STATE OF NEW MEXICO
BEFORE THE WATER QUALITY CONTROL COMMISSION

In the Matter of:	)	
PROPOSED AMENDMENTS TO	)	**No. WQCC 14-05 (R)**
STANDARDS FOR INTERSTATE	)	
***AND INTRASTATE WATERS*,**	)	
20.6.4 NMAC	)	
New Mexico Environment Department,	)	
Petitioner.	)	

REBUTTAL TESTIMONY OF JAMES HOGAN

I. INTRODUCTION

My name is James Hogan and I am currently bureau chief of the New Mexico Environment Department ("NMED") Surface Water Quality Bureau ("SWQB"). A copy of my resume is marked as SWQB Exhibit 3, in the Notice of Intent ("NOI") direct testimony filed on December 12, 2014. It is accurate and up-to-date.

I am presenting this written rebuttal testimony on behalf of the SWQB to first clarify issues raised by the San Juan Water Commission ("SJWC") about Sections 20.6.4.97 through .99 New Mexico Administrative Code ("NMAC"). I will then present rebuttal testimony in response to the SJWC regarding SWQB's proposed amendments to certain waters in Sections 20.6.4.101 through .899 NMAC. Finally, I will present rebuttal testimony to the Amigos Bravos ("AB") proposal to change the aquatic life use in Section 20.6.4.128 NMAC.

31

32 **II. PROPOSALS AND REBUTTAL**

33

34 **A. Overview of Designated Uses**

35 The issues I will address in my rebuttal testimony all center on designated uses - in particular
36 the rebuttable presumption for §101(a)(2) "fishable/swimmable" uses, the process by which to
37 set/change these designated uses for ephemeral or effluent dependent waters, and the
38 requirements to review those waters that do not meet the §101(a)(2) uses. For this reason I will
39 start with an overview of designated uses to set the framework within which the responses to
40 specific issues can be properly addressed.

41

42 ***Designated Uses are an Integral Part of the Water Quality Standards***

43 Section 74-6-4.D of the New Mexico Water Quality Act ("WQA") provides that the Water
44 Quality Control Commission ("WQCC") *"shall adopt water quality standards for surface and*
45 *ground water of the state subject to the Water Quality Act. The standards shall include narrative*
46 *standards and as appropriate, the designated uses of the waters and the water quality criteria*
47 *necessary to protect such uses. The standards shall at a minimum protect the public health or*
48 *welfare, enhance the quality of water and serve the purposes of the Water Quality Act."* The
49 federal Water Pollution Control Act (i.e. the Clean Water Act ("CWA")) regulations provide
50 similar direction:

51 *"States adopt water quality standards to protect public health or welfare, enhance the*
52 *quality of water and serve the purposes of the Clean Water Act."* 40 CFR §131.2.

53

54 ***Rebuttable Presumption for 101(a)(2) "Fishable/Swimmable" Uses***

55 Section 101(a)(2) of the CWA states *"it is the national goal that wherever attainable, an*
56 *interim goal of water quality which provides for the protection and propagation of fish, shellfish,*
57 *and wildlife and provides for recreation in and on the water be achieved by July 1, 1983."*
58 Federal regulations specify that the requirement to adopt standards that "serve the purposes of
59 the Clean Water Act" means that *"(as defined in Sections 101(a)(2) and 303(c) of the Act) water*
60 *quality standards should, wherever attainable, provide water quality for the protection and*
61 *propagation of fish, shellfish and wildlife, recreation in and on the water, and agricultural,*
62 *industrial, and other purposes including navigation."* 40 CFR §131.2. Finally, in accordance
63 with 40 CFR §131.10(j):

64 *"(j) A State must conduct a use attainability analysis as described in § 131.3(g) whenever:*
65 *(1) The State designates or has designated uses that do not include the uses specified in*
66 *section 101(a)(2) of the Act, or*
67 *(2) The State wishes to remove a designated use that is specified in section 101(a)(2) of the*
68 *Act or to adopt subcategories of uses specified in section 101(a)(2) of the Act which require less*
69 *stringent criteria."*

70 Where a use attainability analysis (UAA) is defined as *"a structured scientific assessment of*
71 *the factors affecting the attainment of the use which may include physical, chemical, biological,*
72 *and economic factors as described in §131.10(g)."* 40 CFR §131.3(g).

