

Final California 2010 Integrated Report(303(d) List/305(b) Report)

Supporting Information

Regional Board 1 - North Coast Region

Water Body Name: [Trinity River HU, Middle HA](#)
Water Body ID: CAR1063102119990604163706
Water Body Type: River & Stream

DECISION ID 17507

Region 1

Trinity River HU, Middle HA

Pollutant: Hexachlorocyclohexane (HCH), alpha | Hexachlorocyclohexane (HCH), beta | Aldrin | Atrazine | Azinphos, Ethyl (Ethyl Guthion) | Bolstar | Carbofuran | Chlordane | Chlorothalonil | Chlorpyrifos | Chlorpyrifos, methyl | Ciodrin | Dacthal | Demeton s | Dichlofenthion | Dichlorvos | Dieldrin | Dimethoate | Dioxathion | Dyfonate (Fonofos or Fonophos) | Endrin | Endrin Ketone | Ethion | Ethoprop | Famphur | Fenchlorphos | Fenitrothion | Fensulfothion | Fenthion | Glyphosate | Heptachlor | Heptachlor epoxide | Hexachlorobenzene/ HCB | Leptophos | Lindane/gamma Hexachlorocyclohexane (gamma-HCH) | Merphos | Methidathion | Methoxychlor | Methyl Parathion | Mevinphos | Molinate | Naled | Oxadiazon | Oxychlordane | Phorate | Phosmet | Phosphamidon | Prometon (Prometone) | Prometryn | Propazine | Secbumeton | Simazine | Simetryn | Sulfotep | Tedion | Terbufos | Terbutylazine | Terbutryn | Tetrachlorvinphos | Thiobencarb/Bolero | Thionazin | Tokuthion | Toxaphene | Trichlorfon | Trichloronate | beta-BHC (Benzenehexachloride or beta-HCH) | cis-Nonachlor | delta-BHC (Benzenehexachloride or delta-HCH) | o,p?-DDD (Dichlorodipenyldichloroethane) | o,p?-DDE (Dichlorodipenyldichloroethylene) | p,p'-DDD (Dichlorodipenyldichloroethane) | p,p'-DDE | p,p?-DDMU | trans-Nonachlor

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

Conclusion: These pollutants are 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. None of the samples in LOE #30171 exceed the water quality objective. The pollutants in LOE #30064 do not have water quality objectives and, therefore, a decision could not be made. The samples were analyzed for 95 pesticides, pesticide constituents, isomers, or metabolites. For each of the 95 pesticide analytes, 3 to 4 samples were collected. The samples were collected as part of the Surface Water Ambient Water Monitoring Program (SWAMP). The data are found in the 5-Year Monitoring Report (NCRWQCB 2008). 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. None of 738 samples for both LOEs, #30064, without criteria, or LOE #30171 with criteria, exceeded the water quality guidelines 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.

RWQCB Board Staff Decision: 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 applicable water quality standards are not being exceeded.

SWRCB Board Staff Decision: After review of this Regional Board decision, SWRCB staff recommend the decision be approved by the State Board.

USEPA Action (if applicable):

Line of Evidence (LOE) for Decision ID 17507, Multiple Pollutants
Trinity River HU, Middle HA

Region 1

LOE ID: 30171

Pollutant: Hexachlorocyclohexane (HCH), alpha | Hexachlorocyclohexane (HCH), beta | Aldrin | Atrazine | Carbofuran | Chlordane | Chlorpyrifos | Dacthal | Dieldrin | Endrin | Glyphosate | Heptachlor | Heptachlor epoxide | Hexachlorobenzene/ HCB | Lindane/gamma Hexachlorocyclohexane (gamma-HCH) | Methoxychlor | Molinate | Simazine | Thiobencarb/Bolero | Toxaphene

LOE Subgroup: Pollutant-Water

Matrix: Water

Fraction: Dissolved

Beneficial Use: Municipal & Domestic Supply

Number of Samples: 738

Number of Exceedances: 0

Data and Information Type: PHYSICAL/CHEMICAL MONITORING

Data Used to Assess Water Quality: None of the 738 pesticide samples collected in the mainstem Trinity River exceed the objective as all of the samples were either measured as non-detect or were measured as detected but not quantified with reporting limits below objectives or evaluation guidelines. The samples were analyzed for 95 pesticides, pesticide constituents, isomers, or metabolites. For each of the 95 pesticide analytes, 3 to 4 samples were collected. The samples were collected as part of the Surface Water Ambient Water Monitoring Program (SWAMP). The data are found in the 5-Year Monitoring Report (NCRWQCB 2008).

