Adult Green Sturgeon (*Acipenser medirostris*) under Different Operation Schedules at Red Bluff Diversion Dam. Journal of Applied Ichthyology 00:1-8.
- Stelle, J., William. 2016. pers. comm. D. G. Murillo. September 6, 2016.
- Stephenson, J. R., A. J. Gingerich, R. S. Brown, B. D. Pflugrath, Z. Q. Deng, T. J. Carlson, M. J. Langeslay, M. L. Ahmann, R. L. Johnson, and A. G. Seaburg. 2010. Assessing Barotrauma in Neutrally and Negatively Buoyant Juvenile Salmonids Exposed to Simulated Hydro-Turbine Passage Using a Mobile Aquatic Barotrauma Laboratory. Fisheries Research 106(3):271-278.
- Stevens, D. E. and L. W. Miller. 1970. Distribution of Sturgeon Larvae in the Sacramento-San Joaquin River System. California Fish and Game 56(2):80-86.
- Stewart, A. R., S. N. Luoma, C. E. Schlekat, M. A. Doblin, and K. A. Hieb. 2004. Food Web Pathway Determines How Selenium Affects Aquatic Ecosystems: A San Francisco Bay Case Study. Environmental Science and Technology 38(17):4519-4526.
- Stewart, I. T., D. R. Cayan, and M. D. Dettinger. 2005. Changes toward Earlier Streamflow Timing across Western North America. Journal of Climate 18(8):1136-1155.
- Stillwater Churn Creek Watershed Alliance, Stillwater-Churn Creek Technical Advisory Committee, and Western Shasta Resource Conservation District. 2008. Stillwater-Churn Creek Watershed Action Plan.
- Stillwater Sciences. 2001. Merced River Corridor Restoration Plan Baseline Studies Volume II: Geomorphic and Riparian Vegetation Investigations Report.
- Stillwater Sciences. 2003. Draft Restoration Strategies for the San Joaquin River. Friant Water Users Authority and Natural Resources Defense Council.
- Stillwater Sciences. 2003. Restoration Objectives for the San Joaquin River. San Francisco, California.
- Stillwater Sciences. 2006. Sacramento River Ecological Flows Study: State of the System Report. Prepared for The Nature Conservancy.
- Stillwater Sciences. 2006. Sacramento River Ecological Flows Study: State of the System Report Public Review Draft. The Nature Conservancy, California.

- Stillwater Sciences. 2006. Upper Yuba River Watershed Chinook Salmon and Steelhead Habitat Assessment.
- Stillwater Sciences. 2011. Lower Tuolumne River Water Temperature Modeling Study.
- Stillwater Sciences. 2013. Chinook Salmon Population Model Study Draft Report.
- Stillwater Sciences. 2013a. Salmonid Population Information Integration and Synthesis Study Report.
- Stillwater Sciences. 2013b. Oncorhynchus mykiss Population Study Report Don Pedro Project FERC No 2299.
- Stillwater Sciences and Wiyot Tribe Natural Resources. 2017. Status, Distribution, and Population of Origin of Green Sturgeon in the Eel River: Results of 2014–2016 Studies. Silver Springs, Maryland.
- Stokstad, E. 2011. Appraising U.K. Ecosystems, Report Envisions Greener Horizon. *Science* 332(6034):1139.
- Stompe, D. K., S. L. Alexander, J. D. Roberts, and D. S. Killam. 2016. 2015–2016 Chinook Salmon Dewatered Redd Monitoring on the Sacramento River. Department of Fish and Wildlife, 1-8 pp.
- Stompe, D. K., D. Killam, and R. Revnak. 2016. Redd Dewatering and Juvenile Stranding in the Upper Sacramento River Year 2015-2016. Department of Fish and Wildlife and Pacific States Marine Fisheries Commission, RBFO technical Report No. 02-2016, 1-57 pp.
- Stone, L. 1872. Report of Operations During 1872 at the United States Salmon-Hatching Establishment on the McCloud River, and on the California Salmonidae Generally; with a List of Specimens Collected.
- Stone, L. 1872. Report of Operations During 1872 at the United States Salmon-Hatching Establishment on the McCloud River, and on the California Salmonidae Generally; with a List of Specimens Collected. Pages 168-215 *in* Report of Commissioner of Fish and Fisheries.
- Stone, L. 1882. Account of Operations at the McCloud River Fish-Breeding Stations of the United States Fish Commission, from 1872 to 1882, Inclusive. *Fishery Bulletin* 2.
- Stratus Consulting Inc. 2012. Embracing Uncertainty: A Case Study Examination of How Climate Change Is Shifting Water Utility Planning.99.
- Stratus Consulting Inc. 2015. Actionable Science in Practice: Co-Producing Climate Change Information for Water Utility Vulnerability Assessments.59.
- Strayer, D. L. 2010. Alien Species in Fresh Waters: Ecological Effects, Interactions with Other Stressors, and Prospects for the Future. *Freshwater Biology* 55:152-174.
- Stromberg, J. C., V. B. Beauchamp, M. D. Dixon, S. J. Lite, and C. Paradzick. 2007. Importance of Low-Flow and High-Flow Characteristics to Restoration of Riparian Vegetation Along Rivers in Arid South-Western United States. *Freshwater Biology* 52(4):651-679.
- Sturrock, A. M., J. D. Wikert, T. Heyne, C. Mesick, A. E. Hubbard, T. M. Hinkelman, P. K. Weber, G. E. Whitman, J. J. Glessner, and R. C. Johnson. 2015. Reconstructing the Migratory Behavior and Long-Term Survivorship of Juvenile Chinook Salmon under Contrasting Hydrologic Regimes. *PLoS ONE* 10(5):e0122380.
- Suburban Stats. 2016a. Population Demographics for Shasta Lake, California in 2016 and 2017. <https://suburbanstats.org/population/california/how-many-people-live-in-shasta-lake>. June 19, 2016.
- Suburban Stats. 2016b. Population Demographics for Anderson, California in 2016 and 2015. <https://suburbanstats.org/population/california/how-many-people-live-in-anderson>. June 19, 2016.

- Suisun Marsh Salinity Control Gate Technical Team. 2001. Findings of the Suisun Marsh Salinity Control Gate Steering Group Technical Team.
- Sun, Y., Y. Song, J. Zhao, J. Chen, Y. Yuan, S. Jiang, and D. Zhang. 2001. Effect of Drilling Noise and Vibration on Growth of Carp (*Cyprinus carpio*) by Cut-Fin Marking. *Marine Fish Research/Haiyang Shiuchan Yanjiu* 22(1):62-68.
- Surface Water Resources Inc. 2001. Aquatic Resources of the Lower American River: Baseline Report Draft.
- Surface Water Resources Inc. 2005. Potential for Re-Establishing a Spring-Run Chinook Salmon Population in the Lower Feather River. RFQ 722 - Bay-Delta and Tributaries Fisheries Science Support.
- Suttle, K. B., M. E. Power, J. M. Levine, and C. McNeely. 2004. How Fine Sediment in Riverbeds Impairs Growth and Survival of Juvenile Salmonids. *Ecological Applications* 14(4):969-974.
- Suuronen, P. and D. L. Erickson. 2010. Mortality of Animals That Escape Fishing Gears or Are Discarded after Capture: Approaches to Minimize Mortality. Page 54 *in* Behavior of Marine Fishes: Capture Processes and Conservation Challenges, P. He, editor. Wiley-Blackwell.
- Sverdrup, A., E. Kjellsby, P. G. Kruger, R. Floysand, F. R. Knudsen, P. S. Enger, G. Serckhanssen, and K. B. Helle. 1994. Effects of Experimental Seismic Shock on Vasoactivity of Arteries, Integrity of the Vascular Endothelium and on Primary Stress Hormones of the Atlantic Salmon. *Journal of Fish Biology* 45(6):973-995.
- Swanson, C., P. S. Young, and J. J. Cech. 2005. Close Encounters with a Fish Screen: Integrating Physiological and Behavioral Results to Protect Endangered Species in Exploited Ecosystems. *Transactions of the American Fisheries Society* 134(5):1111-1123.
- Swanson, C., P. S. Young, and J. Cech Jr. 2004. Fish Treadmill-Developed Fish Screen Criteria for Native Sacramento-San Joaquin Watershed Fishes. Cooperative Agreement No. 11420IJ075, U.S. Department of Interior Anadromous Fish Screen Program.
- Swanson, C., P. S. Young, and J. Cech Jr. 2004. Swimming in Two-Vector Flows: Performance and Behavior of Juvenile Chinook Salmon near a Simulated Screened Water Diversion. *American Fisheries Society Symposium*(133):265-278.
- Swart, B. 2016. Shasta Operations Temperature Compliance Memo. National Marine Fisheries Service, 1-16 pp.
- Systech Water Resources, I. 2001. Task 3 Technical Memorandum Analytical Modeling of the Sacramento River. I. Systech Water Resources, 135 pp.
- Tabacchi, E., D. L. Correll, R. Hauer, G. Pinay, A.-M. Planty-Tabacchi, and R. C. Wissmar. 1998. Development, Maintenance and Role of Riparian Vegetation in the River Landscape. *Freshwater Biology* 40(3):497-516.
- Taylor, D. W. 1981. Freshwater Mollusks of California. *California Fish and Game* 67(3):140-163.
- Taylor, E. B. 1991. A Review of Local Adaptation in Salmonidae, with Particular Reference to Pacific and Atlantic Salmon. *Aquaculture* 98:185-207.
- Teh, S. J., D. Deng, I. Werner, F. Teh, and S. S. Hung. 2005. Sublethal Toxicity of Orchard Stormwater Runoff in Sacramento Splittail (*Pogonichthys Macrolepidotus*) Larvae. *Mar Environ Res* 59(3):203-216.
- Tehama County Resource Conservation District. 2008. Tehama East Community Wildfire Protection Plan and Risk Assessment with Recommendations for Fire and Pre-Fire Fuels Treatment Opportunities.

