

Response to Comments – April 19, 2011

Lake Tahoe TMDL for Sediment and Nutrients

(Comment deadline 12 noon March 18, 2011)

6. City of South Lake Tahoe

Note: These Responses commonly reference previous Response to Comments from the Lahontan Water Board, which can be found at http://www.waterboards.ca.gov/lahontan/water_issues/programs/tmdl/lake_tahoe/respnse_comments091310.shtm

(If printing Response to Comments, please print double-sided for best viewing)

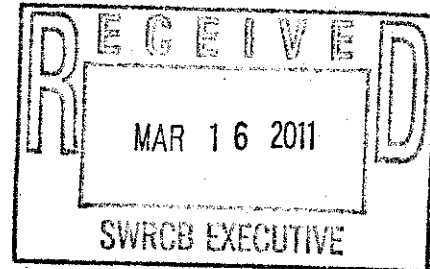


City of South Lake Tahoe

"making a positive difference now"

March 15, 2011

Jeanine Townsend, Clerk to the Board
State Water Resources Control Board
PO Box 100
Sacramento, CA 95812-2000
commentletters@waterboards.ca.gov



Re: Comment Letter – Lake Tahoe TMDL

Dear Madam Clerk,

Preservation of Lake Tahoe and its Basin is a paramount concern for the City of South Lake Tahoe ("City") and its residents. As the only municipal government entity in the Basin, we feel keenly the burden and benefits of our duty as a steward of the Lake environs.

The work of the Lahontan Regional Water Quality Control Board's ("Lahontan") staff on the TMDL is greatly appreciated as a forward step in improving the process and standard for measuring the success of our restoration efforts. However, when reviewing the proposed regulations, we believe that there is still work to be done in certain areas to achieve a balanced implementation of the TMDL standard.

For that reason, the City respectfully requests that the State Water Resources Control Board's comment period on Lahontan's Basin Plan Amendments be extended for a period of six weeks to May 2, 2011 to allow for dialogue between City staff and Lahontan regarding implementation of the TMDL. We are unaware of any funding or statutory requirements that would preclude approval of this request. During the extended comments period, the City plans to specifically address:

- Establishing a balanced multi-pronged approach to Lake preservation which prioritizes near-shore protections in the TMDL. Such prioritization is vital to ensuring the environmental and economic health of South Lake Tahoe.
- Threshold attainment. The City contends that as currently written the thresholds create unfunded mandates that unduly burden the City because of its unique position as the Basin's only municipal agency. We believe a more balanced threshold plan can be implemented which will meet these goals.

This letter sets forth our position with respect to these areas of concern. In the coming weeks, the City plans to meet with Lahontan staff in order to articulate and address these concerns. At that point, we plan to submit a revised comment letter proposing more specific solutions to these issues.

Comment

Response

Public Comment
Lake Tahoe TMDL
Deadline: 3/18/11 by 12 noon

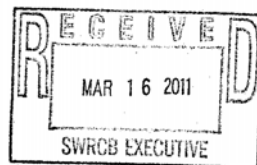


City of South Lake Tahoe

"making a positive difference now"

March 15, 2011

Jeanine Townsend, Clerk to the Board
State Water Resources Control Board
PO Box 100
Sacramento, CA 95812-2000
commentletters@waterboards.ca.gov



Re: Comment Letter – Lake Tahoe TMDL

Dear Madam Clerk,

Preservation of Lake Tahoe and its Basin is a paramount concern for the City of South Lake Tahoe ("City") and its residents. As the only municipal government entity in the Basin, we feel keenly the burden and benefits of our duty as a steward of the Lake environs.

The work of the Lahontan Regional Water Quality Control Board's ("Lahontan") staff on the TMDL is greatly appreciated as a forward step in improving the process and standard for measuring the success of our restoration efforts. However, when reviewing the proposed regulations, we believe that there is still work to be done in certain areas to achieve a balanced implementation of the TMDL standard.

For that reason, the City respectfully requests that the State Water Resources Control Board's comment period on Lahontan's Basin Plan Amendments be extended for a period of six weeks to May 2, 2011 to allow for dialogue between City staff and Lahontan regarding implementation of the TMDL. We are unaware of any funding or statutory requirements that would preclude approval of this request. During the extended comments period, the City plans to specifically address:

- Establishing a balanced multi-pronged approach to Lake preservation which prioritizes near-shore protections in the TMDL. Such prioritization is vital to ensuring the environmental and economic health of South Lake Tahoe.
- Threshold attainment. The City contends that as currently written the thresholds create unfunded mandates that unduly burden the City because of its unique position as the Basin's only municipal agency. We believe a more balanced threshold plan can be implemented which will meet these goals.

This letter sets forth our position with respect to these areas of concern. In the coming weeks, the City plans to meet with Lahontan staff in order to articulate and address these concerns. At that point, we plan to submit a revised comment letter proposing more specific solutions to these issues.

CSLT(StBd)-1: The Clerk to the State Water Resources Control Board informed Mr. Robert Erlich of the City of South Lake Tahoe, in an email dated March 24, 2011, that the extension request has been denied.

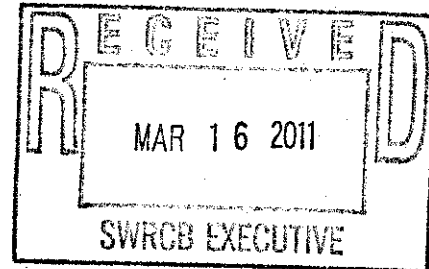


City of South Lake Tahoe

"making a positive difference now"

March 15, 2011

Jeanine Townsend, Clerk to the Board
State Water Resources Control Board
PO Box 100
Sacramento, CA 95812-2000
commentletters@waterboards.ca.gov



Re: Comment Letter – Lake Tahoe TMDL

Dear Madam Clerk,

Preservation of Lake Tahoe and its Basin is a paramount concern for the City of South Lake Tahoe ("City") and its residents. As the only municipal government entity in the Basin, we feel keenly the burden and benefits of our duty as a steward of the Lake environs.

The work of the Lahontan Regional Water Quality Control Board's ("Lahontan") staff on the TMDL is greatly appreciated as a forward step in improving the process and standard for measuring the success of our restoration efforts. However, when reviewing the proposed regulations, we believe that there is still work to be done in certain areas to achieve a balanced implementation of the TMDL standard.