73 Taken together, these federal regulations for Water Quality Standards ("WQS") regulations
74 establish the "rebuttable presumption" that the CWA §101(a)(2) uses are attainable and therefore
75 must be assigned to a water body, unless a State demonstrates, with appropriate documentation,
76 that such uses are not attainable.

The New Mexico WQS have similar requirements:

"The commission may remove a designated use specified in Section 101(a)(2) of the federal Clean Water Act or adopt subcategories of a Section 101(a)(2) use requiring less stringent criteria only if a use attainability analysis demonstrates that attaining the use is not feasible because of a factor listed in 40 CFR 131.10(g). Section 101(a)(2) uses, which refer to the protection and propagation of fish, shellfish and wildlife and recreation in and on the water, are also specified in Subsection B of 20.6.4.6 NMAC." Section 20.6.4.15(A)(1) NMAC.

Secondary Contact and Limited Aquatic Life are not 101(a)(2) uses

In the 2005 Triennial Review, the SWQB argued that the limited aquatic life and secondary contact uses proposed for ephemeral waters under Section 20.6.4.97 NMAC were consistent with §101(a)(2) uses. However in its review of the 2005 Triennial Review, the U.S. Environmental Protection Agency ("EPA") determined these uses are not consistent with §101(a)(2) goals and rejected assigning the ephemeral designation by default because a UAA is required in order to do so. The EPA Record of Decision ("ROD") at p. 36[1] states:

> *In designating a limited aquatic life use subcategory for ephemeral waters, the WQCC explained in its SoR (paragraph 188), that:*
>
> > *"...the limited aquatic life subcategory "fits" the type of aquatic communities likely to be found in nonperennial waters. Finally, the limited aquatic life subcategory is appropriate because it satisfies the CWA and EPA regulations while avoiding the substantial burden on the state of preparing UAAs to justify not designating another subcategory of the aquatic life use for nonperennial waters."*
>
> *EPA supports the concept, but disagrees with the Commission's interpretation that adopting a limited aquatic life use subcategory satisfies the CWA and EPA regulations. Although ephemeral waters may only be capable of supporting a limited aquatic community selectively adapted to the conditions typical of these waters, this limited use does not serve the purposes*

[1] http://www.nmenv.state.nm.us/swqb/documents/swqbdocs/Standards/TriennialReview/2005/ROD-EPAReviewDRAFT11-16-06.pdf

of the Act as defined in CWA sections 101(a)(2) and 303(c). These statutes require water quality standards to provide, wherever attainable, water quality for the protection and propagation of fish, shellfish, and wildlife, and recreation in and on the water – functions commonly referred to as fishable/swimmable uses. EPA's current water quality regulation effectively establishes a rebuttable presumption that fishable/swimmable uses are attainable and therefore should apply to a water body unless it can be demonstrated that such uses are not attainable. EPA does not expect the State to adopt uses for ephemeral waters that cannot be attained, but in those instances, the State must submit a UAA to support an aquatic life designation that does not meet the CWA 101(a)(2) objective as required by 40 CFR131.10(j)(1).

Likewise the ROD at p. 38 states:

"Designating a secondary contact use is likely to be appropriate for ephemeral waters. However, following the same logic explained in the discussion of the limited aquatic life use, EPA's current water quality regulation effectively establishes a rebuttable presumption that "fishable/swimmable" uses are attainable unless it can be demonstrated that such uses are not attainable. As noted in that earlier discussion, 40 CFR 131.10(j)(1) requires that a UAA be submitted supporting designated uses for waters that are lower than the goal uses described in CWA Section 101(a)(2)."