Data Reference: [Surface Water Ambient Monitoring Program \(SWAMP\). Summary Report for the North Coast Region \(RWQCB-1\) for years 2000-2006. North Coast Regional Water Quality Control Board. March 2008](#)

Water Quality Objective/Criterion: Per the Basin Plan (NCRWQCB 2007): No individual pesticide or combination of pesticides shall be present in concentrations that adversely affect beneficial uses. There shall be no bioaccumulation of pesticide concentrations found in bottom sediments or aquatic life. Waters designated for use as domestic or municipal supply shall not contain concentrations of pesticides in excess of the limiting concentrations set forth in California Code of Regulations, Title 22, Division 4, Chapter 15, Article 4, Section 64444, and listed in Table 3.2 of the Basin Plan.
 No evaluation guidelines for the dissolved fractions of the pesticides assessed for this waterbody for the Municipal & Domestic Supply beneficial use could be found that meet the requirements of Section 6.1.3 of the Listing Policy.

Objective/Criterion Reference: [Water Quality Control Plan \(Basin Plan\) - North Coast Region \(Region 1\)](#)

Evaluation Guideline: Hexachlorocyclohexane, alpha (0.0026 ug/l)
 Hexachlorocyclohexane, beta (0.0091ug/l)
 Aldrin (0.000049 ug/l)
 Atrazine (0.001 ug/l)

| | |
|--------------------------------|---|
| | Carbofuran (0.04 mg/l) |
| | Chlordane (0.0001 ug/l) |
| | Chlorpyrifos (0.083 ug/l) |
| | Dacthal (70 ug/l) |
| | Dieldrin (0.00014 ug/l) |
| | Endrin (0.002 ug/l) |
| | Glyphosate (700 ug/l) |
| | Heptachlor (0.01 ug/l) |
| | Heptachlor epoxide (0.01 ug/l) |
| | Hexachlorobenzene/ HCB (0.001 ug/l) |
| | Lindane/gamma Hexachlorocyclohexane (gamma-HCH) (.98 ug/l) |
| | Methoxychlor (0.03 mg/l) |
| | Molinate (0.02 mg/l) |
| | Simazine (0.04 mg/l) |
| | Thiobencarb/Bolero (0.07 mg/l) |
| | Toxaphene (0.003 mg/l) |
| Guideline Reference: | National recommended water quality criteria: 2002. EPA-822-R-02-047 Washington, D.C. USEPA Water Quality Standards 2000. Establishment of numeric criteria for priority toxic pollutants for the State of California: Rules and regulations. Federal Register Vol. 65, No. 97. Washington, D.C.: Environmental Protection Agency California Code of Regulations, Title 22, Division 4, Chapter 15. Domestic Water Quality and Monitoring. http://www.cdph.ca.gov/certlic/drinkingwater/Pages/Lawbook.aspx |
| Spatial Representation: | Samples were collected from the Trinity River Watershed from 2 locations as follows: (1) from the North Fork Trinity Samples were collected from February 2002 to June 2003. Site visits corresponded to fall, winter, spring and early summer seasonal conditions. |
| Temporal Representation: | Samples were collected as grab samples during 23 site visits to each of the three sites from March 2001 to June 2006. Site visits corresponded to fall, winter, spring and early summer seasonal conditions. |
| Environmental Conditions: | There are no known environmental conditions (e.g., seasonality, land use practices, fire events, storms, etc.) that are related to these data. |
| QAPP Information: | Quality control was conducted in accordance with the SWAMP Quality Assurance Management Plan (SWAMP 2002). |
| QAPP Information Reference(s): | |

