

ENCLOSURE 3

**(APPENDIX M OF THE STAFF REPORT –
COMMENTS RECEIVED AND RESPONSE TO COMMENTS**

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Appendix M - Comments Received and Response to Comments

530.550.8760
P.O. Box 8568
Truckee, CA 96162
truckeeriverwc.org



Truckee River Watershed Council
Collaborative solutions to protect, enhance and restore the Truckee River Watershed

California Department
of Fish and Wildlife

California Department
of Parks and Recreation

California Department
of Water Resources

California Fly Fisher
Magazine

Glenshire Homeowners
Association

DMB/Highlands Group, LLC

East West Partners

Friends of Squaw Creek

KidZone Museum

Lahontan Regional
Water Quality
Control Board

Mountain Area
Preservation

Nevada County

North Lake Tahoe
Resort Association

Northstar California

Placer County

Placer County Water
Agency

Sagehen Creek Field
Station - UC Berkeley

Sierra Business Council

Sierra County

Sierra Watch

Squaw Valley and
Alpine Meadows

Tahoe Truckee
Sanitation Agency

Town of Truckee

Trout Unlimited

Truckee Donner
Land Trust

Truckee Donner Public
Utility District

Truckee Meadows
Water Authority

U.S. Army Corps of
Engineers

USDA Forest Service
Tahoe National Forest

Carly Nilson
2501 Lake Tahoe Blvd.
South Lake Tahoe, CA 96150

May 16, 2014

RE: 305(b)/303(d) Integrated Report, April 2014

Thank you for the opportunity to offer comments on the recently released Clean Water Act Sections 305(b) and 303(d) Integrated Report (Integrated Report) for the Lahontan Region.

Support for Maintaining Listings

The Truckee River Watershed Council (TRWC) supports maintaining the listings for water bodies in the Truckee River watershed, including the Middle Truckee River, Donner Lake, and Squaw Creek. This comment letter will focus on data regarding the Middle Truckee River.

We agree with the conclusion presented in the Integrated Report Staff Report that the Truckee River is not ready for delisting. As stated on Page 10 of the Report, we agree that there needs to be further investigation of the current sediment target and turbidity water quality objectives.

Data in Support of the Listing

Impairment of Beneficial Uses. The Integrated Report is based on data collected through 2010. Data TRWC has collected since 2010 indicate that:

1. The current TMDL standard may not detect impairment of beneficial uses.
2. Beneficial uses are impacted in the Truckee River.

In 2010 and 2011 TRWC implemented a monitoring plan in support of the Truckee River TMDL. The monitoring program consisted of suspended sediment and turbidity monitoring as well as bioassessment studies.

Suspended Sediment Concentration. Our suspended sediment (SSC) and turbidity monitoring focused on three key tributary streams: Cold Creek, Donner Creek, and Trout Creek. The SSC data collected from these tributaries demonstrated that for the monitoring period the three tributary streams had suspended sediment concentrations below the TMDL standard, which is that the SSC concentration is 25 mg/L or less 90% of the time.

Bioassessment. In contrast, the bioassessment data strongly supported that beneficial uses are impaired in the Truckee River. We summarize below the key results from these studies.

We developed a monitoring program with Dr. David Herbst of U.C. Santa Barbara – Sierra Nevada Aquatic Research Laboratory. In 2010, we conducted a “reference-test” study comparing several sites along the Truckee River to similar eastern Sierra streams with less watershed disturbance (Carson, Walker, and Markleeville Creek). **Compared to similar reference streams, the Truckee River consistently scored lower on the Eastern Sierra Index of Biological Integrity.** All sampling sites on the Truckee River scored below the “not supporting of beneficial uses” or “partially supporting” thresholds. Reference streams scored as “supporting” or “partially supporting”.

Based upon this work, we completed additional monitoring in 2011 to more specifically examine the relationship between sediment and biological communities. We completed a “patch-scale” study to examine the relationship between deposited sediment and biological condition of the benthic community. **There were significant differences in biological conditions starting with sediment coverage of just 20%. At 80% or greater sediment coverage there were very significant decreases in biological condition.**

The differences in biological condition include:

- Decrease in the quantity and quality of food resources, meaning that both the number and size of benthic macroinvertebrates decreased with increasing sediment coverage;
- The BMI community shifted away from organisms intolerant of pollution towards species that are more tolerant of poor water quality.

Sediment Deposition. In addition to the bioassessment work, we completed surveys to assess the extent of sediment deposition near our bioassessment sampling sites. In these surveys, we found that:

- **Sediment deposition was fairly widespread;**
- At six of the ten sampling sites, 50% or more of the survey points measured sediment coverage in the excessive category (80 – 100% coverage by fine sediment).

Beneficial Uses Not Supported. Taken together, these studies indicate that beneficial uses including “Cold Freshwater Habitat” and “Spawning Reproduction and Development” are likely to not be fully supported in the Truckee River due to impacts on the base of the food web and excess deposited sediment.

De-listing is Pre-Mature

We recognize that data from our studies are not included in the current Integrated Report. We are highlighting our current data to support the Lahontan Water Board staff conclusions that:

- De-listing is premature;

- Beneficial uses are not being supported;
- The current TMDL numeric standard does not appear to be sufficient to detect actual impairment from excess sediment.

All data can be found in reports posted on our website: www.truckeeriverwc.org/about/documents.

Next Steps

We would like to formally request a time at a future Lahontan Water Board meeting to present the results of our TMDL monitoring program in greater depth.

Thank you for considering our comments.

Sincerely,



Beth Christman
Director of Restoration Programs



Lisa Wallace
Executive Director

Appendix M – Comments Received and Response to Comments

Comments	Response
<div data-bbox="205 321 294 386" style="font-size: small;"> 530-550-8760 P.O. Box 8568 Truckee, CA 96162 truckeeriverc.org </div> <div data-bbox="331 305 970 389" style="text-align: center;">  <p>Truckee River Watershed Council Collaborative solutions to protect, enhance and restore the Truckee River Watershed</p> </div> <div data-bbox="205 402 310 1253" style="font-size: x-small;"> California Department of Fish and Wildlife California Department of Parks and Recreation California Department of Water Resources California Fly Fisher Magazine Glenaire Homeowners Association DMHiglands Group LLC East West Planners Friends of Squaw Creek KidZone Museum Lahontan Regional Water Quality Control Board Mountain Area Preservation Nevada County North Lake Tahoe Resort Association Northern California Placer County Placer County Water Agency Sagemen Creek Field Station - UC Berkeley Sierra Business Council Sierra County Sierra Watch Squaw Valley and Alpine Meadows Tahoe Truckee Sanitation Agency Town of Truckee Trout Unlimited Truckee Donner Land Trust Truckee Donner Public Utility District Truckee Meadows Water Authority U.S. Army Corps of Engineers USDA Forest Service Tahoe National Forest </div> <div data-bbox="365 425 550 490"> <p>Carly Nilson 2501 Lake Tahoe Blvd. South Lake Tahoe, CA 96150</p> </div> <div data-bbox="365 503 457 522"> <p>May 16, 2014</p> </div> <div data-bbox="365 539 672 561"> <p>RE: 305(b)/303(d) Integrated Report, April 2014</p> </div> <div data-bbox="365 571 911 636"> <p>Thank you for the opportunity to offer comments on the recently released Clean Water Act Sections 305(b) and 303(d) Integrated Report (Integrated Report) for the Lahontan Region.</p> </div> <div data-bbox="365 649 575 672"> <p>Support for Maintaining Listings</p> </div> <div data-bbox="365 685 915 766"> <p>The Truckee River Watershed Council (TRWC) supports maintaining the listings for water bodies in the Truckee River watershed, including the Middle Truckee River, Donner Lake, and Squaw Creek. This comment letter will focus on data regarding the Middle Truckee River.</p> </div> <div data-bbox="365 782 894 867"> <p>We agree with the conclusion presented in the Integrated Report Staff Report that the Truckee River is not ready for delisting. As stated on Page 10 of the Report, we agree that there needs to be further investigation of the current sediment target and turbidity water quality objectives.</p> </div> <div data-bbox="365 880 550 902"> <p>Data in Support of the Listing</p> </div> <div data-bbox="365 915 861 964"> <p>Impairment of Beneficial Uses. The Integrated Report is based on data collected through 2010. Data TRWC has collected since 2010 indicate that:</p> </div> <div data-bbox="386 971 873 1016"> <ol style="list-style-type: none"> 1. The current TMDL standard may not detect impairment of beneficial uses. 2. Beneficial uses are impacted in the Truckee River. </div> <div data-bbox="365 1026 907 1091"> <p>In 2010 and 2011 TRWC implemented a monitoring plan in support of the Truckee River TMDL. The monitoring program consisted of suspended sediment and turbidity monitoring as well as bioassessment studies.</p> </div> <div data-bbox="365 1104 911 1227"> <p>Suspended Sediment Concentration. Our suspended sediment (SSC) and turbidity monitoring focused on three key tributary streams: Cold Creek, Donner Creek, and Trout Creek. The SSC data collected from these tributaries demonstrated that for the monitoring period the three tributary streams had suspended sediment concentrations below the TMDL standard, which is that the SSC concentration is 25 mg/L or less 90% of the time.</p> </div> <div data-bbox="512 1308 785 1328" style="font-size: x-small;"> <p>Truckee River Watershed Council is a nonprofit 501(c)(3) organization.</p> </div>	<div data-bbox="1062 695 1890 1214" style="border: 1px solid black; padding: 10px;"> <p>TRWC-R1: The surface water assessments made for the 2012 Integrated Report cycle considered data that was submitted up until August of 2010 as part of the State Water Resources Control Board data solicitation process. The Water Board acknowledges the TRWC's 2010 and 2011 monitoring efforts in support of the Truckee River TMDL; however, these data were not evaluated during this listing cycle. To ensure that the results of TRWC's are considered for the next Integrated Report cycle, we strongly urge you to submit the data to the California Environmental Data Exchange Network (CEDEN) using CEDEN formats. CEDEN helps transform different data sources into a standardized, integrated data sharing network and will be the sole source for evaluating data for surface waters for the upcoming Integrated report cycles. For more information on how register your organization and prepare and submit data to CEDEN please view http://www.waterboards.ca.gov/water_issues/programs/swamp/tools.shtml#datamgmt.</p> </div>

Appendix M – Comments Received and Response to Comments

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<p>Bioassessment. In contrast, the bioassessment data strongly supported that beneficial uses are impaired in the Truckee River. We summarize below the key results from these studies.</p> <p>We developed a monitoring program with Dr. David Herbst of U.C. Santa Barbara – Sierra Nevada Aquatic Research Laboratory. In 2010, we conducted a “reference-test” study comparing several sites along the Truckee River to similar eastern Sierra streams with less watershed disturbance (Carson, Walker, and Markleeville Creek). Compared to similar reference streams, the Truckee River consistently scored lower on the Eastern Sierra Index of Biological Integrity. All sampling sites on the Truckee River scored below the “not supporting of beneficial uses” or “partially supporting” thresholds. Reference streams scored as “supporting” or “partially supporting”.</p> <p>Based upon this work, we completed additional monitoring in 2011 to more specifically examine the relationship between sediment and biological communities. We completed a “patch-scale” study to examine the relationship between deposited sediment and biological condition of the benthic community. There were significant differences in biological conditions starting with sediment coverage of just 20%. At 80% or greater sediment coverage there were very significant decreases in biological condition.</p> <p>The differences in biological condition include:</p> <ul style="list-style-type: none"> • Decrease in the quantity and quality of food resources, meaning that both the number and size of benthic macroinvertebrates decreased with increasing sediment coverage; • The BMI community shifted away from organisms intolerant of pollution towards species that are more tolerant of poor water quality. <p>Sediment Deposition. In addition to the bioassessment work, we completed surveys to assess the extent of sediment deposition near our bioassessment sampling sites. In these surveys, we found that:</p> <ul style="list-style-type: none"> • Sediment deposition was fairly widespread; • At six of the ten sampling sites, 50% or more of the survey points measured sediment coverage in the excessive category (80 – 100% coverage by fine sediment). <p>Beneficial Uses Not Supported. Taken together, these studies indicate that beneficial uses including “Cold Freshwater Habitat” and “Spawning Reproduction and Development” are likely to not be fully supported in the Truckee River due to impacts on the base of the food web and excess deposited sediment.</p> <p>De-listing is Pre-Mature</p> <p>We recognize that data from our studies are not included in the current Integrated Report. We are highlighting our current data to support the Lahontan Water Board staff conclusions that:</p> <ul style="list-style-type: none"> • De-listing is premature; 	<div style="border: 1px solid black; padding: 10px; margin-bottom: 10px;"> <p>TRWC-R2: The Truckee River TMDL, adopted by the USEPA in September 2009, assigned load allocations to achieve sediment related water quality objectives set to protect in-stream aquatic life beneficial uses. The suspended sediment concentrations within the Truckee River have impacted the cold freshwater habitat (COLD) and the spawning, reproduction, and development (SPWN) beneficial uses designated for the Truckee River. The sediment load allocations and implementation measures prescribed in the TMDL are established to attain these beneficial uses. The target in the TMDL only refers to suspended sediment concentration at the Nevada state line monitoring station and additional data, including biological data, provides additional measures of determining impairment of the Truckee River. The Truckee River will continue to remain on the 303(d) list of impaired water bodies until the waste load allocations are achieved and beneficial uses are supported. TWRC’s continued monitoring is a critical component in tracking whether the watershed-wide sediment load reductions are protective of beneficial uses in the Truckee River.</p> </div> <div style="border: 1px solid black; padding: 10px;"> <p>TRWC-R3: See TRWC-R1. Support of Water Board’s conclusion noted. No new data was presented for this Integrated Report cycle to evaluate the Truckee River for suspended sediment. Water Board staff encourage TRWC to input their current and future data into CEDEN to be evaluated in future listing cycles.</p> </div>