Required Review of Waters that do not Include 101(a)(2) uses

In accordance with the water quality standards in Section 20.6.4.10 NMAC and the federal water quality regulations require that:

"…the state shall from time to time, but at least once every three years, review applicable water quality standards and, as appropriate, modify and adopt standards. Any water body segment with water quality standards that do not include the uses specified in Section 101(a) of the Clean Water Act ("CWA") shall be re-examined to determine if any new information has become available. If such new information indicates that the uses specified in the CWA Section 101(a)(2) are attainable, the State shall revise its standards accordingly." 40 CFR §131.20(a).

137 **B. Ephemeral waters proposed in Subsection C of 20.6.4.97 NMAC**

138 In their NOI, the SJWC requests that the WQCC reflect on the transactional costs associated
139 with the underlying WQCC-approved water quality standards for ephemeral waters designations
140 and encourages the SWQB and the WQCC to approach the EPA to determine the most efficient
141 way to undo the damage caused by changes adopted in the 2009 triennial standards review.
142 While the SWQB is always willing to engage with interested parties to find ways to improve the
143 clarity and efficiency of the WQS and ensure that waters are neither under- nor over-protected, it
144 is not clear that the SJWC's proposal is tenable.

145 The SWQB disagrees with the SJWC's request to simply revoke the §101(a)(2) rebuttable
146 presumption for several reasons. First, as noted in previous testimony, the EPA considers limited
147 aquatic life and secondary contact to not meet §101(a)(2) goals of the CWA, as clearly
148 documented in their disapproval of the default ephemeral designations approved by the WQCC
149 in the 2005 triennial review. For this reason the SJWC is incorrect in their assertion that the
150 rebuttable presumption adopted by the WQCC in 2009 could easily be reverted back to the pre-
151 2009 designated uses and criteria for secondary contact recreation and limited aquatic life uses
152 without the performance of a UAA.

153 Likewise the SJWC has provided no evidence supporting their statement of "damage caused
154 by the 2009 action". I present testimony below to demonstrate that the SWQB currently has an
155 expeditious and cost-effective approach that will meet relevant State and federal regulations.

156

157 **SJWC:** All unclassified waters are now assigned the designated use of wildlife habitat, primary
158 contact and marginal warmwater aquatic life, and those uses can be downgraded only through

159 the performance of a UAA. The SJWC believes this requirement places an unreasonable
160 transactional cost burden on the state and its citizens that is simply unnecessary.
161
162 **Rebuttal Response:** The SWQB does not agree that UAAs place an unreasonable transactional
163 cost burden on the state and its citizens. For example, during 2008-2009, the SWQB conducted
164 18 Hydrology Protocol ("HP") UAAs for a total of $25,000 in contractor expenses, plus SWQB
165 staff time. In the SWQB's opinion, a cost of less than $1,500 per UAA plus staff time does not
166 seem an unreasonable financial burden given that this work supports a WQS rulemaking change,
167 avoids the costs associated with development of individual Total Maximum Daily Loads
168 ("TMDLs"), and also avoids unnecessary investments in point and non-point source pollution
169 reduction technologies within these stream segments. Most importantly, the appropriate
170 attainable and scientifically defensible uses and criteria have been identified for these streams for
171 CWA use in §303(d) assessments, NPDES permits, and TMDLs.
172
173 **SJWC:** The SJWC claims that the Hydrology Protocol, cited in Subsection 20.6.4.15.C NMAC,
174 elevates this guidance document to the status of an enforceable regulation, thus circumventing
175 the due process rights of those against whom the guidance documents are applied.
176
177 **Rebuttal Response:** The SWQB disagrees with the SJWC's assessment of the Hydrology
178 Protocol. The HP is not merely a guidance document - it is part of the State's Water Quality
179 Management Plan ("WQMP") and was adopted by the WQCC following two rounds of public
180 comment. As a part of the WQMP, the HP does not set enforceable regulations; rather it is a
181 WQCC-approved policy document that sets the procedure by which the regulations, as