**Line of Evidence (LOE) for Decision ID 17507, Multiple Pollutants
Trinity River HU, Middle HA**

Region 1

| | |
|---------------|--|
| LOE ID: | 30064 |
| Pollutant: | Azinphos, Ethyl (Ethyl Guthion) Bolstar Carbofuran Chlorothalonil Chlorpyrifos, methyl Ciodrin Demeton s Dichlofenthion Dichlorvos Dimethoate Dioxathion Dyfonate (Fonofos or Fonophos) Endrin Ketone Ethion Ethoprop Famphur Fenchlorphos Fenitrothion Fensulfothion Fenthion Leptophos Lindane/gamma Hexachlorocyclohexane (gamma-HCH) Merphos Methidathion Methyl Parathion Mevinphos Naled Oxadiazon Oxychlordane Phorate Phosmet Phosphamidon Prometon (Prometone) Prometryn Propazine Secbumeton Simetryn Sulfotep Tedion Terbufos Terbutylazine Terbutryn Tetrachlorvinphos Thiobencarb/Bolero Thionazin Tokuthion Trichlorfon Trichloronate beta-BHC (Benzenehexachloride or beta-HCH) cis-Nonachlor delta-BHC (Benzenehexachloride or delta-HCH) o,p?-DDD (Dichlorodiphenyldichloroethane) o,p?-DDE (Dichlorodiphenyldichloroethylene) p,p'-DDD (Dichlorodiphenyldichloroethane) p,p'-DDE p,p?-DDMU trans-Nonachlor |
| LOE Subgroup: | Pollutant-Water |
| Matrix: | Water |
| Fraction: | Dissolved |

| | |
|------------------------------------|---|
| Beneficial Use: | Municipal & Domestic Supply |
| Number of Samples: | 738 |
| Number of Exceedances: | 0 |
| Data and Information Type: | PHYSICAL/CHEMICAL MONITORING |
| Data Used to Assess Water Quality: | None of the 738 pesticide samples collected in the mainstem Trinity River exceed the objective as all of the samples were either measured as non-detect or were measured as detected but not quantified with reporting limits below objectives or evaluation guidelines. The samples were analyzed for 95 pesticides, pesticide constituents, isomers, or metabolites. For each of the 95 pesticide analytes, 3 to 4 samples were collected. The samples were collected as part of the Surface Water Ambient Water Monitoring Program (SWAMP). The data are found in the 5-Year Monitoring Report (NCRWQCB 2008). |
| Data Reference: | Surface Water Ambient Monitoring Program (SWAMP). Summary Report for the North Coast Region (RWQCB-1) for years 2000-2006. North Coast Regional Water Quality Control Board. March 2008 |
| Water Quality Objective/Criterion: | Per the Basin Plan (NCRWQCB 2007): No individual pesticide or combination of pesticides shall be present in concentrations that adversely affect beneficial uses. There shall be no bioaccumulation of pesticide concentrations found in bottom sediments or aquatic life. Waters designated for use as domestic or municipal supply shall not contain concentrations of pesticides in excess of the limiting concentrations set forth in California Code of Regulations, Title 22, Division 4, Chapter 15, Article 4, Section 64444, and listed in Table 3.2 of the Basin Plan. No evaluation guidelines for the dissolved fractions of the pesticides assessed for this waterbody for the Municipal & Domestic Supply beneficial use could be found that meet the requirements of Section 6.1.3 of the Listing Policy. |
| Objective/Criterion Reference: | Water Quality Control Plan (Basin Plan) - North Coast Region (Region 1) |
| Evaluation Guideline: | |
| Guideline Reference: | |
| Spatial Representation: | Samples were collected from the Trinity River Watershed from 2 locations as follows: (1) from the North Fork Trinity River at Helena (SWAMP Station ID 106TRINFH), and (2) from the mainstem Trinity River at Salyer (SWAMP Station ID 106TRINSL). Samples were collected from well-mixed flows in glides or riffles. |
| Temporal Representation: | Samples were collected from February 2002 to June 2003. Site visits corresponded to fall, winter, spring and early summer seasonal conditions. |
| Environmental Conditions: | There are no known environmental conditions (e.g., seasonality, land use practices, fire events, storms, etc.) that are related to these data. |
| QAPP Information: | Quality control was conducted in accordance with the SWAMP Quality Assurance Management Plan (SWAMP 2002). |
| QAPP Information Reference(s): | |

DECISION ID **12318**
Trinity River HU, Middle HA

Region 1

Pollutant: **Aluminum**
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

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. None of the 20 aluminum 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 (i.e., sufficient justification to not list). 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) None of the 20 samples exceeded the aluminum 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.

RWQCB Board Staff Decision:

After review of the available data and information, North Coast Regional Water Board staff concludes that the water body-pollutant combination should not be placed on the Section 303(d) List because applicable water quality standards are being attained.

SWRCB Board Staff Decision:

After review of this Regional Board decision, SWRCB staff recommend the decision be approved by the State Board.