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<ul style="list-style-type: none">• Beneficial uses are not being supported;• The current TMDL numeric standard does not appear to be sufficient to detect actual impairment from excess sediment. <p>All data can be found in reports posted on our website: www.truckeeiverwc.org/about/documents.</p> <p>Next Steps</p> <p>We would like to formally request a time at a future Lahontan Water Board meeting to present the results of our TMDL monitoring program in greater depth.</p> <p>Thank you for considering our comments.</p> <p>Sincerely,</p> <p> </p> <p>Beth Christman Director of Restoration Programs</p> <p>Lisa Wallace Executive Director</p>	<p>TRWC-R3 continued: Also see TRWC-R2.</p>



City of South Lake Tahoe

"making a positive difference now"

May 19, 2014

Attn: Carly Nilson
Mary Fiore-Wagner
Lahontan Regional Water Quality Control Board
2501 Lake Tahoe Blvd.
South Lake Tahoe, CA 96150

RE: City of South Lake Tahoe Comments on the Lahontan Regional Water Quality Control Board's Clean Water Act Section 303(D) and 305(B) Assessment and Draft Integrated Report

Dear Ms. Carly Nilson and Ms. Mary Fiore-Wagner:

The City of South Lake Tahoe (City) appreciates the opportunity to comment on the Lahontan Regional Water Quality Control Board (Regional Board) draft *2012 Clean Water Act Sections 303(D) and 305(B) Assessment* issued April 5, 2014, in preparation for submittal of the final "Integrated Report" to the State Water Resources Control Board.

As a responsible party named in the Lake Tahoe Total Maximum Daily Load (TMDL), and as a permittee under Order No R6T-2011-101A1, the City of South Lake Tahoe is actively participating in the watershed approach to implementation of the Lake Tahoe TMDL. It is important to restate that the comprehensive Lake Tahoe TMDL and associated Management System include not only the Lake, but also all 63 tributary stream systems to the Lake.

Based on a review of the information contained in the water body "Fact Sheets" and lines of evidence (LOE) provided by the Regional Board in support of Appendix A (Proposed New and Revised 303[D] List for 2012), the City has noticed the following items that should be changed or updated in the Proposed Revisions to the Lake Tahoe HU portion of Appendix A.

1. Bijou Park Creek, New Listing: Iron (Category 5A, Completion Year 2025)

The decision to include this new water body-pollutant combination on the 2012 list contradicts the supporting information for this listing (Decision ID 31735). As noted in the Regional Board Staff Conclusion in Decision ID 31735:

"Ten of the samples exceed the water quality objective for the secondary MCL, but this creek has naturally high levels or [sic] iron".

The staff conclusion then goes on to state:

"Based on the readily available data and information, the weight of evidence indicates that there is sufficient justification *against* placing this water segment-pollutant combination in the section 303(d) list in the Water Quality Limited Segments category" (emphasis added, see page 5 of Attachment 1).

The Regional Board Staff Decision Recommendation in Decision ID 31735 states:

“After review of the available data and information, RWQCB staff concludes that the water body-pollutant combinations *should not be placed on the section 303(d) list because applicable water quality standards are not being exceeded*” (emphasis added, see page 6 of Attachment 1).

Given that Bijou Park Creek is known to have naturally high levels of iron, the City supports the Regional Board staff conclusion that “there is sufficient justification against placing this water segment-pollutant combination on the section 303(d) list” and concurs with the Regional Board staff decision recommendation to not place the water body-pollutant combination on the section 303(d) list.

If the Regional Board does include the water segment pollutant in contradiction to Decision ID 31735, the Category for this new listing should be 4B, since a TMDL is not the most effective approach to addressing a naturally occurring pollutant. The City believes that the resources required to develop and implement a TMDL to address a pollutant that is a natural background condition would be more effectively utilized to address existing TMDLs addressing pollutants with documented anthropogenic sources.

2. Bijou Park Creek, New Listing: Phosphorus (Category 5A, Completion Year 2025)

The supporting information for this listing (Decision ID 31769, LOE ID 31971) notes that Bijou Park Creek is an upstream tributary of Lake Tahoe. The Lake Tahoe TMDL (adopted by the Regional Board on November 16, 2010 and approved by the USEPA on August 17, 2011) determined that the primary source of phosphorus in the Lake Tahoe (and tributaries, including Bijou Park Creek) watershed is urban storm water runoff and phosphorus associated with eroding sediment on disturbed undeveloped lands. On the ground efforts required by the Lake Tahoe TMDL that focus on (1) stabilizing disturbed areas within the forested uplands, (2) restoring eroding stream channels, and (3) managing and treating urban uplands (e.g. street sweeping, installing and maintaining infiltration and stormwater treatment facilities) will also achieve pollutant load reductions in waters tributary to Lake Tahoe.

The Municipal Stormwater National Pollutant Discharge Elimination System (NPDES) permit (Order No R6T-2011-101A1), requires the California- based Lake Tahoe municipalities (El Dorado and Placer Counties, and the City of South Lake Tahoe) and the California Department of Transportation (CalTrans) to develop and implement comprehensive pollutant load reduction programs (PLRPs) to meet specified pollutant load reduction requirements. Implementation measures include a variety of alternative treatment options, roadway operation practices, and local ordinances to reduce average annual pollutant loads. These Lake Tahoe TMDL implementation efforts will also reduce inputs of phosphorus to this impaired segment of Bijou Park Creek. Maintenance activities and restoring small disturbed sites that are underway, or planned and expected, within the forested uplands of this watershed will also reduce or avoid increases in fine sediment and nutrient loads.

Additionally, the Lake Tahoe TMDL also requires implementing measures to control stationary sources of dust, which help reduce pollutant loads of fine sediments. Implementation of these measures helps address the phosphorus loading that impairs Bijou Park Creek that is associated with these fine sediments from dust sources.

Pollutant load reductions within Bijou Park Creek will be tracked through implementation of the detailed performance and compliance measures and assessment and reporting protocols included in the Lake Tahoe TMDL. The TMDL Management System project is currently establishing activity-based tracking and reporting requirements to assess activities that are

expected to reduce pollutant loading from non-urban sources. The Lahontan Water Board and the Nevada Division of Environmental Protection currently implement a Lake Tahoe TMDL Management System for managing, tracking, integrating and evaluating new information generated from TMDL implementation actions, effectiveness monitoring, research efforts, and other factors such as climate change and wildfires.

The Management System is based on an adaptive management framework to (1) link load reduction effectiveness with project implementation monitoring to improve project design and to assess if actual environmental improvement is occurring as expected; (2) establish guidance and operation protocols for how new information will be incorporated into project designs and TMDL program implementation; (3) establish prioritized TMDL research needs to fill data gaps and reduce uncertainties, and (4) implement a process for updating and reporting pollutant load reduction estimates and tracking projects within the TMDL implementation timeline.

The Lake Tahoe TMDL requires implementation, effectiveness, and status and trends monitoring. Tributary stream status and trends monitoring will track long-term changes in water quality conditions relative to established water quality standards or goals, and project-specific monitoring will be used to assess the efficacy of various implementation measures.

Long-term water quality trends and pollutant load reduction tracking in Bijou Park Creek will be captured through the ongoing efforts of the Lake Tahoe Interagency Monitoring Program (LTIMP) whose primary objective is to monitor discharge, nutrient load, and sediment loads from representative streams that flow into Lake Tahoe. Nitrogen and phosphorus loading calculations are performed using the LTIMP flow and nutrient concentration database.

Pollutant loading of Phosphorus from Bijou Park Creek (a tributary to Lake Tahoe) is currently addressed through the existing Lake Tahoe TMDL. This tributary approach was used for impairment listings for Heavenly Creek (Decision IDs 28449 and 19683), Trout Creek (Decision IDs 20459, 20304, 20460, and 19951), Upper Truckee River (Decision IDs 27228 and 20022) and Ward Creek (Decision IDs 20141, 27275 and 20142). The creation of a new TMDL for this one tributary to Lake Tahoe would create redundant and duplicative requirements currently addressed by the Lake Tahoe TMDL.

The City requests that the Category for this new listing be revised to 5B, as this new impairment listing is already being addressed by a USEPA-approved TMDL.

3. Bijou Park Creek, New Listing: Total Nitrogen as N (Category 5A, Completion Year 2025)

The supporting information for this listing (Decision ID 31770) confirms that Bijou Park Creek is an upstream tributary of Lake Tahoe. The Lake Tahoe TMDL (adopted by the Regional Board on November 16, 2010 and approved by the USEPA on August 17, 2011) notes that the largest source of nitrogen in the Lake Tahoe (and tributary watersheds) is transportation-related emissions that lead to atmospheric nitrogen deposition. The Lake Tahoe TMDL also includes implementation measures to reduce atmospheric nitrogen sources. The Tahoe Regional Planning Agency leads efforts to improve transportation infrastructure and reduce overall vehicle miles traveled in the Lake Tahoe region to reduce emissions that lead to atmospheric nutrient loading. Public transit and vehicle fleet turnover are expected to further reduce nutrient-laden emissions in the Tahoe basin that will reduce nitrogen loading in the Bijou Park Creek watershed.

Pollutant load reductions within the Bijou Park Creek watershed will be tracked through implementation of detailed performance and compliance measures and assessment and reporting protocols included in the Lake Tahoe TMDL. The Lahontan Water Board and the Nevada Division of Environmental Protection are currently implementing a Lake Tahoe TMDL Management System for managing, tracking, integrating and evaluating new information generated from TMDL implementation actions, effectiveness monitoring, research efforts, and other factors such as climate change and wildfires. The Management System is currently establishing activity-based tracking and reporting requirements to assess activities that are expected to reduce pollutant loading from non-urban sources, as discussed in detail above.

The Management System is based on an adaptive management framework to (1) link load reduction effectiveness with project implementation monitoring to improve project design and to assess if actual environmental improvement is occurring as expected; (2) establish guidance and operation protocols for how new information will be incorporated into project designs and TMDL program implementation; (3) establish prioritized TMDL research needs to fill data gaps and reduce uncertainties, and (4) implement a process for updating and reporting pollutant load reduction estimates and tracking projects within the TMDL implementation timeline.

The Lake Tahoe TMDL requires implementation, effectiveness, and status and trends monitoring. Existing Lake Tahoe TMDL tributary stream status and trends monitoring will track long-term changes in water quality conditions relative to established water quality standards or goals, and project-specific monitoring will be used to assess the efficacy of various implementation measures.

Pollutant loading of Total Nitrogen as N from Bijou Park Creek (a tributary to Lake Tahoe) is currently addressed through the existing Lake Tahoe TMDL. This approach was used for related impairments in Heavenly Creek (Decision IDs 28449 and 19683), Trout Creek (Decision IDs 20459, 20304, 20460, and 19951), Upper Truckee River (Decision IDs 27228 and 20022) and Ward Creek (Decision IDs 20141, 27275 and 20142). The creation of a new TMDL for this one tributary to Lake Tahoe would create redundant and duplicative requirements currently addressed by the Lake Tahoe TMDL.

The City requests that the Category for this new listing be revised to 5B, as this new impairment listing is already being addressed by a USEPA-approved TMDL.

