

COMMENT LETTER 105 - TROUT UNLIMITED-REDWOOD EMPIRE CHAPTER, R. BRIAN HINES (OCTOBER 7, 1996), RECEIVED OCTOBER 7, 1996

Response to Comment 105-1

Comment Summary: The comment states that the Draft EIR/EIS is inadequate in both what was studied and the conclusions that were drawn from those studies.

Specific concerns were expressed in subsequent comments and these comments are addressed specifically in the Responses to Comments below.

Response to Comment 105-2

Comment Summary: The comment states that \$120.00 was too expensive for either the printed document or for the CD.

Refer to Master Response 3, located in Section 6.2 of this document, regarding the cost and availability of the Draft EIR/EIS.

Response to Comment 105-3

Comment Summary: The comment states that the Draft EIR/EIS CD was not available at either the Sonoma County Central Library, or at the Rincon Valley Regional Library, although the City stated that the CD was available at both locations.

Refer to Master Response 3, located in Section 6.2 of this document, regarding the cost and availability of the Draft EIR/EIS.

Response to Comment 105-4

Comment Summary: The comment questions the reasons for charging \$120.00 for the Draft EIR/EIS CD when a blank CD costs \$5 to \$6. The comment then suggests that this pricing may have been an attempt to limit public access.

Refer to Master Response 3, located in Section 6.2 of this document, regarding the cost and availability of the Draft EIR/EIS.

Response to Comment 105-5

Comment Summary: The comment states that an allotted time period of five minutes per person at the Public Hearing was insufficient for the amount of material contained in the Draft EIR/EIS.

The time allotment of five minutes was provided to ensure that all commentators had an opportunity to speak, and in an attempt to be sure that all comments were focused. All commentators were provided the opportunity to submit written comments on the Draft EIR/EIS in addition to voicing their concerns at the public hearing.

Response to Comment 105-6

Comment Summary: This comment states that fishery studies done for the EIR/EIS show that anadromous fish migrate through wastewater discharges, but studies using caged fish exposed to wastewater would show that the fish experienced serious and harmful estrogenic effects.

The issue of estrogenic effects is addressed in the Draft EIR/EIS in Appendix J-2 (Human Health Effects and Wildlife Effects of Environmental Estrogens), and in Master Response 9, located in Section 6.2 of this document. The article by Janet Raloff referenced in the comment provided source material for Appendix J-2. Appendix J-2 explains why the studies in England may not be relevant to Santa Rosa's reclaimed water. The article explains that the compounds likely responsible for the observed abnormalities are nonylphenols, breakdown products of alkylphenol polyethoxylates. As noted on page 2-16 of Appendix J-2 "Concentrations of the alkylphenols in English rivers (where the estrogenic effects of these compounds have been studied most closely) range from 1 to 50 µg/L but may be as high as 1 mg/L (1,000 µg/L) for poor quality streams -- especially downstream from textile mills (Raloff 1994). Concentrations in United States' rivers are believed to be less than 1 µg/L." Analysis for alkylphenols in reclaimed water found no detectable quantities, but there are no established detection limits for these compounds. Refer also to Response to Comment 85-401.

Response to Comment 105-7

Comment Summary: The comment expresses the opinion that exposing caged fish in the wastewater outfall is the only legitimate way to determine the effects of wastewater on anadromous salmonids.

Intercepting salmonids from the spawning run and exposing them in cages to the wastewater outfall would be technically very difficult to accomplish, and still would not provide assurance of successful completion of the other parts of the life cycle, such as spawning success, rearing, juvenile growth and survivorship, and smoltification. Refer to Response to Comment 85-401.

Response to Comment 105-8

Comment Summary: This comment states that Draft EIR/EIS fishery studies do not support the conclusion that Laguna discharges will not have a significant impact on steelhead and coho salmon.

Conclusions drawn from the EIR/EIS fishery studies are presented on page 78 in Appendix L-1 (Anadromous Fish Migration Study Program 1991-1994), and summarized in Response to Comment 85-326.

Response to Comment 105-9

Comment Summary: This comment criticizes the EIR/EIS for not including studies of estrogenic effects of Santa Rosa wastewater

The subject of estrogenic effects is discussed in Master Response 9, located in Section 6.2 of this document. Also, refer to Response to Comment 105-6.

Response to Comment 105-10

Comment Summary: This comment states that turbidity effects on salmonids are understated by the Draft EIR/EIS, that turbidity in the Laguna is unusually high, and that it is caused by the reclaimed water discharge.

Laguna turbidity is just as high in summer, when no reclaimed water is being discharged, as in winter. This suggests that factors other than reclaimed water discharge (such as erosion in winter and bottom-feeding carp in summer) have a strong influence on turbidity. Refer to Table 6 in Appendix I-4 (Laguna de Santa Rosa Water Quality Monitoring Results) of the Draft EIR/EIS. The impact of the Project on turbidity is evaluated on page 4.6-120 of the Draft EIR/EIS; and also on page 53 in Appendix I-16 (Water Quality Impact Analysis Report Volume I - Text) of the Draft EIR/EIS.

Response to Comment 105-11

Comment Summary: This comment states that the confluence of the Laguna with the Russian River is more turbid than other nearby confluences, such as Austin Creek.

The comment presents no evidence of a claim of increased turbidity. Refer to the Responses to Comments 85-106 and 105-10.

Response to Comment 105-12

Comment Summary: This comment continues discussion of sedimentation/turbidity effects on salmonids, and includes a quotation from a NMFS report on west coast steelhead.

The EIR/EIS authors do not disagree with the stated importance of sedimentation and turbidity on salmonids, but reclaimed water discharges have not been shown to be the cause of the high turbidity in the Laguna de Santa Rosa. Refer to Response to Comment 105-10.