For that reason, the City respectfully requests that the State Water Resources Control Board's comment period on Lahontan's Basin Plan Amendments be extended for a period of six weeks to May 2, 2011 to allow for dialogue between City staff and Lahontan regarding implementation of the TMDL. We are unaware of any funding or statutory requirements that would preclude approval of this request. During the extended comments period, the City plans to specifically address:

- Establishing a balanced multi-pronged approach to Lake preservation which prioritizes near-shore protections in the TMDL. Such prioritization is vital to ensuring the environmental and economic health of South Lake Tahoe.
- Threshold attainment. The City contends that as currently written the thresholds create unfunded mandates that unduly burden the City because of its unique position as the Basin's only municipal agency. We believe a more balanced threshold plan can be implemented which will meet these goals.

This letter sets forth our position with respect to these areas of concern. In the coming weeks, the City plans to meet with Lahontan staff in order to articulate and address these concerns. At that point, we plan to submit a revised comment letter proposing more specific solutions to these issues.

Comment

Public Comment
Lake Tahoe TMDL
Deadline: 3/18/11 by 12 noon

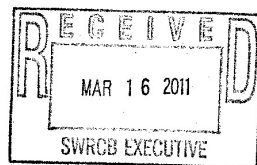


City of South Lake Tahoe

"making a positive difference now"

March 15, 2011

Jeanine Townsend, Clerk to the Board
State Water Resources Control Board
PO Box 100
Sacramento, CA 95812-2000
commentletters@waterboards.ca.gov



Re: Comment Letter – Lake Tahoe TMDL

Dear Madam Clerk,

Preservation of Lake Tahoe and its Basin is a paramount concern for the City of South Lake Tahoe ("City") and its residents. As the only municipal government entity in the Basin, we feel keenly the burden and benefits of our duty as a steward of the Lake environs.

The work of the Lahontan Regional Water Quality Control Board's ("Lahontan") staff on the TMDL is greatly appreciated as a forward step in improving the process and standard for measuring the success of our restoration efforts. However, when reviewing the proposed regulations, we believe that there is still work to be done in certain areas to achieve a balanced implementation of the TMDL standard.

For that reason, the City respectfully requests that the State Water Resources Control Board's comment period on Lahontan's Basin Plan Amendments be extended for a period of six weeks to May 2, 2011 to allow for dialogue between City staff and Lahontan regarding implementation of the TMDL. We are unaware of any funding or statutory requirements that would preclude approval of this request. During the extended comments period, the City plans to specifically address:

- Establishing a balanced multi-pronged approach to Lake preservation which prioritizes near-shore protections in the TMDL. Such prioritization is vital to ensuring the environmental and economic health of South Lake Tahoe.
- Threshold attainment. The City contends that as currently written the thresholds create unfunded mandates that unduly burden the City because of its unique position as the Basin's only municipal agency. We believe a more balanced threshold plan can be implemented which will meet these goals.

This letter sets forth our position with respect to these areas of concern. In the coming weeks, the City plans to meet with Lahontan staff in order to articulate and address these concerns. At that point, we plan to submit a revised comment letter proposing more specific solutions to these issues.

City Council • Administrative Center • 1901 Airport Rd. Ste. 206 • South Lake Tahoe, CA 96150-7004 • (530) 542-6000 • (530) 542-7411 FAX

Response

CSLT(StBd)-2: The Lahontan Water Board has committed to addressing nearshore water quality concerns. Actions taken to reduce the discharge of pollutants affecting deep water transparency decline are expected to improve nearshore water quality as well. Specifically, stormwater controls such as infiltration facilities, improved abrasive applications methods, and enhanced abrasive removal practices that target fine sediment particle removal will also effectively reduce turbidity and total phosphorus discharges to nearshore areas.

Lahontan Water Board staff are working with researchers and agency partners to develop more appropriate standards and indicators for nearshore water quality and will take needed steps to adopt new standards and any additional implementation measures into the Basin Plan. Lahontan Water Board staff have compiled a list of research, monitoring, and policy efforts that have recently been completed or are underway to address nearshore issues. This list is attached at the end of this Response to Comments, following response CSLT(StBd)-8.

The deep water transparency standard is the primary water quality objective and threshold to be attained by adoption and implementation of this TMDL. The Lake Tahoe TMDL and associated load reduction requirements are plans for achieving the transparency standard and are not environmental thresholds. The Tahoe Regional Planning Agency is responsible for establishing and attaining the deep water transparency threshold in the Lake Tahoe basin. Although the City of South Lake Tahoe is the only incorporated city within the Lake Tahoe basin, the City is not the Basin's only "municipal agency". The Lahontan Water Board regulates the City of South Lake Tahoe, El Dorado County, Placer County, and the California Department of Transportation under the National Pollutant Discharge Elimination System Municipal Stormwater program. The TMDL does not place any undue burden on any one given municipality, but rather requires equivalent percent load reduction requirements from all urban stormwater dischargers.

The Lahontan Water Board responded to the City's previous comments regarding the belief that TMDL implementation constitutes an unfunded state mandate – please refer to previous response CSLT-41. The Lake Tahoe TMDL was developed pursuant to Federal Clean Water Act requirements. The development of the TMDL is a federal mandate, and thus requirements for its implementation would not likely be considered an unfunded state mandate. A TMDL or basin plan amendment is not self-implementing. Such policies are implemented through waste discharge requirements and permits. Specific permit conditions may or may not be considered "unfunded mandates".

Economic Impact of TMDL Implementation

The Basin Plan Amendments require permittees/implementers to submit a Pollution Load Reduction Plan and complete a jurisdiction-specific 2004 baseline load estimate for fine sediment particles, phosphorus, and nitrogen. The Lake Tahoe TMDL's annual pollutant load reduction milestones will then be included in the municipal stormwater permit that Lahontan is expected to consider later this year.

While the City recognizes the benefits of the TMDL and Lahontan's Basin Plan Amendment, the City is simply not in the position to fund the extraordinary cost that will be incurred in implementing the Plan. The City is concerned by the lack of provisions in the Plan projecting the future costs to local jurisdictions subject to the TMDL. Because of the lack of clarity regarding projected costs of TMDL implementation in Lake Tahoe, the City has no indication of, or ability to accurately budget for implementation costs.