4. Bijou Park Creek, New Listing: Turbidity (Category 5A, Completion Year 2025)

Bijou Park Creek is an upstream tributary of Lake Tahoe. The Lake Tahoe TMDL (adopted by the Regional Board on November 16, 2010 and approved by the USEPA on August 17, 2011) addresses clarity (turbidity) impairments primarily caused by suspended sediment. On the ground efforts required by the Lake Tahoe TMDL that focus on (1) stabilizing disturbed areas within the forested uplands and (2) managing and treating urban uplands (e.g. street sweeping, installing and maintaining infiltration and stormwater treatment facilities) will also achieve pollutant load reductions of sediment within this waterbody segment, which is tributary to Lake Tahoe.

The Lake Tahoe TMDL identifies actions that resource management agencies, California-based Lake Tahoe municipalities (El Dorado and Placer Counties, and the City of South Lake Tahoe) and California Department of Transportation must take to reduce fine sediment and nutrient loading to the Lake. Municipal Stormwater NPDES permits require the municipalities and CalTrans to develop and implement comprehensive PLRPs to meet specified pollutant load

reduction requirements. Expected implementation measures include a variety of alternative treatment options, roadway operation practices, and local ordinances to reduce average annual pollutant loads. These Lake Tahoe TMDL implementation efforts will also reduce inputs of sediment to this impaired segment of Bijou Park Creek.

Additionally, the Lake Tahoe TMDL requires that the USFS-Lake Tahoe Basin Management Unit undertake restoration actions to reduce erosion and treat urban storm water runoff from paved and unpaved roadways, campgrounds, and recreational trails within the Lake Tahoe watershed. Storm water collection, conveyance, and treatment facilities coupled with revegetation of previously disturbed lands and stabilizing areas designated for recreational use are expected to reduce erosion and help control sediment discharges resulting in elevated turbidity levels in Bijou Park Creek.

Finally, the Lake Tahoe TMDL requires implementation of measures to control stationary sources of dust, which help reduce pollutant loads of fine sediments. Implementation of these measures helps address the sedimentation/siltation loading that impairs Bijou Park Creek from dust sources.

Pollutant load reductions within Bijou Park Creek tributary watershed will be tracked through implementation of detailed performance and compliance measures and assessment and reporting protocols included in the Lake Tahoe TMDL. As discussed above, the TMDL Management System is establishing activity-based tracking and reporting requirements to assess activities that are expected to reduce pollutant loading from non-urban sources.

The Lake Tahoe TMDL requires implementation, effectiveness, and status and trends monitoring. Tributary stream status and trends monitoring will track long-term changes in water quality conditions relative to established water quality standards or goals, and project-specific monitoring will be used to assess the efficacy of various implementation measures.

Long-term water quality trends and pollutant load reduction tracking in Bijou Park Creek will be captured through the ongoing efforts of the LTIMP, whose primary objective is to monitor discharge, nutrient load, and sediment loads from representative streams that flow into Lake Tahoe.

Pollutant loading of turbidity, sediment and siltation from Bijou Park Creek (a tributary to Lake Tahoe) is currently addressed through the existing Lake Tahoe TMDL. This approach was used for related impairments for Heavenly Creek (Decision IDs 28449 and 19683), Trout Creek (Decision IDs 20459, 20304, 20460, and 19951), Upper Truckee River (Decision IDs 27228 and 20022) and Ward Creek (Decision IDs 20141, 27275 and 20142).

The creation of a new TMDL for this one tributary to Lake Tahoe would create redundant and duplicative requirements currently addressed by the Lake Tahoe TMDL.

The City requests that the Category for this new listing be revised to 5B, as this new impairment listing is already being addressed by a USEPA-approved TMDL.

5. Tallac Creek: Pathogens (Category 5A, Completion Year 2019)

The supporting information for this listing (Decision ID 30390) notes that the Line of Evidence are based on unspecified data, and the LOE is a placeholder to support a 303(d) listing decision made prior to 2006. It should be recognized that historic grazing is the most likely source.

Is should be recognized that historic grazing is the most likely source of contamination, and the City believes this impaired can be addressed by regulatory actions other than TMDL, such as restrictions on grazing allotments. The City requests a Category 4B designation for this impairment.

6. Trout Creek (above HWY 50): Pathogens (Category 5A, Completion Year 2013)

The Trout Creek (above HWY 50) segment is listed for completion "2013", which appears to be a typo, as the other portions of the Upper Truckee River and surrounding pathogen impaired waterbodies are designated for completion in 2019. Decision ID 28339 (Trout Creek, above HWY 50) notes the expected Fecal Coliform TMDL Completion Date is 2019, not 2013.

Is should be recognized that historic grazing is the most likely source of contamination, and the City believes this impaired can be addressed by regulatory actions other than TMDLs. As such, the City requests a Category 4B designation for this impairment, and the Completion Year be listed as 2019.

7. Trout Creek (below HWY 50): Pathogens (Category 5A, Completion Year 2019)

The supporting information for this listing (Decision ID 30194, LOE ID 27160) includes information in the Environmental Conditions that livestock grazing formerly occurred in the meadow near the confluence where samples were collected. LOE 27160 noted that 3 of the 19 collected samples exceeded the water quality objective for fecal coliform.

Is should be recognized that historic grazing is the most likely source of contamination, and the City believes this impaired can be addressed by regulatory actions other than TMDL, such as restrictions on grazing allotments. The City requests a Category 4B designation for this impairment.

Thank you for the opportunity to provide comments on the Lahontan Regional Water Quality Control Board's Clean Water Act Section 305(b) and 303(d) Assessment and Draft Integrated Report. The City is dedicated to improving water quality in all receiving waters within the Lake Tahoe basin, and supports policies that effectively utilize existing efforts and prioritize feasible solutions to meet water quality objectives within the basin. Please contact the City's Stormwater Program Coordinator, Jason Burke, at (530) 542-6038 if you have any questions or need additional information.

Sincerely,



Ray Jarvis, P.E.
Public Works Director

Attachment 1 – Highlighted portions of Bijou Park Creek Supporting Information

Cc: Nancy Kerry, City Manager
Sarah Hussong-Johnson, P.E., Deputy Public Works Director/ City Engineer
Robert Larsen, Lahontan Regional Quality Control Board
Jason Burke, Stormwater Program Coordinator

Draft California 2012 Integrated Report(303(d) List/305(b) Report)

Supporting Information

Regional Board 6 - Lahontan Region

Water Body Name: **Bijou Park Creek**
Water Body ID: **CAR6341003120110919092625**
Water Body Type: **River & Stream**

DECISION ID	30482	Region 6
Bijou Park Creek		

Pollutant: **Chloride**
Final Listing Decision: **Do Not List on 303(d) list (TMDL required list)**
Last Listing Cycle's Final Listing Decision: **New Decision**
Revision Status: **Revised**
Impairment from Pollutant or Pollution: **Pollutant**

Regional Board Staff Conclusion: This pollutant is being considered for placement on the section 303(d) list under section 3.2 of the Listing Policy. Under section 3.2, one line of evidence is necessary to assess listing status.

One line of evidence is available in the administrative record to assess this pollutant. Two of the samples exceed the water quality objective.

Based on the readily available data and information, the weight of evidence indicates that there is sufficient justification against placing this water segment-pollutant combination on the section 303(d) list in the Water Quality Limited Segments category.

This conclusion is based on the staff findings that:

1. The data used satisfies the data quality requirements of section 6.1.4 of the Policy.
2. The data used satisfies the data quantity requirements of section 6.1.5 of the Policy.
3. Two of two samples exceeded the objective and and this sample size is insufficient to determine with the power and confidence of the Listing Policy if standards are not met. A minimum of 26 samples is needed for application of table 3.2.
4. Pursuant to section 3.11 of the Listing Policy, no additional data and information are available indicating that standards are not met.

Regional Board Staff Decision Recommendation: After review of the available data and information, RWQCB staff concludes that the water body-pollutant combination should not be placed on the section 303(d) list because it cannot be determined if applicable water quality standards are not being exceeded.

Line of Evidence (LOE) for Decision ID 30482, Chloride	Region 6
Bijou Park Creek	

LOE ID: 32534
Pollutant: Chloride
LOE Subgroup: Pollutant-Water
Matrix: Water
Fraction: None

Beneficial Use: Cold Freshwater Habitat

Number of Samples: 2

Number of Exceedances: 2

Data and Information Type: PHYSICAL/CHEMICAL MONITORING

Data Used to Assess Water Quality: The annual averages from the sampling location in 2008 and 2009 this water body exceeded the water quality objective. One measurement was used to calculate the annual average for 2008 and 3 samples were used to calculate the annual average in 2009.

Data Reference: [Data from discharger self-monitoring reports for the Heavenly Mountain Resort ski area at Lake Tahoe, Oct. 2007-Sep. 2009](#)

SWAMP Data: Non-SWAMP

Water Quality Objective/Criterion: The water quality objective is an annual average of 0.15 mg/L. (from Table 5.1-3 of the Lahontan Region Basin Plan).

Objective/Criterion Reference: [Water Quality Control Plan for the Lahontan Region \(as amended\)](#)

Evaluation Guideline:

Guideline Reference:

Spatial Representation: Samples were collected at the following sampling stie: HV-C4 (Sky Mdw, California Parking Lot)

Temporal Representation: Samples were collected once quarterly between August of 2008 and September of 2009.

Environmental Conditions:

QAPP Information: Data were collected for NPDES permit R6T-2003-0032. This data was collected under waste discharge requirements for a TMDL and therefore is of adequate quality.

QAPP Information Reference(s):

DECISION ID	31736	Region 6
Bijou Park Creek		

Pollutant: Nitrate/Nitrite (Nitrite + Nitrate as N)

Final Listing Decision: Do Not List on 303(d) list (TMDL required list)

Last Listing Cycle's Final Listing Decision: New Decision

Revision Status: Revised

Impairment from Pollutant or Pollution: Pollutant

Regional Board Staff Conclusion: This pollutant is being considered for placement on the section 303(d) list under section 3.1 of the Listing Policy. Under section 3.1 a single line of evidence is necessary to assess listing status.

One lines of evidence are available in the administrative record to assess this pollutant. Zero of the 30 samples exceed the water quality objective.

Based on the readily available data and information, the weight of evidence indicates that there is sufficient justification against placing this water segment-pollutant combination on the section 303(d) list in the Water Quality Limited Segments category.

This conclusion is based on the staff findings that:

1. The data used satisfies the data quality requirements of section 6.1.4 of the Policy.
2. The data used satisfies the data quantity requirements of section 6.1.5 of the Policy.
3. Zero of 30 samples exceeded the objective and this does not exceed the allowable frequency listed in Table 3.1 of the Listing Policy.
4. Pursuant to section 3.11 of the Listing Policy, no additional data and information are available indicating that standards are not met.

Regional Board Staff

After review of the available data and information, RWQCB staff concludes that the water

Decision Recommendation: body-pollutant combination should not be placed on the section 303(d) list because applicable water quality standards are not being exceeded.

Line of Evidence (LOE) for Decision ID 31736, Nitrate/Nitrite (Nitrite + Nitrate as N)**Region 6****Bijou Park Creek**

LOE ID:	31969
Pollutant:	Nitrate/Nitrite (Nitrite + Nitrate as N)
LOE Subgroup:	Pollutant-Water
Matrix:	Water
Fraction:	Total
Beneficial Use:	Municipal & Domestic Supply
Number of Samples:	30
Number of Exceedances:	0
Data and Information Type:	PHYSICAL/CHEMICAL MONITORING
Data Used to Assess Water Quality:	None of the 30 samples exceeded the water quality objective for nitrate + nitrate as N. Samples collected within a 7-day period were averaged and considered as a single sample.
Data Reference:	<u>Data from discharger self-monitoring reports for the Heavenly Mountain Resort ski area at Lake Tahoe, Oct. 2007-Sep. 2009</u>
SWAMP Data:	Non-SWAMP
Water Quality Objective/Criterion:	The Water Quality Control Plan, Lahontan Basin, Objective for Municipal and Domestic Supply uses of inland surface waters states the following: waters shall not contain concentrations of inorganic chemicals in excess of the limits specified in California Code of Regulations, Title 22, Table 64431-A of section 64431 (Inorganic Chemicals). The maximum contaminant level listed in Table 64431-A for nitrate + nitrite as N is 10.0 mg/L.
Objective/Criterion Reference:	<u>Water Quality Control Plan for the Lahontan Region (as amended)</u>
Evaluation Guideline:	
Guideline Reference:	
Spatial Representation:	Samples were collected at HV-C4 Bijou Park Creek below California Parking Lot.
Temporal Representation:	Samples were collected from 10/23/2007 to 9/15/2009.
Environmental Conditions:	
QAPP Information:	Data were collected as part of Water Discharge Requirements R6T-2003-0032 for Heavenly Mountain Resort.
QAPP Information Reference(s):	

DECISION ID

31737

Region 6

Bijou Park Creek

Pollutant: Temperature, water
Final Listing Decision: Do Not List on 303(d) list (TMDL required list)
Last Listing Cycle's Final Listing Decision: New Decision
Revision Status: Revised
Impairment from Pollutant or Pollution: Pollutant

Regional Board Staff Conclusion: This pollutant is being considered for placement on the section 303(d) list under section 3.2 of the Listing Policy. Under section 3.2 a single line of evidence is necessary to assess listing status.