- Temmerman, S., T. J. Bouma, J. Van de Koppel, D. Van der Wal, M. B. De Vries, and P. M. J. Herman. 2007. Vegetation Causes Channel Erosion in a Tidal Landscape. *Geology* 35(7):631-634.
- Teo, S. L. H., P. T. Sandstrom, E. D. Chapman, R. E. Null, K. Brown, A. P. Klimley, and B. A. Block. 2011. Archival and Acoustic Tags Reveal the Post-Spawning Migrations, Diving Behavior, and Thermal Habitat of Hatchery-Origin Sacramento River Steelhead Kelts (*Oncorhynchus mykiss*). *Environmental Biology of Fishes* 96(2-3):175-187.
- Terraqua, I. 2004. Draft Battle Creek Salmon and Steelhead Restoration Project Adaptive Management Plan. Wauconda, Washington.
- The Fishery Foundation of California. 2003. Draft Plan of Actions to Restore Salmon and Steelhead Populations in the Lower Calaveras River. Stockton, CA.
- The National Academic Press. 2013. Assessing Risks to Endangered and Threatened Species from Pesticides. The National Academic Press:176.
- The Royal Society. 2005. Ocean Acidification Due to Increasing Atmospheric Carbon Dioxide.
- The San Francisco Estuary Partnership. 2015. State of the Estuary Report: Status Trends and Update of 33 Indicators of Ecosystem Health, San Francisco Bay and Sacramento-San Joaquin River Delta.
- The Yolo Basin Foundation. 2006. The State of the Yolo Bypass: December 2006.
- Theurer, F. D., K. A. Voos, and W. J. Miller. 1984. Instream Water Temperature Model, Instream Flow Information Paper 16.344.
- Thom, B. 2016. Guidance for Addressing Climate Change in West Coast Region Endangered Species Act Section 7 Consultations. National Marine Fisheries Service, 1-7 pp.
- Thom, B. 2017. pers. comm. D. G. Murillo. January 19, 2017.
- Thomas, J. L. 1967. Diet of Juvenile and Adult Striped Bass *Roccus saxatilis* in Sacramento-San Joaquin River System. *California Fish and Game* 53(1):49-62.
- Thomas, M., A. P. Klimley, and A. Hearn. 2015. Appendix 2-B Red Bluff Diversion Dam Conservation Measures: Juvenile Green Sturgeon Movements and Identification of Critical Rearing Habitat.
- Thomas, M. J., M. L. Peterson, E. D. Chapman, A. R. Hearn, G. P. Singer, R. D. Battleson, and A. P. Klimley. 2013. Behavior, Movements, and Habitat Use of Adult Green Sturgeon, *Acipenser medirostris*, in the Upper Sacramento River. *Environmental Biology of Fishes* 97(2):133-146.
- Thomas, M. J., M. L. Peterson, N. Friedenber, J. P. Van Eenennaam, J. R. Johnson, J. J. Hoover, and A. P. Klimley. 2013. Stranding of Spawning Run Green Sturgeon in the Sacramento River: Post-Rescue Movements and Potential Population-Level Effects. *North American Journal of Fisheries Management* 33(2):287-297.
- Thomas R. Payne and Associates. 2005. Recovery of Fish Populations in the Upper Sacramento River Following the 1991 Cantara Spill.
- Thompson, A. M., K. Kim, and A. J. Vandermuss. 2008. Thermal Characteristics of Stormwater Runoff from Asphalt and Sod Surfaces. *Journal of the American Water Resources Association* 44(5):1325-1336.

- Thompson, B., T. Adelsbach, C. Brown, J. Hunt, J. Kuwabara, J. Neale, H. Ohlendorf, S. Schwarzbach, R. Spies, and K. Taberski. 2007. Biological Effects of Anthropogenic Contaminants in the San Francisco Estuary. *Environmental Research* 105(1):156-174.
- Thompson, K. 1972. Determining Stream Flows for Fish Life. Page 20 Pacific Northwest River Basins Commission Instream Flow Requirement Workshop.
- Thompson, L. C., M. I. Escobar, C. M. Mosser, D. R. Purkey, D. Yates, and P. B. Moyle. 2011. Water Management Adaptations to Prevent Loss of Spring-Run Chinook Salmon in California under Climate Change. Pages 465-478 *Journal of Water Resources Planning and Management*.
- Thomson, C. J. and C. Pinkerton. 2008. Habitat Restoration Cost References for Salmon Recovery Planning. U.S. Department of Commerce, NOAA Technical Memorandum NMFS-SWFSC-425, 79 pp.
- Thorson, J. T., M. D. Scheuerell, E. R. Buhle, and T. Copeland. 2014. Spatial Variation Buffers Temporal Fluctuations in Early Juvenile Survival for an Endangered Pacific Salmon. *Journal of Animal Ecology* 83(1):157-167.
- Thrower, F. P. and J. E. Joyce. 2004. Effects of 70 Years of Freshwater Residency on Survival, Growth, Early Maturation, and Smolting in a Stock of Anadromous Rainbow Trout from Southeast Alaska. *American Fisheries Society* 44(485-496).
- Thrush, S. F. and P. K. Dayton. 2002. Disturbance to Marine Benthic Habitats by Trawling and Dredging: Implications for Marine Biodiversity. *Annual Review of Ecology and Systematics* 33(1):449-473.
- Tierney, K. B., D. H. Baldwin, T. J. Hara, P. S. Ross, N. L. Scholz, and C. J. Kennedy. 2010. Olfactory Toxicity in Fishes. *Aquatic Toxicology* 96(1):2-26.
- Tobin, E. 2010. pers. comm. B. McNeil. January 28, 2010.
- Toft, J. D., C. A. Simenstad, J. R. Cordell, and L. F. Grimaldo. 2003. The Effects of Introduced Water Hyacinth on Habitat Structure, Invertebrate Assemblages, and Fish Diets. *Estuaries* 26(3):746-758.
- Tolimieri, N., A. Jeffs, and J. C. Montgomery. 2002. Ambient Sound as a Cue for Navigation by the Pelagic Larvae of Reef Fishes. *Bioacoustics* 207:219-224.
- Tomalty, K., M. Stephens, M. Baerwald, K. Bork, M. Meek, and B. May. 2014. Examining the Causes and Consequences of Hybridization During Chinook Salmon Reintroductions: Using the San Joaquin River as a Restoration Case Study of Management Options. *San Francisco Estuary and Watershed Science*:1-18.
- Torn, M. S., E. Mills, and J. Fried. 1998. Will Climate Change Spark More Wildfire Damage? LBNL Report No. 42592.
- Trites, A. and C. P. Donnelly. 2003. The Decline of Steller Sea Lions *Eumetopias jubatus* in Alaska: A Review of the Nutritional Stress Hypothesis. *Mammal Review* 33(1):3-28.
- Trust, S. L. 2006. An Evaluation of the Feasibility of Restoring Freshwater Tidal Wetlands at Calhoun Cut Ecological Reserve. 312 pp.
- Tuck, I. D., S. J. Hall, M. R. Robertson, E. Armstrong, and D. J. Basford. 1998. Effects of Physical Trawling Disturbance in a Previously Unfished Sheltered Scottish Sea Loch. *Marine Ecology Progress Series* 162:227-242.
- Tucker, M. E., C. M. Williams, and R. R. Johnson. 1998. Abundance, Food Habits and Life History Aspects of Sacramento Squawfish and Striped Bass at the Red Bluff Diversion Complex, Including the Research Pumping Plant, Sacramento River, California, 1994-1996. U.S. Fish and Wildlife Service, 63 pp.

- Tucker, M. E., C. M. Williams, and R. R. Johnson. 1998. Abundance, Food Habits, and Life History Aspects of Sacramento Squawfish and Striped Bass at the Red Bluff Diversion Complex, California, 1994-1996. U.S. Fish and Wildlife Service, Report Series: Volume 4.
- Tuolumne River Preservation Trust. 2002. Proposal Titled, Tuolumne River - La Grange Floodplain Restoration.
- Turlock Irrigation District. 2001. Tuolumne River Mining Reach Restoration Project: Warner-Deardorff Segment No. 3 - Construction.55.
- Turlock Irrigation District and Modesto Irrigation District. 2009. FERC Project No. 2299: 2008 Annual Summary Report.
- Tyack, P. L. 2008. Implications for Marine Mammals of Large-Scale Changes in the Marine Acoustic Environment. *Journal of Mammalogy* 89(3):549-558.
- U.S. Army Corps of Engineers. 1971. Flood Plain Information - Cow Creek, Palo Cedro, California. 59 pp.
- U.S. Army Corps of Engineers. 2018. Portland District Missions Environmental Stewardship. <http://www.nwp.usace.army.mil/environment/docs/afep>. 5/8/2018.
- U.S. Army Corps of Engineers and Reclamation Board. 1999. Sacramento and San Joaquin River Basins Comprehensive Study Interim Report. 74 pp.
- U.S. Army Corps of Engineers (Corps). 2013. Biological Assessment for the U.S. Army Corps of Engineers Authorized Operation and Maintenance of Existing Fish Passage Facilities at Daguerre Point Dam on the Lower Yuba River.
- U.S. Army Corps of Engineers (USACE). 2014. Yuba River Ecosystem Restoration – Section 905(B) Analysis.
- U.S. Bureau of Reclamation. 1998. Lower Stony Creek Fish, Wildlife and Water Use Management Plan. Department of the Interior.
- U.S. Bureau of Reclamation. 2003. Shasta Lake Water Resources Investigation, Ecosystem Restoration Opportunities Office Report. 34 pp.
- U.S. Bureau of Reclamation. 2004. 2001-2004 Steelhead Monitoring and Incidental Take Report for the Central Valley Project and State Water Project Operations Criteria and Plan (CVP/SWP OCAP) Biological Opinions.
- U.S. Bureau of Reclamation. 2004. Biological Assessment on the Continued Long-Term Operations of the Central Valley Project and the State Water Project. U.S. Bureau of Reclamation, 108 pp.
- U.S. Bureau of Reclamation. 2008. Biological Assessment on the Continued Long-Term Operations of the Central Valley Project and the State Water Project. Department of the Interior, 64 pp.
- U.S. Bureau of Reclamation. 2010. Sacramento River Salmonid Spawning Gravel Augmentation Program Gets under Way. http://www.sustainablecitynetwork.com/topic_channels/environmental/article_ddf575ca-aeed-11df-980c-0017a4a78c22.html. 4/17/2018.
- U.S. Bureau of Reclamation. 2011. Secure Water Act Section 9503(C) - Reclamation Climate Change and Water 2011. U.S. Department of the Interior and Bureau of Reclamation, 226 pp.
- U.S. Bureau of Reclamation. 2011. Secure Water Act Section 9503(C) - Reclamation Climate Change and Water, Report to Congress. U.S. Department of the Interior, 226 pp.

U.S. Bureau of Reclamation. 2011. Secure Water Act Section 9503(C) – Reclamation Climate Change and Water, Report to Congress. U.S. Department of the Interior, 226 pp.

U.S. Bureau of Reclamation. 2012a. Colorado River Basin Water Supply and Demand Study. U.S. Department of the Interior and Bureau of Reclamation, 34 pp.

U.S. Bureau of Reclamation. 2012b. Stanislaus River Discharge-Habitat-Relationships for Rearing Salmonids. U.S. Department of the Interior, 87 pp.

U.S. Bureau of Reclamation. 2014. Downscaled Cmp3 and Cmp5 Hydrology Projections. U.S. Department of the Interior and Bureau of Reclamation, 111 pp.

U.S. Bureau of Reclamation. 2014. West-Wide Climate Risk Assessment Sacramento and San Joaquin Basins Climate Impact Assessment. U.S. Department of the Interior and Bureau of Reclamation, 66 pp.

U.S. Bureau of Reclamation. 2015. Biological Assessment for the Lower American River Anadromous Fish Habitat Restoration Program. 40 pp.

