



**UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 10**

1200 Sixth Avenue, Suite 900
Seattle, Washington 98101-3140

Reply To: OWW-134

Michael McIntyre
Surface Water Quality Division
Idaho Department of Environmental Quality
1410 North Hilton
Boise, ID 83716-1255

RE: U.S. Environmental Protection Agency (EPA) Comments on Idaho's Draft 2008 Integrated Report

Dear Mr. McIntyre:

Thank you for the opportunity to review Idaho Department of Environmental Quality's (DEQ) Draft 2008 Integrated Report (IR). We appreciate the cooperation and work of Mike Edmondson and DEQ staff during the development of the 2008 IR, especially the coordination prior to the public comment period and the sharing of a pre-public comment draft with EPA staff. We support this early involvement and believe it results in a better understanding of the approaches used to develop the IR and enables meaningful discussions to occur between DEQ and EPA staff that can later expedite EPA's review of the final document.

Please find EPA's comments attached. Our comments are broken out into major concerns that address approvability issues and recommendations and suggestions that we feel would make the document more clear. As you are aware, we have already submitted comments and questions regarding a number of waters where we have requested additional information (emails to Mike Edmondson from Tracy Chellis, 2/5/08, 9:49 am and 2/7/08, 12:37 pm.) As we receive this information from DEQ we will be following up should we have any concerns. At this time, EPA is still reviewing DEQ's documentation of Category 4a waters (waters for which a TMDL has been developed). We will contact you in the next couple of weeks to discuss this issue.

EPA hopes the following comments support DEQ's efforts to develop a sound report. If you have any questions or would like to discuss our comments, please feel free to contact me at (206) 553-6694, or Tracy Chellis of my staff at (206) 553-6326.

Sincerely,
/signed/

David Croxton
Manager, Watershed Unit

Enclosure

cc: Mike Edmondson, IDEQ



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Purpose

The purpose of this document is to describe the basis for EPA's review of the public comment version of Idaho's 2008 Section 303(d) water quality limited waters list. EPA reviewed the methodology used by the State in developing the 303(d) list and Idaho's description of the data and information it considered. When EPA reviews State's 303(d) lists, we review whether the State reasonably considered existing and readily available water quality-related data and information and identified all waters required to be listed.

Statutory and Regulatory Background

Identification of Water Quality Limited Segments (WOLS) for Inclusion on Section 303(d) List

Section 303(d)(1) of the Clean Water Act (CWA) directs States to identify those waters within its jurisdiction for which effluent limitations required by Section 301(b)(1)(A) and (B) are not stringent enough to implement any applicable water quality standard, and to establish a priority ranking for such waters, taking into account the severity of the pollution and the uses to be made of such waters. The Section 303(d) listing requirement applies to waters impaired by point and/or nonpoint sources, pursuant to EPA's long-standing interpretation of Section 303(d).

EPA regulations provide that States do not need to list waters where the following controls are adequate to implement applicable standards: (1) technology-based effluent limitations required by the Act, (2) more stringent effluent limitations required by federal, State or local authority, and (3) other pollution control requirements required by State, local, or federal authority. See 40 CFR 130.7(b)(1).

Consideration of Existing and Readily Available Water Quality-Related Data and Information

In developing Section 303(d) lists, States are required to assemble and evaluate all existing and readily available water quality-related data and information, including, at a minimum, consideration of existing and readily available data and information about the 7 following categories of waters: (1) waters identified as partially meeting or not meeting designated uses, or as threatened, in the State's most recent Section 305(b) report; (2) waters for which dilution calculations or predictive modeling indicate non-attainment of applicable standards; (3) waters for which water quality problems have been reported by governmental agencies, members of the public, or academic institutions; and (4) waters identified as impaired or threatened in any Section 319 non-point assessment submitted to EPA. See 40 CFR 130.7(b)(5). In addition to these minimum categories, States are required to consider any other data and information that is existing and readily available. EPA's 1991 Guidance for Water Quality-Based Decisions describes categories of water quality-related data and information that may be existing and readily available. See EPA 1991, Appendix C. While States are required to evaluate all existing and readily available water quality-related data and information, States may decide to rely or not rely on particular data or information in determining whether to list particular waters. In addition to requiring States to assemble and evaluate all existing and readily available water quality-related data and information, EPA regulations at 40 CFR 130.7(b)(6) require States to include as part of their submissions to EPA documentation to support decisions to rely or not rely on particular data and information and decisions to list or not

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list waters. Such documentation needs to include, at a minimum, the following information: (1) a description of the methodology used to develop the list; (2) a description of the data and information used to identify waters; and (3) any other reasonable information requested by EPA Region X.