One line of evidence is available in the administrative record to assess this pollutant. Zero of 17 samples exceed the water quality objective.

Based on the readily available data and information, the weight of evidence indicates that there is sufficient justification against placing this water segment-pollutant combination on the section 303(d) list in the Water Quality Limited Segments category.

This conclusion is based on the staff findings that:

1. The data used satisfies the data quality requirements of section 6.1.4 of the Policy.
2. The data used satisfies the data quantity requirements of section 6.1.5 of the Policy.
3. Zero of 17 samples exceeded the objective and this sample size is insufficient to determine with the power and confidence of the Listing Policy if standards are not met. A minimum of 26 samples is needed for application of table 3.2.
4. Pursuant to 3.11 of the Listing Policy, no additional data and information are available indicating that standards are not met.

Regional Board Staff Decision Recommendation: After review of the available data and information, RWQCB staff concludes that the water body-pollutant combination should not be placed on the section 303(d) list because it cannot be determined if applicable water quality standards are not being exceeded.

**Line of Evidence (LOE) for Decision ID 31737, Temperature, water
 Bijou Park Creek**

Region 6

LOE ID: 32248

Pollutant: Temperature, water
LOE Subgroup: Pollutant-Water
Matrix: Water
Fraction: None

Beneficial Use: Cold Freshwater Habitat

Number of Samples: 17
Number of Exceedances: 0

Data and Information Type: PHYSICAL/CHEMICAL MONITORING
Data Used to Assess Water Quality: None of the 17 samples exceeded the evaluation guideline for temperature in this water body.

Data Reference: Data from discharger self-monitoring reports for the Heavenly Mountain Resort ski area at Lake Tahoe, Oct. 2007-Sep. 2009

SWAMP Data: Non-SWAMP

Water Quality Objective/Criterion: CSIT 305b/303d Comments

ATTACHMENT 1

The natural receiving water temperature of all waters shall not be altered unless it can be demonstrated to the satisfaction of the Regional Board that such an alteration in temperature does not adversely affect the water for beneficial uses. (Water Quality Control Plan for the Lahontan Region)

Objective/Criterion Reference:

Water Quality Control Plan for the Lahontan Region (as amended)

Evaluation Guideline:

Inland Fishes of California (Moyle 1976) states that for rainbow trout the optimum range for growth and completion of most life stages is 13-21 degrees C (page 129).

Guideline Reference:

Fish introductions in CA: History and impact on native fishes. Davis, CA: University of CA, Davis

Spatial Representation:

Samples were collected at HV-C4 Bijou Park Creek below California Parking Lot.

Temporal Representation:

Samples were collected monthly between October of 2008 and September of 2009.

Environmental Conditions:

QAPP Information:

This data was collected under waste discharge requirements for a TMDL and therefore is of adequate quality.

QAPP Information Reference(s):

DECISION ID

31735

Region 6

Bijou Park Creek

Pollutant:

Iron

Final Listing Decision:

List on 303(d) list (TMDL required list)

Last Listing Cycle's Final Listing Decision:

New Decision

Revision Status:

Revised

Sources:

Natural Sources

Expected TMDL

2025

Completion Date:

Impairment from Pollutant

Pollutant

or Pollution:

Regional Board Staff

Conclusion:

This pollutant is being considered for placement on the section 303(d) list under section 3.1 of the Listing Policy. Under section 3.1 a single line of evidence is necessary to assess listing status.

Two lines of evidence are available in the administrative record to assess this pollutant. Ten of the samples exceed the water quality objective for the secondary MCL, but this creek has naturally high levels of iron.

Based on the readily available data and information, the weight of evidence indicates that there is sufficient justification against placing this water segment-pollutant combination on the section 303(d) list in the Water Quality Limited Segments category.

This conclusion is based on the staff findings that:

1. The data used satisfies the data quality requirements of section 6.1.4 of the Policy.
2. The data used satisfies the data quantity requirements of section 6.1.5 of the Policy.
3. Ten of ten samples exceeded the water quality objective and though this does exceed the allowable frequency listed in Table 3.1 of the Listing Policy, iron is naturally occurring in this creek.
4. Pursuant to section 3.11 of the Listing Policy, no additional data and information are available indicating that standards are not met.

Regional Board Staff

After review of the available data and information, RWQCB staff concludes that the water

Decision Recommendation: body-pollutant combination should not be placed on the section 303(d) list because applicable water quality standards are not being exceeded.

**Line of Evidence (LOE) for Decision ID 31735, Iron
Bijou Park Creek**

Region 6

LOE ID:	31980
Pollutant:	Iron
LOE Subgroup:	Pollutant-Water
Matrix:	Water
Fraction:	Total
Beneficial Use:	Municipal & Domestic Supply
Number of Samples:	9
Number of Exceedances:	9
Data and Information Type:	Fixed station physical/chemical (conventional plus toxic pollutants)
Data Used to Assess Water Quality:	All nine of the samples exceeded the secondary MCL.
Data Reference:	<u>Data from discharger self-monitoring reports for the Heavenly Mountain Resort ski area at Lake Tahoe, Oct. 2007-Sep. 2009</u>
SWAMP Data:	Non-SWAMP
Water Quality Objective/Criterion:	The Water Quality Control Plan, Lahontan Basin, Objective for Municipal and Domestic Supply uses of inland surface waters states the following: waters shall not contain concentrations of inorganic chemicals in excess of the limits specified in California Code of Regulations, Title 22, Table 64449-B of Section 64449 (Secondary Maximum Contaminant Levels-Ranges). The secondary MCL for iron is 0.3 mg/L.
Objective/Criterion Reference:	<u>Water Quality Control Plan for the Lahontan Region (as amended)</u>
Evaluation Guideline:	
Guideline Reference:	
Spatial Representation:	Samples were collected at HV-C4 Bijou Park Creek below California Parking Lot.
Temporal Representation:	Samples were collected quarterly from the fourth quarter of 2008 to the third quarter of 2009. Additionally, three storm samples were collected.
Environmental Conditions:	Three storm samples were collected.
QAPP Information:	Data were collected as part of Water Discharge Requirements R6T-2003-0032 for Heavenly Mountain Resort.
QAPP Information Reference(s):	

**Line of Evidence (LOE) for Decision ID 31735, Iron
Bijou Park Creek**

Region 6

LOE ID:	31981
Pollutant:	Iron
LOE Subgroup:	Pollutant-Water
Matrix:	Water
Fraction:	Total
Beneficial Use:	Cold Freshwater Habitat

Number of Samples:	1
Number of Exceedances:	1
Data and Information Type:	Fixed station physical/chemical (conventional plus toxic pollutants)
Data Used to Assess Water Quality:	The annual average of iron at this station is 3.44 mg/L, which exceeds the objective.
Data Reference:	Data from discharger self-monitoring reports for the Heavenly Mountain Resort ski area at Lake Tahoe, Oct. 2007-Sep. 2009
SWAMP Data:	Non-SWAMP
Water Quality Objective/Criterion:	The maximum concentration of iron discharge to surface water is 0.5 mg/L.
Objective/Criterion Reference:	Water Quality Control Plan for the Lahontan Region (as amended)
Evaluation Guideline:	
Guideline Reference:	
Spatial Representation:	Samples were collected at HV-C4 Bijou Park Creek below California Parking Lot.
Temporal Representation:	Samples were collected quarterly from the fourth quarter of 2008 to the third quarter of 2009. Additionally, three storm samples were collected.
Environmental Conditions:	Three storm samples were collected.
QAPP Information:	Data were collected as part of Water Discharge Requirements R6T-2003-0032 for Heavenly Mountain Resort.
QAPP Information Reference(s):	

DECISION ID	31768	Region 6
Bijou Park Creek		

Pollutant:	Oil and Grease
Final Listing Decision:	List on 303(d) list (TMDL required list)
Last Listing Cycle's Final Listing Decision:	New Decision
Revision Status	Revised
Sources:	Source Unknown
Expected TMDL	2025
Completion Date:	
Impairment from Pollutant or Pollution:	Pollutant

Regional Board Staff Conclusion: This pollutant is being considered for placement on the section 303(d) list under section 3.1 of the Listing Policy. Under section 3.1 a single line of evidence is necessary to assess listing status.

One lines of evidence is available in the administrative record to assess this pollutant. Seventeen of the seventeen samples exceed the water quality objective.

Based on the readily available data and information, the weight of evidence indicates that there is sufficient justification in favor of placing this water segment-pollutant combination on the section 303(d) list in the Water Quality Limited Segments category.

This conclusion is based on the staff findings that:

1. The data used satisfies the data quality requirements of section 6.1.4 of the Policy.
2. The data used satisfies the data quantity requirements of section 6.1.5 of the Policy.
3. Seventeen of seventeen samples exceed the objective and guideline and this exceeds the allowable frequency listed in Table 3.1 of the Listing Policy.

4. Pursuant to section 3.11 of the Listing Policy, no additional data and information are available indicating that standards are not met.

Regional Board Staff Decision Recommendation: After review of the available data and information, RWQCB staff concludes that the water body-pollutant combination should be placed on the section 303(d) list because applicable water quality standards are exceeded and a pollutant contributes to or causes the problem.

Line of Evidence (LOE) for Decision ID 31768, Oil and Grease **Region 6**
Bijou Park Creek

LOE ID: 34094

Pollutant: Oil and Grease
 LOE Subgroup: Pollutant-Water
 Matrix: Water
 Fraction: Total

Beneficial Use: Cold Freshwater Habitat

Number of Samples: 17
 Number of Exceedances: 17

Data and Information Type: PHYSICAL/CHEMICAL MONITORING
 Data Used to Assess Water Quality: 17 of the 17 oil and grease samples exceeded the USEPA recommended criteria for this water body.

Data Reference: Data from discharger self-monitoring reports for the Heavenly Mountain Resort ski area at Lake Tahoe, Oct. 2007-Sep. 2009

SWAMP Data: Non-SWAMP

Water Quality Objective/Criterion: Waters shall not contain oils, greases, waxes or other materials in concentrations that result in a visible film or coating on the surface of the water or on objects in the water, that cause nuisance, or that otherwise adversely affect the water for beneficial uses (Lahontan Region Water Quality Control Plan).

Objective/Criterion Reference: Water Quality Control Plan for the Lahontan Region (as amended)

Evaluation Guideline: Per the Water Quality Criteria (USEPA 1986) also known as the Gold Book: concentrations of oil at 0.001 mg/l can harm aquatic life.

Guideline Reference: Quality Criteria for Water 1986. United States Environmental Protection Agency. Office of Water. Regulations and Standards. Washington D.C. EPA 440/5-86-001.

Spatial Representation: Samples were collected at the following sample site: HV-C4 (Sky Mdw, California parking lot).

Temporal Representation: Samples were collected monthly between August of 2008 and September 2009.

Environmental Conditions:

QAPP Information: Data were collected for NPDES permit R6T-2003-0032. This data was collected under waste discharge requirements for a TMDL and therefore is of adequate quality.

QAPP Information Reference(s):

DECISION ID	31769	Region 6
Bijou Park Creek		

Pollutant: Phosphorus
Final Listing Decision: List on 303(d) list (TMDL required list)
Last Listing Cycle's Final Listing Decision: New Decision
Revision Status: Revised
Sources: Source Unknown
Expected TMDL: 2025
Completion Date:
Impairment from Pollutant or Pollution: Pollutant

Regional Board Staff Conclusion: This pollutant is being considered for placement on the section 303(d) list under section 3.1 of the Listing Policy. Under section 3.1 a single line of evidence is necessary to assess listing status.

One line of evidence is available in the administrative record to assess this pollutant. Two of the samples exceed the water quality objective.

Based on the readily available data and information, the weight of evidence indicates that there is sufficient justification in favor of placing this water segment-pollutant combination on the section 303(d) list in the Water Quality Limited Segments category.

