



State of Idaho

DEPARTMENT OF WATER RESOURCES

322 East Front Street • P.O. Box 83720 • Boise, Idaho 83720-0098

Phone: (208) 287-4800 • Fax: (208) 287-6700 • Web Site: www.idwr.idaho.gov

C. L. "BUTCH" OTTER
Governor

DAVID R. TUTHILL, JR.
Director

February 25, 2009

To the members of the ESHMC:

I appreciate the hard work and significant contributions the modeling committee is making toward updating and improving the ESPA Model. On January 15th, 2009, the committee sent me the following question:

As part of the uncertainty analysis, should the ESHMC address the technical aspects (not policy issues) of a trim line as a function of uncertainty?

Please note that the subject of the trim line was addressed by the Hearing Officer's January 11, 2008 Opinion in the Spring Users case (Blue Lakes Trout Farm, Inc. and Clear Springs Foods, Inc.). The Hearing Officer stated that:

4. It was proper for the Director to determine a margin of error which resulted in the so called "trim line." The 10% margin of error factor assigned by the former Director was not the result of a perfect protocol that might render a different figure or range of figures. No such protocol was in place and there was none forthcoming in a reasonable time when the decisions on the Spring Users' calls had to be made. There is common sense to the 10% error factor assigned by the former Director, based on the assumption that the model cannot be better than the input of a key component. The evidence is clear that the model is not perfect and should have an error factor developed to utilize. It may be simple but true - a 10% factor is closer to accurate than no error factor, once the scientists agree, as they do, that an error factor is desirable. Until a better factor is established, the Director in his best judgment may use 10%. The development of a more scientifically based error factor should be a priority in improvement.

More recently, the trim line was discussed in the Hearing Officer's April 29th, 2008 Opinion in the Surface Water Coalition case:

7. The former Director utilized a 10% margin of error that is appropriate until a more scientifically based margin is established. Development of a more scientifically, peer reviewed, margin should be a priority. Development of the model has not proceeded to the point of establishing a margin of error. Those involved in the development of the model agree that it is not 100% accurate and that it is desirable to determine an error factor. The calls that have been made have necessitated decisions before the next stage in model development. The former Director recognized that there had to be a margin of error in the application of the model and assigned a 10% error factor. This conclusion was based on the fact that the gauges used in water measurement have a plus or minus error factor of 10%. The former Director concluded that the model could be no better than the measuring gauges used and used the 10% margin absent a better figure developed through further testing of the model. No party offered credible evidence of a better margin of error.

Members of ESHMC
Page 2
February 25, 2009

8. The former Director used the 10% margin of error as a trim line, excluding ground water users from curtailment who were in that margin. The purpose of the trim line or clip was to avoid curtailing ground water users who might have no effect on enhancing reach gains. Application of the trim line was proper to avoid a significant probability that curtailment would extend to ground water users who would suffer significantly without contributing water where necessary to remediate the material injury to the surface water users.

Based on these opinions, I believe there is sufficient guidance and a basis for the use of a trim line. The trim line is related to my determination of injury in that it defines users whose contribution to the shortage suffered by a calling party is *de minimus*. However, during the next ESHMC meeting (March 31st – April 1), members of the committee are welcome to bring a write-up and make a 10 to 15 minute presentation regarding the technical aspects of the use of a trim line. The write-ups and meeting minutes will become part of a white paper that is an ESHMC publication similar to the previous white paper on the “ESHMC Member Opinions of the ESPA Model” (January, 2007).

The white paper does not supersede the need for the ESHMC to address uncertainty associated with Version 2.0 of the ESPA Model as it pertains to predictions of river and spring reach gains. The associated level of uncertainty will be most useful in determining where and what type of data to collect to minimize uncertainty in future versions of the ESPA Model. The investigation of uncertainty should be accomplished through regular committee analysis and discussion.

Thank you again for your efforts.

Sincerely,

A handwritten signature in blue ink that reads "David R. Tuthill, Jr." The signature is fluid and cursive, with a large initial "D" and a long, sweeping tail.

David R. Tuthill, Jr.
Director