When the City commented on Lahontan's TMDL Substitute Environmental Document, the City expressed serious concern over the fact that it may not be able to fund the TMDL while still providing critical public services to the City's residents. The City also suggested that the Economic Considerations section should discuss options to modify load reduction milestones if availability of funding limits the implementers' ability to achieve the required pollutant load reduction. Lahontan's response to the City's comments indicated that these concerns were too speculative to be addressed in the Substitute Environmental Document. However, Lahontan did amend the TMDL prior to adoption to include language stating: "Should funding and implementation constraints impact the ability to meet load reduction milestones, the Regional Board will consider amending the implementation and load reduction schedules."

One of the Lake Tahoe TMDL's scientific peer reviewers, Professor Lewis, had concerns about the "enormous cost" of the implementation phase, and recommended "outlining the results that could be obtained for expenditures of 50 percent or 25 percent of the proposed expenditure." Professor Lewis also noted that it is "necessary that any evidence of failure in a specific control strategy lead to the cessation and reformulation of the control strategy, rather than inertial continuation of expenditures on an ineffective strategy. Projects such as this often founder on the inflexibility of the action plan once implementation begins."

The City believes it is vitally important that the State Board and Lahontan provide some direction as to a funding strategy and implementation plan so that local jurisdictions are better able, in difficult financial times, to assess and budget for the costs associated with implementation of the TMDL.

Near-Shore Water Quality and Aesthetics in Lake Tahoe

For almost a decade, the City has worked with various environmental organizations around Lake Tahoe to determine a reasonable and obtainable measure and plan to preserve and restore Lake Tahoe's famed water clarity. In the interim, the Lake has seen increased algal growth, invasive species, and a rise in water temperatures, all of which are likely contributors to near-shore water

Comment

CSLT TMDL Position Paper
Page 2 of 4

Economic Impact of TMDL Implementation

The Basin Plan Amendments require permittees/implementers to submit a Pollution Load Reduction Plan and complete a jurisdiction-specific 2004 baseline load estimate for fine sediment particles, phosphorus, and nitrogen. The Lake Tahoe TMDL's annual pollutant load reduction milestones will then be included in the municipal stormwater permit that Lahontan is expected to consider later this year.

While the City recognizes the benefits of the TMDL and Lahontan's Basin Plan Amendment, the City is simply not in the position to fund the extraordinary cost that will be incurred in implementing the Plan. The City is concerned by the lack of provisions in the Plan projecting the future costs to local jurisdictions subject to the TMDL. Because of the lack of clarity regarding projected costs of TMDL implementation in Lake Tahoe, the City has no indication of, or ability to accurately budget for implementation costs.

When the City commented on Lahontan's TMDL Substitute Environmental Document, the City expressed serious concern over the fact that it may not be able to fund the TMDL while still providing critical public services to the City's residents. The City also suggested that the Economic Considerations section should discuss options to modify load reduction milestones if availability of funding limits the implementers' ability to achieve the required pollutant load reduction. Lahontan's response to the City's comments indicated that these concerns were too speculative to be addressed in the Substitute Environmental Document. However, Lahontan did amend the TMDL prior to adoption to include language stating: "Should funding and implementation constraints impact the ability to meet load reduction milestones, the Regional Board will consider amending the implementation and load reduction schedules."

One of the Lake Tahoe TMDL's scientific peer reviewers, Professor Lewis, had concerns about the "enormous cost" of the implementation phase, and recommended "outlining the results that could be obtained for expenditures of 50 percent or 25 percent of the proposed expenditure." Professor Lewis also noted that it is "necessary that any evidence of failure in a specific control strategy lead to the cessation and reformulation of the control strategy, rather than inertial continuation of expenditures on an ineffective strategy. Projects such as this often founder on the inflexibility of the action plan once implementation begins."

The City believes it is vitally important that the State Board and Lahontan provide some direction as to a funding strategy and implementation plan so that local jurisdictions are better able, in difficult financial times, to assess and budget for the costs associated with implementation of the TMDL.

Near-Shore Water Quality and Aesthetics in Lake Tahoe

For almost a decade, the City has worked with various environmental organizations around Lake Tahoe to determine a reasonable and obtainable measure and plan to preserve and restore Lake Tahoe's famed water clarity. In the interim, the Lake has seen increased algal growth, invasive species, and a rise in water temperatures, all of which are likely contributors to near-shore water

Response

CSLT(StBd)-3: This is not a new comment and the City raised this comment about cost in its November 15, 2010 letter to the Lahontan Water Board. At the November 16, 2010 Lahontan Water Board hearing, the City reiterated this comment during the oral public testimony period and the Lahontan Water Board considered the City's comments in its decision. As suggested by the City during the oral public testimony at the hearing, the Lahontan Water Board changed "may" to "will" in the following sentence of the Basin Plan Amendment text, "*Should funding and implementation constraints impact the ability to meet load reduction milestones the Regional Board ~~may~~ will consider amending the implementation and load reduction schedules*". In the City's September 13, 2010 comment letter, the City supports the approach in the TMDL which allows municipal stormwater permittee flexibility in prioritizing load reduction actions. As explained in response **CSLT(StBd)-4**, below, the actual cost cannot be estimated until the City completes its Pollutant Load Reduction Plan and prioritizes its actions.

CSLT(StBd)-4: This is the same comment the City submitted in its November 2, 2010 letter to the Lahontan Water Board. Previous response CLST-38 directly responds to the comment. Also, the Administrative Record contains Appendix B which has the Lahontan Water Board responses to scientific peer review comments. In Appendix B, response WL-42 is a direct response to Professor Lewis's peer review comment the City cites, and that response is reproduced in entirety, below:

WL-42: The Water Board and NDEP estimate that the resources necessary to achieve required load reductions from the urban uplands will be roughly \$100 Million per year for the next fifteen years. While the Water Board and NDEP acknowledge the challenge of dedicating such resources in the current economic climate, the magnitude of the commitment is similar to the amount spent during the past ten years of erosion control, stormwater treatment, and restoration efforts in the Tahoe Basin. The TMDL Implementation Plan requires each implementer to assess its baseline load and devise its own pollutant load reduction strategy to meet the load reduction requirements. Therefore, each implementer can weigh cost as a factor when choosing its load reduction actions for each year.