This conclusion is based on the staff findings that:

1. The data used satisfies the data quality requirements of section 6.1.4 of the Policy.
2. The data used satisfies the data quantity requirements of section 6.1.5 of the Policy.
3. Two of two samples exceed the water quality objective (annual average) and this exceeds the allowable frequency listed in Table 3.1 of the Listing Policy.
4. Pursuant to section 3.11 of the Listing Policy, no additional data and information are available indicating that standards are not met.

Regional Board Staff Decision Recommendation: After review of the available data and information, RWQCB staff concludes that the water body-pollutant combination should be placed on the section 303(d) list because applicable water quality standards are exceeded and a pollutant contributes to or causes the problem.

Line of Evidence (LOE) for Decision ID 31769, Phosphorus
Bijou Park Creek

Region 6

LOE ID: 31971
Pollutant: Phosphorus
LOE Subgroup: Pollutant-Water
Matrix: Water
Fraction: Total
Beneficial Use: Cold Freshwater Habitat
Number of Samples: 2
Number of Exceedances: 2
Data and Information Type: PHYSICAL/CHEMICAL MONITORING
Data Used to Assess Water Quality: Both of the two annual averages exceeded the water quality objective for total phosphorus. Annual averages were calculated by water year starting in October 1st through September 30th. A total of 33 samples were collected. None of the individual samples showed concentrations meeting the annual average objective.

CSLT 305b/303d Comments

ATTACHMENT 1

Data Reference:

Data from discharger self-monitoring reports for the Heavenly Mountain Resort ski area at Lake Tahoe, Oct. 2007-Sep. 2009

SWAMP Data:

Non-SWAMP

Water Quality Objective/Criterion:

Table 5.1-3 of the Basin Plan states that the water quality objective for total phosphorus for Trout Creek is an annual average objective of 0.008 mg/L. Bijou Park Creek is an upstream tributary of Lake Tahoe.

Objective/Criterion Reference:

Water Quality Control Plan for the Lahontan Region (as amended)

Evaluation Guideline:

Guideline Reference:

Spatial Representation:

Samples were collected at HV-C4 Bijou Park Creek below California Parking Lot.

Temporal Representation:

Samples were collected from 10/23/2007 to 9/15/2009.

Environmental Conditions:

Phosphorus levels spiked during storm events that occurred one month apart. Seven samples were taken during storm events.

QAPP Information:

Data were collected as part of Water Discharge Requirements R6T-2003-0032 for Heavenly Mountain Resort.

QAPP Information Reference(s):

DECISION ID

31770

Region 6

Bijou Park Creek

Pollutant: Total Nitrogen as N
Final Listing Decision: List on 303(d) list (TMDL required list)
Last Listing Cycle's Final Listing Decision: New Decision
Revision Status: Revised
Sources: Source Unknown
Expected TMDL: 2025
Completion Date:
Impairment from Pollutant or Pollution: Pollutant

Regional Board Staff Conclusion:

This pollutant is being considered for placement on the section 303(d) list under section 3.1 of the Listing Policy. Under section 3.1 a single line of evidence is necessary to assess listing status.

One line of evidence is available in the administrative record to assess this pollutant. Two of the two samples exceed the water quality objective.

Based on the readily available data and information, the weight of evidence indicates that there is sufficient justification in favor of placing this water segment-pollutant combination on the section 303(d) list in the Water Quality Limited Segments category.

This conclusion is based on the staff findings that:

1. The data used satisfies the data quality requirements of section 6.1.4 of the Policy.
2. The data used satisfies the data quantity requirements of section 6.1.5 of the Policy.
3. Two of two samples exceed the objective (annual average; 34 individual samples used to get two annual averages) and this exceeds the allowable frequency listed in Table 3.1 of the Listing Policy.
4. Pursuant to section 3.11 of the Listing Policy, no additional data and information are available indicating that standards are not met.

Regional Board Staff

After review of the available data and information, RWQCB staff concludes that the water

Decision Recommendation: body-pollutant combination should be placed on the section 303(d) list because applicable water quality standards are exceeded and a pollutant contributes to or causes the problem.

Line of Evidence (LOE) for Decision ID 31770, Total Nitrogen as N

Region 6

Bijou Park Creek

LOE ID:	31970
Pollutant:	Total Nitrogen as N
LOE Subgroup:	Pollutant-Water
Matrix:	Water
Fraction:	Total
Beneficial Use:	Cold Freshwater Habitat
Number of Samples:	2
Number of Exceedances:	2
Data and Information Type:	PHYSICAL/CHEMICAL MONITORING
Data Used to Assess Water Quality:	Both of the two annual averages exceeded the water quality objective for total nitrogen. Annual averages were calculated by water year starting in October 1st through September 30th. A total of 34 samples were collected. None of the individual samples showed concentrations meeting the annual average objective.
Data Reference:	Data from discharger self-monitoring reports for the Heavenly Mountain Resort ski area at Lake Tahoe, Oct. 2007-Sep. 2009
SWAMP Data:	Non-SWAMP
Water Quality Objective/Criterion:	Table 5.1-3 of the Basin Plan states that the water quality objective for total nitrogen for Lake Tahoe is an annual average objective of 0.15 mg/L. Bijou Park Creek is an upstream tributary of Lake Tahoe.
Objective/Criterion Reference:	Water Quality Control Plan for the Lahontan Region (as amended)
Evaluation Guideline:	
Guideline Reference:	
Spatial Representation:	Samples were collected at HV-C4 Bijou Park Creek below California Parking Lot.
Temporal Representation:	Samples were collected from 10/23/2007 to 9/15/2009.
Environmental Conditions:	Nitrogen levels spiked during storm events that occurred one month apart. Seven samples were taken during storm events.
QAPP Information:	Data were collected as part of Water Discharge Requirements R6T-2003-0032 for Heavenly Mountain Resort.
QAPP Information Reference(s):	

DECISION ID 31771

Region 6

Bijou Park Creek

Pollutant:	Turbidity
Final Listing Decision:	List on 303(d) list (TMDL required list)
Last Listing Cycle's Final Listing Decision:	New Decision
Revision Status	Revised
Sources:	Source Unknown
Expected TMDL	2025

Completion Date:**Impairment from Pollutant or Pollution:****Regional Board Staff Conclusion:**

This pollutant is being considered for placement on the section 303(d) list under section 3.1 of the Listing Policy. Under section 3.1 a single line of evidence is necessary to assess listing status.

One line of evidence is available in the administrative record to assess this pollutant. Fifteen of the samples exceed the water quality objective.

Based on the readily available data and information, the weight of evidence indicates that there is sufficient justification in favor of placing this water segment-pollutant combination on the section 303(d) list in the Water Quality Limited Segments category.

This conclusion is based on the staff findings that:

1. The data used satisfies the data quality requirements of section 6.1.4 of the Policy.
2. The data used satisfies the data quantity requirements of section 6.1.5 of the Policy.
3. Fifteen of seventeen samples exceed the objective and this exceeds the allowable frequency listed in Table 3.1 of the Listing Policy.
4. Pursuant to section 3.11 of the Listing Policy, no additional data and information are available indicating that standards are not met.

Regional Board Staff Decision Recommendation: After review of the available data and information, RWQCB staff concludes that the water body-pollutant combination should be placed on the section 303(d) list because applicable water quality standards are exceeded and a pollutant contributes to or causes the problem.

Line of Evidence (LOE) for Decision ID 31771, Turbidity**Region 6****Bijou Park Creek**

LOE ID:	32535
Pollutant:	Turbidity
LOE Subgroup:	Pollutant-Water
Matrix:	Water
Fraction:	None
Beneficial Use:	Municipal & Domestic Supply
Number of Samples:	17
Number of Exceedances:	15
Data and Information Type:	PHYSICAL/CHEMICAL MONITORING
Data Used to Assess Water Quality:	Fifteen of the 17 turbidity samples exceeded the MCL in this water body.
Data Reference:	<u>Data from discharger self-monitoring reports for the Heavenly Mountain Resort ski area at Lake Tahoe, Oct. 2007-Sep. 2009</u>
SWAMP Data:	Non-SWAMP
Water Quality Objective/Criterion:	California Maximum Contaminant Levels (MCLs) apply to ambient waters under the Lahontan Basin Plan's "Chemical Constituents" objective. The MCL for turbidity is 5 NTU.
Objective/Criterion Reference:	<u>Maximum Contaminant Levels for organic and inorganic chemicals, CCR</u>
Evaluation Guideline:	

Spatial Representation: Samples were collected at the following sampling stie: HV-C4 (Sky Mdw, California Parking Lot)

Temporal Representation: Samples were collected monthly between August of 2008 and September of 2009.

Environmental Conditions:

QAPP Information: Data were collected for NPDES permit R6T-2003-0032. This data was collected under waste discharge requirements for a TMDL and therefore is of adequate quality.

QAPP Information Reference(s):

Appendix M – Comments Received and Response to Comments

Comments	Responses
 <p data-bbox="466 277 764 347">City of South Lake Tahoe "making a positive difference now"</p> <p data-bbox="848 383 947 402">May 19, 2014</p> <p data-bbox="268 440 611 529">Attn: Carly Nilson Mary Fiore-Wagner Lahontan Regional Water Quality Control Board 2501 Lake Tahoe Blvd. South Lake Tahoe, CA 96150</p> <p data-bbox="268 545 942 602">RE: City of South Lake Tahoe Comments on the Lahontan Regional Water Quality Control Board's Clean Water Act Section 303(D) and 305(B) Assessment and Draft Integrated Report</p> <p data-bbox="268 618 636 638">Dear Ms. Carly Nilson and Ms. Mary Fiore-Wagner:</p> <p data-bbox="268 659 926 729">The City of South Lake Tahoe (City) appreciates the opportunity to comment on the Lahontan Regional Water Quality Control Board (Regional Board) draft <i>2012 Clean Water Act Sections 303(D) and 305(B) Assessment</i> issued April 5, 2014, in preparation for submittal of the final "Integrated Report" to the State Water Resources Control Board.</p> <p data-bbox="268 748 932 837">As a responsible party named in the Lake Tahoe Total Maximum Daily Load (TMDL), and as a permittee under Order No R6T-2011-101A1, the City of South Lake Tahoe is actively participating in the watershed approach to implementation of the Lake Tahoe TMDL. It is important to restate that the comprehensive Lake Tahoe TMDL and associated Management System include not only the Lake, but also all 63 tributary stream systems to the Lake.</p> <p data-bbox="268 857 932 927">Based on a review of the information contained in the water body "Fact Sheets" and lines of evidence (LOE) provided by the Regional Board in support of Appendix A (Proposed New and Revised 303(D) List for 2012), the City has noticed the following items that should be changed or updated in the Proposed Revisions to the Lake Tahoe HU portion of Appendix A.</p> <p data-bbox="268 946 932 1016">1. Bijou Park Creek, New Listing: Iron (Category 5A, Completion Year 2025) The decision to include this new water body-pollutant combination on the 2012 list contradicts the supporting information for this listing (Decision ID 31735). As noted in the Regional Board Staff Conclusion in Decision ID 31735:</p> <p data-bbox="323 1032 932 1068">"Ten of the samples exceed the water quality objective for the secondary MCL, but this creek has naturally high levels or [sic] iron".</p> <p data-bbox="268 1084 573 1104">The staff conclusion then goes on to state:</p> <p data-bbox="323 1117 932 1187">"Based on the readily available data and information, the weight of evidence indicates that there is sufficient justification <i>against</i> placing this water segment-pollutant combination in the section 303(d) list in the Water Quality Limited Segments category" (emphasis added, see page 5 of Attachment 1).</p> <p data-bbox="268 1203 848 1222">The Regional Board Staff Decision Recommendation in Decision ID 31735 states:</p> <p data-bbox="205 1284 989 1304">Engineering Department, Services Center • 1052 Tata Lane • South Lake Tahoe, CA 96150-6323 • (530) 542-7415 • (530) 541-3051 FAX</p>	<p data-bbox="1104 451 1793 573">CSLT R1: Based on more accurate information and public comments received, Appendix A and portions of the 2012 Integrated Report have been updated (i.e., Staff Report, Appendix I [Fact Sheets]) in several ways:</p> <p data-bbox="1104 605 1860 751">The final listing decision for waterbody-pollutant combination Bijou Park Creek-Iron remains "List on 303(d) list (TMDL required list). Language in the Water Board Staff Conclusion and Decision Recommendation sections has been revised to be consistent with this final listing.</p> <p data-bbox="1104 784 1860 906">For Bijou Park Creek waterbody-pollutant combinations of N (Nitrogen), P (Phosphorus), and Turbidity the final listing decision has been changed from "List on 303(d) List" to "List on 303(d) List Being addressed by USEPA approved TMDL."</p> <p data-bbox="1104 995 1860 1304">CSLT R2: The Draft 2012 Integrated Report that was circulated for public review and comment on April 4, 2014 indicates a final listing decision for the waterbody-pollutant combination: Bijou Park Creek-Iron as "List on 303(d) list (TMDL required list)." This final listing decision remains unchanged and the text has been changed to read, "...there is sufficient justification against for placing this water segment-pollutant combination on the section 303(d) list in the Water Quality Limited Segments category (emphasis added)." (CSLT R2 continued on next page.)</p>