USEPA Action (if applicable):

Line of Evidence (LOE) for Decision ID 12318, Aluminum

Region 1

Trinity River HU, Middle HA

| | |
|------------------------------------|--|
| LOE ID: | 25365 |
| Pollutant: | Aluminum |
| LOE Subgroup: | Pollutant-Water |
| Matrix: | Water |
| Fraction: | Total |
| Beneficial Use: | Municipal & Domestic Supply |
| Number of Samples: | 20 |
| Number of Exceedances: | 0 |
| Data and Information Type: | PHYSICAL/CHEMICAL MONITORING |
| Data Used to Assess Water Quality: | None of the 20 aluminum samples collected from the Trinity River Watershed, Middle Trinity Hydrologic Area exceed the objective. The samples were collected as part of the Surface Water Ambient Water Monitoring Program (SWAMP). The data are found in the SWAMP Summary Report for the North Coast Region for Years 2000-2006 (NCRWQCB 2008). |
| Data Reference: | Surface Water Ambient Monitoring Program (SWAMP). Summary Report for the North Coast Region (RWQCB-1) for years 2000-2006. North Coast Regional Water Quality Control Board. March 2008 |
| Water Quality Objective/Criterion: | Per the Basin Plan (NCRWQCB 2007): The Maximum Contaminant Level for aluminum is 1.0 mg/l (1,000 ug/L). |
| Objective/Criterion Reference: | Title 22, Division 4, Chapter 15, Sections 64400 et seq. California Code of Regulations |
| Evaluation Guideline: | |
| Guideline Reference: | |
| Spatial Representation: | |

Samples were collected from the Trinity River Watershed from 2 locations as follows: (1) from the North Fork Trinity River at Helena (SWAMP Station ID TRINFH), and (2) from the mainstem Trinity River at Salyer (SWAMP Station ID TRINSL). Samples were collected from well-mixed flows in glides or riffles.

Temporal Representation: Samples were collected from February 2002 to June 2003. Site visits corresponded to fall, winter, spring and early summer seasonal conditions.

Environmental Conditions: There are no known environmental conditions (e.g., seasonality, land use practices, fire events, storms, etc.) that are related to these data.

QAPP Information: Quality control was conducted in accordance with the SWAMP Quality Assurance Management Plan (Puckett 2002).

QAPP Information Reference(s): [Quality Assurance Management Plan for the State of California's Surface Water Ambient Monitoring Program. Sacramento, CA. State Water Resources Control Board. SWAMP. December 2002 \(1st version\)](#)

DECISION ID 15730

Region 1

Trinity River HU, Middle HA

Pollutant: Ammonia as Nitrogen
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

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. None of the 20 ammonia as nitrogen samples exceed the 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 (i.e., sufficient justification to not list). 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) None of the 20 samples exceed the water quality 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.

RWQCB Board Staff Decision: After review of the available data and information, North Coast Regional Water Board staff concludes that the water body-pollutant combination should not be placed on the Section 303(d) List because applicable water quality standards are being attained.

SWRCB Board Staff Decision: After review of this Regional Board decision, SWRCB staff recommend the decision be approved by the State Board.

USEPA Action (if applicable):

Line of Evidence (LOE) for Decision ID 15730, Ammonia as Nitrogen
 Trinity River HU, Middle HA