U.S. Bureau of Reclamation. 2015. Draft Biological Assessment for California WaterFix. U.S. Bureau of Reclamation.

U.S. Bureau of Reclamation. 2016. Biological Assessment for the California WaterFix.

U.S. Bureau of Reclamation. 2016. Biological Assessment for the California WaterFix, Revised Working Draft. U.S. Bureau of Reclamation.

U.S. Bureau of Reclamation. 2016. pers. comm.

U.S. Bureau of Reclamation. 2016. Secure Water Act Section 9503(C) Reclamation Climate Change and Water 2016. U.S. Department of the Interior and Bureau of Reclamation, 307 pp.

U.S. Bureau of Reclamation. 2016. pers. comm. J. Alawan. October 3, 2016.

U.S. Bureau of Reclamation. 2017. pers. comm. National Marine Fisheries Service. May 8, 2017.

U.S. Bureau of Reclamation. 2017. Interagency Fish Passage Steering Committee (Ifpsc). 19 pp.

U.S. Bureau of Reclamation and California Department of Water Resources. 2012. Yolo Bypass Salmonid Habitat Restoration and Fish Passage Implementation Plan, Long-Term Operation of the Central Valley Project and State Water Project Biological Opinion.

U.S. Bureau of Reclamation and Department of Water Resources. 2005. Suisun Marsh Salinity Control Gates Proposal to Improve Fish Passage 2005. U.S. Department of the Interior, 10 pp.

U.S. Bureau of Reclamation, National Marine Fisheries Service, U.S. Fish and Wildlife Service, California Department of Fish and Game, and Pacific Gas and Electric Company. 1999. Memorandum of Understanding for the Battle Creek Chinook Salmon and Steelhead Restoration Project, Located in the Battle Creek Watershed.

U.S. Bureau of Reclamation and U.S. Fish and Wildlife Service. 2011. Biological Assessment - Coleman Barrier Weir Site Modifications. Interior.

U.S. Census Bureau. 2010. Annual Estimates of the Resident Population by Sex, Race, and Hispanic Origin for the United States, States, and Counties. <http://www.census.gov/popest/data/index.html>. June 19, 2016.

- U.S. Census Bureau. 2017. American Fact Finder, Individuals Below Poverty Level for Siskiyou County, Shasta County, and State of California. http://factfinder.census.gov/faces/nav/jsf/pages/community_facts.xhtml. March 31, 2017.
- U.S. Congress. 1973. Endangered Species Act of 1973 Section 1539: Exceptions, Subsections (a) through (J) Inclusive. 16 USC 1531-1544.
- U.S. Congress. 2009. Title X Subtitle A - San Joaquin River Restoration Settlement. Public Law 111-11, 123 STAT. 993.
- U.S. Department of Agriculture. 2012. Biological Assessment: *Egeria densa* Control Program. 270.
- U.S. Department of Commerce. 2002. Endangered Species Act - Section 7 Consultation Biological Opinion. U.S. Department of Commerce, 116 pp.
- U.S. Department of Commerce. 2005. Updated Status of Federally Listed ESUs of West Coast Salmon and Steelhead. U.S. Department of Commerce, 637 pp.
- U.S. Department of Commerce. 2013. Regional Climate Trends and Scenarios for the U.S. National Climate Assessment. U.S. Department of Commerce, 87 pp.
- U.S. Department of Commerce, O. o. I. G. 2005. The NMFS Review Process for the California Central Valley and State Water Projects' Biological Opinion Deviated from the Region's Normal Practice. S. R. O. Office of Audits, Final Audit Report No. STL - 17242-5-0001/July 2005, 36 pp.
- U.S. Department of Fish and Game. 1999. Sacramento River Winter-Run Chinook Salmon, Annual Report
- U.S. Department of the Interior. 1973. 16 United States Code Endangered Species Act of 1973; Section 1539; Exceptions, Subsections a through J Inclusive. Page 48 *in* U.S. Fish and Wildlife Service, editor., Washington, D.C.
- U.S. Department of the Interior. 1982. Guidance for Determining Flood Flow Frequency. 194 pp.
- U.S. Department of the Interior and U.S. Geological Survey. 2011. Regional Skew for California, and Flood Frequency for Selected Sites in the Sacramento-San Joaquin River Basin, Based on Data through Water Year 2006. U.S. Geological Survey, 104 pp.
- U.S. Environmental Protection Agency. 2001a. Salmonid Behavior and Water Temperature. U.S. Environmental Protection Agency, 38 pp.
- U.S. Environmental Protection Agency. 2001b. Salmonid Distributions and Temperature. U.S. Environmental Protection Agency, 22 pp.
- U.S. Environmental Protection Agency. 2001c. Spatial and Temporal Patterns of Stream Temperature. Issue Paper 3. 33 pp.
- U.S. Environmental Protection Agency. 2001d. Temperature Interaction. 36 pp.
- U.S. Environmental Protection Agency. 2001e. EPA Region 10 Guidance for Pacific Northwest State and Tribal Temperature Water Quality Standards. 57 pp.
- U.S. Environmental Protection Agency. 2001e. Summary of Technical Literature Examining the Physiological Effects of Temperature on Salmonids. 118 pp.

- U.S. Environmental Protection Agency. 2003. EPA Region 10 Guidance for Pacific Northwest State and Tribal Temperature Water Quality Standards. U.S. Environmental Protection Agency, EPA 910-B-03-002, 1-57 pp.
- U.S. Environmental Protection Agency. 2004. Overview of the Ecological Risk Assessment Process in the Office of Pesticide Programs, U.S. Environmental Protection Agency: Endangered and Threatened Species Effects Determinations. 1-92 pp.
- U.S. Environmental Protection Agency. 2004. Overview of the Ecological Risk Assessment Process in the Office of Pesticide Programs-Endangered and Threatened Species Effects Determinations.92.
- U.S. Environmental Protection Agency. 2006. Iron Mountain Mine Case Study, Success through Planning, Partnerships, and Perseverance. U.S. Environmental Protection Agency, 17 pp.
- U.S. Environmental Protection Agency. 2006. Iron Mountain Mine Case Study: Success through Planning, Partnerships, and Perserverance. United States Environmental Protection Agency, 17 pp.
- U.S. Environmental Protection Agency. 2007. Framework for Metals Risk Assessment. EPA 120/R-07/001, 1-172 pp.
- U.S. Environmental Protection Agency. 2011. Letter from Alexis Strauss Director Water Division.36.
- U.S. Environmental Protection Agency. 2011. Water Quality Challenges in the San Francisco Bay/Sacramento-San Joaquin Delta Estuary. 1-91 pp.
- U.S. Environmental Protection Agency. 2012. Comments to the Draft Environmental Impact Statement for Hydropower License, Middle Fork American River Hydroelectric Project FERC. 9 pp.
- U.S. Environmental Protection Agency. 2012. Water Quality Challenges in the San Francisco Bay/ Sacramento-San Joaquin Delta Estuary: EPA Action Plan. 29 pp.
- U.S. Environmental Protection Agency. 2012. Water Quality Challenges in the San Francisco Bay/Sacramento-San Joaquin Delta Estuary: EPA's Action Plan. 1-29 pp.
- U.S. Environmental Protection Agency. 2017. Caddis Volume 2 Sources, Stressors and Responses: Temperature. <https://www.epa.gov/caddis-vol2/caddis-volume-2-sources-stressors-responses-temperature>. 5/7/2018.
- U.S. Environmental Protection Agency. 2017. National Recommended Water Quality Criteria - Aquatic Life Criteria Table. <https://www.epa.gov/wqc/national-recommended-water-quality-criteria-aquatic-life-criteria-table>.
- U.S. Environmental Protection Agency and U.S. Coast Guard. 2002. Inter-Agency Memorandum of Agreement Regarding Oil Spill Planning and Response Activities under the Federal Water Pollution Control Act's National Oil and Hazardous Substances Pollution Contingency Plan and the Endangered Species Act: A Guidebook. U.S. Environmental Protection Agency, U.S. Coast Guard, U.S. Fish and Wildlife Service, National Marine Fisheries Service, National Ocean Service, and Department of the Interior.
- U.S. Fish and Wildlife Service. Title 50: Wildlife and Fisheries Chapter 1: United States Fish and Wildlife Service, Department of the Interior. Subchapter B: Taking, Posession, Transportation, Sale, Purchase, Barter, Exportation and Importation of Wildlife and Plants. Part 17: Endangered and Threatened Wildlife and Plants, Subpart H: Experimental Populations, 17.80 Definitions. 50 CFR 17.80.
- U.S. Fish and Wildlife Service. 1992. Shaded Riverine Aquatic Cover of the Sacramento River System: Classification as Resource Category 1 under the FWS Mitigation Policy. U.S. Fish and Wildlife Service, 1-25 pp.
- U.S. Fish and Wildlife Service. 1993. Memorandum from W.S. White to David Lewis, Regional Director, Bureau of Reclamation, Sacramento, California; Usbr - Stanislaus River Basin Calaveras River Conjunctive Use Water

Program Study; a Preliminary Evaluation of Fish and Wildlife Impacts with Emphasis on Water Needs of the Calaveras River. Department of the Interior.

- U.S. Fish and Wildlife Service. 1995. Working Paper on Restoration Needs Habitat Restoration Actions to Double Natural Production of Anadromous Fish in the Central Valley of California.
- U.S. Fish and Wildlife Service. 1995. Working Paper on Restoration Needs: Habitat Restoration Actions to Double Natural Production of Anadromous Fish in the Central Valley of California., 293 pp.
- U.S. Fish and Wildlife Service. 1995-2012. Delta Juvenile Fish Monitoring Program (DJFMP): Monitoring Data. https://www.fws.gov/lodi/juvenile_fish_monitoring_program/jfmp_index.htm.
- U.S. Fish and Wildlife Service. 1997. Identification of the Instream Flow Requirements for Anadromous Fish in the Streams within the Central Valley of California. 43 pp.
- U.S. Fish and Wildlife Service. 1998. Effects of Temperature on Early Life-Stage Survival of Sacramento River Fall-Run and Winter-Run Chinook Salmon. 1-49 pp.
- U.S. Fish and Wildlife Service. 1999. Draft Programmatic Environmental Assessment Anadromous Fish Restoration Actions in Lower Deer Creek Tehama County, California. Department of the Interior, 107 pp.
- U.S. Fish and Wildlife Service. 1999. Guidelines for Developing Post-Construction Evaluation and Assessment Plans, and Operations & Maintenance Plans. U.S. Fish and Wildlife Service, 15 pp.
- U.S. Fish and Wildlife Service. 2001. Final Restoration Plan for the Anadromous Fish Restoration Program. U.S. Fish and Wildlife Service, 146 pp.
- U.S. Fish and Wildlife Service. 2001. Final Restoration Plan for the Anadromous Fish Restoration Program: A Plan to Increase Natural Production of Anadromous Fish in the Central Valley of California. 1-146 pp.
- U.S. Fish and Wildlife Service. 2003. Flow-Habitat Relationships for Spring-Run Chinook Salmon Spawning in Butte Creek. Energy Planning and Instream Flow Branch, 1-89 pp.
- U.S. Fish and Wildlife Service. 2004 Impacts of Riprapping to Aquatic Organisms and River Functioning, Lower Sacramento River, California. U.S. Fish and Wildlife Service, 44 pp.
- U.S. Fish and Wildlife Service. 2006. Relationships between Flow Fluctuations and Redd Dewatering and Juvenile Stranding for Chinook Salmon and Steelhead in the Sacramento River between Keswick Dam and Battle Creek. Energy Planning and Instream Flow Branch, 1-94 pp.
- U.S. Fish and Wildlife Service. 2008. Biological Opinion on Formal Endangered Species Act Consultation on the Proposed Coordinated Operations of the Central Valley Project (CVP) and State Water Project (SWP). California and Nevada Region, 1-410 pp.
- U.S. Fish and Wildlife Service. 2008. Species at Risk from Selenium Exposure in the San Francisco Estuary. U.S. Department of the Interior, 85 pp.
- U.S. Fish and Wildlife Service. 2009. Endangered and Threatened Wildlife and Plants: Proposed Establishment of a Nonessential Experimental Population of [Species] in [Location] [Draft Template]. Page 19 50 CFR 17. Department of the Interior.
- U.S. Fish and Wildlife Service. 2009. Template for Proposed Experimental Population Rule. Department of the Interior.