182 documented in Subsection 20.6.4.15.C NMAC, can be implemented. Under this protocol, data
183 are collected to demonstrate that a waterbody cannot achieve the presumed primary contact or
184 aquatic life uses, which are assigned by default. As such, any WQS change adopted following a
185 HP UAA will only lead to a designated use with less stringent criteria. However, adopting such a
186 change must follow the administrative hearing process, which does not circumvent due process.
187 While the approval process in Subsection 20.6.4.15.C NMAC provides for an expedited
188 process to revise the designated use of a water body, it does not circumvent due process, as the
189 public notice and comment period is still required prior to the SWQB approval and submission to
190 the EPA. Once approved by the SWQB and the EPA, HP UAAs are also subject to public
191 hearing and approval by the WQCC through the Triennial Review process.
192
193 **SJWC:** The SJWC argues that the EPA should be receptive to a proposal allowing New Mexico
194 to return to the WQS that were in place for ephemeral streams prior to 2009, given recent public
195 comments on EPA's proposed "waters of the United States" rule. *See* Definition of "Waters of
196 the United States."[2] Numerous submitted comments demonstrate that ephemeral waters may not
197 be classified as waters of the United States and thus federal jurisdiction for water quality
198 protection purposes does not apply to such waters.
199
200 **Rebuttal Response:** The SWQB recognizes that many parties, including the NMED, have raised
201 concerns about the federal jurisdictional authority over ephemeral waters. Until a final rule is
202 promulgated, however, it is premature to interpret the impact of EPA's waters of the United
203 States rule, or to determine if a state level designation of ephemeral waters could be made.

[2] SJWC cites the proposed rule published by the EPA on April 21, 2014. 79 FR 76, p. 22188 (Definition of ''Waters of the United States'' Under the Clean Water Act; Proposed Rule).

Regardless, per Subsection 20.6.4.15(A)(1) NMAC, designated uses may only be removed or made less stringent if a UAA demonstrates that attaining the existing use is not feasible because of a factor listed in 40 CFR §131.10(g).

SJWC: Arizona has a reasonable approach to unclassified waters; New Mexico should adopt their concept of effluent dependent waters.

Rebuttal Response: The SJWC provides no suggestions as to how Arizona's regulations on effluent dependent waters ("EDWs") could be incorporated into New Mexico's WQS. While Arizona's approach may appear reasonable, in the opinion of the SWQB it would be fraught with implementation challenges if adopted for New Mexico. First, as defined in Arizona's WQS, *"an effluent-dependent water is a surface water that, without the point source discharge of wastewater, would be an ephemeral water."* (R18-11-101) This would require an extensive, statewide study of all waters with point source discharges to determine if, without the point source, the water would be ephemeral. Second, Arizona's WQS define a special designated use and associated standards for EDWs. As such the term "EDW" describes the source of the water, rather than the uses supported by the water and the criteria to protect these uses, as in New Mexico's WQS. It is likely that EDWs in New Mexico support a wide variety of uses, thus defining a single use for all EDWs would be difficult. Likewise, effluent quality, and thus the resulting in-stream water quality, would likely be variable in EDWs, thus establishing one set of standards to protect the source of the water would be difficult. Therefore, adopting standards similar to Arizona's would require careful consideration of the overall impact to all of New Mexico's WQS. Finally, it is unclear whether having a designated use of EDW would imply that

227 the stream has a designated use for waste transport and assimilation. This is a significant issue
228 because waste transport and assimilation is not considered an acceptable designated water body
229 use. The federal regulations at 40 CFR §131.10(a) states:

230 *"§131.10 Designation of uses.*

231 ***(a)*** *Each State must specify appropriate water uses to be achieved and protected. The*
232 *classification of the waters of the State must take into consideration the use and value of*
233 *water for public water supplies, protection and propagation of fish, shellfish and wildlife,*
234 *recreation in and on the water, agricultural, industrial, and other purposes including*
235 *navigation.* ***In no case shall a State adopt waste transport or waste assimilation as a***
236 ***designated use for any waters of the United States.*** *[Emphasis added]*

237 Therefore, as for other discharges, the effluent quality must be maintained at treatment
238 levels sufficient enough that degradation does not occur, and also consistent enough to ensure
239 that all attainable uses are met. Furthermore, as the Department already has several regulatory
240 tools, such as the HP, to determine what uses and criteria should apply for receiving streams,
241 such a broad category as an EDW designated use is not necessary.