Region 1

LOE ID: 26301

Pollutant: Ammonia as Nitrogen
 LOE Subgroup: Pollutant-Water
 Matrix: Water

| | |
|--|---|
| Fraction: | Total |
| Beneficial Use: Aquatic Life Use: | Cold Freshwater Habitat Fish Migration Fish Spawning Freshwater Replenishment Preservation of Rare & Endangered Species Wildlife Habitat |
| Number of Samples: Number of Exceedances: | 20 0 |
| Data and Information Type: Data Used to Assess Water Quality: | PHYSICAL/CHEMICAL MONITORING None of the 20 ammonia as nitrogen samples collected from the Trinity River exceed the objective. The samples were collected as part of the Surface Water Ambient Water Monitoring Program (SWAMP). The data are found in the SWAMP Summary Report for the North Coast Region for Years 2000-2006 (NCRWQCB 2008). |
| Data Reference: | Surface Water Ambient Monitoring Program (SWAMP). Summary Report for the North Coast Region (RWQCB-1) for years 2000-2006. North Coast Regional Water Quality Control Board. March 2008 |
| Water Quality Objective/Criterion: | Per the Basin Plan (NCRWQCB 2007): All waters shall be maintained free of toxic substances in concentrations that are toxic to, or that produce detrimental physiological responses in human, plant, animal, or aquatic life. |
| Objective/Criterion Reference: | Water Quality Control Plan (Basin Plan) - North Coast Region (Region 1) |
| Evaluation Guideline: | Per the National Recommended Water Quality Criteria (USEPA 2006): The 1-hour average concentration (acute criterion or CMC) of total ammonia nitrogen (in mg N/L) for freshwater where salmonid fish are present, which is not to be exceeded more than once every three years on average, is calculated using the following equation: $CMC = 0.275 / (1 + 10^{(7.204 - pH)}) + 39.0 / (1 + 10^{(pH - 7.204)})$. |
| Guideline Reference: | National Recommended Water Quality Criteria. United States Environmental Protection Agency. Office of Water. Office of Science and Technology. 4304T The Blue Book |
| Spatial Representation: | Samples were collected from the Trinity River Watershed from 2 locations as follows: (1) from the North Fork Trinity River at Helena (SWAMP Station ID 106TRINFH), and (2) from the mainstem Trinity River at Salyer (SWAMP Station ID 106TRINSL). Samples were collected from well-mixed flows in glides or riffles. |
| Temporal Representation: | Samples were collected from February 2002 to June 2003. Site visits corresponded to fall, winter, spring and early summer seasonal conditions. |
| Environmental Conditions: | There are no known environmental conditions (e.g., seasonality, land use practices, fire events, storms, etc.) that are related to these data. |
| QAPP Information: | Quality control was conducted in accordance with the SWAMP Quality Assurance Management Plan (Puckett 2002). |
| QAPP Information Reference(s): | Quality Assurance Management Plan for the State of California's Surface Water Ambient Monitoring Program. Sacramento, CA. State Water Resources Control Board. SWAMP. December 2002 (1st version) |

DECISION ID 10640

Region 1

Trinity River HU, Middle HA

| | |
|---|---|
| Pollutant: | Arsenic Cadmium Chromium (total) Copper Lead Mercury Nickel Selenium Silver Zinc |
| 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 |

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. None of the 200 metals 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 (i.e., sufficient justification to not list). 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) None of the 200 samples exceeded the metal objectives, and this does not exceed the allowable frequency of 18 per the binomial distribution described in Section 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.

RWQCB Board Staff Decision: After review of the available data and information, North Coast Regional Water Board staff concludes that the water body-pollutant combination should not be placed on the Section 303(d) List because applicable water quality standards are being attained.

SWRCB Board Staff Decision: After review of this Regional Board decision, SWRCB staff recommend the decision be approved by the State Board.

USEPA Action (if applicable):

Line of Evidence (LOE) for Decision ID 10640, Multiple Pollutants

Region 1

Trinity River HU, Middle HA

| | |
|------------------------------------|---|
| LOE ID: | 21513 |
| Pollutant: | Arsenic Cadmium Chromium (total) Copper Lead Mercury Nickel Selenium Silver Zinc |
| LOE Subgroup: | Pollutant-Water |
| Matrix: | Water |
| Fraction: | Total |
| Beneficial Use: | Municipal & Domestic Supply |
| Number of Samples: | 200 |
| Number of Exceedances: | 0 |
| Data and Information Type: | PHYSICAL/CHEMICAL MONITORING |
| Data Used to Assess Water Quality: | None of the 200 metals samples collected in the mainstem Trinity River exceed the objectives. There were 10 samples collected for each of the 10 metal parameters at each of the 2 sites. The samples were collected as part of the Surface Water Ambient Water Monitoring Program (SWAMP). The data are found in the SWAMP Summary Report for the North Coast Region for Years 2000-2006 (NCRWQCB 2008). |
| Data Reference: | Surface Water Ambient Monitoring Program (SWAMP). Summary Report for the North Coast Region (RWQCB-1) for years 2000-2006. North Coast Regional Water Quality Control Board. March 2008 |
| Water Quality Objective/Criterion: | Per the Basin Plan (NCRWQCB 2007): Arsenic objective is 0.05 mg/L. Cadmium objective is 0.01 mg/L. Chromium objective is 0.05 mg/L. Lead objective is 0.05 mg/L. Mercury objective is 0.002 mg/L. Selenium objective is 0.01 mg/L. Silver objective is 0.05 mg/L. Per 22 CCR 64431: Nickel maximum contaminant level is 0.1 mg/L. Per 22 CCR 64449: Copper secondary |