- U.S. Fish and Wildlife Service. 2010. Title 50: Wildlife and Fisheries Chapter I: United States Fish and Wildlife Service, Department of the Interior. Subchapter B: Taking, Possession, Transportation, Sale, Purchase, Barter, Exportation and Importation of Wildlife and Plants. Part 17: Endangered and Threatened Wildlife and Plants, Subpart H: Experimental Populations, Section 17.80 Definitions. 50 CFR 17.80.
- U.S. Fish and Wildlife Service. 2011. Biological Assessment of Artificial Propagation at Coleman National Fish Hatchery and Livingston Stone National Fish Hatchery: Program Description and Incidental Take of Chinook Salmon and Steelhead. U.S. Fish and Wildlife Service, 406 pp.
- U.S. Fish and Wildlife Service. 2011. Biological Assessment of Artificial Propagation at Coleman National Fish Hatchery and Livingston Stone National Fish Hatchery: Program Description and Incidental Take of Chinook Salmon and Steelhead. U.S. Fish and Wildlife Service, 405 pp.
- U.S. Fish and Wildlife Service. 2014. Delta Juvenile Fish Monitoring Program (DJFMP): Monitoring Data. https://www.fws.gov/lodi/juvenile_fish_monitoring_program/jfmp_index.htm.
- U.S. Fish and Wildlife Service. 2014. Identification of the Instream Flow Requirements for Anadromous Fish in the Streams within the Central Valley of California and Fisheries Investigations. Sacramento, California.
- U.S. Fish and Wildlife Service. 2014. Wolverine. U.S. Fish and Wildlife Service, 2 pp.
- U.S. Fish and Wildlife Service. 2015. Clear Creek Habitat Synthesis Report The Anadromous Fish Restoration Program, 1-24 pp.
- U.S. Fish and Wildlife Service. 2015. Delta Juvenile Fish Monitoring Program (DJFMP): Monitoring Data. https://www.fws.gov/lodi/juvenile_fish_monitoring_program/jfmp_index.htm.
- U.S. Fish and Wildlife Service. 2015. Final Report above Shasta Dam Passage Investigation.
- U.S. Fish and Wildlife Service. 2015a. Hatchery and Genetic Management Plan, Livingston Stone National Fish Hatchery -Integrated-Recovery Supplementation Program. U.S. Fish and Wildlife Service, 98 pp.
- U.S. Fish and Wildlife Service. 2015b. Hatchery and Genetic Management Plan Livingston Stone National Fish Hatchery – Winter Chinook Captive Broodstock Program. U.S. Fish and Wildlife Service, 68 pp.
- U.S. Fish and Wildlife Service. 2015c. Above Shasta Dam Passage Investigation Final Report: October 8, 2015 USFWS, CA-NV Fish Health Center Principal Investigator(S): Scott Foott, Ken Nichols, and Ron Stone.
- U.S. Fish and Wildlife Service. 2016. Chipps Island Trawl Data (1976 - 2016). Lodi, California.
- U.S. Fish and Wildlife Service. 2016. Chipps Island Trawl Data (1976 - 2016).in U. S. D. o. t. Interior, editor., Lodi, CA.
- U.S. Fish and Wildlife Service. 2016. Delta Juvenile Fish Monitoring Program (DJFMP): Monitoring Data. https://www.fws.gov/lodi/juvenile_fish_monitoring_program/jfmp_index.htm.
- U.S. Fish and Wildlife Service. 2016. Hatchery and Genetic Management Plan: Livingston Stone National Fish Hatchery Integrated-Recovery Supplementation Program. 1-99 pp.
- U.S. Fish and Wildlife Service. 2016. Proposed Revisions to the U.S. Fish and Wildlife Service Mitigation Policy. Federal Register 81(92):29574-29575.
- U.S. Fish and Wildlife Service. 2016a. Shasta Crayfish *Pacifastacus Fortis*. https://www.fws.gov/sacramento/es_species/Accounts/Invertebrates/es_shasta-crayfish.htm. 2016.

- U.S. Fish and Wildlife Service. 2016b. Gray Wolf (*Canis Lupus*).
<https://ecos.fws.gov/ecp0/profile/speciesProfile.action?spcode=A00D>. 2016.
- U.S. Fish and Wildlife Service. 2016c. Local Species Information - Fisher (*Pekania Pennanti*).
<https://www.fws.gov/yreka/fisher.html>.
- U.S. Fish and Wildlife Service. 2017. Delta Juvenile Fish Monitoring Program (DJFMP): Monitoring Data.
https://www.fws.gov/lodi/juvenile_fish_monitoring_program/jfmp_index.htm.
- U.S. Fish and Wildlife Service and Bureau of Reclamation. 1997. Final Environmental Assessment and Finding of No Significant Impact (Fonsi) Establishment of a Winter-Run Chinook Salmon Supplementation Spawning and Rearing Facility Using Sacramento River Water.
- U.S. Fish and Wildlife Service and California Department of Fish and Game. 1953. A Plan for the Protection and Maintenance of Salmon and Steelhead in the American River, California, Together with Recommendations for Action. U.S. Fish and Wildlife Service and California Department of Fish and Game, 62 pp.
- U.S. Fish and Wildlife Service, U.S. Bureau of Reclamation, and H. V. T. T. County. 2018. Trinity River Fishery Restoration, Supplemental Environmental Impact Statement/Environmental Report, Appendix G-3, OCAP Ba Project Description. U. S. B. o. R. U.S. Fish and Wildlife Service, 108 pp.
- U.S. Forest Service. 1996 Management Guide: Shasta and Trinity Units Whiskeytown-Shasta-Trinity National Recreation Area. Shasta-Trinity National Forest, Redding, California in United States Bureau of Reclamation. 2013. Draft Environmental Impact Statement, Shasta Lake Water Resources Investigation. Bureau of Reclamation, Mid-Pacific Region. 292 pp.
- U.S. Forest Service. 1997. Beegum Watershed Analysis. U.S. Forest Service, Yolla Bolla Ranger District South Fork Management Unit, and Shasta-Trinity National Forest, 111 pp.
- U.S. Forest Service. 1998. McCloud River Watershed Analysis.
- U.S. Forest Service. 1998a. Redband Trout Conservation Agreement, Shasta-Trinity National Forest, Conservation Agreement, Upper McCloud River Redband Trout *Oncorhynchus mykiss* U.S. Forest Service, 72 pp.
- U.S. Forest Service. 2001. Long-Term Strategy for Anadromous Fish-Producing Watersheds in the Lassen National Forest. U.S. Department of Agriculture, FEIS Volume 4 Appendix I, 1-114 pp.
- U.S. Forest Service. 2012. Bald Eagles of Shasta, Trinity, & Lewiston Lakes Shasta & Trinity Units Whiskeytown - Shasta-Trinity National Recreation Area Shasta-Trinity National Forest. May 17, 2016.
- U.S. Forest Service. 2014b. Sightseeing on Shasta Lake and a Little Underwater History.
http://www.fs.usda.gov/Internet/FSE_DOCUMENTS/fsm9_008585.pdf. June 19, 2016.
- U.S. Forest Service. 2016. Martes Americana. <https://www.fs.fed.us/database/feis/animals/mammal/maam/all.html>. 2016.
- U.S. Forest Service (USFC). 2009. Climate Change Considerations in Project Level NEPA Analysis. 11 pp.
- U.S. Geological Survey. 1995. Water Resources Data California: Water Year 1994. U.S. Geological Survey, USGS Water-Data Report CA-94-4, 456 pp.
- U.S. Government Printing Office. 1995. Paperwork Reduction Act. 18 pp.
- Udall, B. 2013. Assessment of Climate Change in the Southwest United States. Island Press:531.