Priority Ranking

EPA regulations also codify and interpret the requirement in Section 303(d)(1)(A) of the Act that States establish a priority ranking for listed waters. The regulations at 40 CFR 130.7(b)(4) require States to prioritize waters on their Section 303(d) lists for TMDL development, and also to identify those Water Quality Limited Segments (WQLS) targeted for TMDL development in the next two years. In prioritizing and targeting waters, States must, at a minimum, take into account the severity of the pollution and the uses to be made of such waters. See Section 303(d)(1)(A). As long as these factors are taken into account, the Act provides that States establish priorities. States may consider other factors relevant to prioritizing waters for TMDL development, including immediate programmatic needs, vulnerability of particular waters as aquatic habitats, recreational, economic, and aesthetic importance of particular waters, degree of public interest and support, and State or national policies and priorities. See 57 FR 33040, 33045 (July 24, 1992), and EPA 1991.

Analysis of Idaho's Draft Submission

EPA has reviewed the State's submission and has the following comments on approvability issues with the State's submission.

ID 17050114SW001 06 - Lower Boise River:

The Idaho Department of Environmental Quality (DEQ) has proposed de-list the Lower Boise River from Middleton to the mouth for nutrients (total phosphorus). DEQ contends that the Lower Boise River is no longer impaired by nutrients. However, data indicate that nutrients in the Lower Boise impair beneficial use support in the River, contribute to the impairment of the beneficial uses of the Snake River and Brownlee Reservoir and exceed EPA criteria recommendations for nutrients. EPA has reviewed DEQ's documentation and justification for de-listing and finds that the existing and readily available information is not consistent with this conclusion and instead recommends that the Lower Boise should remain 303(d) listed for nutrients.

In considering DEQ's de-listing rationale, EPA reviewed Idaho's water quality standards that address nutrients. Idaho Administrative Code (IDAPA 58.01.02-200.05, 06, 07) outlines the following water quality criteria that pertain to nutrients:

05. Floating, Suspended or Submerged Matter. Surface waters of the state shall be free from floating, suspended, or submerged matter of any kind in concentrations causing nuisance or objectionable conditions or that may impair designated beneficial uses. This matter does not include suspended sediment produced as a result of nonpoint source activities. (8-24-94)

06. Excess Nutrients. Surface waters of the state shall be free from excess nutrients that can cause visible slime growths or other nuisance aquatic growths impairing designated beneficial uses. (8-24-94)

07. Oxygen-Demanding Materials. Surface waters of the state shall be free from oxygen-demanding materials in concentrations that would result in an anaerobic water condition. (7-1-93)

Many states have narrative criteria for nutrients that must be interpreted to determine if beneficial uses are supported. While Idaho has not developed specific guidance to interpret their criteria, they have developed the River Macroinvertebrate Index (IDEQ, 2002) and use other parameters (DO, chlorophyll a, etc) and the narrative criteria above, to determine if nutrient problems are impairing beneficial use support.

EPA has developed *Ambient Water Quality Criteria Recommendations* (EPA 822-B-0006) that present nutrient criteria for rivers and streams in Nutrient Ecoregion III (the Ecoregion which includes the Lower Boise). The recommendations are that for minimally impacted rivers and streams in Ecoregion III, the reference condition which is protective of designated uses and allows management flexibility is 0.010-0.055 mg/l total phosphate phosphorus. More specifically, reference conditions for Level III, Ecoregion 12 streams for total phosphorus is stated at 0.043 mg/l. The seasonal average concentration in the Lower Boise for the irrigation season currently is given to be 0.296 mg/l. This is far above the reference condition.

