

4. IMPLEMENTATION PLANS

Table 4-10 Scott River Sediment and Temperature TMDL Implementation Actions*		
Topic	Responsible Parties	Actions
Roads & Sediment Waste Discharges	<ul style="list-style-type: none"> Parties Responsible for Roads and Sediment Waste Discharge Sites. Regional Water Board. 	<ul style="list-style-type: none"> The Regional Water Board encourages parties responsible for roads and sediment waste discharge sites to take actions necessary to prevent, minimize, and control road-caused sediment waste discharges. Such actions may include the inventory, prioritization, control, monitoring, and adaptive management of sediment waste discharge sites and proper road inspection and maintenance. The Regional Water Board's Executive Officer shall require parties responsible for roads, on an as-needed, site-specific basis, to develop and submit an Erosion Control Plan and a Monitoring Plan. An Erosion Control Plan shall describe, in detail, sediment waste discharge sites and how and when those sites are to be controlled. By September 8, 2008, criteria shall be developed for determining when an Erosion Control Plan shall be required, although nothing precludes the Executive Officer from requiring Erosion Control Plans prior to this date. Should discharges or threatened discharges of sediment waste that could negatively affect the quality of waters of the State be identified in an Erosion Control Plan or by other means, dischargers shall be required to implement their Erosion Control Plan and monitor sediment waste discharge sites through appropriate permitting or enforcement actions.
Roads	<ul style="list-style-type: none"> California Department of Transportation (Caltrans). Regional Water Board. 	<ul style="list-style-type: none"> Regional Water Board staff shall evaluate the effects of Caltrans' state-wide NPDES permit, storm water permit, and waste discharge requirements (collectively known as the Caltrans Storm Water Program) by September 8, 2008. The evaluation shall determine the adequacy and effectiveness of the Caltrans Storm Water Program in preventing, reducing, and controlling sediment waste discharges and elevated water temperatures in the North Coast Region, including the Scott River watershed. If Regional Water Board staff find that the Caltrans Storm Water Program is not adequate and effective, Regional Water Board staff shall develop specific requirements, for State Water Board consideration, to be incorporated into the Caltrans Storm Water Program at the earliest opportunity, or the Regional Water Board shall take other appropriate permitting or enforcement actions.
Roads	<ul style="list-style-type: none"> County of Siskiyou (County). Regional Water Board. 	<ul style="list-style-type: none"> The Regional Water Board and the County shall work together to draft and finalize a Memorandum of Understanding (MOU) to address county roads in the Scott River watershed. The MOU shall be drafted and ready for consideration by the appropriate decision-making body(ies) of the County by September 8, 2008. The following items shall be addressed during MOU development: <ol style="list-style-type: none"> A date for the initiation and completion of an inventory of all sediment waste discharge sites caused by county roads within the Scott River watershed, which can be done with assistance from the Five Counties Salmonid Conservation Program. A date for the completion of a priority list of sediment waste discharge sites. A date for the completion of a schedule for the repair and control of sediment waste discharge sites. A date for the completion of a document describing the sediment control practices to be implemented by the County to repair and control sediment waste discharge sites, which can be done with assistance from the Five Counties Salmonid Conservation Program. A description of the sediment control practices, maintenance practices, and other management measures to be implemented by the County to prevent future sediment waste discharges, which can be done with assistance from the Five Counties Salmonid Conservation Program. A monitoring plan to ensure that the sediment control practices are implemented as proposed and effective at controlling discharges of sediment waste. A commitment by the County to complete the inventory, develop the priority list, develop and implement the schedule, develop and implement sediment control practices, implement the monitoring plan, and conduct adaptive management.