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<p>City of South Lake Tahoe May 19, 2014 Page 2 of 6</p> <p style="text-align: right;">Draft 305(d)/303(d) List Comments</p> <p>"After review of the available data and information, RWQCB staff concludes that the water body-pollutant combinations <i>should not be placed on the section 303(d) list because applicable water quality standards are not being exceeded</i>" (emphasis added, see page 6 of Attachment 1).</p> <p>Given that Bijou Park Creek is known to have naturally high levels of iron, the City supports the Regional Board staff conclusion that "there is sufficient justification against placing this water segment-pollutant combination on the section 303(d) list" and concurs with the Regional Board staff decision recommendation to not place the water body-pollutant combination on the section 303(d) list.</p> <p>If the Regional Board does include the water segment pollutant in contradiction to Decision ID 31735, the Category for this new listing should be 4B, since a TMDL is not the most effective approach to addressing a naturally occurring pollutant. The City believes that the resources required to develop and implement a TMDL to address a pollutant that is a natural background condition would be more effectively utilized to address existing TMDLs addressing pollutants with documented anthropogenic sources.</p> <p>2. Bijou Park Creek, New Listing: Phosphorus (Category 5A, Completion Year 2025) The supporting information for this listing (Decision ID 31769, LOE ID 31971) notes that Bijou Park Creek is an upstream tributary of Lake Tahoe. The Lake Tahoe TMDL (adopted by the Regional Board on November 16, 2010 and approved by the USEPA on August 17, 2011) determined that the primary source of phosphorus in the Lake Tahoe (and tributaries, including Bijou Park Creek) watershed is urban storm water runoff and phosphorus associated with eroding sediment on disturbed undeveloped lands. On the ground efforts required by the Lake Tahoe TMDL that focus on (1) stabilizing disturbed areas within the forested uplands, (2) restoring eroding stream channels, and (3) managing and treating urban uplands (e.g. street sweeping, installing and maintaining infiltration and stormwater treatment facilities) will also achieve pollutant load reductions in waters tributary to Lake Tahoe.</p> <p>The Municipal Stormwater National Pollutant Discharge Elimination System (NPDES) permit (Order No R6T-2011-101A1), requires the California- based Lake Tahoe municipalities (El Dorado and Placer Counties, and the City of South Lake Tahoe) and the California Department of Transportation (CalTrans) to develop and implement comprehensive pollutant load reduction programs (PLRPs) to meet specified pollutant load reduction requirements. Implementation measures include a variety of alternative treatment options, roadway operation practices, and local ordinances to reduce average annual pollutant loads. These Lake Tahoe TMDL implementation efforts will also reduce inputs of phosphorus to this impaired segment of Bijou Park Creek. Maintenance activities and restoring small disturbed sites that are underway, or planned and expected, within the forested uplands of this watershed will also reduce or avoid increases in fine sediment and nutrient loads.</p> <p>Additionally, the Lake Tahoe TMDL also requires implementing measures to control stationary sources of dust, which help reduce pollutant loads of fine sediments. Implementation of these measures helps address the phosphorus loading that impairs Bijou Park Creek that is associated with these fine sediments from dust sources.</p> <p>Pollutant load reductions within Bijou Park Creek will be tracked through implementation of the detailed performance and compliance measures and assessment and reporting protocols included in the Lake Tahoe TMDL. The TMDL Management System project is currently establishing activity-based tracking and reporting requirements to assess activities that are</p>	<p>CSLT R2 (continued): The Water Board agrees that similar to several creeks in the Lake Tahoe Basin, Bijou Park Creek has naturally high levels of iron. The State and Regional Water Boards are currently exploring options to address water bodies that may be naturally high in pollutants. Until the natural sources of pollutants are addressed by either an exclusion policy or an ambient iron concentration for Bijou Park Creek is developed by the Water Board, the secondary MCL (or maximum contaminant level) of 0.3 mg/L is applied to evaluate compliance with the MUN beneficial use. The sample results available for Bijou Park Creek indicate that iron concentrations measured in Bijou Park Creek exceed the secondary MCL for iron indicating that the MUN use is not supported. The iron concentrations measured in nine of nine samples evaluated for the MUN use exceeds the secondary MCL of 0.3 mg/L, and five of the nine samples exceeds the secondary MCL by an order of magnitude (or 10 times the MCL).</p> <p>For future assessment cycles, if a natural source exclusion policy is developed the final listing decision for Bijou Park Creek-Iron may be re-evaluated. Additionally, this listing may be addressed through revision of the water quality objective rather than through a TMDL.</p> <p>CSLT R3: See response provided on next page.</p>

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<p>City of South Lake Tahoe May 19, 2014 Page 3 of 6</p> <p>Draft 305(d)/303(d) List Comments</p> <p>expected to reduce pollutant loading from non-urban sources. The Lahontan Water Board and the Nevada Division of Environmental Protection currently implement a Lake Tahoe TMDL Management System for managing, tracking, integrating and evaluating new information generated from TMDL implementation actions, effectiveness monitoring, research efforts, and other factors such as climate change and wildfires.</p> <p>The Management System is based on an adaptive management framework to (1) link load reduction effectiveness with project implementation monitoring to improve project design and to assess if actual environmental improvement is occurring as expected; (2) establish guidance and operation protocols for how new information will be incorporated into project designs and TMDL program implementation; (3) establish prioritized TMDL research needs to fill data gaps and reduce uncertainties, and (4) implement a process for updating and reporting pollutant load reduction estimates and tracking projects within the TMDL implementation timeline.</p> <p>The Lake Tahoe TMDL requires implementation, effectiveness, and status and trends monitoring. Tributary stream status and trends monitoring will track long-term changes in water quality conditions relative to established water quality standards or goals, and project-specific monitoring will be used to assess the efficacy of various implementation measures.</p> <p>Long-term water quality trends and pollutant load reduction tracking in Bijou Park Creek will be captured through the ongoing efforts of the Lake Tahoe Interagency Monitoring Program (LTIMP) whose primary objective is to monitor discharge, nutrient load, and sediment loads from representative streams that flow into Lake Tahoe. Nitrogen and phosphorus loading calculations are performed using the LTIMP flow and nutrient concentration database.</p> <p>Pollutant loading of Phosphorus from Bijou Park Creek (a tributary to Lake Tahoe) is currently addressed through the existing Lake Tahoe TMDL. This tributary approach was used for impairment listings for Heavenly Creek (Decision IDs 28449 and 19683), Trout Creek (Decision IDs 20459, 20304, 20460, and 19951), Upper Truckee River (Decision IDs 27228 and 20022) and Ward Creek (Decision IDs 20141, 27275 and 20142). The creation of a new TMDL for this one tributary to Lake Tahoe would create redundant and duplicative requirements currently addressed by the Lake Tahoe TMDL.</p> <p><i>The City requests that the Category for this new listing be revised to 5B, as this new impairment listing is already being addressed by a USEPA-approved TMDL.</i></p> <p>3. Bijou Park Creek, New Listing: Total Nitrogen as N (Category 5A, Completion Year 2025)</p> <p>The supporting information for this listing (Decision ID 31770) confirms that Bijou Park Creek is an upstream tributary of Lake Tahoe. The Lake Tahoe TMDL (adopted by the Regional Board on November 16, 2010 and approved by the USEPA on August 17, 2011) notes that the largest source of nitrogen in the Lake Tahoe (and tributary watersheds) is transportation-related emissions that lead to atmospheric nitrogen deposition. The Lake Tahoe TMDL also includes implementation measures to reduce atmospheric nitrogen sources. The Tahoe Regional Planning Agency leads efforts to improve transportation infrastructure and reduce overall vehicle miles traveled in the Lake Tahoe region to reduce emissions that lead to atmospheric nutrient loading. Public transit and vehicle fleet turnover are expected to further reduce nutrient-laden emissions in the Tahoe basin that will reduce nitrogen loading in the Bijou Park Creek watershed.</p> <p>Engineering Department, Services Center • 1052 Tata Lane • South Lake Tahoe, CA 96150-6323 • (530) 542-7415 • (530) 541-3051 FAX</p>	<p>CSLT R3: As stated in the Water Board conclusion and decision recommendation, Bijou Park Creek is an upstream tributary to Lake Tahoe. The Water Board agrees with the CSLT that the same implementation measures (managing urban runoff discharges through implementation of Caltrans' and CSLT's pollutant load reduction programs, street sweeping, controlling stationary sources of dust) that are prescribed in the Lake Tahoe TMDL approved by USEPA on August 16, 2011, will also address inputs of phosphorus that impact Bijou Park Creek. (See Appendix I- Fact Sheet for Bijou Park Creek – Phosphorus for more details regarding management measures to control phosphorus.) The final listing decisions for Bijou Park Creek- Phosphorus has been changed from "List on 303(d) list (TMDL required list) to "List on 303(d) list (being addressed by USEPA approved TMDL). The Water Board conclusion and decision recommendation associated with the water body-pollutant combination: Bijou Park Creek- Phosphorus have been updated to include pertinent information from the Lake Tahoe TMDL that support this approach.</p> <p>CSLT R4: As stated in the Water Board conclusion and decision recommendation, Bijou Park Creek is an upstream tributary to Lake Tahoe. The Water Board agrees with the CSLT that the same implementation measures (reduction in transportation-related emissions) prescribed in the Lake Tahoe TMDL approved by USEPA on August 16, 2011, will also address inputs of nitrogen that impact Bijou Park Creek. (See Appendix I- Fact Sheet for Bijou Park Creek – Nitrogen for more details regarding management measures to control nitrogen.) The final listing decisions for Bijou Park Creek - Nitrogen has been changed from "List on 303(d) list (TMDL required list) to "List on 303(d) list (being addressed by USEPA approved TMDL). The Water Board conclusion and decision recommendation associated with the water body pollutant combination: Bijou Park Creek- Nitrogen has been updated to include pertinent information from the Lake Tahoe TMDL that support this approach. CSLT R4 continued on next page.</p>