As an indicator of nuisance aquatic growth, several sources suggest that periphyton chlorophyll *a* values of 100 -200 mg/m² constitute a nuisance threshold, above which aesthetics are impaired (Horner and others, 1983; Watson and Gestring, 1996; Welch and others, 1988; Welch and others, 1989). In September 1999 IDEQ established the Boise River TMDL for sediment and bacteria. The TMDL also included discussion of nutrients, and on page 46, Figure 21 is a graph showing 33 chlorophyll *a* data points for five locations on the Lower Boise River. Fifteen of the measurements from Caldwell, Middleton and Glenwood Bridge are above 200 mg/m² with a maximum measurement of >900 mg/m². These measurements were collected from 1995 to 1997. On page 48 the document states the following:

“The available data do not show major impairment of beneficial uses due to nutrients and associated nuisance aquatic growths. High nutrient concentrations and periphytic algae levels above suggested nuisance thresholds together imply that nutrients are a potential threat to aquatic life and recreational uses.”

On page 45, the document states the following:

“It is also possible that high sediment concentrations in the river below Caldwell are preventing algae growth by limiting the amount of light that penetrates the water column. If sediment concentrations in the summer are reduced, algae growth in the reach of the river below Caldwell may increase.”

The following table was created from information contained in *McCoy, D.E., Water-Quality and Biological Conditions in the Lower Boise River, Ada and Canyon Counties, Idaho, 1994-2002: U.S. Geological Survey Scientific Investigations Report 2004-5128, 80 p.*

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Location	Ave. TP Conc. mg/l	Range of TP mg/l	Ave. Chl a. mg/m² (Periphyton)	Range Chl a. mg/m² (Periphyton)
Diversion Dam	0.03	0.01 – 0.09	9	<1 - 21
Glenwood	0.11	0.02 – 0.38	116	22 - 267
Middleton	0.25	0.03 – 0.85	264	23 - 477
Parma	0.29	0.08 – 0.55	159	13 - 300

This data indicates a substantial increase in total phosphorus and chlorophyll *a* from Lucky Peak reservoir to the mouth of the river near Parma with a peak near Middleton. Average total phosphorus concentrations exceed the Ecoregion criteria from Glenwood to Parma.

As mentioned above, nutrients from the Boise River also contribute to the impairment of the beneficial uses of the Snake River and Brownlee Reservoir. Sampling conducted by the Idaho Power Company indicates that significant planktonic algae occur in the Snake River just downstream from the mouth of the Boise River during the months of March through October (IDEQ, 1999). Also, the Snake River Hells Canyon phosphorus TMDL establishes a target (allocation) for the Lower Boise River at 0.070 mg/l or less during the May-September timeframe. As noted above, the seasonal average concentration at the mouth of the Lower Boise for the irrigation season currently is 0.296 mg/l, far above both the Ecoregion reference condition and the TMDL target.

In the Boise River TMDL (1999), DEQ evaluated macroinvertebrate data available from the USGS for five sites sampled in October of 1995 and 1996. The macroinvertebrate data indicated that the Boise River had degraded conditions from Eckert Road to its mouth. Ephemeroptera, Plecoptera, and Trichoptera (EPT) taxa richness is a traditional metric that consistently has been used to detect impacts to macroinvertebrate assemblages in rivers and streams. In the Lower Boise, a limited number of EPT taxa was found at all sites indicating that the macroinvertebrate assemblage was in poor condition. In addition, there were other metrics (i.e. Plecoptera taxa richness, % predators, etc.) that also indicated poor biological condition.

Since the time of the TMDL, USGS has continued to monitor water quality and biological conditions in the Lower Boise River (MacCoy, 2004). Macroinvertebrates were collected at five sites in the Lower Boise from 1995 to 2002. The average number of EPT taxa in the Lower Boise was less than half the average number at four least-impacted, similar-sized rivers in Idaho. USGS calculated the RMI (River Macroinvertebrate Index, developed by DEQ in 2002) scores for the Lower Boise and most scores indicated poor water quality and impaired biotic integrity. In addition, USGS used a fine-sediment index to evaluate the effect of fine sediment on insect populations (Relyea et al, 2000). This index, the Fine Sediment Biotic Index (FSBI), indicated fine sediments impacted macroinvertebrates in the Lower Boise.