242

243 **C. Proposal for Certain Segments in Section 20.6.4.100-899 NMAC to Change to**
244 **Primary Contact Recreation**

245 The SJWC argues that the WQCC should not adopt the SWQB's proposed revisions for
246 upgrading recreational use in nine waterbody segments because such a use already meets
247 §101(a)(2) goals and therefore there is no need to make this change, and because the SWQB
248 provides no information and data proving the use is attainable. As detailed previously,
249 secondary contact does not meet the §101(a)(2) goal and as such, per 40 CFR §131.20(a), the
250 State is required to review these waters during the Triennial Review to determine if the

251 §101(a)(2) goal remains unattainable. In conducting this review, the SWQB found no evidence
252 of a UAA to support the designation of a secondary contact use or evidence that primary contact
253 use is unattainable in these waters. To the contrary, all evidence found indicated that the primary
254 contact recreation was an existing use, or at the very least attainable given the significant amount
255 of other water-based recreation occurring. For these reasons, the SWQB argues that the WQCC
256 should reject the SJWC recommendation and adopt the changes as proposed by the SWQB.

257

258 **SJWC:** Because the current designated use of secondary contact recreation, previously approved
259 by EPA, meets CWA §101(a)(2) goal for recreation in and on the water there is no need to
260 impose this change.

261

262 **Rebuttal Response:** In previous Triennial Reviews, the SWQB made the same argument
263 presented by the SJWC when the ephemeral standards under Section 20.6.4.97 NMAC were first
264 adopted. As noted above in its review of the 2005 Triennial Review, the EPA determined that
265 secondary contact is not consistent with §101(a)(2) goals and rejected assigning the ephemeral
266 designation by default because a UAA is required in order to do so.

267

268 **SJWC:** The SWQB does not offer any data, documentation, or evidence that primary contact is
269 occurring and is attainable.

270

271 **Rebuttal Response:** This is not correct; in the SWQB petition and testimony, evidence
272 of primary contact recreation as an existing or an attainable use is provided. As discussed above,
273 the State is required to periodically review waters that do not meet §101(a)(2) goals; in

274 conducting this review, the SWQB found no evidence to support that primary contact in these
275 waters is not attainable. This information is summarized in SWQB Rebuttal Exhibit 2 (memo)
276 and hereby added to the rationale already presented in the petition and testimony.

277 For example, in Segment 20.6.4.219 NMAC, for Avalon Reservoir, the petition Basis for
278 Change states the following:

279 *"In this case, kayaking and scuba for game fishing are activities allowed and described on*
280 *the reservoir park website. The Department has no evidence that this use is not attainable*
281 *and information indicates that primary contact use may be existing and is likely attainable."*
282 (Pintado Testimony, SWQB Exhibit 13, p. 81)

283 Also, in testimony the SWQB stated that primary contact recreation was observed in
284 Segment 20.6.4.103 NMAC. Additionally, it has been noted by field staff that the Rio Grande is
285 accessible for swimming, and there is a commercial hot springs park located in this segment,
286 which features access to the river. It was stated in testimony that Segment 20.6.4.116 NMAC
287 includes the Rio Ojo Caliente, which has swimming at the hot springs located in it. Rafting and
288 float trips have been observed by SWQB staff, and the United States Bureau of Land
289 Management ("BLM") offers rafting activities on the lower and upper segments of the Rio
290 Chama.[3]

291 While nominally accessible to park scientists and guided tours, the SWQB also has
292 anecdotal information from the National Park Service (Valles Caldera National Park) that
293 Segment 20.6.4.124 NMAC has an existing use (as defined under Subsection 20.6.4.7 (E)(3)
294 NMAC) of primary contact recreation in hot springs in this segment with features named

[3] SWQB staff has observed rafting and float trips on this segment. The Bureau of Land Management offers rafting activities on lower and upper segments of the Rio Chama: http://www.blm.gov/nm/st/en/prog/recreation/taos/rio_chama_wsr.html

295 "footbath springs", and "Ladies' and Men's bathhouses". Evidence of primary contact recreation
296 has been observed by SWQB staff in Segments 20.6.4.204 and 206 NMAC, particularly
297 upstream and downstream of Brantley Reservoir. Segment 20.6.4.207 NMAC is the main stem
298 of the Pecos River and includes over 100 miles including the Salt Creek wilderness used by
299 hikers and backpackers. While some of this area is very remote, contact recreation is possible.
300 There is easy access just below Sumner Dam, there are daytime recreational-use sites on both
301 sides of the river, and fishing activities are common.