Economic Impact of TMDL Implementation

The Basin Plan Amendments require permittees/implementers to submit a Pollution Load Reduction Plan and complete a jurisdiction-specific 2004 baseline load estimate for fine sediment particles, phosphorus, and nitrogen. The Lake Tahoe TMDL's annual pollutant load reduction milestones will then be included in the municipal stormwater permit that Lahontan is expected to consider later this year.

While the City recognizes the benefits of the TMDL and Lahontan's Basin Plan Amendment, the City is simply not in the position to fund the extraordinary cost that will be incurred in implementing the Plan. The City is concerned by the lack of provisions in the Plan projecting the future costs to local jurisdictions subject to the TMDL. Because of the lack of clarity regarding projected costs of TMDL implementation in Lake Tahoe, the City has no indication of, or ability to accurately budget for implementation costs.

When the City commented on Lahontan's TMDL Substitute Environmental Document, the City expressed serious concern over the fact that it may not be able to fund the TMDL while still providing critical public services to the City's residents. The City also suggested that the Economic Considerations section should discuss options to modify load reduction milestones if availability of funding limits the implementers' ability to achieve the required pollutant load reduction. Lahontan's response to the City's comments indicated that these concerns were too speculative to be addressed in the Substitute Environmental Document. However, Lahontan did amend the TMDL prior to adoption to include language stating: "Should funding and implementation constraints impact the ability to meet load reduction milestones, the Regional Board will consider amending the implementation and load reduction schedules."

One of the Lake Tahoe TMDL's scientific peer reviewers, Professor Lewis, had concerns about the "enormous cost" of the implementation phase, and recommended "outlining the results that could be obtained for expenditures of 50 percent or 25 percent of the proposed expenditure." Professor Lewis also noted that it is "necessary that any evidence of failure in a specific control strategy lead to the cessation and reformulation of the control strategy, rather than inertial continuation of expenditures on an ineffective strategy. Projects such as this often founder on the inflexibility of the action plan once implementation begins."

The City believes it is vitally important that the State Board and Lahontan provide some direction as to a funding strategy and implementation plan so that local jurisdictions are better able, in difficult financial times, to assess and budget for the costs associated with implementation of the TMDL.

Near-Shore Water Quality and Aesthetics in Lake Tahoe

For almost a decade, the City has worked with various environmental organizations around Lake Tahoe to determine a reasonable and obtainable measure and plan to preserve and restore Lake Tahoe's famed water clarity. In the interim, the Lake has seen increased algal growth, invasive species, and a rise in water temperatures, all of which are likely contributors to near-shore water

Comment

CSLT TMDL Position Paper
Page 2 of 4

Economic Impact of TMDL Implementation

The Basin Plan Amendments require permittees/implementers to submit a Pollution Load Reduction Plan and complete a jurisdiction-specific 2004 baseline load estimate for fine sediment particles, phosphorus, and nitrogen. The Lake Tahoe TMDL's annual pollutant load reduction milestones will then be included in the municipal stormwater permit that Lahontan is expected to consider later this year.

While the City recognizes the benefits of the TMDL and Lahontan's Basin Plan Amendment, the City is simply not in the position to fund the extraordinary cost that will be incurred in implementing the Plan. The City is concerned by the lack of provisions in the Plan projecting the future costs to local jurisdictions subject to the TMDL. Because of the lack of clarity regarding projected costs of TMDL implementation in Lake Tahoe, the City has no indication of, or ability to accurately budget for implementation costs.

When the City commented on Lahontan's TMDL Substitute Environmental Document, the City expressed serious concern over the fact that it may not be able to fund the TMDL while still providing critical public services to the City's residents. The City also suggested that the Economic Considerations section should discuss options to modify load reduction milestones if availability of funding limits the implementers' ability to achieve the required pollutant load reduction. Lahontan's response to the City's comments indicated that these concerns were too speculative to be addressed in the Substitute Environmental Document. However, Lahontan did amend the TMDL prior to adoption to include language stating: "Should funding and implementation constraints impact the ability to meet load reduction milestones, the Regional Board will consider amending the implementation and load reduction schedules."

One of the Lake Tahoe TMDL's scientific peer reviewers, Professor Lewis, had concerns about the "enormous cost" of the implementation phase, and recommended "outlining the results that could be obtained for expenditures of 50 percent or 25 percent of the proposed expenditure." Professor Lewis also noted that it is "necessary that any evidence of failure in a specific control strategy lead to the cessation and reformulation of the control strategy, rather than inertial continuation of expenditures on an ineffective strategy. Projects such as this often founder on the inflexibility of the action plan once implementation begins."

The City believes it is vitally important that the State Board and Lahontan provide some direction as to a funding strategy and implementation plan so that local jurisdictions are better able, in difficult financial times, to assess and budget for the costs associated with implementation of the TMDL.

Near-Shore Water Quality and Aesthetics in Lake Tahoe

For almost a decade, the City has worked with various environmental organizations around Lake Tahoe to determine a reasonable and obtainable measure and plan to preserve and restore Lake Tahoe's famed water clarity. In the interim, the Lake has seen increased algal growth, invasive species, and a rise in water temperatures, all of which are likely contributors to near-shore water

Response

CSLT(StBd)-5: As part of developing the Lake Tahoe TMDL, considerable state and federal resources were used to produce the Pollutant Reduction Opportunity Report (PROv2), which estimated costs of reasonably foreseeable implementation measures and the evaluated implementation feasibility. The TMDL relied on the results of the analysis documented in the PROv2 to establish a TMDL implementation plan. The Lahontan Water Board has also supported efforts to develop stormwater management and load estimation tools and supported local government efforts to obtain federal and state grant funds for water quality improvement projects. Over the past two years, the Lahontan Water Board has been managing a federally-funded Support Services contract to assist the urban jurisdictions in using the stormwater load estimation tools specifically for the purpose of calculating a baseline load. Because each government agency faces unique budget challenges, it would not be appropriate for the State or Lahontan Water Board to "provide direction as to a funding strategy".

quality and aesthetic degradation in Lake Tahoe. Near-shore water quality degradation is visible to the naked eye and is particularly noticeable in late summer and early fall.

Residents and visitors are more likely to see this near-shore water quality degradation than to observe the decline in deep-water lake clarity. As visitors to Lake Tahoe account for the greatest source of South Lake Tahoe's economy and industry, it is of vital importance to ensure that their experience on the shores of Lake Tahoe is pristine and clean. Accordingly, the City believes it is of great value to ensure that near-shore water quality is addressed concurrently with deep water lake clarity. While deep water clarity is critical to the long-term environmental health of Lake Tahoe, near-shore water quality is as critical and potentially more impactful to residents, businesses and tourists in South Lake Tahoe.