- United States Army Corps of Engineers. 2009. Final Erosional Assessment/Initial Study for Levee Repair of 25 Erosional Sites: Sacramento River Bank Protection Project. Prepared by North State Resources, Inc., Redding, California and Stillwater Sciences, Inc., Berkeley, California, for U.S. Army Corps of Engineers, Sacramento District and Central Valley Flood Protection Board, Sacramento, California. U.S. Army Corps of Engineers Contract No. W91238-07-D-0022. May 2009.
- United States Army Corps of Engineers. 2012. Standard Assessment Methodology for the Sacramento River Bank Protection Project, 2010–2012 Certification Update, Final. Prepared for U.S. Army Corps of Engineers, Sacramento District by Stillwater Sciences, Berkeley, California, Contract W91238-09-P-0249 Task Order 3.
- United States Census Bureau. 2016a. Quick Facts for Siskiyou County, Shasta County, and State of California. www.census.gov/quickfacts. July 2016.
- United States Census Bureau. 2016b. American Factfinder, Poverty in the United States, 1960-2010. <https://factfinder.census.gov/faces/nav/jsf/pages/index.xhtml>, July 2016.
- United States Department of Agriculture, Natural Resources Conservation Service, United States Department of the Interior, and National Park Service. 2013. Soil Survey of Whiskeytown National Recreation Area, California.
- United States Department of Agriculture (USDA). 2000. Rainbow Trout (*Oncorhynchus mykiss*) Fish and Wildlife Habitat Management Leaflet Number 13. <https://www.fws.gov/northeast/wssnfh/pdfs/rainbow1.pdf> June 15, 2016.
- United States Department of the Interior. 2012. Endangered and Threatened Species; 5-Year Reviews for 5 Evolutionarily Significant Units of Pacific Salmon and 1 Distinct Population Segment of Steelhead in California. Fish and Wildlife Service, 18 pp.
- United States District Court, E. D. S. D. 2006. Notice of Lodgement Stipulation of Settlement: Nrdc, et al., v. Kirk Rodgers, et al.
- United States Fish and Wildlife Service. 2010. Flow-Habitat Relationships for Spring and Fall-Run Chinook Salmon and Steelhead/Rainbow Trout Spawning in the Yuba River Prepared by the Energy Planning and Instream Flow Branch, Sacramento, California. 430 pp.
- United States Fish and Wildlife Service. 2014. pers. comm. N. Alston.
- United States Geological Survey. 2017. Nonindigenous Aquatic Species (*Siphateles Bicolor*). <https://nas.er.usgs.gov/queries/factsheet.aspx?SpeciesID=532>. April 27, 2017.
- Upper Columbia White Sturgeon Recovery Initiative. 2018. Documents. <http://www.nwp.usace.army.mil/environment/docs/afep/>. 5/8/2018.
- USCODE. 2010. Title 33 Navigation and Navigable Waters. Section 1329. Nonpoint Source Management Programs. 457-462 pp.
- USEPA. 2004. Overview of the Ecological Risk Assessment Process in the Office of Pesticide Programs-Endangered and Threatened Species Effects Determinations.92.
- Van Dalen, J. A. and K. Essink. 2001. Benthic Community Response to Sand Dredging and Shoreface Nourishment in Dutch Coastal Waters. *Senckenbergiana maritima* 31(2):329-332.
- Van den Boogaart, J. G. M., M. Muller, and J. W. M. Osse. 2012. Structure and Function of the Median Finfold in Larval Teleosts. *The Journal of Experimental Biology* 215:2359-2368.

- Van Eenennaam, J. P., J. Linares, S. I. Doroshov, D. C. Hillemeier, T. E. Willson, and A. A. Nova. 2006. Reproductive Conditions of the Klamath River Green Sturgeon. *Transactions of the American Fisheries Society* 135(1):151-163.
- Van Eenennaam, J. P., J. Linares-Casenave, X. Deng, and S. I. Doroshov. 2005. Effect of Incubation Temperature on Green Sturgeon Embryos, *Acipenser medirostris*. *Environmental Biology of Fishes* 72(2):145-154.
- Van Eenennaam, J. P., J. Linares-Casenave, X. Deng, and S. I. Doroshov. 2005. Effect of Incubation Temperature on Green Sturgeon Embryos, *Acipenser medirostris*. *Environmental Biology of Fishes* 72(2):145-154.
- Van Eenennaam, J. P., J. Linares-Casenave, J.-B. Muguet, and S. I. Doroshov. 2008. Induced Spawning, Artificial Fertilization, and Egg Incubation Techniques for Green Sturgeon. *North American Journal of Aquaculture* 70(4):434-445.
- Van Eenennaam, J. P., M. A. Webb, X. Deng, S. I. Doroshov, R. B. Mayfield, J. J. Cech Jr, D. C. Hillemeier, and T. E. Willson. 2001. Artificial Spawning and Larval Rearing of Klamath River Green Sturgeon. *Transactions of the American Fisheries Society* 130(1):159-165.
- Van Eenennaam, J. P., M. A. H. Webb, X. Deng, and S. I. Doroshov. 2001. Artificial Spawning and Larval Rearing of Klamath River Green Sturgeon. *Transactions of the American Fisheries Society* 130:159-165.
- Van Eenennaam, J. P., M. A. H. Webb, X. Deng, S. I. Doroshov, R. B. Mayfield, J. J. Cech, J. D. C. Hillemeier, and T. E. Willson. 2001. Artificial Spawning and Larval Rearing of Klamath River Green Sturgeon. *Transactions of the American Fisheries Society* 130:159-165.
- Van Lienden, B., A. Munevar, and T. Das. 2014. West-Wide Climate Risk Assessment Sacramento and San Joaquin Basins Climate Impact Assessment. U.S. Bureau of Reclamation, 1-66 pp.
- Van Oosten, J. 1948. Turbidity as a Factor in the Decline of Great Lakes Fishes with Special Reference to Lake Erie. *Transactions of the American Fisheries Society* 75(1):281-322.
- Vanderlaan, A. S. M., J. J. Corbett, S. L. Green, J. A. Callahan, C. Wang, R. D. Kenney, C. T. Taggart, and J. Firestone. 2009. Probability and Mitigation of Vessel Encounters with North Atlantic Right Whales. *Endangered Species Research* 6:273-285.
- VanRheenen, N. T., Andrew W. Wood, Richard N. Palmer, Dennis P. Lettenmaier. 2004. Potential Implications of Pcm Climate Change Scenarios for Sacramento-San Joaquin River Basin Hydrology and Water Resources. *Climatic Change* 62(62):257-281.
- VanRheenen, N. T., A. W. Wood, R. N. Palmer, and D. P. Lettenmaier. 2004. Potential Implications of Pcm Climate Change Scenarios for Sacramento-San Joaquin River Basin Hydrology and Water Resources. *Climatic Change* 62(1-3):257-281.
- Vaux, W. G. 1968. Intragravel Flow and Interchange of Water in a Streambed. *Fishery Bulletin* 66(3):479-489.
- Vaz, P. G., E. Kebreab, S. S. Hung, J. G. Fadel, S. Lee, and N. A. Fanguie. 2015. Impact of Nutrition and Salinity Changes on Biological Performances of Green and White Sturgeon. *PLoS ONE* 10(4):e0122029.
- Velsen, F. P. 1987. Temperature and Incubation in Pacific Salmon and Rainbow Trout: Compilation of Data on Median Hatching Time, Mortality and Embryonic Staging. Department of Fisheries and Oceans, Canadian Data Report of Fisheries and Aquatic Sciences 626.
- Verts, B. J. and L. N. Carraway. 1998. Land Mammals of Oregon. Page 673 *in*. University of California Press.

- Viant, M. R., I. Werner, E. S. Rosenblum, A. S. Gantner, R. S. Tjeerdema, and M. L. Johnson. 2003. Correlation between Heat-Shock Protein Induction and Reduced Metabolic Condition in Juvenile Steelhead Trout (*Oncorhynchus mykiss*) Chronically Exposed to Elevated Temperature. *Fish Physiology and Biochemistry* 29:159-171.
- Vicuna, S., J. A. Dracup, J. R. Lund, L. L. Dale, and E. P. Maurer. 2010. Basin-Scale Water System Operations with Uncertain Future Climate Conditions: Methodology and Case Studies. *Water Resources Research* 46(4).
- Viers, J. H. 2011. Hydropower Relicensing and Climate Change¹. *JAWRA Journal of the American Water Resources Association* 47(4):655-661.
- Vigg, S. and C. C. Burley. 1991. Temperature-Dependent Maximum Daily Consumption of Juvenile Salmonids by Northern Squawfish (*Ptycholeilus Oregonensis*) from the Columbia River. *Canadian Journal of Fisheries and Aquatic Sciences* 48(12):2491-2498.
- Villamagna, A. M. and B. R. Murphy. 2010. Ecological and Socio-Economic Impacts of Invasive Water Hyacinth (*Eichhornia Crassipes*): A Review. *Freshwater Biology* 55(2):282-298.
- Vincik, R. F. and R. R. Johnson. 2013. A Report on Fish Rescue Operations at Sacramento and Delevan Nwr Areas, April 24 through June 5, 2013. California Department of Fish and Wildlife, Region II, Rancho Cordova, California.
- Visscher, L. 1983. Lewis Lake Lake Trout. U.S. Fish and Wildlife Service, 11 pp.
- Voellmy, I. K., J. Purser, D. Flynn, P. Kennedy, S. D. Simpson, and A. N. Radford. 2014. Acoustic Noise Reduces Foraging Success in Two Sympatric Fish Species via Different Mechanisms. *Animal Behaviour* 89:191-198.
- Voellmy, I. K., J. Purser, S. D. Simpson, and A. N. Radford. 2014. Increased Noise Levels Have Different Impacts on the Anti-Predator Behaviour of Two Sympatric Fish Species. *PLoS ONE* 9(7):1-8.
- Vogel, D. 1995. Losses of Young Anadromous Salmonids at Water Diversions on the Sacramento and Mokelumne Rivers.
- Vogel, D. 2002. Juvenile Chinook Salmon Radio-Telemetry Study in the Southern Sacramento - San Joaquin Delta: December 2000 - January 2001. U.S. Fish and Wildlife Service, 118 pp.
- Vogel, D. 2005. Effects of Delta Hydrodynamic Conditions on San Joaquin River Juvenile Salmon. Natural Resource Scientists, Inc., Red Bluff, California.
- Vogel, D. 2008. Evaluation of Adult Sturgeon Migration at the Glenn-Colusa Irrigation District Gradient Facility on the Sacramento River. Natural Resource Scientists, Inc.
- Vogel, D. 2011. Evaluation of Fish Entrainment in Seven Unscreened Sacramento River Diversions 2010. Natural Resource Scientists, Inc., Red Bluff, California.
- Vogel, D. 2011. Insights into the Problems, Progress, and Potential Solutions for Sacramento River Basin Native Anadromous Fish Restoration. Natural Resources Scientists, Inc., Red Bluff, California.
- Vogel, D. 2013. Evaluation of Fish Entrainment in 12 Unscreened Sacramento River Diversions. U.S. Fish and Wildlife Service and U.S. Bureau of Reclamation CVPIA Anadromous Fish Screen Program.
- Vogel, D. and K. Marine. 1991. U.S. Bureau of Reclamation Central Valley Project Guide to Upper Sacramento River Chinook Salmon Life History. RDD/R42/003.51.
- Vogel, D. A. 2010. Evaluation of Acoustic-Tagged Juvenile Chinook Salmon Movements in the Sacramento-San Joaquin Delta During the 2009 Vernalis Adaptive Management Program.