Objective/Criterion Reference: maximum contaminant level is 1.0 mg/L. Zinc secondary maximum contaminant level is 5.0 mg/L.
[Water Quality Control Plan \(Basin Plan\) - North Coast Region \(Region 1\) Title 22, Division 4, Chapter 15, Sections 64400 et seq. California Code of Regulations](#)

Evaluation Guideline:
Guideline Reference:

Spatial Representation: Samples were collected from the Trinity River Watershed from 2 locations as follows: (1) from the North Fork Trinity River at Helena (SWAMP Station ID 106TRINFH), and (2) from the mainstem Trinity River at Salyer (SWAMP Station ID 106TRINSL). Samples were collected from well-mixed flows in glides or riffles.

Temporal Representation: Samples were collected from February 2002 to June 2003. Site visits corresponded to fall, winter, spring and early summer seasonal conditions.

Environmental Conditions: There are no known environmental conditions (e.g., seasonality, land use practices, fire events, storms, etc.) that are related to these data.

QAPP Information: Quality control was conducted in accordance with the SWAMP Quality Assurance Management Plan (SWAMP 2002).

QAPP Information Reference(s): [Quality Assurance Management Plan for the State of California's Surface Water Ambient Monitoring Program. Sacramento, CA. State Water Resources Control Board. SWAMP. December 2002 \(1st version\)](#)

DECISION ID 12439 **Region 1**
Trinity River HU, Middle HA

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

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. None of the 15 chloride samples exceed the evaluation guideline. 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 (i.e., sufficient justification to not list). 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) None of the 15 samples exceeded the chloride evaluation guideline used to interpret the water quality objective, and this does not exceed the allowable frequency listed in Table 3.2 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.

RWQCB Board Staff Decision: After review of the available data and information, North Coast Regional Water Board staff concludes that the water body-pollutant combination should not be placed on the Section 303(d) List because applicable water quality standards are being attained.

SWRCB Board Staff Decision: After review of this Regional Board decision, SWRCB staff recommend the decision be approved by the State Board.

USEPA Action (if applicable):

**Line of Evidence (LOE) for Decision ID 12439, Chloride
Trinity River HU, Middle HA**

Region 1

| | |
|------------------------------------|--|
| LOE ID: | 25418 |
| Pollutant: | Chloride |
| LOE Subgroup: | Pollutant-Water |
| Matrix: | Water |
| Fraction: | Not Recorded |
| Beneficial Use: | Municipal & Domestic Supply |
| Number of Samples: | 20 |
| Number of Exceedances: | 0 |
| Data and Information Type: | PHYSICAL/CHEMICAL MONITORING |
| Data Used to Assess Water Quality: | None of the 20 chloride samples collected in the mainstem Trinity River exceed the evaluation guideline. The samples were collected as part of the Surface Water Ambient Water Monitoring Program (SWAMP). The data are found in the SWAMP Summary Report for the North Coast Region for Years 2000-2006 (NCRWQCB 2008). |
| Data Reference: | Surface Water Ambient Monitoring Program (SWAMP). Summary Report for the North Coast Region (RWQCB-1) for years 2000-2006. North Coast Regional Water Quality Control Board. March 2008 |
| Water Quality Objective/Criterion: | Per the Basin Plan (NCRWQCB 2007): Waters shall not contain taste- or odor-producing substances in concentrations that impart undesirable tastes or odors to fish flesh or other edible products of aquatic origin, or that cause nuisance or adversely affect beneficial uses. |
| Objective/Criterion Reference: | Water Quality Control Plan (Basin Plan) - North Coast Region (Region 1) |
| Evaluation Guideline: | Per 22 CCR 64449: The recommended Secondary Maximum Contaminant Level for chloride is 250 mg/L. |
| Guideline Reference: | Title 22, Division 4, Chapter 15, Sections 64400 et seq. California Code of Regulations |
| Spatial Representation: | Samples were collected from the Trinity River Watershed from 2 locations as follows: (1) from the North Fork Trinity River at Helena (SWAMP Station ID 106TRINFH), and (2) from the mainstem Trinity River at Salyer (SWAMP Station ID 106TRINSL). Samples were collected from well-mixed flows in glides or riffles. |
| Temporal Representation: | Samples were collected from February 2002 to June 2003. Site visits corresponded to fall, winter, spring and early summer seasonal conditions. |
| Environmental Conditions: | There are no known environmental conditions (e.g., seasonality, land use practices, fire events, storms, etc.) that are related to these data. |
| QAPP Information: | Quality control was conducted in accordance with the SWAMP Quality Assurance Management Plan (SWAMP 2002). |
| QAPP Information Reference(s): | Quality Assurance Management Plan for the State of California's Surface Water Ambient Monitoring Program. Sacramento, CA. State Water Resources Control Board. SWAMP. December 2002 (1st version) |