The final revisions to the adopted Basin Plan Amendment included language stating "The Regional Board is committed to ongoing investigation of Lake Tahoe's near-shore water quality and to taking regulatory actions needed to improve near-shore conditions." The October 2010 revisions to the Basin Plan removed the July 2010 proposed Basin Plan Amendment language which stated that "Appropriate standards and indicators for the near-shore condition should be developed along with specific management actions." While it is reasonable to assume that reducing pollutant loads of fine sediment particles, nitrogen, and phosphorus should benefit near-shore water quality, the general understanding of the causes, sources, and solutions for near-shore water quality degradation lags far behind that of deep-water transparency standards and processes in Lake Tahoe.

Accordingly, as the City and other entities in Lake Tahoe struggle to develop fiscal strategies and implementation plans to restore deep water transparency, the City is gravely concerned that sufficient resources may not be available to address immensely important near-shore water quality issues. Until more is known about near-shore pollutant sources, the City questions whether the TMDL's emphasis on reducing deep-water clarity sufficiently sets forth a strategy to improve near-shore water quality. In light of the tourist economy's impact on the City's ability to sustain itself, particularly in these fiscally difficult times, the City believes the TMDL should place greater emphasis on programs and plans which provide the most benefit to near-shore water quality. Further, support from residents and visitors who generate much of Lake Tahoe's economic activity would be more readily obtained if Lahontan could clearly show that those programs most effective in improving deep-water transparency would also provide significant benefits to near-shore water quality.

The City thus requests that the State and Lahontan commit to a prompt and thorough review of processes and pollutant sources contributing to near-shore water quality degradation, and to the development of appropriate standards, indicators and regulatory actions to help ensure that municipal permittee stormwater programs help protect near-shore as well as deep water resources in Lake Tahoe.

Maximizing Benefits to Lake Tahoe, the City, and the Community

The City, as well as all other jurisdictions in the Lake Tahoe Basin, face the extraordinarily difficult task of balancing State and federal water quality mandates with federally mandated

Comment

CSLT TMDL Position Paper
Page 3 of 4

quality and aesthetic degradation in Lake Tahoe. Near-shore water quality degradation is visible to the naked eye and is particularly noticeable in late summer and early fall.

Residents and visitors are more likely to see this near-shore water quality degradation than to observe the decline in deep-water lake clarity. As visitors to Lake Tahoe account for the greatest source of South Lake Tahoe's economy and industry, it is of vital importance to ensure that their experience on the shores of Lake Tahoe is pristine and clean. Accordingly, the City believes it is of great value to ensure that near-shore water quality is addressed concurrently with deep water lake clarity. While deep water clarity is critical to the long-term environmental health of Lake Tahoe, near-shore water quality is as critical and potentially more impactful to residents, businesses and tourists in South Lake Tahoe.

The final revisions to the adopted Basin Plan Amendment included language stating "The Regional Board is committed to ongoing investigation of Lake Tahoe's near-shore water quality and to taking regulatory actions needed to improve near-shore conditions." The October 2010 revisions to the Basin Plan removed the July 2010 proposed Basin Plan Amendment language which stated that "Appropriate standards and indicators for the near-shore condition should be developed along with specific management actions." While it is reasonable to assume that reducing pollutant loads of fine sediment particles, nitrogen, and phosphorus should benefit near-shore water quality, the general understanding of the causes, sources, and solutions for near-shore water quality degradation lags far behind that of deep-water transparency standards and processes in Lake Tahoe.

Accordingly, as the City and other entities in Lake Tahoe struggle to develop fiscal strategies and implementation plans to restore deep water transparency, the City is gravely concerned that sufficient resources may not be available to address immensely important near-shore water quality issues. Until more is known about near-shore pollutant sources, the City questions whether the TMDL's emphasis on reducing deep-water clarity sufficiently sets forth a strategy to improve near-shore water quality. In light of the tourist economy's impact on the City's ability to sustain itself, particularly in these fiscally difficult times, the City believes the TMDL should place greater emphasis on programs and plans which provide the most benefit to near-shore water quality. Further, support from residents and visitors who generate much of Lake Tahoe's economic activity would be more readily obtained if Lahontan could clearly show that those programs most effective in improving deep-water transparency would also provide significant benefits to near-shore water quality.

The City thus requests that the State and Lahontan commit to a prompt and thorough review of processes and pollutant sources contributing to near-shore water quality degradation, and to the development of appropriate standards, indicators and regulatory actions to help ensure that municipal permittee stormwater programs help protect near-shore as well as deep water resources in Lake Tahoe.

Maximizing Benefits to Lake Tahoe, the City, and the Community

The City, as well as all other jurisdictions in the Lake Tahoe Basin, face the extraordinarily difficult task of balancing State and federal water quality mandates with federally mandated

Response

CSLT(StBd)-6: These are not new comments since the City raised these issues in its November 15, 2010 letter to the Lahontan Water Board. These comments were addressed orally at the November 16, 2010 hearing, and the Lahontan Water Board considered the City's comments in its decision.

The Lahontan Water Board has long been aware of nearshore issues, such as increased algae growth, and the public familiarity with the nearshore of Lake Tahoe has heightened the focus on efforts to address these issues. The Lahontan Water Board is not idle with respect to addressing nearshore concerns. As noted by the City in these comments, the Lake Tahoe TMDL will result in reducing nutrient inputs to the nearshore, which is expected to improve nearshore conditions. Available information indicates that nearshore water quality is impacted by pollutants in urban stormwater runoff. The increased amount of attached algae is likely caused by elevated nutrient concentrations. The TMDL implementation plan specifically targets urban stormwater runoff, and the implementation actions to reduce pollutants influencing deep water transparency are expected to positively effect nearshore water quality conditions. Additionally, the Lahontan Water Board actively has funded projects and supports policy efforts to control aquatic invasive species in the nearshore area.