Macroinvertebrate assemblages are monitored in rivers because they are a direct measure of the aquatic life uses. Another reason that they are used in monitoring is because macroinvertebrates integrate the effects of multiple environmental factors such as water quality, substrate quality, and habitat. In both the TMDL and in more recent USGS

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studies, it is clear that the macroinvertebrate assemblages in the Lower Boise River are in poor condition. The more recent USGS study shows that fine sediments impact macroinvertebrates in the Lower Boise River, however this does not mean that fine sediment is the sole stressor. The macroinvertebrates are also exposed to increased temperatures, altered flow regimes, increased phosphorus and other anthropogenic environmental factors. The cumulative and synergistic effects of these pollutants in the Lower Boise may exceed the tolerance levels of many of these taxa.

In summary, EPA believes the Lower Boise is impaired for nutrients because periphyton levels are well above nuisance thresholds in the literature, phosphorus concentrations are well above EPA recommended nutrient levels and upstream background levels at Lucky Peak, and above targets set to achieve water quality standards in downstream waters (per Snake River Hells Canyon TMDL). We also believe it is very likely that excess sediment in the lower river masks additional effects of high nutrient concentrations. If the existing sediment TMDL were to be fully implemented and nutrient concentrations are not reduced, the nutrient impairment would become even worse since increased light penetration to the bottom sediments of the river would promote vegetation growth given the presence of high nutrient concentrations. Based on the data and information presented, EPA recommends that the Lower Boise remain 303(d) list for nutrients.

Intermittent Streams:

DEQ is recommending de-listing the following list of intermittent streams:

De-listing because of flaws:

- ID 16010204BR013_02 – Samaria Creek (sediment and phosphorus)
- ID 16010204BR013_03 – Samaria Creek (sediment and nutrients)

De-listing because water quality standards being met:

- ID 17050101SW003_02 – Browns Creek (sediment)
- ID 17050101SW003_03 – Browns Creek (sediment)
- ID 17050101SW003_04 – Browns Creek (sediment)
- ID 17050101SW004_02 – Browns Creek (sediment)
- ID 17050101SW004_03 – Browns Creek (sediment)
- ID 17050101SW006_02 – Sailor Creek (sediment)
- ID 17050101SW006_03 – Sailor Creek (sediment)
- ID 17050101SW006_04 – Sailor Creek (sediment)
- ID 17050101SW008_02 – Deadman Creek (sediment)
- ID 17050101SW008_03 – Deadman Creek (sediment)
- **ID 17050102SW008_02 – Sugar Creek (sediment)
- **ID 17050102SW008_03 – Sugar Creek (sediment)
- ID 17050102SW022_02 – Cougar Creek (sediment)
- ID 17050102SW022_03 – Cougar Creek (sediment)
- ID 17050102SW025_02 – Poison Creek (sediment)
- ID 17050102SW025_03 – Poison Creek (sediment)
- ID 17050103SW016_02 – Pickett Creek (sediment and temperature)
- ID 17050103SW016_03 – Pickett Creek (sediment)
- ID 17050103SW019_02 – Brown Creek (sediment)
- ID 17050103SW019_03 – Brown Creek (sediment)

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ID 17050103SW019_04 – Brown Creek (sediment)
ID 17050103SW021_02 – Birch Creek (sediment)
ID 17050103SW021_03 – Birch Creek (sediment)
ID 17050103SW021_04 – Birch Creek (sediment)
ID 17050103SW025_02 – Corder Creek (sediment)
ID 17050103SW026_02 – Rabbit Creek (sediment)
ID 17050103SW004_02 – McBride Creek (sediment and temperature)
ID 17050103SW004_03 – McBride Creek (sediment and temperature)
ID 17050103SW008_02 – Hardtrigger Creek (sediment)
ID 17050122SW012_02- Soldier Creek (sediment)
ID 17050122SW015_02 – Bissel Creek (sediment)

However, in most of these waters an evaluation of whether the pollutant is impairing beneficial uses is still needed, beyond simply establishing that the stream is intermittent. Idaho water quality standards, IDAPA 58.01.01.070.06 reads:

“...Numeric water quality standards only apply to intermittent waters during optimum flow periods sufficient to support the uses for which the water body is designated. For recreation, the optimum flow is equal to or greater than five (5) cubic feet per second (cfs). For aquatic life uses, optimum flow is equal to or greater than one (1) cfs...”

This provision makes it clear that numeric standards do not apply below optimum flow levels, however narrative standards, such as sediment, still apply to these waters even when flows are below optimum. It is not clear from the information provided for these streams that they have been assessed during the times of the year, such as spring and late fall when the streams are more likely to have surface flow. Intermittent streams are considered waters of the US and must be protected. In addition, intermittent streams may be sources of sediment, nutrients and other pollutants during critical high flow events.