- Vogel, D. A. and K. R. Marine. 1991. Guide to Upper Sacramento River Chinook Salmon Life History. Department of Fish and Game, U.S. Fish and Wildlife Service.
- Vogel, D. A., K. R. Marine, and J. G. Smith. 1988. Fish Passage Action Program for Red Bluff Diversion Dam, Final Report on Fishery Investigations. U.S. Fish and Wildlife Service, USFWS Report No. FR1/FAO-88-1, 92 pp.
- Vogel, D. A., K. R. Marine, and J. G. Smith. 1990. A Summary of Evaluations of Upstream and Downstream Anadromous Salmonid Passage.8.
- Wade, A. A., T. J. Beechie, E. Fleishman, N. J. Mantua, H. Wu, J. S. Kimball, D. M. Stoms, and J. A. Stanford. 2013. Steelhead Vulnerability to Climate Change in the Pacific Northwest. *Journal of Applied Ecology* 50:1093-1104.
- Wade, A. A., T. J. Beechie, E. Fleishman, N. J. Mantua, H. Wu, J. S. Kimball, D. M. Stoms, J. A. Stanford, and A. Punt. 2013. Steelhead Vulnerability to Climate Change in the Pacific Northwest. *Journal of Applied Ecology*:n/a-n/a.
- Walters, A. W., K. K. Bartz, and M. M. McClure. 2013. Interactive Effects of Water Diversion and Climate Change for Juvenile Chinook Salmon in the Lemhi River Basin (USA). *Conservation Biology* 27(6):1179-1189.
- Wang, J. C. S. 2006. Early Life History Comparison of the Green Sturgeon, *Acipenser medirostris*, and White Sturgeon, *Acipenser transmontanus*, of the Sacramento-San Joaquin River Delta, California. Bureau of Reclamation, Tracy Technical Bulletin 2006-1, 1-24 pp.
- Wanner, G. A., D. A. Shuman, and D. W. Willis. 2007. Food Habits of Juvenile Pallid Sturgeon and Adult Shovelnose Sturgeon in the Missouri River Downstream of Fort Randall Dam, South Dakota. *Journal of Freshwater Ecology* 22(1):81-92.
- Waples, R., D. J. Teel, J. M. Myers, and A. R. Marshall. 2004. Life-History Divergence in Chinook Salmon: Historic Contingency and Parallel Evolution. Publications Agencies and Staff of the U.S. Department of Commerce, Paper 454, 386-403 pp.
- Waples, R. S. 1991. Definition of "Species" under the Endangered Species Act: Application to Pacific Salmon. U.S. Department of Commerce, NOAA Technical Memorandum NMFS-F/NWC-194, 18 pp.
- Waples, R. S. 1991. Genetic Interactions between Hatchery and Wild Salmonids: Lessons from the Pacific Northwest. *Canadian Journal of Fisheries and Aquatic Sciences* 48(Suppl. 1):124-133.
- Waples, R. S. 2013. Incorporating Climate Change into Risk Analyses under the U.S. Endangered Species Act. *Conservation Biology* 27(6):1137-1233.
- Ward, E. J. 2010. Demographic Model Selection. Northwest Fisheries Science Center.
- Ward, E. J. 2014. 2014 Update of Southern Resident Kill Whale Demography. 1-13 pp.
- Ward, E. J., M. J. Ford, R. G. Kope, J. K. B. Ford, L. A. Velez-Espino, C. K. Parken, L. W. LaVoy, M. B. Hanson, and K. C. Balcomb. 2013. Estimating the Impacts of Chinook Salmon Abundance and Prey Removal by Ocean Fishing on Southern Resident Killer Whale Population Dynamics. National Marine Fisheries Service, NOAA Technical Memorandum NMFS-NWFSC-123, 1-85 pp.
- Ward, E. J., M. J. Ford, R. G. Kope, J. K. B. Ford, L. A. Velez-Espino, C. K. Parken, L. W. LaVoy, M. B. Hanson, and K. C. Balcomb. 2016. Estimating the Impacts of Chinook Salmon Abundance and Prey Removal by Ocean Fishing on Southern Resident Killer Whale Population Dynamics NOAA Technical Memorandum NMFS-NWFSC-123. U.S. Department of Commerce, 85 pp.

- Ward, E. J., E. E. Holmes, and K. C. Balcomb. 2009. Quantifying the Effects of Prey Abundance on Killer Whale Reproduction. *Journal of Applied Ecology* 46(3):632-640.
- Ward, J. V. and J. A. Stanford. 1982. Thermal Responses in the Evolutionary Ecology of Aquatic Insects. *Annual Review of Entomology* 27(1):97-117.
- Ward, M. B. and J. Moberg. 2004. Battle Creek Watershed Assessment: Characterization of Stream Conditions and an Investigation of Sediment Source Factors in 2001 and 2002. Wauconda, WA.
- Ward, P. D., T. R. McReynolds, and C. E. Garman. 2003. Butte and Big Chico Creeks Spring-Run Chinook Salmon, *Oncorhynchus tshawytscha* Life History Investigation: 2001-2002. California Department of Fish and Game, 59 pp.
- Ward, P. D., T. R. McReynolds, and C. E. Garman. 2004. Butte Creek Spring-Run Chinook Salmon, *Oncorhynchus tshawytscha* Pre-Spawn Mortality Evaluation 2004.
- Wardle, C., T. Carter, G. Urquhart, A. Johnstone, A. Ziolkowski, G. Hampson, and D. Mackie. 2001. Effects of Seismic Air Guns on Marine Fish. *Continental Shelf Research* 21(8):1005-1027.
- Wardle, C. S., T. J. Carter, G. G. Urquhart, A. D. F. Johnstone, A. M. Ziolkowski, G. Hampson, and D. Mackie. 2001. Effects of Seismic Air Guns on Marine Fish. *Continental Shelf Research* 21(8):1005-1027.
- Waring, C. P. and A. Moore. 1997. Sublethal Effects of a Carbamate Pesticide on Pheromonal Mediated Endocrine Function in Mature Male Atlantic Salmon (*Salmo salar* L.) Parr. *Fish Physiology and Biochemistry* 17(1-6):203-211.
- Washington Department of Ecology. 2018. Wetlands: Nature's Water Filters, Sponges and Nurseries. <https://ecology.wa.gov/Water-Shorelines/Wetlands/Wetlands-overview>. May 7, 2018.
- Washington Department of Fish and Wildlife and Oregon Department of Fish and Wildlife. 2012. Submission to Response to Federal Register. Washington Department of Fish and Wildlife and Oregon Department of Fish and Wildlife, 64959-64960 pp.
- Washington, P. M. and A. M. Koziol. 1993. Overview of the Interactions and Environmental Impacts of Hatchery Practices on Natural and Artificial Stocks of Salmonids. *Fisheries Research* 18(1-2):105-122.
- Washington State Department of Ecology. 2012. Preparing for a Changing Climate Washington State's Integrated Climate Response Strategy. Department of Ecology, 207 pp.
- Water Forum. 2005. Lower American River State of the River Report.
- Water Forum Fisheries and Instream Habitat Working Group. 2001. Initial Fisheries and in-Stream Habitat Management and Restoration Plan for the Lower American River.
- Waters, T. F. 1995. Sediment in Streams: Sources, Biological Effects, and Control. American Fisheries Society Monograph 7.
- Waters, T. F. 1995. Sediment in Streams: Sources, Biological Effects, and Control. American Fisheries Society, Bethesda.
- Watling, L., R. H. Findlay, L. M. Mayer, and D. F. Schick. 2001. Impact of a Scallop Drag on the Sediment Chemistry, Microbiota, and Faunal Assemblages of a Shallow Subtidal Marine Benthic Community. *Journal of Sea Research* 46(3):309-324.

- Weaver, C. P., R. J. Lempert, C. Brown, J. A. Hall, D. Revell, and D. Sarewitz. 2013. Improving the Contribution of Climate Model Information to Decision Making: The Value and Demands of Robust Decision Frameworks. *Wiley Interdisciplinary Reviews-Climate Change* 4(1):39-60.
- Weaver, J. and S. Mehalick. 2009. Tuolumne River 2009 Summary Report.
- Webb, M. A. H. and D. L. Erickson. 2007. Reproductive Structure of the Adult Green Sturgeon, *Acipenser medirostris*, Population in the Rogue River, Oregon. *Environmental Biology of Fishes* 79(3-4):305-314.
- Webb, P. W. 1995. Locomotion. Pages 70-99 in *Physiological Ecology of Pacific Salmon*, C. Groot, L. Margolis, and W. C. Clarke, editors. UBC Press, Vancouver.
- Weber, L. J., R. A. Goodwin, S. Li, J. M. Nestler, and J. J. Anderson. 2006. Application of an Eulerian-Lagrangian-Agent Method (Elam) to Rank Alternative Designs of a Juvenile Fish Passage Facility. *Journal of Hydroinformatics* 08(4):271-295.
- Weitkamp, L. A. 2010. Marine Distributions of Chinook Salmon from the West Coast of North America Determined by Coded Wire Tag Recoveries. *Transaction of the American Fisheries Society* 139:147-170.
- Wells, B. K., C. B. Grimes, J. G. Sneva, S. McPherson, and J. B. Waldvogel. 2008. Relationships between Oceanic Conditions and Growth of Chinook Salmon (*Oncorhynchus tshawytscha*) from California, Washington, and Alaska, USA. *Fisheries Oceanography* 17(2):101-125.
- Wells, B. K., J. A. Santora, J. C. Field, R. B. MacFarlane, B. B. Marinovic, and W. J. Sydeman. 2012. Population Dynamics of Chinook Salmon *Oncorhynchus tshawytscha* Relative to Prey Availability in the Central California Coastal Region. *Marine Ecology Progress Series* 457:125-137.
- Wells, B. K., J. A. Santora, I. D. Schroeder, N. Mantua, W. J. Sydeman, D. D. Huff, and J. C. Field. 2016. Marine Ecosystem Perspectives on Chinook Salmon Recruitment: A Synthesis of Empirical and Modeling Studies from the California Upwelling System. *Marine Ecology Progress Series* 552:271-284.
- Werner, I., J. Linares-Casenave, J. P. Van Eenennaam, and S. I. Doroshov. 2006. The Effect of Temperature Stress on Development and Heat-Shock Protein Expression in Larval Green Sturgeon (*Acipenser medirostris*). *Environmental Biology of Fishes* 79(3-4):191-200.
- Werner, I., J. Linares-Casenave, J. P. Van Eenennaam, and S. I. Doroshov. 2006. The Effect of Temperature Stress on Development and Heat-Shock Protein Expression in Larval Green Sturgeon (*Acipenser Mirostris*). *Environmental Biology of Fishes* 79(3-4):191-200.
- Werner, I., J. Linares-Casenave, J. P. Van Eenennaam, and S. I. Doroshov. 2007. The Effect of Temperature Stress on Development and Heat-Shock Protein Expression in Larval Green Sturgeon (*Acipenser Mirostris*). *Environmental Biology of Fishes* 79(3-4):191-200.
- Werner, I., T. B. Smith, J. Feliciano, and M. L. Johnson. 2005. Heat Shock Proteins in Juvenile Steelhead Reflect Thermal Conditions in the Navarro River Watershed, California. *Transactions of the American Fisheries Society* 134(2):399-410.
- West Coast Salmon Biological Review Team. 2003. Updated Status of Federally Listed ESUs of West Coast Salmon and Steelhead. National Marine Fisheries Service, 25 pp.
- West Sacramento Area Flood Control Agency. 2011. Southport Sacramento River Early Implementation Project. Interim Preliminary Design Report. West Sacramento Levee Improvement Program. January 28, 2011.

