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**Public Comment from Dan Opdyke, TPWD
For Trinity-San Jacinto Basin and Bay Area Stakeholder Committee
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Two Issues with the BBEST Instream "Flow Regime" High Flow Pulse
Recommendations and Proposals for what to do about them

Issue #1: Using an example HFP recommendation from winter at Oakwood, page 114 of the BBEST report:

This frequency was generated using long-term statistics and should be interpreted using long-term behavior

**Q: 11,200 cfs with
Frequency 1 per season
Volume is 257,289
Duration is 14**

Events that equaled or exceeded this peak flow (Q) have not occurred exactly once every winter season. Some historical winters did not have any such events. Rather, such events occurred on average once every winter season, over the long term, for example, 60 such events in 60 winters. From a statistical perspective, the recommendations should be interpreted similarly. This confusion was caused by a lack of clarity in the textual descriptions of HEFR outputs.

Possible Solution: Interpret pulse recommendations based on long-term behavior. Lack of any one winter to have such a pulse does not constitute failure to meet the recommendation. Possible expedient solution is to determine the historical attainment frequency of meeting the "1 per season" recommendation and base your recommendation on the calculated historical frequency.

Issue #2:

This peak flow has historically been met or exceeded (over the long term) at this frequency.

**Q: 11,200 cfs with
Frequency 1 per season
Volume is 257,289
Duration is 14**

However, such events have not always met or exceeded this volume and duration.

Events that meet or exceed all three criteria (Q, volume, and duration) have occurred less frequently in the historical record than once per season. Thus, this flow regime recommendation, which by implication is based on all three criteria, does not exactly match the historical record. This confusion was caused by poor documentation and will be clarified in future updates. Note also that this high flow pulse recommendation is not intended to specifically characterize an individual historic or future event, indeed, no flow recommendation could.

Possible Solutions: Find historical attainment frequency of either (1) events that meet the peak flow only, or (2) events that meet all three characteristics, and base your recommendation on the calculated historical frequency.