

CH2M HILL Comments on Headwaters to Ocean (H2O) – listed in order of location in the document, with the most significant 3 highlighted. Submitted by Bob Fuller, P.E., CH2M HILL, Vice President and Sr.Consultant

1) Recommendation: Recognize and add “economic development” as a third “pressure”, p. 1, para 3.

Rationale: Economic development is a 3rd “increasing pressure”, which to some extent is linked to population growth, but has broader effects (e.g water quantity and quality will be needed for energy generation including renewables). If left out, future government planning won’t take it into account, to the chagrin of all our municipal clients.

2) Recommendation: Recognize the current uncertainty surrounding Oregon water management due to lack of data, and the future increase in uncertainty due to climate change. Can be done by adding a paragraph that shows intent to address, p. 1, between para 3 and 4.

Rationale: If the State thinks they are going to address this uncertainty PURELY through data collection, that will be a major burden to our clients, ratepayers, and tax payers – since given the increased variability, there will never be sufficient data collected. Rather, this calls for a different approach, which affects how planning is done for all projects. We would hope that the research and planning allotment under “Ecosystem Benefits” will consider new approaches.....

3) Recommendation: Recognize the broad base of water users and values equitably, by eliminating either “environment and ecosystems” or “fish and wildlife”, p. 1, para 5.

Rationale: These 2 categories are largely redundant and imply greater weight due to this redundancy than is reflected in proposed allocation of state resources and attention. There needs to be a balanced assessment of the all values statewide and within access basins.

4) Recommendation: Recognize that there are water storage capabilities and quality effects that fall into “other subsurface flow and storage systems”, by adding to p. 2, para 1, “Geographic Focus” statement. Also add “estuaries and marine shorelines” to the statement.

Rationale: The complexity of the “underground aquifer” system and option needs to be recognized. There are benefits a-plenty to water temperature and quality from subsurface flows, that haven’t yet been considered in Oregon relative to water supply and in-stream flow. There isn’t a need to complicate this too much at this point, but the interplay should be fully recognized as a continuum rather than slotted categories – and we believe that is the intent of this paragraph but we don’t think it got there. Also, there is funding for estuaries and shorelines included but they aren’t clearly identified as part of the geographic focus other than the statement “territorial sea”, which begs the question of whether only current freshwater is being considered; they are identified elsewhere

5) Recommendation: Recognize that the section said to be identifying “challenges” is indeed identifying the states “objectives”, and change the title accordingly p. 2, para 2.

Rationale: There are many challenges that aren’t included in this list that are significant. The State can’t address all challenges and must narrow to objectives, particularly in the first biennium of a 10-year effort. Hence the need for the title change.

6) Recommendation: Add 2 objectives that are otherwise left out, as bolded bullet sections, p. 2:

a. Conservation, Efficiency, and Reuse

Promote application of these principles on all state-funded projects

Provide incentives for non-state funded projects to apply these principles and make these investments

Facilitate partnerships to foster cost-effective collaborations for efficiency and reuse

Identify water market values and fluctuations, and their impact on conservation, efficiency, and reuse

b. Infrastructure Life Cycle Investment Requirements

Identify where proposed projects may help update or obviate the need for fixing failing or high maintenance infrastructure

Address backlog or maintenance and replacement needs for existing systems

Facilitate partner collaborations and efficiencies to minimize life cycle costs

Ensure financial planning for life cycle costs

Rationale: If these elements aren't elevated, they will drop out of both the near term and long term programs. Also, they go beyond simple title changes, to the core of the strategy.

7) Recommendation: Separate "Administrative" as a separate section titled "Administrative Objectives to Achieve Water Resources Management Objectives", at same level as "Guiding Principles" section.

Rationale: While the "Administrative" bullet section may be an objective of the agencies and the Governor's Office, its elements are **not** strategic and they provide value only in so much as they ensure accomplishment of the Water Resource Management Objectives. It is essential to keep the attention on the outcomes and not the mechanisms.

8) Recommendation: Change the strategic emphasis from "water storage and supply" projects to "water management" projects, p. 3 para 4 bullet 2.

Rationale: There are better and more innovative solutions than "storage and supply" in many basins, and the solutions should not be dictated in the strategy – rather, consideration of a broad set of solutions should be encouraged. Also, there are projects that will be needed in association with storage and supply, such as conveyance and water quality, that aren't otherwise addressed. Keep the options open.

9) Recommendation: Change the strategic emphasis from "balancing beneficial uses of water with need for water to provide ecosystem benefits" to "Align investments in water management with statewide and basin values for each long term beneficial use", p. 3 para 4 bullet 3.

Rationale: "Ecosystem benefits" are a kind of "beneficial use" – there isn't a need to single this one out but it needs to be on the same level starting out as each of the other beneficial uses. Rather there is considerable need to align investment by all parties with basin and state wide values.

10) Recommendation: Delete "that include", p. 3 para 5.

Rationale: Current wording implies that there might be more program areas.

11) Recommendation: Change wording to "Facilitate partnerships across all levels and parties, whose goals are in alignment with sustainable water resource management", p. 3 para 5 bullet 2.

Rationale: The strategy is broader than funding anyone with a hand out.

12) Recommendation: Change wording to "Making consistent critical capital investments", p. 3 para 5 bullet 3.

Rationale: “Strategic” doesn’t give needed information. Capital investments by the state need to be those that fit a well-thought out, vetted, and adopted set of criteria.

13) Recommendation: Funding changes need to include at least \$10M specifically for reuse, conservation, and efficiency projects OR these need to be built in as requirements for all partners support and capital projects (program areas 2 and 3). Pp 4 & 5.

Rationale: Reuse, conservation, and efficiency gains must begin to be build into water management systems now, for the meager increases in accessible, deliverable water to meet current and future needs.

14) Recommendation: Capital investment to address minimum in-stream flow should be allocated to comprehensive solutions that include water rights purchases along with other basin-appropriate approaches. P5.

Rationale: The issue has and needs funding for a varied solution set – one size does not fit all.