Table 4-10 Scott River Sediment And Temperature TMDL Implementation Actions* (cont.)		
Topic	Responsible Parties	Actions
Grading	<ul style="list-style-type: none"> County of Siskiyou (County). Regional Water Board. 	<ul style="list-style-type: none"> The Regional Water Board encourages the County to develop a comprehensive ordinance addressing roads, land disturbance activities, and grading activities outside of subdivisions in the Scott River watershed, or an equivalent County-enforceable mechanism, by September 8, 2008. The ordinance may be specific to the Scott River watershed or county-wide in scope.
Dredge Mining	<ul style="list-style-type: none"> Regional Water Board. 	<ul style="list-style-type: none"> Regional Water Board staff shall review laws and regulations that address water quality effects of suction dredge mining and shall investigate the impact of suction dredge mining activities on sediment and temperature loads in the Scott River watershed by September 8, 2009. If Regional Water Board staff find that dredge mining activities are discharging deleterious sediment waste and/or resulting in elevated water temperatures, staff shall propose, for Board consideration, the regulation of such discharges through appropriate permitting or enforcement actions.
Temperature & Vegetation	<ul style="list-style-type: none"> Parties Responsible for Vegetation that Shades Water Bodies. Regional Water Board. 	<ul style="list-style-type: none"> The Regional Water Board encourages parties responsible for vegetation that provides shade to a water body in the Scott River watershed to preserve and restore such vegetation. This may include planting riparian trees, minimizing the removal of vegetation that provides shade to a water body, and minimizing activities that might suppress the growth of new or existing vegetation (e.g., allowing cattle to eat and trample riparian vegetation). To address compliance with the Nonpoint Source Policy, the Regional Water Board shall develop and take appropriate permitting and enforcement actions to address the human-caused removal and suppression of vegetation that provides shade to a water body in the Scott River watershed. The Regional Water Board's Executive Officer shall report to the Regional Water Board on the status of the preparation and development of appropriate permitting and enforcement actions by September 8, 2009.
Water Use	<ul style="list-style-type: none"> Water Users. County of Siskiyou (County). Stakeholders. Regional Water Board. 	<ul style="list-style-type: none"> The Regional Water Board encourages water users to develop and implement water conservation practices. The Regional Water Board requests the County, in cooperation with other appropriate stakeholders, to study the connection between groundwater and surface water, the impacts of groundwater use on surface flow and beneficial uses, and the impacts of groundwater levels on the health of riparian vegetation in the Scott River watershed. The study should: (1) consider groundwater located both within and outside of the interconnected groundwater area delineated in the Scott River Adjudication,** (2) the amount of water transpired by trees and other vegetation, and (3), if deleterious impacts to beneficial uses are found, identify potential solutions including mitigation measures and changes to management plans. Should the County determine that it and its stakeholders are able to commit to conducting the above study, the County, in cooperation with other stakeholders, shall develop a study plan by September 8, 2007. The study plan shall include: (1) goals and objectives; (2) data collection methods; (3) general locations of data collection sites; (4) data analysis methods; (5) quality control and quality assurance protocols; (6) responsible parties; (7) timelines and due dates for data collection, data analysis, and reporting; (8) financial resources to be used; and (9) provisions for adaptive change to the study plan and to the study based on additional study data and results, as they are available.
Flood Control & Bank Stabilization	<ul style="list-style-type: none"> Parties Responsible for Flood Control Structures or Dredge, Fill, and/or Bank Stabilization Activities. Regional Water Board. 	<ul style="list-style-type: none"> The Regional Water Board encourages parties responsible for levees and other flood control structures to plant and restore stream banks on and around existing flood control structures. The Regional Water Board shall rely on existing authorities and regulatory tools, such as the 401 Water Quality Certification program, to ensure that flood control and bank stabilization activities in the Scott River watershed are conducted in a manner that minimizes the removal or suppression of vegetation that provides shade to a water body, prevents or minimizes sediment delivery, and minimizes changes in channel morphology that could increase water temperatures.