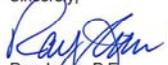
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<p style="font-size: small;">City of South Lake Tahoe May 19, 2014 Page 4 of 6</p> <p style="text-align: right; font-size: small;">Draft 305(d)/303(d) List Comments</p> <p>Pollutant load reductions within the Bijou Park Creek watershed will be tracked through implementation of detailed performance and compliance measures and assessment and reporting protocols included in the Lake Tahoe TMDL. The Lahontan Water Board and the Nevada Division of Environmental Protection are currently implementing a Lake Tahoe TMDL Management System for managing, tracking, integrating and evaluating new information generated from TMDL implementation actions, effectiveness monitoring, research efforts, and other factors such as climate change and wildfires. The Management System is currently establishing activity-based tracking and reporting requirements to assess activities that are expected to reduce pollutant loading from non-urban sources, as discussed in detail above.</p> <p>The Management System is based on an adaptive management framework to (1) link load reduction effectiveness with project implementation monitoring to improve project design and to assess if actual environmental improvement is occurring as expected; (2) establish guidance and operation protocols for how new information will be incorporated into project designs and TMDL program implementation; (3) establish prioritized TMDL research needs to fill data gaps and reduce uncertainties, and (4) implement a process for updating and reporting pollutant load reduction estimates and tracking projects within the TMDL implementation timeline.</p> <p>The Lake Tahoe TMDL requires implementation, effectiveness, and status and trends monitoring. Existing Lake Tahoe TMDL tributary stream status and trends monitoring will track long-term changes in water quality conditions relative to established water quality standards or goals, and project-specific monitoring will be used to assess the efficacy of various implementation measures.</p> <p>Pollutant loading of Total Nitrogen as N from Bijou Park Creek (a tributary to Lake Tahoe) is currently addressed through the existing Lake Tahoe TMDL. This approach was used for related impairments in Heavenly Creek (Decision IDs 28449 and 19683), Trout Creek (Decision IDs 20459, 20304, 20460, and 19951), Upper Truckee River (Decision IDs 27228 and 20022) and Ward Creek (Decision IDs 20141, 27275 and 20142). The creation of a new TMDL for this one tributary to Lake Tahoe would create redundant and duplicative requirements currently addressed by the Lake Tahoe TMDL.</p> <p><i>The City requests that the Category for this new listing be revised to 5B, as this new impairment listing is already being addressed by a USEPA-approved TMDL.</i></p> <p>4. Bijou Park Creek, New Listing: Turbidity (Category 5A, Completion Year 2025) Bijou Park Creek is an upstream tributary of Lake Tahoe. The Lake Tahoe TMDL (adopted by the Regional Board on November 16, 2010 and approved by the USEPA on August 17, 2011) addresses clarity (turbidity) impairments primarily caused by suspended sediment. On the ground efforts required by the Lake Tahoe TMDL that focus on (1) stabilizing disturbed areas within the forested uplands and (2) managing and treating urban uplands (e.g. street sweeping, installing and maintaining infiltration and stormwater treatment facilities) will also achieve pollutant load reductions of sediment within this waterbody segment, which is tributary to Lake Tahoe.</p> <p>The Lake Tahoe TMDL identifies actions that resource management agencies, California-based Lake Tahoe municipalities (El Dorado and Placer Counties, and the City of South Lake Tahoe) and California Department of Transportation must take to reduce fine sediment and nutrient loading to the Lake. Municipal Stormwater NPDES permits require the municipalities and CalTrans to develop and implement comprehensive PLRPs to meet specified pollutant load</p>	<div style="border: 1px solid black; padding: 10px; margin-bottom: 10px;"> <p>CSLT R4 continued: The final listing decision for Bijou Park Creek has been changed from “List on 303(d) list (TMDL required list) to “List on 303(d) list (being addressed by USEPA approved TMDL). The Water Board conclusion and decision recommendation associated with the water body pollutant combination: Bijou Park Creek- Nitrogen has been updated to include pertinent information in the Lake Tahoe TMDL that support this approach.</p> </div> <div style="border: 1px solid black; padding: 10px;"> <p>CSLT R5: As stated in the Water Board conclusion and decision recommendation, Bijou Park Creek is an upstream tributary to Lake Tahoe. The material causing turbidity impairment in Bijou Park creek includes both organic and inorganic suspended and dissolved particles. Implementation of control measures prescribed in the Lake Tahoe TMDL, adopted by USEPA on August 16 2011, are intended, in part, to reduce organic and inorganic fine sediment particles that are the most dominant pollutant contributing to the impairment of the lake's clarity. Water Board staff acknowledge that many of the same control measures (stabilizing and re-vegetating road shoulders, street sweeping, installing and maintaining storm water treatment controls) being implemented to reduce fine sediment from entering Lake Tahoe and its tributaries, will also address the turbidity impairment within Bijou Park Creek. (See Appendix I- Fact Sheet for Bijou Park Creek – Turbidity for more details regarding management measures to control turbidity and suspended sediments.) CSLT R5 continued on next page.</p> </div>
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Comments	Responses
<p style="font-size: small;">City of South Lake Tahoe May 19, 2014 Page 5 of 6</p> <p style="text-align: right; font-size: small;">Draft 305(d)/303(d) List Comments</p> <p>reduction requirements. Expected implementation measures include a variety of alternative treatment options, roadway operation practices, and local ordinances to reduce average annual pollutant loads. These Lake Tahoe TMDL implementation efforts will also reduce inputs of sediment to this impaired segment of Bijou Park Creek.</p> <p>Additionally, the Lake Tahoe TMDL requires that the USFS-Lake Tahoe Basin Management Unit undertake restoration actions to reduce erosion and treat urban storm water runoff from paved and unpaved roadways, campgrounds, and recreational trails within the Lake Tahoe watershed. Storm water collection, conveyance, and treatment facilities coupled with revegetation of previously disturbed lands and stabilizing areas designated for recreational use are expected to reduce erosion and help control sediment discharges resulting in elevated turbidity levels in Bijou Park Creek.</p> <p>Finally, the Lake Tahoe TMDL requires implementation of measures to control stationary sources of dust, which help reduce pollutant loads of fine sediments. Implementation of these measures helps address the sedimentation/siltation loading that impairs Bijou Park Creek from dust sources.</p> <p>Pollutant load reductions within Bijou Park Creek tributary watershed will be tracked through implementation of detailed performance and compliance measures and assessment and reporting protocols included in the Lake Tahoe TMDL. As discussed above, the TMDL Management System is establishing activity-based tracking and reporting requirements to assess activities that are expected to reduce pollutant loading from non-urban sources.</p> <p>The Lake Tahoe TMDL requires implementation, effectiveness, and status and trends monitoring. Tributary stream status and trends monitoring will track long-term changes in water quality conditions relative to established water quality standards or goals, and project-specific monitoring will be used to assess the efficacy of various implementation measures.</p> <p>Long-term water quality trends and pollutant load reduction tracking in Bijou Park Creek will be captured through the ongoing efforts of the LTIMP, whose primary objective is to monitor discharge, nutrient load, and sediment loads from representative streams that flow into Lake Tahoe.</p> <p>Pollutant loading of turbidity, sediment and siltation from Bijou Park Creek (a tributary to Lake Tahoe) is currently addressed through the existing Lake Tahoe TMDL. This approach was used for related impairments for Heavenly Creek (Decision IDs 28449 and 19683), Trout Creek (Decision IDs 20459, 20304, 20460, and 19951), Upper Truckee River (Decision IDs 27228 and 20022) and Ward Creek (Decision IDs 20141, 27275 and 20142).</p> <p>The creation of a new TMDL for this one tributary to Lake Tahoe would create redundant and duplicative requirements currently addressed by the Lake Tahoe TMDL.</p> <p><i>The City requests that the Category for this new listing be revised to 5B, as this new impairment listing is already being addressed by a USEPA-approved TMDL.</i></p> <p>5. Tallac Creek: Pathogens (Category 5A, Completion Year 2019) The supporting information for this listing (Decision ID 30390) notes that the Line of Evidence are based on unspecified data, and the LOE is a placeholder to support a 303(d) listing decision made prior to 2006. It should be recognized that historic grazing is the most likely source.</p> <p style="font-size: x-small; margin-top: 20px;">Engineering Department, Services Center • 1052 Tata Lane • South Lake Tahoe, CA 96150-6323 • (530) 542-7415 • (530) 541-3051 FAX</p>	<div style="border: 1px solid black; padding: 10px; margin-bottom: 20px;"> <p>CSLT R5 continued: The final listing decisions for Bijou Park Creek – Turbidity has been changed from “List on 303(d) list (TMDL required list) to “List on 303(d) list (being addressed by USEPA approved TMDL). The Water Board conclusion and decision recommendation associated with the water body pollutant combination: Bijou Park Creek- Turbidity has been updated to include pertinent information from the Lake Tahoe TMDL that support this approach.</p> </div> <div style="border: 1px solid black; padding: 10px;"> <p>CSLT R6: Water Board staff has been evaluating bacteria levels in Tallac Creek at Highway 89 and Baldwin Beach since 2010 for both E. coli and fecal coliform. This data has been inputted into CEDEN. This data is available to the public (www.ceden.org) and will be assessed next listing cycle to determine if it is meeting the bacteria standard of the Basin Plan and is no longer impaired. Without new data for evaluation, this water body cannot be taken off the 303(d) list until sufficient data is presented to show that it meets the bacteria standard as per the Listing Policy requirements.</p> </div>

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Comments	Responses
<p>City of South Lake Tahoe May 19, 2014 Page 6 of 6</p> <p style="text-align: right;">Draft 305(d)/303(d) List Comments</p> <p><i>Is should be recognized that historic grazing is the most likely source of contamination, and the City believes this impaired can be addressed by regulatory actions other than TMDL, such as restrictions on grazing allotments. The City requests a Category 4B designation for this impairment.</i></p> <p>6. Trout Creek (above HWY 50): Pathogens (Category 5A, Completion Year 2013) The Trout Creek (above HWY 50) segment is listed for completion "2013", which appears to be a typo, as the other portions of the Upper Truckee River and surrounding pathogen impaired waterbodies are designated for completion in 2019. Decision ID 28339 (Trout Creek, above HWY 50) notes the expected Fecal Coliform TMDL Completion Date is 2019, not 2013.</p> <p><i>Is should be recognized that historic grazing is the most likely source of contamination, and the City believes this impaired can be addressed by regulatory actions other than TMDLs. As such, the City requests a Category 4B designation for this impairment, and the Completion Year be listed as 2019.</i></p> <p>7. Trout Creek (below HWY 50): Pathogens (Category 5A, Completion Year 2013) The supporting information for this listing (Decision ID 30194, LOE ID 27160) includes information in the Environmental Conditions that livestock grazing formerly occurred in the meadow near the confluence where samples were collected. LOE 27160 noted that 3 of the 19 collected samples exceeded the water quality objective for fecal coliform.</p> <p><i>Is should be recognized that historic grazing is the most likely source of contamination, and the City believes this impaired can be addressed by regulatory actions other than TMDL, such as restrictions on grazing allotments. The City requests a Category 4B designation for this impairment.</i></p> <p>Thank you for the opportunity to provide comments on the Lahontan Regional Water Quality Control Board's Clean Water Act Section 305(b) and 303(d) Assessment and Draft Integrated Report. The City is dedicated to improving water quality in all receiving waters within the Lake Tahoe basin, and supports policies that effectively utilize existing efforts and prioritize feasible solutions to meet water quality objectives within the basin. Please contact the City's Stormwater Program Coordinator, Jason Burke, at (530) 542-6038 if you have any questions or need additional information.</p> <p>Sincerely,  Ray Jarvis, P.E. Public Works Director</p> <p>Attachment 1 – Highlighted portions of Bijou Park Creek Supporting Information</p> <p>Cc: Nancy Kerry, City Manager Sarah Hussong-Johnson, P.E., Deputy Public Works Director/ City Engineer Robert Larsen, Lahontan Regional Quality Control Board Jason Burke, Stormwater Program Coordinator</p> <p>Engineering Department, Services Center • 1052 Tata Lane • South Lake Tahoe, CA 96150-6323 • (530) 542-7415 • (530) 541-3051 FAX</p>	<div data-bbox="1071 251 1900 625" style="border: 1px solid black; padding: 5px;"> <p>CSLT R7: Water Board staff has been evaluating bacteria levels in Trout Creek at Highway 50 and at the confluence with the Upper Truckee River since 2010 for both E. coli and fecal coliform. This data has been inputted into CEDEN. This data is available to the public (www.ceden.org) and will be assessed next listing cycle to determine if it is meeting the bacteria standard of the Basin Plan and is no longer impaired. Without new data for evaluation, this water body cannot be taken off the 303(d) list until sufficient data is presented to show that it meets the bacteria standard as per the Listing Policy requirements.</p> </div> <div data-bbox="1071 738 1900 803" style="border: 1px solid black; padding: 5px; margin-top: 20px;"> <p>CSLT R8: See response CSLT R7.</p> </div>

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Comments	Responses
<p>The CSLT included 13 pages of attachments that are referred to in the first 3 comments. These pages are not reflected in the responses as this documentation is included as part of the Staff Report.</p>	

Appendix M - Comments Received and Response to Comments

Nilson, Carly@Waterboards

From: Austin, Carrie@Waterboards
Sent: Monday, April 07, 2014 1:57 PM
To: Martorano, Nicholas@Waterboards; Carter, Karen@CDCR; Carter, Katharine@Waterboards; Fitzgerald, Rebecca@Waterboards; Lim, Jeong-Hee@Waterboards; Shukry-Zeywar, Nadim@Waterboards; Nilson, Carly@Waterboards; Booth, Richard@Waterboards
Cc: Cooke, Janis@Waterboards; Morris, Patrick@Waterboards; Wood, Michelle@Waterboards; Louie, Stephen@Waterboards; Palumbo, Amanda@Waterboards; Poulson, Zane@Waterboards; Lichten, Keith@Waterboards; Looker, Richard@Waterboards; Gillespie, Stacy@Waterboards
Subject: Mercury and draft 2012 Integrated Report

Hello colleagues,

This e-mail is to let you know that those of us working on the statewide mercury control program for reservoirs plan to recommend that R1 & R6 include several more reservoirs in our program than are proposed for the 2012 303(d) list. We think that you might want to share this information at the integrated report roundtable tomorrow, because it applies to nearly all of the other regions, too.

Importantly, placement on the 303(d) list for any reason does not automatically trigger any regulatory action, according to OCC. (It may trigger need for a TMDL, but then the TMDL carries out the regulatory action—the 303(d) is not itself a regulatory action.)