The Basin Plan contains water quality objectives specific to the whole of Lake Tahoe. The only water quality objective for Lake Tahoe specific to the nearshore is that turbidity not exceed 3 Nephelometric Turbidity Units (NTU) in waters too shallow to measure clarity, and this objective may not be adequately protective of nearshore beneficial uses (Taylor et al. 2003). Without nearshore specific objectives and indicators it is difficult to link the specific cause and effect of pollutants to determine the proper recourse and there is no yardstick to measure progress towards restoring and maintaining the nearshore. Nonetheless, the problems in the nearshore should not postpone adoption of the TMDL for the deep water transparency objective. Over a decade and tens of millions of dollars have been spent studying the causes of the decline in Lake Tahoe's transparency. Now that we have identified the cause of the transparency loss and have developed a plan for reducing pollutant loads to the Lake, it does not make sense to put off implementation of those objectives because of problems in the nearshore, especially when we strongly believe that those same actions that will improve the deep water transparency will also benefit water quality in the nearshore. Furthermore, the TMDL implementation plan gives the City the flexibility in meeting its waste load allocation to put greater emphasis on programs and plans that provide other benefits that the City may choose to prioritize, such as benefits to the nearshore.

quality and aesthetic degradation in Lake Tahoe. Near-shore water quality degradation is visible to the naked eye and is particularly noticeable in late summer and early fall.

Residents and visitors are more likely to see this near-shore water quality degradation than to observe the decline in deep-water lake clarity. As visitors to Lake Tahoe account for the greatest source of South Lake Tahoe's economy and industry, it is of vital importance to ensure that their experience on the shores of Lake Tahoe is pristine and clean. Accordingly, the City believes it is of great value to ensure that near-shore water quality is addressed concurrently with deep water lake clarity. While deep water clarity is critical to the long-term environmental health of Lake Tahoe, near-shore water quality is as critical and potentially more impactful to residents, businesses and tourists in South Lake Tahoe.

The final revisions to the adopted Basin Plan Amendment included language stating "The Regional Board is committed to ongoing investigation of Lake Tahoe's near-shore water quality and to taking regulatory actions needed to improve near-shore conditions." The October 2010 revisions to the Basin Plan removed the July 2010 proposed Basin Plan Amendment language which stated that "Appropriate standards and indicators for the near-shore condition should be developed along with specific management actions." While it is reasonable to assume that reducing pollutant loads of fine sediment particles, nitrogen, and phosphorus should benefit near-shore water quality, the general understanding of the causes, sources, and solutions for near-shore water quality degradation lags far behind that of deep-water transparency standards and processes in Lake Tahoe.

Accordingly, as the City and other entities in Lake Tahoe struggle to develop fiscal strategies and implementation plans to restore deep water transparency, the City is gravely concerned that sufficient resources may not be available to address immensely important near-shore water quality issues. Until more is known about near-shore pollutant sources, the City questions whether the TMDL's emphasis on reducing deep-water clarity sufficiently sets forth a strategy to improve near-shore water quality. In light of the tourist economy's impact on the City's ability to sustain itself, particularly in these fiscally difficult times, the City believes the TMDL should place greater emphasis on programs and plans which provide the most benefit to near-shore water quality. Further, support from residents and visitors who generate much of Lake Tahoe's economic activity would be more readily obtained if Lahontan could clearly show that those programs most effective in improving deep-water transparency would also provide significant benefits to near-shore water quality.

The City thus requests that the State and Lahontan commit to a prompt and thorough review of processes and pollutant sources contributing to near-shore water quality degradation, and to the development of appropriate standards, indicators and regulatory actions to help ensure that municipal permittee stormwater programs help protect near-shore as well as deep water resources in Lake Tahoe.

Maximizing Benefits to Lake Tahoe, the City, and the Community

The City, as well as all other jurisdictions in the Lake Tahoe Basin, face the extraordinarily difficult task of balancing State and federal water quality mandates with federally mandated

Comment

CSLT TMDL Position Paper
Page 3 of 4

quality and aesthetic degradation in Lake Tahoe. Near-shore water quality degradation is visible to the naked eye and is particularly noticeable in late summer and early fall.

Residents and visitors are more likely to see this near-shore water quality degradation than to observe the decline in deep-water lake clarity. As visitors to Lake Tahoe account for the greatest source of South Lake Tahoe's economy and industry, it is of vital importance to ensure that their experience on the shores of Lake Tahoe is pristine and clean. Accordingly, the City believes it is of great value to ensure that near-shore water quality is addressed concurrently with deep water lake clarity. While deep water clarity is critical to the long-term environmental health of Lake Tahoe, near-shore water quality is as critical and potentially more impactful to residents, businesses and tourists in South Lake Tahoe.

The final revisions to the adopted Basin Plan Amendment included language stating "The Regional Board is committed to ongoing investigation of Lake Tahoe's near-shore water quality and to taking regulatory actions needed to improve near-shore conditions." The October 2010 revisions to the Basin Plan removed the July 2010 proposed Basin Plan Amendment language which stated that "Appropriate standards and indicators for the near-shore condition should be developed along with specific management actions." While it is reasonable to assume that reducing pollutant loads of fine sediment particles, nitrogen, and phosphorus should benefit near-shore water quality, the general understanding of the causes, sources, and solutions for near-shore water quality degradation lags far behind that of deep-water transparency standards and processes in Lake Tahoe.

Accordingly, as the City and other entities in Lake Tahoe struggle to develop fiscal strategies and implementation plans to restore deep water transparency, the City is gravely concerned that sufficient resources may not be available to address immensely important near-shore water quality issues. Until more is known about near-shore pollutant sources, the City questions whether the TMDL's emphasis on reducing deep-water clarity sufficiently sets forth a strategy to improve near-shore water quality. In light of the tourist economy's impact on the City's ability to sustain itself, particularly in these fiscally difficult times, the City believes the TMDL should place greater emphasis on programs and plans which provide the most benefit to near-shore water quality. Further, support from residents and visitors who generate much of Lake Tahoe's economic activity would be more readily obtained if Lahontan could clearly show that those programs most effective in improving deep-water transparency would also provide significant benefits to near-shore water quality.

The City thus requests that the State and Lahontan commit to a prompt and thorough review of processes and pollutant sources contributing to near-shore water quality degradation, and to the development of appropriate standards, indicators and regulatory actions to help ensure that municipal permittee stormwater programs help protect near-shore as well as deep water resources in Lake Tahoe.