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Table 4-10 Scott River Sediment And Temperature TMDL Implementation Actions* (cont.)		
Topic	Responsible Parties	Actions
Timber Harvest	<ul style="list-style-type: none"> • Private & Public Parties Conducting Timber Harvest Activities. • Habitat Conservation Plan Holders. • Regional Water Board. 	<ul style="list-style-type: none"> • The Regional Water Board shall use appropriate permitting and enforcement tools to regulate discharges from timber harvest activities in the Scott River watershed, including, but not limited to, cooperation with, and participation in, the California Department of Forestry and Fire Protection's timber harvest project approval process. • The Regional Water Board shall use, where applicable, general or specific waste discharge requirements and waivers of waste discharge requirements to regulate timber harvest activities on private and public lands in the Scott River watershed. • Timber harvest activities on private lands in the Scott River watershed are not eligible for Categorical Waiver C included in the Categorical Waiver of Waste Discharge Requirements for Discharges Related to Timber Harvest Activities on Non-Federal Lands in the North Coast Region (Order No. R1-2004-0016, as it may be amended or updated for time to time) simply through the adoption of this TMDL Action Plan. However, timber harvest activities on private lands in the Scott River watershed may be eligible for Categorical Waivers A, B, D, E, and F, as appropriate. • Where a Habitat Conservation Plan (HCP) is developed, Regional Water Board staff shall work with the HCP holder to develop, for Board consideration, ownership-wide waste discharge requirements for activities covered by the HCP, with any additional restrictions necessary to protect water quality and beneficial uses. • If current laws and regulation governing timber harvest (e.g., the Forest Practice Rules) are changed in a manner that reduces water quality protections, the Regional Board will use its authorities to maintain at a minimum the current level of water quality protection.
U.S. Forest Service & U.S. Bureau of Land Management	<ul style="list-style-type: none"> • U.S. Forest Service (USFS). • U.S. Bureau of Land Management (BLM). • Regional Water Board. 	<ul style="list-style-type: none"> • The Regional Water Board and federal land management agencies, including the USFS and the BLM, shall work together to draft and finalize Memoranda of Understanding (MOU) that shall address sediment waste discharges, elevated water temperatures, and grazing activities within the Scott River watershed. The MOUs shall be drafted and ready for consideration by the appropriate decision-making body(ies) by September 8, 2008. The following items shall be addressed during MOU development: Contents Related to Sediment Waste Discharges: <ol style="list-style-type: none"> 1. A date for the completion of an inventory of all significant sediment waste discharge sites and all roads on USFS/BLM land. 2. A date for the completion of a priority list. 3. A date for the completion of a schedule for the repair and control of significant sediment waste discharge sites. 4. A date for the completion of a document describing the sediment control practices to be implemented by the USFS/BLM to repair and control sediment waste discharge sites. 5. A description of sediment control practices, road maintenance practices, and other management measures to be implemented by the USFS/BLM to prevent or minimize future sediment waste discharges. 6. A monitoring plan to ensure that sediment control practices are implemented as proposed and are effective at controlling discharges of sediment waste. 7. A commitment by the USFS/BLM to complete the inventory, develop the priority list, develop and implement the schedule, develop and implement sediment control practices, implement the monitoring plan, and conduct adaptive management. Contents Related to Elevated Water Temperatures: <ol style="list-style-type: none"> 8. A commitment by the USFS/BLM to continue to implement the Riparian Reserve buffer width requirements. 9. A monitoring plan to ensure that the Riparian Reserve buffer widths are effective at preventing or minimizing effects on natural shade. 10. A commitment by the USFS/BLM to implement the Riparian Reserve monitoring plan and conduct adaptive management.

Table 4-10 Scott River Sediment And Temperature TMDL Implementation Actions* (cont.)		
Topic	Responsible Parties	Actions
U.S. Forest Service & U.S. Bureau of Land Management	<ul style="list-style-type: none"> U.S. Forest Service (USFS). U.S. Bureau of Land Management (BLM). Regional Water Board. 	<p>Continued from previous page.</p> <p>Contents Related to Grazing Activities:</p> <ol style="list-style-type: none"> A date for the completion of a description of grazing management practices and riparian monitoring activities implemented in grazing allotments on USFS/BLM lands. A commitment by the USFS/BLM and the Regional Water Board to determine if existing grazing management practices and monitoring activities are adequate and effective at preventing, reducing, and controlling sediment waste discharges and elevated water temperatures. A commitment by the USFS/BLM to develop revised grazing management practices and monitoring activities, should existing measures be inadequate or ineffective, subject to the approval of the Regional Water Board's Executive Officer. A commitment by the USFS/BLM to implement adequate and effective grazing management practices and monitoring activities and to conduct adaptive management.
Grazing	<ul style="list-style-type: none"> Private Parties Conducting Grazing Activities. Regional Water Board. 	<ul style="list-style-type: none"> The Regional Water Board encourages the parties responsible for grazing activities to take necessary actions to prevent, minimize, and control sediment waste discharges and elevated water temperatures. The Regional Water Board's Executive Officer shall require parties responsible for grazing activities on private lands in the Scott River watershed to develop, submit, and implement a Grazing and Riparian Management Plan and a Monitoring Plan on an as-needed, site-specific basis. A Grazing and Riparian Management Plan shall describe, in detail, (1) sediment waste discharges and sources of elevated water temperatures caused by livestock grazing, (2) how and when such sources are to be controlled and monitored, and (3) management practices that will prevent and reduce future sources. By September 8, 2008, criteria shall be developed for determining when a Grazing and Riparian Management Plan shall be required, although nothing precludes the Executive Officer from requiring Grazing and Riparian Management Plans prior to this date. Should human activities that will likely result in sediment waste discharges and/or elevated water temperatures be proposed or identified, through a Grazing and Riparian Management Plan or by other means, the responsible party(ies) shall be required to implement their Grazing and Riparian Management Plans and monitor through appropriate permitting or enforcement actions.
Siskiyou RCD & Scott River Watershed Council	<ul style="list-style-type: none"> Siskiyou Resource Conservation District (SRCD). Scott River Watershed Council (SRWC). Regional Water Board. 	<ul style="list-style-type: none"> The Regional Water Board and staff shall increase efforts to work cooperatively with the SRCD and SRWC to provide technical support and information to landowners and stakeholders in the Scott River watershed and to coordinate educational and outreach efforts. The Regional Water Board shall encourage the SRWC to (1) implement the strategic actions specified in the Strategic Action Plan and (2) assist landowners in developing and implementing management practices that are adequate and effective at preventing, minimizing, and controlling sediment waste discharges and elevated water temperatures.
Natural Resources Conservation Service and University of California Cooperative Extension	<ul style="list-style-type: none"> Natural Resources Conservation Service (NRCS). University of California Cooperative Extension (UCCE) Regional Water Bd 	<ul style="list-style-type: none"> The Regional Water Board shall increase efforts to work cooperatively with the NRCS and UCCE to provide technical support and information to responsible parties and stakeholders in the Scott River watershed and to coordinate educational and outreach efforts.
CA Dept. of Fish and Game	<ul style="list-style-type: none"> CA Depart. of Fish & Game (CDFG). Regional Water Board. 	<ul style="list-style-type: none"> The Regional Water Board shall encourage the CDFG and aid, where appropriate, in the implementation of necessary tasks, actions, and recovery recommendations as specified in the Recovery Strategy for California Coho Salmon (CDFG 2004) in the Scott River watershed.