DECISION ID 12482
Trinity River HU, Middle HA

Region 1

Pollutant: PCBs (Polychlorinated biphenyls)
Final Listing Decision: Do Not List on 303(d) list (TMDL required list)
New Decision

Last Listing Cycle's Final Listing Decision:

Revision Status Revised
Impairment from Pollutant or Pollution: Pollutant

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. None of the 400 polychlorinated biphenyl (PCB) samples exceed the evaluation guideline. 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 (i.e., sufficient justification to not list). 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) None of the 400 samples exceeded the PCB evaluation guideline used to interpret the water quality objective, and this does not exceed the allowable frequency of 35 per the binomial distribution described in Section 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.

RWQCB Board Staff Decision: After review of the available data and information, North Coast Regional Water Board staff concludes that the water body-pollutant combination should not be placed on the Section 303(d) List because applicable water quality standards are being attained.

SWRCB Board Staff Decision: After review of this Regional Board decision, SWRCB staff recommend the decision be approved by the State Board.

USEPA Action (if applicable):

**Line of Evidence (LOE) for Decision ID 12482, PCBs (Polychlorinated biphenyls)
 Trinity River HU, Middle HA**

Region 1

| | |
|------------------------------------|---|
| LOE ID: | 25461 |
| Pollutant: | PCBs (Polychlorinated biphenyls) |
| LOE Subgroup: | Pollutant-Water |
| Matrix: | Water |
| Fraction: | Total |
| Beneficial Use: | Municipal & Domestic Supply |
| Number of Samples: | 400 |
| Number of Exceedances: | 0 |
| Data and Information Type: | PHYSICAL/CHEMICAL MONITORING |
| Data Used to Assess Water Quality: | None of the 400 polychlorinated biphenyl (PCB) analytes collected in the mainstem Trinity River exceed the evaluation guideline. Each of the 8 samples were analyzed for 50 PCB congeners. The samples were collected as part of the Surface Water Ambient Water Monitoring Program (SWAMP). The data are found in the 5-Year Monitoring Report (NCRWQCB 2008). |
| Data Reference: | Surface Water Ambient Monitoring Program (SWAMP). Summary Report for the North Coast Region (RWQCB-1) for years 2000-2006. North Coast Regional Water Quality Control Board. March 2008 |
| Water Quality Objective/Criterion: | Per the Basin Plan (NCRWQCB 2007, p. 3-4.00): All waters shall be maintained free of toxic substances in concentrations that are toxic to, or that |

SWRCB Board Staff Decision:

After review of this Regional Board decision, SWRCB staff recommend the decision be approved by the State Board.

USEPA Action (if applicable):**Line of Evidence (LOE) for Decision ID 10020, Specific Conductivity
Trinity River HU, Middle HA****Region 1**

LOE ID: 21226

Pollutant: Specific Conductivity
LOE Subgroup: Pollutant-Water
Matrix: Water
Fraction: None

Beneficial Use: Municipal & Domestic Supply

Number of Samples: 20
Number of Exceedances: 0

Data and Information Type: PHYSICAL/CHEMICAL MONITORING
Data Used to Assess Water Quality: None of the 20 specific conductivity samples collected from the Trinity River Watershed, Middle Trinity Hydrologic Area exceed the objective. The samples were collected as part of the Surface Water Ambient Water Monitoring Program (SWAMP). The data are found in the SWAMP Summary Report for the North Coast Region for Years 2000-2006 (NCRWQCB 2008).

Data Reference: [Surface Water Ambient Monitoring Program \(SWAMP\). Summary Report for the North Coast Region \(RWQCB-1\) for years 2000-2006. North Coast Regional Water Quality Control Board. March 2008](#)

Water Quality Objective/Criterion: Per 22 CCR 64449: The recommended secondary Maximum Content Level (MCL) is 900 uS/cm.