302 Segments 20.6.4.213, 219 and 308 NMAC are all lakes on state parks with activities
303 noted in the testimony, which includes scuba, fishing (includes scuba game fishing and fly
304 fishing), wading, kayaking, canoeing and paddlecraft, and use of small trolling boats. The
305 SWQB considers such water-based recreation to indicate a significant potential for primary
306 contact, either on purpose or by accident.

307

308 **SJWC:** The SWQB also states in their Basis for Change "to be consistent with the latest EPA
309 recommendations for recreational contact… the designated use…is upgraded." However, the
310 EPA announcement published in the Nov 29, 2012 Federal Register applies to the availability of
311 the 2012 Recreational Water Quality Criteria, a document that contains EPA's recreational water
312 quality criteria recommendations for protection human health in ambient waters that already are
313 designated for primary contact recreation- not secondary contact. EPA's recommendation does
314 not apply unless or until the waters have a designated use of primary contact.

315

316 **Rebuttal Response:** The SWQB disagrees with the SJWC's comment. The relevant requirement
317 is in 40 CFR §131.20(a), which requires states to review WQS that do not meet §101(a)(2) uses.

318 The SWQB reference to 77 FR71191, November 29, 2012 is merely to note that the primary
319 contact standards meet the latest EPA recommendations for recreational contact and CWA
320 §101(a) goals (77 FR71191, November 29, 2012).
321
322 **D. Section 20.6.4.128 NMAC – LANL Waters in Segment 128**
323 Amigos Bravos submitted a proposal to change the limited aquatic life use to the
324 marginal warmwater aquatic life use in Segment 20.6.4.128 NMAC ("Segment 128") for the
325 following reasons: 1) non-perennial waters are important; 2) the current uses and criteria (e.g.,
326 acute) in this segment are not based on sound science, do not meet the review required under 40
327 CFR §131.20(a) and should be revised; 3) intermittent streams on LANL property should have
328 the same protections as for other intermittent waters in New Mexico; and 4) Segment 128 uses
329 and criteria are based on a "fatally flawed" UAA. (Amigos Bravos NOI Testimony, Pleading
330 Log Item 19) Los Alamos National Lab ("LANL") has filed a notice of intent to present direct
331 technical testimony in opposition to Amigos Bravos' proposal. (LANL NOI Testimony, Pleading
332 Log Item 22)
333 The SWQB's rebuttal testimony is in opposition to Amigos Bravos' proposal, and is
334 presented below. In summary, the WQCC and EPA have previously determined that limited
335 aquatic life is the highest attainable use for the intermittent and ephemeral waters in Segment
336 128. Amigos Bravos presents no new information to indicate that the marginal warmwater
337 aquatic life use is an existing or attainable use, in fact the arguments they provide was
338 considered, and rejected, by the WQCC during the last Triennial Review. Likewise the argument
339 that these criteria are based on a "fatally flawed" UAA is not supported by the record supporting