- Western Shasta Resource Conservation District. 1996. Lower Clear Creek Watershed Analysis. R. R. A. for Bureau of Land Management.
- Western Shasta Resource Conservation District. 2003. Cow Creek Watershed Assessment Scope of Work.
- Weston, D. P., J. You, and M. J. Lydy. 2004. Distribution and Toxicity of Sediment-Associated Pesticides in Agriculture-Dominated Water Bodies of California's Central Valley. *Environmental Science and Technology* 38(10):2752-2759.
- White, J. and P. Brandes. 2004. The Effects of Environmental Water Account Actions on Salmonids in 2001-2004. CALFED, 15 pp.
- Wicks, B. J., R. Joensen, Q. Tang, and D. J. Randall. 2002. Swimming and Ammonia Toxicity in Salmonids: The Effect of Sub Lethal Ammonia Exposure on the Swimming Performance of Coho Salmon and the Acute Toxicity of Ammonia in Swimming and Resting Rainbow Trout. *Aquatic Toxicology* 59(1-2):55-69.
- Wiens, J., L. Grenier, R. Grossinger, and M. C. Healey. 2016. The Delta as Changing Landscapes. *San Francisco Estuary and Watershed Science* 14(2):1-21.
- Wieting, D. 2016. Interim Guidance on the Endangered Species Act Term "Harassment". Procedural Instructions 02-110-19. National Marine Fisheries Service, 1-6 pp.
- Wilby, R. L., S. P. Charles, Z. E., B. Timbal, P. Whetton, and L. O. Mearns. 2004. Guidelines for Use of Climate Scenarios Developed from Statistical Downscaling Methods. 27.
- Wilcox, C. 2017. pers. comm. National Marine Fisheries Service. May 1, 2017.
- Wiley, M. L., J. B. Gaspin, and J. F. Goertner. 1981. Effects of Underwater Explosions on Fish with a Dynamical Model to Predict Fishkill. *Ocean Science and Engineering* 6(2):223-284.
- Williams, B. K. and E. D. Brown. 2012. Adaptive Management the Us Department of the Interior Applications Guide. U.S. Department of the Interior, 136 pp.
- Williams, D. D. and N. E. Williams. 1998. Aquatic Insects in an Estuarine Environment: Densities, Distribution and Salinity Tolerance. *Freshwater Biology* 39(3):411-421.
- Williams, J. G. 2001. Chinook Salmon in the Lower American River, California's Largest Urban Stream. *Contributions to the Biology of Central Valley Salmonids - Fish Bulletin* 179(2):1-36.
- Williams, J. G. 2006. Central Valley Salmon: A Perspective on Chinook and Steelhead in the Central Valley of California. *San Francisco Estuary and Watershed Science* 4:416.
- Williams, J. G. 2009. Lost in Space, the Sequel: Spatial Sampling Issues with 1-D Phabsim. *River Research and Applications*:12.
- Williams, J. G. 2010. Drerip Delta Conceptual Model: Life History Conceptual Model for Chinook Salmon & Steelhead *Oncorhynchus tshawytscha* & *Oncorhynchus mykiss*. Department of Fish and Game Ecosystem Restoration Program.
- Williams, J. G. 2012. Juvenile Chinook Salmon (*Oncorhynchus tshawytscha*) in and around the San Francisco Estuary. *San Francisco Estuary and Watershed Science* 10(3):1-24.
- Williams, J. G. 2012. Juvenile Chinook Salmon in and around the San Francisco Estuary. *San Francisco Estuary and Watershed Science* 10:3-26.

- Williams, J. G., B. C. Spence, D. A. Boughton, R. C. Johnson, L. Crozier, N. Mantua, M. O'Farrell, and S. T. Lindley. 2016. Status Review Memo from Lindley to Yates -Viability Assessment for Pacific Salmon and Steelhead Listed under the Endangered Species Act: Southwest - Southwest Fisheries Science Center, 182 pp.
- Williams, P. B., E. Andrews, J. J. Opperman, S. Brozkurt, and P. B. Moyle. 2009. Quantifying Activated Floodplains on a Lowland Regulated River: Its Applications to Floodplain Restoration in the Sacramento Valley. *San Francisco Estuary and Watershed Science* 7(1).
- Williams, R., D. Lusseau, and P. S. Hammond. 2006. Estimating Relative Energetic Costs of Human Disturbance to Killer Whales (*Orcinus orca*). *Biological Conservation* 133(3):301-311.
- Williams, T. H., B. C. Spence, D. A. Boughton, R. C. Johnson, L. Crozier, N. Mantua, M. O'Farrell, and S. T. Lindley. 2016. Viability Assessment for Pacific Salmon and Steelhead Listed under the Endangered Species Act: Southwest, Memorandum from Steve Lindley to Will Stelle.
- Williams, T. H., S. T. Lindley, B. C. Spence, and D. A. Boughton. 2011. Status Review Update for Pacific Salmon and Steelhead Listed under the Endangered Species Act: Southwest. Page 109, Santa Cruz, California.
- Williams, T. H., S. T. Lindley, B. C. Spence, and D. A. Boughton. 2011. Status Review Update for Pacific Salmon and Steelhead Listed under the Endangered Species Act: Southwest. National Marine Fisheries Service, 106 pp.
- Williams, T. H., S. T. Lindley, B. C. Spence, and D. A. Boughton. 2011. Status Review Update for Pacific Salmon and Steelhead Listed under the Endangered Species Act: Southwest; 20 May 2011 -- Update to January 5, 2011 Report. National Marine Fisheries Service Southwest Fisheries Science Center, 1-106 pp.
- Williams, T. H., S. T. Lindley, B. C. Spence, and D. A. Boughton. 2011. Status Review Update for Pacific Salmon and Steelhead Listed under the Endangered Species Act: Update to January 5, 2011 Report., National Marine Fisheries Service, Southwest Fisheries Science Center. Santa Cruz, CA.
- Williams, T. H. and G. H. Reeves. 2003. Ecosystem Diversity and the Extinction Risk of Pacific Salmon and Trout. U.S. Department of Commerce, NOAA Technical Memorandum NMFS-NWFSC-56, 198 pp.
- Williams, T. H., B. C. Spence, D. A. Boughton, R. C. Johnson, L. Crozier, N. Mantua, M. O'Farrell, and S. Lindley. 2016. Viability Assessment for Pacific Salmon and Steelhead Listed under the Endangered Species Act: Southwest. National Marine Fisheries Service, NOAA Technical Memorandum NOAA-TM-NMFS-SWFSC-564, 1-53 pp.
- Williams, T. H., B. C. Spence, W. Duffy, D. Hillemeier, G. Kautsky, T. E. Lisle, M. McCain, T. E. Nickelson, E. Mora, and T. Pearson. 2008. Framework for Assessing Viability of Threatened Coho Salmon in the Southern Oregon/Northern California Coast Evolutionarily Significant Unit. U.S. Department of Commerce, NOAA Technical Memorandum-NMFS-SWFSC-432, 113 pp.
- Wilzbach, M. A., M. J. Ashenfelter, and S. J. Ricker. 2012. Movement of Resident Rainbow Trout Transplanted Below a Barrier to Anadromy. *Transactions of the American Fisheries Society* 141(2):294-304.
- Winberg, G. G. 1956. Rate of Metabolism and Food Requirements of Fishes. Page 286 *in*, Minsk, U.S.S.R.
- Winnemem Wintu. 2016c. Who We Are, Journey to Justice. <http://www.winnememwintu.us/who-we-are/>. June 19, 2016.
- Winnemem Wintu. 2016d. Journey to Justice. <http://www.winnememwintu.us/journey-to-justice/>. June 19, 2016.
- Winnemem Wintu Tribe. 2016. Letter from Chief Sisk, Winnemem Wintu Tribe to Julianne Polanco, State Historic Preservation Office, Bureau of Reclamation Shasta Dam Fish Passage Evaluation (SDFPE) Pilot Program. Winnemem Wintu Tribe, 4 pp.

- Winship, A. J., M. R. O'Farrell, and M. S. Mohr. 2012. Management Strategy Evaluation for Sacramento River Winter Chinook Salmon.
- Wintu, W. 2016b. Winnemem Wintu Salmon Restoration Plan McCloud River. 110 pp.
- Wipfli, M. S., J. Hudson, and J. P. Caouette. 1998. Influence of Salmon Carcasses on Stream Productivity: Response of Biofilm and Benthic Macroinvertebrates in Southeastern Alaska, U.S.A. *Canadian Journal of Fisheries and Aquatic Sciences* 55:1503-1511.
- Wipfli, M. S., J. Hudson, J. P. Caouette, and D. T. Chaloner. 2003. Marine Subsidies in Freshwater Ecosystems: Salmon Carcasses Increase the Growth Rates of Stream-Resident Salmonids. *Transactions of the American Fisheries Society* 132:371-381.
- Wipfli, M. S., J. P. Hudson, J. P. Caouette, and D. T. Chaloner. 2003. Marine Subsidies in Freshwater Ecosystems: Salmon Carcasses Increase the Growth Rates of Stream-Resident Salmonids. *Transactions of the American Fisheries Society* 132(2):371-381.
- Witten, P. E. and B. K. Hall. 2015. Teleost Skeletal Plasticity: Modulation, Adaptation, and Remodeling. *Copeia* 103(103):727-739.
- Wohl, E. and S. Rathburn. 2003. Mitigation of Sedimentation Hazards Downstream from Reservoirs. *International Journal of Sediment Research* 18:97-106.
- Wood, P. J. and P. D. Armitage. 1997. Biological Effects of Fine Sediment in the Lotic Environment. *Environmental Management* 21(2):203-217.
- Woodbury, D. P. and J. H. Stadler. 2008. A Proposed Method to Assess Physical Injury to Fishes from Underwater Sound Produced During Pile Driving. *Bioacoustics* 17(1-3):289-291.
- Woolsey, P. 2012. Consideration of Climate Change in Federal Eiss, 2009 - 2011. 43 pp.
- Workman, M. 2016. pers. comm. N. McIntosh. August 25, 2016.
- Workman, M. L. 2002. Downstream Migration Monitoring at Woodbridge Dam on the Lower Mokelumne River, CA. December 201 through July 2002.
- Workman, M. L. 2002. Lower Mokelumne River Upstream Fish Migration Monitoring Conducted at Woodbridge Irrigation District Dam. August 2001 through July 2002.
- Workman, M. L. 2003. Lower Mokelumne River Upstream Fish Migration Monitoring Conducted at Woodbridge Irrigation District Dam August 2002 through July 2003.
- Workman, M. L. 2004. Lower Mokelumne River Upstream Fish Migration Monitoring Conducted at Woodbridge Irrigation District Dam. August 2001 through July 2002.
- Workman, M. L. 2005. Lower Mokelumne River Upstream Fish Migration Monitoring Conducted at Woodbridge Irrigation District Dam. August 2001 through July 2002.
- Workman, M. L. 2006. Downstream Migration Monitoring at Woodbridge Dam on the Lower Mokelumne River, California. December 2005 through July 2006.
- Workman, M. L. 2006. Lower Mokelumne River Fall-Run Chinook Salmon Escapement Report. October through December 2005.