Objective/Criterion Reference: [Title 22, Division 4, Chapter 15, Sections 64400 et seq. California Code of Regulations](#)

Evaluation Guideline:
Guideline Reference:

Spatial Representation: Samples were collected from the Trinity River Watershed from 2 locations as follows: (1) from the North Fork Trinity River at Helena (SWAMP Station ID TRINFH), and (2) from the mainstem Trinity River at Salyer (SWAMP Station ID TRINSL). Samples were collected from well-mixed flows in glides or riffles.

Temporal Representation: Samples were collected from February 2002 to June 2003. Site visits corresponded to fall, winter, spring and early summer seasonal conditions.

Environmental Conditions: There are no known environmental conditions (e.g., seasonality, land use practices, fire events, storms, etc.) that are related to these data.

QAPP Information: Quality control was conducted in accordance with the SWAMP Quality Assurance Management Plan (Puckett 2002).

QAPP Information Reference(s): [Quality Assurance Management Plan for the State of California's Surface Water Ambient Monitoring Program. Sacramento, CA. State Water Resources Control Board. SWAMP. December 2002 \(1st version\)](#)

DECISION ID 12509
Trinity River HU, Middle HA

Region 1

Pollutant: Sulfates
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

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. None of the 20 sulfate samples exceed the evaluation guideline. 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 (i.e., sufficient justification to not list). 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) None of the 20 samples exceed the sulfate evaluation guideline used to interpret the water quality objective, and this does not exceed the allowable frequency listed in Table 3.2 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.

RWQCB Board Staff Decision: After review of the available data and information, North Coast Regional Water Board staff concludes that the water body-pollutant combination should not be placed on the Section 303(d) List because applicable water quality standards are being attained.

SWRCB Board Staff Decision: After review of this Regional Board decision, SWRCB staff recommend the decision be approved by the State Board.

USEPA Action (if applicable):

**Line of Evidence (LOE) for Decision ID 12509, Sulfates
 Trinity River HU, Middle HA**

Region 1

| | |
|------------------------------------|--|
| LOE ID: | 25526 |
| Pollutant: | Sulfates |
| LOE Subgroup: | Pollutant-Water |
| Matrix: | Water |
| Fraction: | Not Recorded |
| Beneficial Use: | Municipal & Domestic Supply |
| Number of Samples: | 20 |
| Number of Exceedances: | 0 |
| Data and Information Type: | PHYSICAL/CHEMICAL MONITORING |
| Data Used to Assess Water Quality: | None of the 20 sulfate samples collected in the mainstem Trinity River exceed the evaluation guideline. The samples were collected as part of the Surface Water Ambient Water Monitoring Program (SWAMP). The data are found in the 5-Year Monitoring Report (NCRWQCB 2008). |
| Data Reference: | Surface Water Ambient Monitoring Program (SWAMP). Summary Report for the North Coast Region (RWQCB-1) for years 2000-2006. North Coast Regional Water Quality Control Board. March 2008 |
| Water Quality Objective/Criterion: | Per the Basin Plan (NCRWQCB 2007, p. 3-3.00): Waters shall not contain taste- or odor-producing substances in concentrations that impart undesirable tastes or odors to fish flesh or other edible products of aquatic origin, or that cause nuisance or adversely affect beneficial uses. |

USEPA Action (if applicable):**Line of Evidence (LOE) for Decision ID 6926, Sedimentation/Siltation
Trinity River HU, Middle HA****Region 1**

LOE ID: 1671

Pollutant: Sedimentation/Siltation
 LOE Subgroup: Pollutant-Water
 Matrix: Water
 Fraction: None

Beneficial Use: Cold Freshwater Habitat

Number of Samples: 0
 Number of Exceedances: 0

Data and Information Type: Not Specified
 Data Used to Assess Water Quality: Unspecified--This LOE is a placeholder to support a 303(d) listing decision made prior to 2006.

Data Reference: [Placeholder reference 2006 303\(d\)](#)

Water Quality Objective/Criterion:
 Objective/Criterion Reference:

Evaluation Guideline:
 Guideline Reference:

Spatial Representation:
 Temporal Representation:
 Environmental Conditions:
 QAPP Information: QA Info Missing
 QAPP Information Reference(s):