340 the WQCC's adoption and the EPA's review and approval. For these reasons, as detailed below,
341 the SWQB recommends that the Commission not adopt Amigos Bravos' proposal.
342
343 **AB:** Amigos Bravos proposes to change Segment 128 from a limited aquatic life use to a
344 marginal warm water aquatic life use because intermittent waters on LANL are given weaker
345 protections than all other intermittent waters in New Mexico. Amigos Bravos' testimony
346 provides an account of the importance of non-perennial streams and includes an inventory of
347 birds, mammals and aquatic species documented in Los Alamos County and in the Jemez
348 Mountains region.
349
350 **Rebuttal Response:** The SWQB agrees that non-perennial streams are important. However,
351 Amigos Bravos' most recent proposal for Segment 128 relies upon, and reinterprets, the same
352 information considered by the WQCC when the limited aquatic life use was first assigned to
353 ephemeral and intermittent streams in Segment 128.[4] This same information was presented again
354 by Amigos Bravos in a proposal to change the limited aquatic life use in Segment 128 during the
355 2008-2009 Triennial Review. At that time, the WQCC did not approve Amigos Bravos'
356 proposed change to the limited aquatic life use, noting four main reasons:
357 1. The WQCC does not adopt Amigos Bravos' proposal to replace limited aquatic life
358 use with aquatic life use because this segment was created and designated uses were
359 assigned in the last triennial review; Amigos Bravos presented no new evidence
360 regarding current water quality conditions that would support a change in the
361 standards.

[4] Discussion is in the 2003-2005 Triennial Review Hearing Officer's Report, Attachment A, pp. 189-199.

2. A UAA was completed and approved by the EPA for this segment. The UAA noted that the 2002 study referenced by Amigos Bravos "provide[s] information from numerous sources indicating that ephemeral and intermittent streams in the Jemez Mountains support aquatic life that includes aquatic invertebrates and perhaps amphibians, but not fish." Amigos Bravos relies on information that the WQCC already considered in assigning the limited aquatic life use.
3. The EPA approved this provision based on the hearing record and the UAA submitted by the SWQB, and has not indicated any problem with that decision.
4. The UAA for this segment acknowledges the presence of aquatic invertebrates, and even amphibians, but not fish, and therefore concludes that the waters cannot attain the CWA §101(a)(2) goal of water quality providing for the "protection and propagation of fish, shellfish and wildlife."

(SWQB Rebuttal Exhibit 3)

AB: The LANL UAA is fatally flawed because it was improperly drafted as an after-the-fact rationalization for the 2004 decision by the WQCC to change 20.6.4.128 NMAC.

Rebuttal Response: During the time the 2003-2005 Triennial Review was conducted, the SWQB and the WQCC considered the 2002 report (Lusk and McRae) to provide the necessary documentation to support of uses assigned to Segments 126-128. In accordance with CWA §303(c) and 40 CFR §131.20(c), amendments to the WQS, including for Segments 126-128, were submitted to the EPA for review on July 1, 2005. The WQCC's Statement of Reasons for Amendment of Standards, the hearing record, all transcripts and exhibits, and the 2002 U.S. Fish

and Wildlife study were provided to support the changes, pursuant to 40 CFR §131.6(b) and (f). The EPA approved the majority of the amendments (SWQB Rebuttal Exhibit 4). However, for Segment 128, the EPA took no action and requested further documentation, citing 40 CFR §131.6(b) and (f), and stating:

> *"…In today's action, EPA is approving the majority of these amendments. However, based on a review of the record, EPA was unable to take action on a few provisions because they did not meet the minimum requirements for a water quality standards submission. See 40 CFR 13 1.6(b) and (f). Specifically, EPA was unable to take action on the limited aquatic life, aquatic life and or secondary contact recreation use designations for Sections 20.6.4.97, 20.6.4.98 and 20.6.4.99. EPA strongly supports the concept the State has used in developing standards for unclassified ephemeral, intermittent and perennial surface waters; however, adequate supporting documentation (such as a use attainability analysis) was not available which would allow us to take action on all portions of these provisions. Similarly, EPA was unable to take action on the new and for revised use designations and modifications for six classified segments because adequate supporting documentation (such as a use attainability analysis) was not available to support the modifications. See segments 20.6.4.126, 128, 221, 310, 701 and 702.*
>
> *The enclosed detailed Record of Decision ["ROD"] explains EPA's basis for the approval action taken and* ***provides an explanation of the type of documentation that is necessary for EPA to be able to approve the remaining provisions. We would be glad to work with you and provide technical assistance regarding the needed supporting documentation." [Emphasis added]***
>
> (SWQB Rebuttal Exhibit 4)