Accordingly, placement of a reservoir on the list for elevated fish methylmercury levels does not automatically trigger inclusion in the statewide mercury control program for reservoirs. We plan for it to be a separate action to be undertaken by each Regional Water Board.

Initially, 74 reservoirs already listed on the 2010 303(d) list are included in the statewide Reservoir Mercury Control Program. In the future, after State Water Board adoption of this program, when Water Board reviews result in reservoirs being identified as having fish with elevated methylmercury, these additional reservoirs will be included in this Reservoir Mercury Control Program.

We understand that for the 2012 list, the following regions recommend the following additional mercury listings for reservoirs:

- R1 recommends listing of Copco Lake (Copco 1), Iron Gate Reservoir, Tule Lake, and Ruth Lake (from Table 6)
- R6 recommends listing of Little Rock Reservoir (from Appendix A, new listings for mercury)
- R7 none – 2012 list already adopted (from Attachment Four)

Here is an example of the reservoirs in R1 & R6 that we expect to recommend in the future be added to the statewide mercury control program for reservoirs. This example is based on average fish mercury > 0.2 mg/kg, our current definition of a reservoir, and a weight of evidence approach. (Note that there are lots of ongoing discussions about the statewide fish tissue objective and the listing policy, so this is only an example.)

- R1: Copco Lake, Iron Gate Reservoir, Ruth Lake, Spring Lake, and Dead Lake
- R6: Little Rock Reservoir, Lake Gregory, Lake Arrowhead, Silverwood Lake, Upper Twin Lake
- R7: none

That was the quick list. Here's the details on R1 and R6:

R1: Copco Lake, Iron Gate Reservoir, Ruth Lake, Spring Lake, and Dead Lake

- Tule Lake is not a reservoir and so would not be included in the reservoir mercury control program.
- Dead Lake is a former lumber mill pond in the Tolowa Dunes State Park. We recommend that it be considered for inclusion in the program because it is a manmade feature that we think exceeds 20 acre-feet in capacity, and, even though the SWAMP Lake Study data set has only one sampling location, 13 of 16 fish samples exceed 0.2 mg/kg. Per aerial photo, the lake is ~27 acres. Assuming it has a depth of at least 1 foot, it exceeds the current reservoir definition of minimum 20 acre-feet capacity.
- Spring Lake (aka Santa Rosa Creek Reservoir) is formed by a dam and has a capacity of 3550 acre-feet. We recommend that it be included in the program because it is a reservoir with capacity greater than 20 acre-feet and, even though the SWAMP Lake Study data set has only one sampling location, 8 of 11 fish samples exceed 0.2 mg/kg.

R6: Little Rock Reservoir, Lake Gregory, Lake Arrowhead, Silverwood Lake, Upper Twin Lake

- The SWAMP Lake Study data set has only one sampling location for Gregory, Arrowhead, Silverwood, and Upper Twin.
- However:
 - 5 of 13 samples in Lake Gregory exceed 0.2 mg/kg.
 - 12 of 16 samples in Lake Arrowhead exceed 0.2 mg/kg.
 - 15 of 16 samples in Silverwood Lake exceed 0.2 mg/kg.
 - 2 of 3 samples in Upper Twin Lake exceed 0.2 mg/kg.
- All five of these are formed by dams with capacities between 2,000 and 78,000 acre-feet, and therefore meet our definition of a reservoir.

Here's definition of reservoir from staff report we're currently circulating for internal review (Section 1.6.1)

For this program, reservoirs are defined as natural or artificial impoundments of at least 20 acre-feet water storage capacity that contain fish and have constructed control structures such as dams, levees, or berms to contain or otherwise manage water, and/or were excavated. Names are often misleading; many reservoirs are called lakes on local and U.S. Geological Survey topographic maps even though they are created by structures and excavations.

Artificial impoundments are places where water ponds behind engineered structures (e.g., dams, levees, berms) and anthropogenic landscape alterations. Some of these constructed changes were made purposefully to create artificial lakes, while others were made for other reasons like dredging or quarrying but subsequently created artificial lakes. Many artificial lakes were formed by flood control and stormwater facilities. Barriers which impound 15 acre-feet or less of water are not dams according to the Porter-Cologne Water Quality Control Act (California Water Code, Division 3, section 6003). Only a few California dams provide less than 20 acre-feet water storage capacity (DWR 2010a and 2010b).

Don't hesitate to contact me with any questions. If you would like to discuss this further, we can set up a teleconference to include Stephen Louie and Michelle Wood in R5 who are much, much more knowledgeable about the reservoir fish data than I am. Carrie

Appendix M – Comments Received and Response to Comments

<u>Comment</u>	<u>Response</u>
<p>Nilson, Carly@Waterboards</p> <hr/> <p>From: Austin, Carrie@Waterboards Sent: Monday, April 07, 2014 1:57 PM To: Martorano, Nicholas@Waterboards; Carter, Karen@CDCR; Carter, Katharine@Waterboards; Fitzgerald, Rebecca@Waterboards; Lim, Jeong-Hee@Waterboards; Shukry-Zeywar, Nadim@Waterboards; Nilson, Carly@Waterboards; Booth, Richard@Waterboards Cc: Cooke, Janis@Waterboards; Morris, Patrick@Waterboards; Wood, Michelle@Waterboards; Louie, Stephen@Waterboards; Palumbo, Amanda@Waterboards; Poulson, Zane@Waterboards; Lichten, Keith@Waterboards; Looker, Richard@Waterboards; Gillespie, Stacy@Waterboards Subject: Mercury and draft 2012 Integrated Report</p> <p>Hello colleagues,</p> <p>This e-mail is to let you know that those of us working on the statewide mercury control program for reservoirs plan to recommend that R1 & R6 include several more reservoirs in our program than are proposed for the 2012 303(d) list. We think that you might want to share this information at the integrated report roundtable tomorrow, because it applies to nearly all of the other regions, too.</p> <p>Importantly, placement on the 303(d) list for any reason does not automatically trigger any regulatory action, according to OCC. (It may trigger need for a TMDL, but then the TMDL carries out the regulatory action—the 303(d) is not itself a regulatory action.)</p> <p>Accordingly, placement of a reservoir on the list for elevated fish methylmercury levels does not automatically trigger inclusion in the statewide mercury control program for reservoirs. We plan for it to be a separate action to be undertaken by each Regional Water Board.</p> <p>Initially, 74 reservoirs already listed on the 2010 303(d) list are included in the statewide Reservoir Mercury Control Program. In the future, after State Water Board adoption of this program, when Water Board reviews result in reservoirs being identified as having fish with elevated methylmercury, these additional reservoirs will be included in this Reservoir Mercury Control Program.</p> <p>We understand that for the 2012 list, the following regions recommend the following additional mercury listings for reservoirs:</p> <ul style="list-style-type: none"> • R1 recommends listing of Copco Lake (Copco 1), Iron Gate Reservoir, Tule Lake, and Ruth Lake (from Table 6) • R6 recommends listing of Little Rock Reservoir (from Appendix A, new listings for mercury) • R7 none – 2012 list already adopted (from Attachment Four) <p>Here is an example of the reservoirs in R1 & R6 that we expect to recommend in the future be added to the statewide mercury control program for reservoirs. This example is based on average fish mercury > 0.2 mg/kg, our current definition of a reservoir, and a weight of evidence approach. (Note that there are lots of ongoing discussions about the statewide fish tissue objective and the listing policy, so this is only an example.)</p> <ul style="list-style-type: none"> • R1: Copco Lake, Iron Gate Reservoir, Ruth Lake, Spring Lake, and Dead Lake • R6: Little Rock Reservoir, Lake Gregory, Lake Arrowhead, Silverwood Lake, Upper Twin Lake • R7: none <p>That was the quick list. Here's the details on R1 and R6:</p>	<div style="border: 1px solid black; padding: 10px;"> <p>Region 2-R1: In agreement with new direction from Water Board staff, Regional Board staff has changed the assessment of mercury in fish tissue. Originally, the data for mercury in fish tissue was evaluated using composite samples. Individual fish that were collected on the same day were composited based on fish species. Though the samples were collected from a single location on a single day, fish move throughout a lake and accumulate mercury in tissue over time. Therefore, spatial and temporal independence does not apply and it is more appropriate to evaluate fish tissue samples individually and not combining individual fish tissue samples into a composite sample. This approach is consistent with State Board guidance and for protection of human health.</p> <p>It is important to include the reservoirs on the 303(d) list when the data show the fish tissue contains elevated mercury levels and to inform the public about these conditions.</p> </div>

Appendix M – Comments Received and Response to Comments

<u>Comment</u>	<u>Response</u>
<p>R1: Copco Lake, Iron Gate Reservoir, Ruth Lake, Spring Lake, and Dead Lake</p> <ul style="list-style-type: none"> • Tule Lake is not a reservoir and so would not be included in the reservoir mercury control program. • Dead Lake is a former lumber mill pond in the Tolowa Dunes State Park. We recommend that it be considered for inclusion in the program because it is a manmade feature that we think exceeds 20 acre-feet in capacity, and, even though the SWAMP Lake Study data set has only one sampling location, 13 of 16 fish samples exceed 0.2 mg/kg. Per aerial photo, the lake is ~27 acres. Assuming it has a depth of at least 1 foot, it exceeds the current reservoir definition of minimum 20 acre-feet capacity. • Spring Lake (aka Santa Rosa Creek Reservoir) is formed by a dam and has a capacity of 3550 acre-feet. We recommend that it be included in the program because it is a reservoir with capacity greater than 20 acre-feet and, even though the SWAMP Lake Study data set has only one sampling location, 8 of 11 fish samples exceed 0.2 mg/kg. <p>R6: Little Rock Reservoir, Lake Gregory, Lake Arrowhead, Silverwood Lake, Upper Twin Lake</p> <ul style="list-style-type: none"> • The SWAMP Lake Study data set has only one sampling location for Gregory, Arrowhead, Silverwood, and Upper Twin. • However: <ul style="list-style-type: none"> ○ 5 of 13 samples in Lake Gregory exceed 0.2 mg/kg. ○ 12 of 16 samples in Lake Arrowhead exceed 0.2 mg/kg. ○ 15 of 16 samples in Silverwood Lake exceed 0.2 mg/kg. ○ 2 of 3 samples in Upper Twin Lake exceed 0.2 mg/kg. • All five of these are formed by dams with capacities between 2,000 and 78,000 acre-feet, and therefore meet our definition of a reservoir. <p>Here's definition of reservoir from staff report we're currently circulating for internal review (Section 1.6.1)</p> <p>For this program, reservoirs are defined as natural or artificial impoundments of at least 20 acre-feet water storage capacity that contain fish and have constructed control structures such as dams, levees, or berms to contain or otherwise manage water, and/or were excavated. Names are often misleading; many reservoirs are called lakes on local and U.S. Geological Survey topographic maps even though they are created by structures and excavations.</p> <p>Artificial impoundments are places where water ponds behind engineered structures (e.g., dams, levees, berms) and anthropogenic landscape alterations. Some of these constructed changes were made purposefully to create artificial lakes, while others were made for other reasons like dredging or quarrying but subsequently created artificial lakes. Many artificial lakes were formed by flood control and stormwater facilities. Barriers which impound 15 acre-feet or less of water are not dams according to the Porter-Cologne Water Quality Control Act (California Water Code, Division 3, section 6003). Only a few California dams provide less than 20 acre-feet water storage capacity (DWR 2010a and 2010b).</p> <p>Don't hesitate to contact me with any questions. If you would like to discuss this further, we can set up a teleconference to include Stephen Louie and Michelle Wood in R5 who are much, much more knowledgeable about the reservoir fish data than I am. Carrie</p>	<p>Region 2-R2: Though the samples were collected from a single location on a single day, fish move throughout a lake and accumulate mercury in tissue over time. Therefore, spatial and temporal independence does not apply and it is more appropriate to evaluate fish tissue samples individually. This approach is consistent with State Board guidance and for protection of human health.</p> <p>Changes to staff recommendations include the addition of Lake Gregory and Lake Arrowhead to the proposed 2012 303(d) list of impaired water bodies. Based on the evaluation of individual fish samples, the number of exceedances in Lake Gregory and Lake Arrowhead supports listing on the 303(d) list in accordance with the Listing Policy. Upper Twin Lake was not recommended for listing by staff because of the limited data set in determining impairment. More data is necessary to confidently evaluate Upper Twin Lake for impairment.</p> <p>The mercury threshold of 0.2 mg/kg is the USEPA 304(a) recommended water quality criterion for concentrations of methylmercury in fish tissue of a certain size and length.</p>