In EPA's May 6, 1999 review of Idaho's 1998 Section (§) 303(d) list, EPA highlights the need to establish a decision process for intermittent streams because the biota in these waters are much different than in perennial streams. Without such a process there is a gap in the State's decision process. EPA also notes in this letter that waters should not be removed from the 303(d) list without an adequate basis to conclude that the water quality standards are met. On the whole, EPA does not support DEQ's de-listing of intermittent streams without an assessment process in place therefore we believe all intermittent waters should remain listed until an appropriate assessment tool is developed.

The following information documents our review of the proposed de-listing related to intermittent streams.

The de-listing justification for Samaria Creek states that it is being de-listed because there were “flaws in the original listing,” and that the stream is intermittent. No other information is cited. This is not an adequate justification for de-listing a stream.

Browns, Sailor and Deadman Creeks are discussed in the King Hill-CJ Strike Subbasin Assessment and TMDL. All creeks were noted to be dry when sampling was attempted,

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however sampling was not attempted in early spring or late fall which is a time when intermittent streams will typically have flow. It is not clear from the de-listing rationale or from the TMDL if any assessment of these waters was done by evaluating downstream conditions.

Sugar, Cougar and Poison Creeks are discussed in the Bruneau River Subbasin Assessment and TMDL. Cougar and Poison Creeks were both dry when DEQ when to sample them, however they were assessed based on downstream conditions. EPA supports the downstream evaluation as a potential indicator of determining use support for intermittent streams, however since DEQ does not have an assessment protocol for intermittent streams we recommend that these waters remain listed. In the TMDL discussion of Sugar Creek it is noted that Sugar Creek was listed in error. If this is the case, DEQ should be de-listing because of "flaws in original listing," not because "water quality standards are being met."

McBride, Hardtrigger, Pickett, Brown, Birch, Corder, Rabbit and Cougar Creeks are discussed in the Mid Snake Succor Creek Subbasin Assessment and TMDL. Data is presented in the TMDL that shows both Hardtrigger and Pickett have at some period had flow above 1cfs. The other creeks had less than 1 cfs or no flow when DEQ attempted sampling. All of these creeks are being proposed for de-listing because "water quality standards are being met," however from the de-listing justification and the information presented in the TMDL it does not appear that these waters were assessed.

Soldier Creek is discussed in the North Fork Payette River Subbasin Assessment and TMDL and Bissel Creek is discussed in the Bissel Creek Subbasin Assessment and TMDL. Both of these waters are being proposed for de-listing because of intermittent flow.

ID 17060210SL001 02 - Little Salmon River:

The information provided in the pages cited in the de-listing justification for the TMDL do not offer conclusive information that these waters are not impaired. The pages cited do not include any BURP data to suggest that beneficial uses are not impaired. In fact, all of the waters (Sheep, Hat, Denny, Lookwood and Rattlesnake) all note that the drainages have been impacted by logging, roads, livestock grazing and in some of the creeks, recreation. These are all activities that can have significant sediment impact on streams.

If BURP data exists, please provide it to support this de-listing. Based on the information provided, DEQ has not provided the documentation necessary to support this de-listing.

ID 17050107SW008 04 - North Fork Owyhee River:

Information cited on page 60 of the Upper Owyhee TMDL references Battle Creek and Shoofly Creek, not the North Fork Owyhee and Juniper Creek. DEQ needs to cite in the de-listing documentation on which page or pages in the TMDL the information supporting the de-listing is located.

ID 17040210SK002 02 - Raft River (unknown)

ID 17040210SK008 04 - Raft River (unknown)

ID 17040210SK013 04 – Raft River

ID 17040210SK019 02 – Sublett Creek (sediment, fecal coliform and unknown)

ID 17040210SK020 OL – Sublett Reservoir:

DEQ is proposing to de-list AU 17040210SK002_02, Raft River for unknown because “water quality standards are being met.” However, data presented on pages 73-76, table 31 of the Raft River TMDL show total phosphorus concentrations above 0.1mg/L.

