

Draft Individual Review Form

Proposal number: 2001-B201-1

Short Proposal Title: Tuolumne River Restoration

1a) Are the objectives and hypotheses clearly stated?

Provide detailed comments in support of your conclusion

The goals are clear: 1) reduce salmonid predator habitat, 2) reconstruct channel geomorphology, 3) restore native riparian habitat, 4) restore habitat for San Joaquin fall-run chinook. Again, as with other proposals, if this is supposed to come under some scientific review, then there should be at least some minimal attempt to cite past studies of plant or fish restoration. For instance, the assertion that off-channel pits are sites of higher predation due to predatory large-mouth should be justified somehow by a previous study or report. There is not even a Literature Cited section in the proposal.

1b1) Does the conceptual model clearly explain the underlying basis for the proposed work?

Provide detailed comments in support of your conclusion

The conceptual model is stated as a list of project objectives. Nonetheless, the overall model is one in which restoration of the natural channel, isolation of the from deep pools created by aggregate mining, and creation of riparian habitat will all reduced salmon mortality, increase salmon breeding habitat, and create additional riparian corridor habitat for terrestrial species.

1b2) Is the approach well designed and appropriate for meeting the objectives of the project?

Provide detailed comments in support of your conclusion

Much of the proposed work is the physical construction of the channel itself, for which I have no real expertise. The project will literally fill in the deep pools created by mining, rechannel this section of river to create an appropriate riffle-run with riparian terraces for revegetation. I will comment on the consequences of the physical moving of rock and earth. There is little space allotted for details regarding the revegetation procedures and no mention of what will be used for revegetation. Apparently the success of revegetation will be assessed annually and replantings performed. What exactly will be monitored and how it will be monitored is unclear. Also how “success” will be assessed is also uncertain. Presumably the plantings will be the dominant members of the plant assemblage and that invasion of exotics will be minimal.

Fish populations will be monitored, although again, just how this will be done and what will be monitored is unclear. Having read the monitoring elements and budget sheet and the legend in particular, I find that they will use electrofishing, seines, smolt survival, spawning surveys, etc. which lead me to believe that they will be fairly comprehensive in their assessment of the “success” of fish populations.

1c1) Has the applicant justified the selection of research, pilot or demonstration project, or a full-scale implementation project?

Provide detailed comments in support of your conclusion

There is certainly reason enough to proceed with full-scale implementation

1c2) Is the project likely to generate information that can be used to inform future decision making?

Provide detailed comments in support of your conclusion

Yes, assuming that the monitoring is conducted adequately, this should provide a lot of important information regarding restoration of large tributaries and the consequences for salmonids and riparian habitats.

2a) Are the monitoring and information assessment plans adequate to assess the outcome of the project?

Provide detailed comments in support of your conclusion

The details are rather incomplete so it's hard to assess. The consulting firms of McBain and Trush Stillwater Sciences will presumably handle information assessment and monitoring, so I have to trust they do an adequate job.

2b) Are data collection, data management, data analysis, and reporting plans well-described, scientifically sound and adequate to meet the proposed objectives?

Provide detailed comments in support of your conclusion

There is little discussion of the ways in which data will be handled and analyzed, other than all this will be contracted out. Perhaps some more details from the contractor would be helpful. There is little mention of reporting data and availability of project results.

3) Is the proposed work likely to be technically feasible?

Provide detailed comments in support of your conclusion

Aside from the construction portions of the project, for which I cannot adequately comment, the monitoring of fish populations and riparian habitats is very feasible.

4) Is the proposed project team qualified to efficiently and effectively implement the proposed project?

Provide detailed comments in support of your conclusion

The project team, together with the consulting agencies seems to have the needed expertise. Fryer has extensive experience with project management, Ford is an experienced aquatic biologist, and McBain and Trush together with Stillwater have substantial experience with riparian habitats and aquatic systems respectively.

Miscellaneous comments

The integration of project managers and consulting agencies could have been better outlined. Although the appendix has pages listing local landowners and agencies, there is no mention of plans for outreach and dissemination of project results.

**Overall Evaluation
Summary Rating**

- Excellent
- Very Good
- XX Good
- Fair
- Poor

Provide a brief explanation of your summary rating

I think the project would result in important information for future projects involving this kind of river channel restoration. However the usefulness of this project seemed limited by a lack of plans for data management and dissemination, in addition to the limited description of restoration and monitoring activities.