- Workman, M. L. and E. Rible. 2007. Lower Mokelumne River Fall-Run Chinook Salmon Escapement Report October 2006 through January 2007.
- Workman, M. L., E. Rible, and J. Shillam. 2008. Lower Mokelumne River Fall-Run Chinook Salmon Escapement Report.
- Workman, R., D. B. Hayes, and T. G. Coon. 2002. A Model of Steelhead Movement in Relation to Water Temperature in Two Lake Michigan Tributaries. *Transactions of the American Fisheries Society* 131:463-475.
- Wright, S. A. and D. H. Schoellhamer. 2004. Trends in the Sediment Yield of the Sacramento River, California, 1957–2001. *San Francisco Estuary and Watershed Science* 2(2):1-14.
- Wurtsbaugh, W. A. and G. E. Davis. 1977. Effects of Temperature and Ration Level on the Growth and Food Conversion Efficiency of *Salmo gairdneri*, Richardson. *Journal of Fish Biology* 11:87-98.
- Wyman, M. T., M. J. Thomas, R. R. McDonald, A. R. Hearn, R. D. Battleson, E. D. Chapman, P. Kinzel, J. T. Minear, E. A. Mora, J. M. Nelson, M. D. Pagel, and A. P. Klimley. 2018. Fine-Scale Habitat Selection of Green Sturgeon (*Acipenser medirostris*) within Three Spawning Locations in the Sacramento River, California. *Canadian Journal of Fisheries and Aquatic Sciences* 75(5):779-791.
- Wysocki, L. E., J. P. Dittami, and F. Ladich. 2006. Ship Noise and Cortisol Secretion in European Freshwater Fishes. *Biological Conservation* 128(4):501-508.
- Xu, Z. H., X. A. Yin, T. Sun, Y. P. Cai, Y. Ding, W. Yang, and Z. F. Yang. 2017. Labyrinths in Large Reservoirs: An Invisible Barrier to Fish Migration and the Solution through Reservoir Operation. *Water Resources Research* 53(1):817-831.
- Yarnell, S., R. Peek, G. Epke, and A. Lind. 2016. Management of the Spring Snowmelt Recession in Regulated Systems. *Journal of the American Water Resources Association* 52(3):723-736.
- Yarnell, S., R. Peek, D. Rheinheimer, A. Lind, and J. H. Viers. 2013. Management of the Spring Snowmelt Recession an Integrated Analysis of Empirical, Hydrodynamic and Hydropower Modeling Applications.
- Yarnell, S. M., J. F. Mount, and E. W. Larsen. 2006. The Influence of Relative Sediment Supply on Riverine Habitat Heterogeneity. *Geomorphology* 80(3-4):310-324.
- Yarnell, S. M., J. H. Viers, and J. F. Mount. 2010. Ecology and Management of the Spring Snowmelt Recession. *BioScience* 60(2):114-127.
- Yates, D., H. Galbraith, D. Purkey, A. Huber-Lee, J. Sieber, J. West, S. Herrod-Julius, and B. Joyce. 2008. Climate Warming, Water Storage, and Chinook Salmon in California's Sacramento Valley. *Climatic Change* 91(3-4):335-350.
- Yates, P. M., M. R. Heupel, A. J. Tobin, and C. A. Simpfendorfer. 2012. Diversity in Young Shark Habitats Provides the Potential for Portfolio Effects. *Marine Ecology Progress Series* 458:269-281.
- Yelverton, J. T., D. R. Richmond, E. R. Fletcher, and R. K. Jones. 1973. Safe Distances from Underwater Explosions for Mammals and Birds. Defense Nuclear Agency.
- Yelverton, J. T., D. R. Richmond, W. Hicks, K. Saunders, and E. R. Fletcher. 1975. The Relationship between Fish Size and Their Response to Underwater Blast. Defense Nuclear Agency.
- Yolo Parties and Solano Parties. 2000. Settlement Agreement and Stipulation Among Solano County Water Agency, Solano Irrigation District, Maine Prairie Water District, Cities of Vacaville, Fairfield, Vallejo and Suisun City, and Putah Creek Council, City of Davis, and the Regents of the University of California. 17 pp.

- Yoshiyama, R. M. and F. W. Fisher. 2001. Long Time Past: Baird Station and the McCloud Wintu. *Fisheries* 26(3):6-22.
- Yoshiyama, R. M., F. W. Fisher, and P. B. Moyle. 1998. Historical Abundance and Decline of Chinook Salmon in the Central Valley Region of California. *North American Journal of Fisheries Management* 18:487-521.
- Yoshiyama, R. M., E. Gerstung, F. Fisher, and P. Moyle. 1996. Historical and Present Distribution of Chinook Salmon in the Central Valley Drainage of California: Sierra Nevada Ecosystem Project Final Report to Congress, Vol. III. University of California Davis.
- Yoshiyama, R. M., E. R. Gerstung, F. W. Fisher, and P. B. Moyle. 2001. Historical and Present Distribution of Chinook Salmon in the Central Valley Drainage of California. *Research Gate*:107.
- Yoshiyama, R. M., E. R. Gerstung, F. W. Fisher, and P. B. Moyle. 2001. Historical and Present Distribution of Chinook Salmon in the Central Valley Drainage of California.
- Yoshiyama, R. M., E. R. Gertstung, F. W. Fisher, and P. B. Moyle. 2000. Chinook Salmon in the California Central Valley: An Assessment. *Fisheries Management* 25(2):6-20.
- Yoshiyama, R. M., E. R. Gertstung, F. W. Fisher, and P. B. Moyle. 2001. Historical and Present Distribution of Chinook Salmon in the Central Valley Drainage of California. *Fish Bulletin* 179(1):71-176.
- Yoshiyama, R. W., E. R. Gerstung, F. W. Fisher, and P. B. Moyle. 1996. Historical and Present Distribution of Chinook Salmon in the Central Valley Drainage of California. Pages 309-362.
- Young, P. S., J. J. Cech, and L. C. Thompson. 2011. Hydropower-Related Pulsed-Flow Impacts on Stream Fishes: A Brief Review, Conceptual Model, Knowledge Gaps, and Research Needs. *Reviews in Fish Biology and Fisheries* 21(4):713-731.
- Yuba County Water Agency. 2018. Yuba County Water Agency Comments on National Marine Fisheries Service Draft Recovery Plan for the Southern Distinct Population Segment of North American Green Sturgeon. Yuba County Water Agency, 18 pp.
- Zabel, R. W., B. J. Burke, M. L. Moser, and C. C. Caudill. 2014. Modeling Temporal Phenomena in Variable Environments with Parametric Models: An Application to Migrating Salmon. *Ecological Modelling* 273:23-30.
- Zaugg, W. S. 1981. Advanced Photoperiod and Water Temperature Effects on Gill Na⁺-K⁺ Adenosine-Triphosphatase Activity and Migration of Juvenile Steelhead (*Salmo gairdneri*). *Canadian Journal of Fisheries and Aquatic Sciences* 38(7):758-764.
- Zaugg, W. S. and H. H. Wagner. 1973. Gill ATPase Activity Related to Parr-Smolt Transformation and Migration in Steelhead Trout (*Salmo gairdneri*): Influence of Photoperiod and Temperature. Pages 955-965 in *Comparative Biochemistry and Physiology Part B: Comparative Biochemistry*.
- Zeug, S. C., L. K. Albertson, H. Lenihan, J. Hardy, and B. Cardinale. 2011. Predictors of Chinook Salmon Extirpation in California's Central Valley. *Fisheries Management and Ecology* 18(1):61-71.
- Zeug, S. C., P. S. Bergman, B. J. Cavallo, and K. S. Jones. 2012. Application of a Life Cycle Simulation Model to Evaluate Impacts of Water Management and Conservation Actions on an Endangered Population of Chinook Salmon. *Environmental Modeling & Assessment* 17(5):455-467.
- Zeug, S. C., A. Brodsky, N. Kogut, A. R. Stewart, and J. E. Merz. 2014. Ancient Fish and Recent Invaders: White Sturgeon *Acipenser transmontanus* Diet Response to Invasive-Species-Mediated Changes in a Benthic Prey Assemblage. *Marine Ecology Progress Series* 514:163-174.

- Zeug, S. C. and B. J. Cavallo. 2013. Influence of Estuary Conditions on the Recovery Rate of Coded-Wire-Tagged Chinook Salmon (*Oncorhynchus tshawytscha*) in an Ocean Fishery. *Ecology of Freshwater Fish* 22(1):157-168.
- Zeug, S. C. and B. J. Cavallo. 2014. Controls on the Entrainment of Juvenile Chinook Salmon (*Oncorhynchus tshawytscha*) into Large Water Diversions and Estimates of Population-Level Loss. *PLoS ONE* 9(7):e101479.
- Zeug, S. C., K. Sellheim, C. Watry, J. D. Wikert, and J. Merz. 2014. Response of Juvenile Chinook Salmon to Managed Flow: Lessons Learned from a Population at the Southern Extent of Their Range in North America. *Fisheries Management and Ecology* 21(2):155-168.
- Zielinski, D. P., M. Hondzo, and V. R. Voller. 2014. Mathematical Evaluation of Behavioral Deterrent Systems to Disrupt Fish Movement. *Ecological Modelling* 272:150-159.
- Zimmerman, C. E., G. W. Edwards, and K. Perry. 2008. Maternal Origin and Migratory History of *Oncorhynchus mykiss* Captured in Rivers of the Central Valley, California. Contract P0385300.
- Zimmerman, C. E., G. W. Edwards, and K. Perry. 2008. Maternal Origin and Migratory History of *Oncorhynchus mykiss* Captured in Rivers of the Central Valley, California. U. S. G. Survey and C. D. o. F. a. Game, PO385300.
- Zimmerman, C. E., G. W. Edwards, and K. Perry. 2009. Maternal Origin and Migratory History of Steelhead and Rainbow Trout Captured in Rivers of the Central Valley, California. *Transactions of the American Fisheries Society* 138(2):280-291.
- Zimmermann, A. E. and M. Lapointe. 2005. Intergranular Flow Velocity through Salmonid Redds: Sensitivity to Fines Infiltration from Low Intensity Sediment Transport Events. *River Research and Applications* 21(8):865-881.
- Zoellick, B. W. 1999. Stream Temperatures and the Elevational Distribution of Redband Trout in Southwestern Idaho. *Great Basin Naturalist* 59:136-143.
- Zoellick, B. W. 2004. Density and Biomass of Redband Trout Relative to Stream Shading and Temperature in Southwestern Idaho. *Western North American Naturalist* 64(1):18-26.
- Zydlowski, G. B. and J. R. Johnson. 2002. Response of Bull Trout Fry to Four Types of Water Diversion Screens. *North American Journal of Fisheries Management* 22(4):1276-1282.