Maximizing Benefits to Lake Tahoe, the City, and the Community

The City, as well as all other jurisdictions in the Lake Tahoe Basin, face the extraordinarily difficult task of balancing State and federal water quality mandates with federally mandated

Response

CSLT(StBd)-7: Lahontan Water Board staff continues to participate in the Nearshore Agency Working Group (NAWG), which includes the Tahoe Regional Planning Agency (TRPA), Nevada Division of Environmental Protection (NDEP), and the US EPA. The NAWG is responsible for advising and managing the Nearshore Science Team that is working to fulfill a grant funded by the Southern Nevada Public Lands Management Act (SNPLMA) and scheduled to last through May 2012.

The goal of this grant is to develop standards for the nearshore waters of Lake Tahoe. Once complete, the TRPA, NDEP, and the Lahontan Water Board will move towards adopting water quality objectives for the nearshore, so that this valuable and high profile resource can be protected consistently lake wide.

TRPA thresholds and general public services. Thus, the City believes it is vitally important to be able to show its citizens that financial investments in water quality do more than just improve lake clarity. That is, the City believes the TMDL should include a means of accounting for water quality benefits which also provide ancillary benefits to the community and/or attain TRPA thresholds. Allowances of increased commercial floor area, relaxation of coverage requirements for linear public service projects, and increased building allocations are just some examples that may serve as crediting "rewards" for achieving the goal set by this ambitious Plan. Concessions should be provided to agencies and jurisdictions that implement projects which address other federally mandated thresholds, particularly those of TRPA.

As stated above, support from residents and visitors who generate much of Lake Tahoe's economic activity would be more readily obtained if Lahontan could clearly show that those programs most effective in improving water quality would also provide significant benefits to public services and amenities as well as to TRPA threshold attainment.

In closing, the City asks that the State consider the issues set forth in this letter. The City believes it is of the utmost importance, and it is essential to the success of the TMDL that that the Plan incorporate funding strategies, address near-shore water quality issues, and acknowledge the needs of our community in balancing water quality with other federally mandated environmental thresholds and public services. This notice comes later than we would have wished. However, changes in elected officials, management and staffing levels diverted our attention temporarily from this vital issue. Your cooperation is greatly appreciated in granting us the grace period to achieve the best public policy possible in the area of TMDL implementation.

Sincerely,


SOUTH LAKE TAHOE CITY COUNCIL:




Hal Cole, Mayor




Clair Fortier, Mayor Pro-Tem



Tom Davis, Councilmember



Bruce Grego, Councilmember



Angela Swanson, Councilmember

Comment

CSLT TMDL Position Paper
Page 4 of 4


TRPA thresholds and general public services. Thus, the City believes it is vitally important to be able to show its citizens that financial investments in water quality do more than just improve lake clarity. That is, the City believes the TMDL should include a means of accounting for water quality benefits which also provide ancillary benefits to the community and/or attain TRPA thresholds. Allowances of increased commercial floor area, relaxation of coverage requirements for linear public service projects, and increased building allocations are just some examples that may serve as crediting "rewards" for achieving the goal set by this ambitious Plan. Concessions should be provided to agencies and jurisdictions that implement projects which address other federally mandated thresholds, particularly those of TRPA.

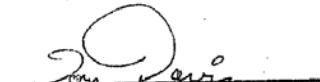
As stated above, support from residents and visitors who generate much of Lake Tahoe's economic activity would be more readily obtained if Lahontan could clearly show that those programs most effective in improving water quality would also provide significant benefits to public services and amenities as well as to TRPA threshold attainment.

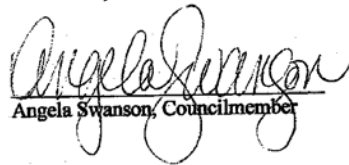
In closing, the City asks that the State consider the issues set forth in this letter. The City believes it is of the utmost importance, and it is essential to the success of the TMDL that that the Plan incorporate funding strategies, address near-shore water quality issues, and acknowledge the needs of our community in balancing water quality with other federally mandated environmental thresholds and public services. This notice comes later than we would have wished. However, changes in elected officials, management and staffing levels diverted our attention temporarily from this vital issue. Your cooperation is greatly appreciated in granting us the grace period to achieve the best public policy possible in the area of TMDL implementation.

Sincerely,

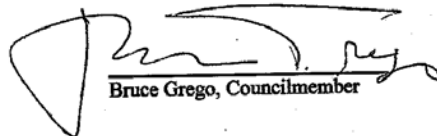
SOUTH LAKE TAHOE CITY COUNCIL:


Hal Cole, Mayor


Tom Davis, Councilmember


Angela Swanson, Councilmember


Clair Fortier, Mayor Pro-Tem


Bruce Grego, Councilmember

Response

CSLT(StBd)-8: The Lahontan Water Board does not have authority to regulate land-use, such as commercial floor area and building allocations. The TRPA is the bi-state agency with that authority. Accordingly, Lahontan Water Board staff is working directly with TRPA on its Regional Plan update to help TRPA staff craft regulatory provisions that complement TMDL implementation. TRPA Executive Director Joanne Marchetta wrote in an October 7, 2010 letter to the Lahontan Water Board:

"TRPA is updating the Regional Plan for the Lake Tahoe Region and incorporating strategies to implement the TMDL is a primary goal of this effort. The TRPA Governing Board endorsed the proposed TMDL related goals and policies at the July 27, 2010 Board meeting. Currently, in collaboration with Lahontan Region staff, TRPA is developing implementation measures for inclusion in the Regional Plan. In July 2009, the Governing Board endorsed the updated Environmental Improvement Program which includes cost estimates for implementing TMDL capital projects across federal, state, local and private sectors. Incorporation of the TMDL into the Lahontan Region Basin Plan and TRPA's Regional Plan represents an important opportunity to merge TRPA and state water quality policies. This consistency across agencies increases effectiveness and operational efficiency of our respective agencies."

The Lake Clarity Crediting Program, which is not specifically part of this TMDL, is anticipated to be used to assess compliance with Municipal NPDES Stormwater permit conditions. The Crediting Program Handbook has been available to the public for more than one year and contains protocols describing how municipal permittees can register load reductions and monitor facility conditions to ensure compliance with anticipated permit requirements.

The TMDL, combined with the future renewed Municipal NPDES Permit and associated Monitoring and Reporting requirements provide consistent water quality metrics and assessment methods to allow development/redevelopment to move forward and other land-use issues can be resolved with TRPA.

