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CFS:BULLETIN

Issue 4 – November 2012.   Cutting edge science. Real solutions.

Shade Simulation Models: How Accurate Are They?

Simulation modeling offers an effective means to evaluate the impact of forest management on instream shade, an important factor in fish production. Field studies generally require multiple years of pre- and post-harvest data collection, and findings can be limited to the presciptions employed. Simulation modeling allows us to extend findings from these studies and then evaluate effects over a range of treatments and stand conditions. But are these simulation models reliable? To answer this question, CFS senior scientist Mark Teply and his collaborators conducted a validation of Shade.xls, a shade model commonly used in the Pacific Northwest. Using data from several field studies, they compared shade loss predicted by Shade.xls to actual shade loss and found that crown conditions can have a significant effect on prediction bias [click the graph for a larger view]. Mr. Teply recently submitted a report of his findings to the Idaho Forest Practices Act Advisory Committee [available here as a PDF download]. Look for an upcoming paper on using models to evaluate the effects of forest management on shade in the *Western Journal of Applied Forestry*.
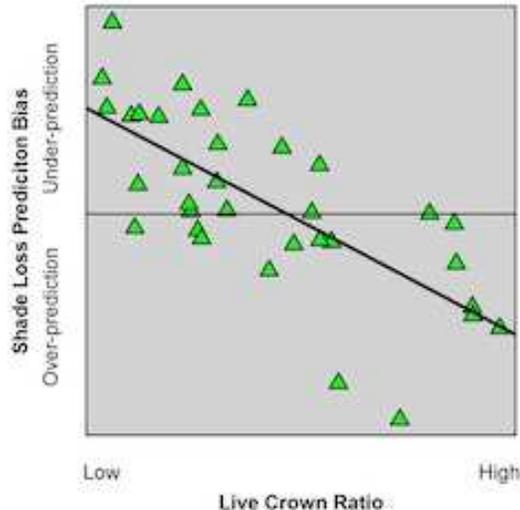
CFS Adds Forest Planning Capabilities

CFS is pleased to announce the addition of Kevin Ceder to our Forests and Fish team in our Lacey, WA office. Kevin is an exceptional Ecosystems Analyst with 10+ years of experience in forest inventory, growth and yield modeling, and forest planning analysis. His skill set complements our fish sciences expertise in helping our clients find efficient solutions to forest management problems when the needs of commodity production and fish conservation intersect. Kevin has worked on projects throughout the Pacific Northwest evaluating timber production and ecosystems services. You can reach Kevin to find out more at 206.963.2029 or at kevin.ceder@fishsciences.net.

What Percentage of Salvaged Winter-Run Chinook Are Really Winter-Run?

CFS scientists gave six presentations and exhibited three posters at the 7th Biennial Bay-Delta Science Conference in Sacramento, California. Among these was a presentation in which CFS scientist Dr. Scott Blankenship reported the preliminary results of a new genetics-based study identifying winter-run Chinook salmon salvaged at the Delta pumping facilities [PDF]:

- Application of Genetic Methods to Salvaged Winter-Run Chinook Salmon by Scott Blankenship.