Response to Comment 105-13

Comment Summary: This comment states that the contribution of the current Santa Rosa discharge to the turbidity in the Laguna is environmentally unacceptable, and that increasing the discharge would be even worse.

Refer to the Responses to Comments 105-10 and 105-12.

Response to Comment 105-14

Comment Summary: This comment summarizes comments 105-6 through 105-13 by stating that discharge Alternative 5 is unacceptable because studies of caged fish in the outfall were not included, and because excess turbidity is caused by Santa Rosa's discharges

Refer to Master Response 2, located in Section 6.2 of this document regarding Project selection. Refer also to Responses to Comments 105-7 and 105-12.

Response to Comment 105-15

Comment Summary: The comment states the Draft EIR/EIS has undervalued the damage that Alternative 5 would have to salmonid species in the Laguna or Russian River that are proposed for threatened or endangered listing, so it has not properly compared the cost with other non-discharge options. The comment also states that the study has improperly externalized the cost of the disposal alternative onto the fish which pay for it with extinction of their species, and the winter sport fishing/tourist industry in the Russian River area.

Based on the anadromous fish migration study program, it was determined that increased discharge to the Russian River will not significantly impact the salmonid fishery of the Russian River. Refer to Appendices L-1 (Anadromous Fish Migration Study Program 1991-1994) and L-2 (Anadromous Fish Migration Study Program 1991-1995) of the Draft EIR/EIS. Page 46 of Appendix L-2 states that upmigrating steelhead adults do not appear to be affected by reclaimed water in the migration corridor. No evidence has been found to support the hypothesis that the presence of reclaimed water in the migration corridor has any impact on homing behavior or movements of steelhead. Consequently, from a biological view, there will be no impact to the Russian River winter sport fishing industry. Also, refer to Master Response 7, located in Section 6.2 of this document, regarding the Russian River tourism industry.

Response to Comment 105-16

Comment Summary: The comment states that the cost of the discharge option on the Russian River tourism economy was the subject of testimony by the Guerneville Chamber of Commerce at the September 24, 1996 Public Hearing. A study released by the Sonoma County Water Agency, "A History of the Salmonid decline in the Russian River" describes the Historic Russian River salmonid economy. The health of the Economy thrived on the sport of fishing activity. The referenced study was not attached to the comment.

Refer to Master Response 7, located in Section 6.2 of this document, regarding the Russian River tourism industry. The EIR/EIS authors are not aware of any information,

much less any documented study that attributes the salmonid decline to wastewater discharge.

Response to Comment 105-17

Comment Summary: The comment states that the Draft EIR/EIS is inadequate since it does not give proper consideration to the proposed increased diversions from the Russian River described in the Sonoma County Water Agency's Water Supply and Transmission System Project Draft EIR. The comment indicates that since the Sonoma County Water Agency is proposing to increase diversions from the Russian River by approximately the same annual amount that the City of Santa Rosa is seeking to dispose of each year, the need to reuse Santa Rosa's treated wastewater could not be more clear.

As stated on page 4.6-133 of the Draft EIR/EIS, "the River flows used to estimate Subregional System Project effects are based on Sonoma County Water Agency estimate of future diversions." All analyses thus considered the effect of the proposed diversions.

Response to Comment 105-18

Comment Summary: The comment summarizes the comment letter by stating that the Draft EIR/EIS is inadequate due to the lack of legitimate studies on fish species that have pending threatened or endangered status, and the devaluation of the reuse of wastewater as an important resource for Sonoma County. Additionally, the comment states that the choice of Alternative 5 as the Environmentally Superior Alternative in the Draft EIR/EIS is flawed.

Potential impacts to fish species that have pending threatened or endangered status (steelhead and Coho salmon) were analyzed based on their status (i.e., proposed endangered and proposed threatened) at the time the Draft EIR/EIS was circulated for public review. This analysis can be found in Chapter 4.9. Study methodologies and results for aquatic resources can be found in Appendix L-7, (Aquatic Biological Resources Impacts Analysis Report) of the Draft EIR/EIS. Additionally, refer to Master Response 12, located in Section 6.2 of this document, which deals with the current status of steelhead trout.

The Draft EIR/EIS has not devalued the reuse of wastewater as an important resource for Sonoma County. The Draft EIR/EIS has discussed the reuse of wastewater in detail, and reuse is a major component of Alternatives 2, 3 and 4 (pages 1-19 through 1-21 of the Draft EIR/EIS). Further discussion of reuse can be found in the Summary of Project Objectives on page 1-3; and on pages 3.1-24 through 3.1-26; and pages 3.3-4 through 3.3-40 of the Draft EIR/EIS.

The reasons for the choice of the environmentally superior alternative are provided starting on page 5-22 of the Draft EIR/EIS. The Draft EIR/EIS has evaluated discharge to the Russian River, and has found that discharge has fewer impacts than any other alternative. Section 4.7 of the Draft EIR/EIS concluded that "Direct discharge of

reclaimed water into the Laguna de Santa Rosa or the Russian River will not adversely affect water quality at drinking water sources and would not adversely affect human health via other potential exposure pathways" (see page 4.7-61). Section 4.6 found significant unavoidable impacts to conductivity, dissolved oxygen, and biostimulatory substances in the Russian River (see page 4.6-150). However, with implementation of cumulative projects to reduce nutrient inputs to the Laguna, and with mitigation proposed for Project impacts, analysis concluded that 20% design discharge to the Laguna could be implemented without significant water quality impacts.

Response to Comment 105-19

Comment Summary: The comment is an article submitted by the commentor as support for comments 105-6 through 105-9.

Refer to Response to Comment 105-6 for a discussion of the article.