Lake Tahoe TMDL - Nearshore
April 19, 2011

	Title	Funding	Funding Source	Timing	Description/ Deliverable
1	NICHES: Nearshore Indicators for Clarity, Habitat, and Ecological Sustainability	\$250,000	SNPLMA	Complete	1. Evaluate the nearshore fishery. 2. Evaluate a variety of traditional indicators that may be used to determine long-term change 3. Develop novel metrics to detect shorter term change to the nearshore habitat of Lake Tahoe
2	Influence of Urban Runoff on Nearshore Water Quality at Lake Tahoe	unknown	unknown	Complete	Identifying how urban runoff affects nearshore water quality through analysis of water samples.
2	Monitoring past, present, and future water quality using remote sensing	unknown	SNPLMA	Complete	Use remotely sensed (satellite) data to provide a quantitative management tool for lake-wide assessments of water quality and to link changes in water quality to discrete sources at the sub-watershed scale.
3	Evaluation of Nearshore Ecology and Aesthetics	\$180,000, Cost share of \$45,930	SNPLMA	Spring 2012	1. Develop a conceptual model that characterizes our current understanding of processes that affect nearshore quality and relates them to the desired conditions. 2. Develop and recommend potential nearshore indicators. 3. Develop a nearshore monitoring plan.
4	Predicting and managing changes in near-shore water quality		SNPLMA	Spring 2011	Understand and assemble a dataset on clarity, periphyton growth, fate of pollutants, and spread of nonnative plants and fishes in near-shore environment
5	Development of a risk model to determine the expansion and potential environmental impacts of Asian clams in Lake Tahoe	\$321,658	SNPLMA	Summer 2011	Develop a risk analysis of Asian clam distribution and its environmental impact by examining the structure, estimated transport pathways, life history, and energetics of existing populations discovered in the lake.
6	Natural and human limitations to Asian clam distribution and recolonization—factors that impact the management and control in Lake Tahoe	\$249,887	SNPLMA	Summer 2012	Determine human and natural factors influencing Asian clam distribution and the recolonization rate of clam beds treated with bottom barriers, Provide cost efficiency analysis of using bottom barriers to kill clams en masse.
7	Potential for Pathogen Growth, Fecal Indicator Growth and Phosphorus Release under Clam Removal Barriers in the Lake Tahoe Basin	\$99,395	SNPLMA	Spring 2011	Determine if killing Asian clams with bottom barriers contribute to an increase in fecal pathogens. Quantify release of phosphorus from killing clams with rubber bottom barriers.
8	Linking On-Shore and near-Shore Processes: Near-Shore Water Quality Monitoring Buoy at Lake Tahoe	unknown	NDSL License Plate funds	Ongoing	Semi-continuous monitoring to correlate nearshore water quality with upland activities.
9	Boat Monitoring (Blue Boating Program)	~\$40,000	TRPA	Annually	Boat monitoring: boat type, launch frequency, boater behavior
10	Shorezone Effectiveness Monitoring	\$180,000	TRPA & USGS	Annually	Shorezone water quality monitoring to assess effectiveness of TRPA regulations and their enforcement: BTEX, PAH, Bacteria, Fecal Coliform

**Lake Tahoe TMDL - Nearshore
April 19, 2011**

12	Aquatic Invasive Species, Nearshore Weeds Program (does not capture all previous actions)				Reduce and prevent spread of extant populations using bottom barriers and diver assisted (hand pulling) suction.
	Milfoil Removal - Lakewide (five sites)	\$250,000	SNPLMA	2011	Five (5) sites lakewide of Eurasian milfoil control
	Lake Tahoe Aquatic Plant Survey Project	included in Lakewide Removal budget	SNPLMA	2011	1) Survey the near shore areas of Lake Tahoe and surrounding lakes for submerged aquatic vegetation to record the location, extent, and density of nuisance aquatic plant infestations; 2) Develop a spatial database of known aquatic plant infestations in the Lake Tahoe Region; and 3) Support evaluation of aquatic plant control and eradication efforts through information gathering, sharing, and coordination.
	Emerald bay, Pier & Swim Area, Parson's Rock	\$75,000	SNPLMA, BOR	2011	Reduce and prevent spread of extant populations, survey infestation size, deploy control strategies to eliminate infestations, implement effectiveness monitoring
	Lakeside Marina	\$22,000/ \$53,200	Public/ Private	(complete) 2010	Reduce and prevent spread of extant populations, survey infestation size, deploy control strategies to eliminate infestations, implement effectiveness monitoring
	Elk's Point Marina	\$11,200	Private	(complete) 2010	Reduce and prevent spread of extant populations, survey infestation size, deploy control strategies to eliminate infestations, implement effectiveness monitoring
13	Aquatic Invasive Species, Asian Clam Program				Lahontan is a member of the Asian Clam Working Group
	Asian clam pilot control project	\$403,248	Cleanup and Abatement Account, SNPLMA, BLM, NDSL	Complete	Pilot experiment to determine if bottom barriers or suction removal are an effective means to kill Asian clams. Troubleshoot technologies and logistics.
	Asian Clam Control, Marla Bay & Lakeside	\$326,087	SNPLMA, NDSL	2011	Expanded pilot project to test logistics and efficacy of using bottom barriers to kill clams in large areas. One acre total project area.
	Asian Clam Survey, Lakewide	\$99,887	Cleanup and Abatement Account	Complete	Underwater survey of perimeter of Lake Tahoe to determine extent and locations of Asian clam infestations.
	Asian Clam Survey, Emerald Bay	\$37,557	Cleanup and Abatement Account	Spring 2011	Survey Asian clam infestation in Emerald Bay to monitor spread of infestation and inform design of Emerald Bay control project.
	Asian clam cold water control effectiveness	~\$63,000	SNPLMA	2011	Determine if killing Asian clams with bottom barriers can be successful in cold water conditions
	Asian clam - Emerald Bay pilot project - boating effects on bottom barriers	~\$95,000	SNPLMA	2011	Determine if use of bottom barriers is feasible in areas affected by boat traffic and associated water turbulence
	Asian Clam Control Action Plan/Pilot, Emerald Bay	~\$500,000	Cleanup and Abatement Account	Fall 2011	Eradicate Asian clams from Emerald Bay. Estimated implementation fall 2012. Estimated project completion Summer 2013