DEQ is proposing to de-list AUs 17040210SK008_04 and 17040210SK0013_04, Raft River for unknown because “water quality standards are being met.” However, data presented on page 64, table 9 of the Raft River TMDL show total phosphorus concentrations above 0.1mg/L.

DEQ is proposing to de-list AU 17040210SK019_02, Sublett Creek for sediment, fecal coliform and unknown because either “water quality standards are being met,” or “flaws in original listing.” However, this de-listing is based on a very limited data set that is presented on pages 73-76, table 31 of the Raft River TMDL.

DEQ is proposing to de-list AU 17040210SK020_OL, Sublett Reservoir for sediment and unknown because “water quality standards are being met.” However, on page 101 of the Raft River TMDL there is a discussion about major non-point sources of sediment as rangelands, unstable banks and reentrainment from the riverbed during drawdown and return to regular flows. Page 100, figure 36 notes DO problems at depth.

Based on the information provided on these waterbodies in the Raft River TMDL, they should remain listed in Category 5.

17050114SW008 03 - Tenmile Creek:

DEQ is proposing to de-list Tenmile Creek for sediment because water quality standards are being met. The rationale provided states:

While a population of transient adult rainbow trout likely resides in Fivemile and Tenmile Creek, further protection from water column sediment is not necessary. The existing TSS concentrations at the monitoring sites above the mouths of both streams rarely exceed 50mg/L, which is a threshold for juvenile fish, and hence overly stringent for adult fish.

EPA has reviewed the monitoring results for this assessment unit found on Idaho's Integrated Report website which includes results from two BURP monitoring sites as follows:

	<u>SMI score</u>	<u>SFI score</u>	<u>SHI score</u>	<u>Avg score</u>
1997SBOIA003	0	None listed	1	0
1997SBOIA004	0	1	2	0

The Idaho WBAG II (IDEQ, 2002) indicates that average BURP scores of < 2 means that a waterbody is not full supporting beneficial uses. The results above indicate this waterbody is not supporting coldwater beneficial uses. This rationale appears inconsistent with WBAG guidance regarding minimum threshold for macroinvertebrate

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scoring. On page 6-13, WBAG II indicates that *"If there are any scores below minimum threshold levels, then DEQ automatically determines the waterbody is not fully supporting"*. SMI scores for this waterbody appear to be below the minimum threshold.

The use of TSS data alone to evaluate beneficial use support, or to override beneficial use status calls based on BURP data and WBAG II procedures, is not supportable. TSS is only one component of the sediment load, and may not reflect substrate sediment levels or the level of impairment of aquatic life impacted by substrate sediment. The rationale provided above suggests that if average TSS levels are < 50 mg/l, adult rainbow trout will be protected. The IDEQ suggested threshold of 50 mg/l is not necessarily protective of all forms or lifestages of coldwater biota. EPA has accepted a 50 mg/l as a TMDL target in some circumstances, primarily because it has resulted in substantial % reduction goals in sediment loading. This should not be construed to suggest that we believe this level fully protects beneficial uses, or should be used to evaluate beneficial use support. Furthermore, the Lower Boise subbasin assessment indicates that this level was exceeded in Tenmile Creek, based on average values for the irrigation season of 62 mg/l (p. 31).

Based on this information, Tenmile Creek should remain listed in Category 5 for sediment.

ID 17060307CL007 02b – Hem Creek:

DEQ is proposing to de-list Hem Creek for temperature because water quality standards are being met. DEQ notes temperature exceedances in Hem Creek but concludes that Hem Creek is in a natural condition.

EPA has reviewed DEQ's de-listing justification and other documentation on Hem Creek. After reviewing aerial photographs from 1998 and 2004, it is clear that harvest management has been going on in this watershed during the past several years. Our review has found that there is evidence of anthropogenic activities that could influence temperature (air photos of timber harvest, roads), which would need to be analyzed in more detail (consistent with DEQ's 2003 natural conditions guidance) to establish conclusively whether or not these activities have influenced stream temperature.

The de-listing justification also discusses the CWE model. As you are aware, EPA provided substantial comments on the use of CWE in 2001 (Psyk, 2001). EPA accepted CWE as a tool to help establish shade targets in TMDLs, but we never accepted its use for demonstrating natural conditions. Furthermore, no information is presented to indicate that DEQ has evaluated watershed conditions in a manner recommended in their natural conditions guidance. Since 2001, DEQ has discarded the use of CWE for TMDL purposes, so it seems inappropriate that it would be used in this situation.