* Although the Regional Water Board prefers to pursue the implementation actions listed in Table 4-10, the Regional Water Board shall take appropriate permitting and/or enforcement actions should any of the implementation actions fail to be implemented by the responsible party or should the implementation actions prove to be inadequate.

** Superior Court of Siskiyou County. 1980. Scott River Adjudication: Decree No. 30662.

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IX. Glossary

Adjusted Potential Effective Shade:

The percentage of direct beam solar radiation attenuated and scattered before reaching the ground or stream surface from the potential vegetation conditions, reduced by 10% to account for natural disturbances such as fire, windthrow, disease, and earth movements that reduce the actual riparian vegetation below the site potential.

Compliance and Trend Monitoring:

Monitoring intended to determine, on a watershed scale, if water quality standards are being met, and to track progress towards meeting water quality standards.

Effective Shade:

The percentage of direct beam solar radiation attenuated and scattered before reaching the ground or stream surface from topographic and vegetation conditions.

Groundwater Accretion:

The gradual increase in surface flow in a stream resulting from the influx of groundwater.

Implementation Monitoring:

Monitoring used to assess whether activities and control practices were carried out as planned. This type of monitoring can be as simple as photographic documentation, provided that the photographs are adequate to represent and substantiate the implementation of control practices.

Instream Effectiveness Monitoring:

Monitoring of instream conditions to assess whether sediment control practices are effective at keeping waste sediment from being discharged to a water body. Instream effectiveness monitoring may be conducted upstream and downstream of the discharge point or before, during, and after the implementation of sediment control practices.

Potential Vegetation Conditions:

The most advanced seral stage that nature is capable of developing and making actual at a site in the absence of human interference. Seral stages are the series of plant communities that develop during ecological succession from bare ground to the climax community (e.g., fully mature, old-growth).

Road:

Any vehicle pathway, including, but not limited to: paved roads, dirt roads, gravel roads, public roads and highways, private roads, rural residential roads

and driveways, permanent roads, temporary roads, seasonal roads, inactive roads, trunk roads, spur roads, ranch roads, timber roads, skid trails, and landings which are located on or adjacent to a road.

Salmonids:

Fish species in the family Salmonidae, including but not limited to, salmon, trout, and char.

Sediment:

Any inorganic or organic earthen material, including, but not limited to: soil, silt, sand, clay, and rock.

Sediment Waste:

Sediment that is generated directly or indirectly by anthropogenic activities or projects.

Sediment Waste Discharge Site:

An individual, anthropogenic erosion site that is currently discharging or has the potential to discharge sediment waste to waters of the State.

Thermal Refugia:

Colder areas within a water body that provide cold water refuge from unsuitably warm water.

Timber Harvest Activities:

Commercial and non-commercial activities relating to forest management and timberland conversions. These activities include the cutting or removal of both timber and other solid wood forest products, including Christmas trees. These activities include, but not limited to, construction, reconstruction and maintenance of roads, fuel breaks, firebreaks, watercourse crossings, landings, skid trails, or beds for the falling of trees; fire hazard abatement and fuel reduction activities; burned area rehabilitation; and site preparation that involves disturbance of soil or burning of vegetation following timber harvesting activities; but excluding preparatory tree marking, surveying, or road flagging.

Upslope Effectiveness Monitoring:

Monitoring intended to determine, by assessing upslope conditions, if sediment control practices are effective at keeping waste sediment from being discharged to a water body. This type of monitoring can be as simple as photographic documentation, provided that the photographs are adequate to represent and substantiate that the sediment control practices are effective.