Based on this information, Hem Creek should remain listed in Category 5 for temperature.

ID I7050120SW001 05 – South Fork Payette River (sediment):

DEQ is proposing to de-list South Fork Payette River for sediment because water quality standards are being met. After reviewing the documentation in the South Fork Payette TMDL it appears that bedload sediment is the main problem in the mainstem, so

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suspended sediment concentrations (SSC) meeting targets is not a compelling argument to de-list this water. Even so, the Subbasin Assessment states that SSC are above targets at high flows, which shows there is impairment, even if using suspended sediment concentrations were appropriate.

The Subbasin Assessment attributes sediment problems to roads and natural causes, so it acknowledges anthropogenic causes for impairment. This in itself is reason enough not to de-list. DEQ references only one BURP site on a long stretch of this river which doesn't sufficiently characterize the impacts from areas near roads. Also, Redband trout fish density have decreased from 1996-2003. Though mountain whitefish densities have increased, they are still lower than levels from 1988-1990.

Based on this information, South Fork Payette River should remain listed in Category 5 for sediment.

ID 17060201SL010 02 – South Fork Salmon River (sediment):

ID 17060208SL023 05 – East Fork South Fork Salmon River (sediment)

ID 17060208SL025 04 – Johnson Creek (sediment):

In 1992 EPA approved a sediment TMDL for the South Fork Salmon River, specifically the three uppermost segments of the upper South Fork Salmon (PNRS # 918, 919, 920). The East Fork South Fork Salmon River was specifically excluded. Because the identified segments were large in scale and discussion in the TMDL frequently referenced restoration activities in tributaries, it appears that the intent of the TMDL was to cover both the mainstem SF Salmon and tributaries, except the EFSF Salmon River. For that reason, we recommend that both Johnson Creek and SF Salmon 1st and 2nd order tributary segments be moved to Category 4a, since the approved TMDL appears to include these waters.

The rationale for de-listing the above waterbodies provides no information to suggest that sediment is not continuing to impair beneficial uses in these segments. In fact, it points to evidence that the existing road system continues to contribute large quantities of sediment during storm events. Consequently placement of these segments in either Category 3 or 1 of the IR does not appear to be supported at this time.

The rationale for de-listing East Fork South Fork Salmon River for sediment is the same as for Johnson Creek and the South Fork Salmon River, and provides no information to suggest that sediment is not continuing to impair beneficial uses in this segment. In fact, it points to evidence that the existing road system continues to contribute large quantities of sediment during storm events. As mentioned above, the 1992 SF Salmon River TMDL specifically excludes this waterbody. Consequently the East Fork South Fork Salmon River should remain in Category 5 of the 2008 list for sediment.

Recommendations and Suggestions:

ID 17050122SW003 06 - Payette River:

The de-listing justification for sediment suggests that a TMDL was developed for this section of the River. The rationale provides no documentation to suggest that sediment is not continuing to impair beneficial uses in this segment. Consequently placement of

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these segments in either Category 3 or 1 of the IR does not appear to be supported at this time.

ID 17040208SK001 05 – Portneuf River (combined biota and unknown):

A TMDL was developed for the Portneuf River and approved by EPA in April, 2001. It is unclear from the de-listing rationale why this segment is being proposed to be de-listed for combined biota/habitat bioassessments. It states in the de-listing justification that the water is still impaired. If the TMDL was developed to address this impairment the de-listing should be 4a, waters with approved TMDL. However, if the TMDL did not address the issue of combined biota/habitat assessment the waters should remain listed.

ID 17040220SK003 04 – Willow Creek:

ID 17040220SK004 02 – Beaver Creek:

Both of these have the same documentation for de-listing, yet Willow Creek justification states that water quality standards are being met and Beaver Creek justification is "other."

ID 17040221SK012L-OL – Little Wood Reservoir:

The information detailed on page 131 of the Little Wood River Subbasin Assessment and TMDL show that the Reservoir is not impaired by fecal coliform. Why is the de-listing justification "other" and not "water quality standards being met?"

Weiser TMDL:

EPA approved the Weiser River TMDL in January 2007, however DEQ is not proposing to de-list any waters, specifically the 4a waters (waters that have approved TMDLs) associated with this document.