The EPA also made specific comments on Segment 128 in the ROD accompanying its letter:

> *"…As with the two previous Sections, New Mexico has established this segment, classifying waters within LANL property. The State based use designations for this segment on the same intensive study by the Service (Lusk and MacRae 2002) mentioned in the previous sections. This segment has been designated for limited aquatic life and secondary contact based on likelihood of exposure by ingestion and a light frequency of use, as well as the State's default livestock watering and wildlife habitat uses that have been applied.*
>
> *The limited aquatic life and secondary contact uses may be the highest uses that can be attained in this segment. However, as discussed in Section 20.6.4.126, such designations are not compatible with the uses specified in section 101(a)(2) of the Act and must be supported by a UAA based on one of the factors listed in 40 CFR 131.10(g). Again, the most logical factor is 131.10(g)(2) - natural, ephemeral, intermittent, or low-flow conditions or water levels prevent attainment of the use. The supporting UAA for waters in this segment and Section 20.6.4.126 may be combined.*

426
427 *Action: EPA takes no action on this Section."*
428 (SWQB Rebuttal Exhibit 5)
429
430 To suggest that the UAA was completed "after the fact" and is therefore "fatally flawed"
431 is without merit. The UAA report was requested under 40 CFR §131.6 to support the uses
432 adopted in 2005 by the WQCC for the ephemeral and intermittent waters in Segments 126 and
433 128. The EPA worked with the SWQB on the UAA, which was submitted to the EPA on August
434 17, 2007, and approved on August 31, 2007.
435 The allegation that the UAA is "fatally flawed" based on a predetermination decision is
436 not applicable in the context of WQS revisions, especially when the federal regulations allow for
437 additional information to be submitted before final CWA §303(c) approval by EPA. The federal
438 regulations at 40 CFR §131.21(a)(1)-(2) require the EPA to review and either approve or
439 disapprove a state's WQS only after they have been adopted and certified by the state.[5]
440 Therefore, to comply with the federal regulations all WQS revisions could be considered "after
441 the fact." AB cites *Davis v. Mineta*, 302 F.3d 1104 (10th Cir. 2002) for the proposition that the
442 UAA was "fatally flawed" as a result of some "predetermination." That case is not relevant as it
443 dealt with the National Environmental Policy Act ("NEPA") process, a procedural statute
444 requiring federal agencies to evaluate the impact of their actions upon the environment before
445 engaging in that action. That process is very different than the EPA approval of a UAA
446 submitted by a state agency, where the EPA would almost certainly consider the same evidence
447 as the state agency did in evaluating how to classify these waters.

[5] According to 40 CFR 131.21, those WQS revisions submitted after May 30, 2000, are applicable for CWA purposes only after EPA's final approval.

448 Furthermore, in the 2011 ROD for the EPA's review of the 2008-2009 Triennial Review,
449 the EPA reiterated its approval of the uses and criteria for ephemeral and intermittent streams in
450 Segment 128:

451 *"In its 2005 action, New Mexico designated limited aquatic life and secondary*
452 *contact uses for this segment. In 2006, EPA took no action on this new segment, noting*
453 *that the State had not provided adequate support justifying the limited aquatic life or the*
454 *secondary contact use designation. EPA noted that 40 CFR 131.6(b) and (f) requires the*
455 *submission of supporting analyses and other general information that would assist EPA*
456 *in determining the adequacy of standards that don't include uses specified in*
457 *§101(a)(2)of the Act. EPA noted that to comply with the regulation, New Mexico must*
458 *submit a UAA to demonstrate why attaining the limited aquatic life and secondary*
459 *contact recreation uses are not feasible based on one of the factors listed in 40 CFR*
460 *131.10(g).*
461 *Following that recommendation, NMED developed a UAA in August 2007, to*
462 *support the limited aquatic life and secondary contact use designations for this segment.*
463 *The State's UAA identified the streams included in this segment as ephemeral and*
464 *intermittent. Given that these streams do not flow for varying periods throughout the year*
465 *and the lack of upstream source populations, it is unlikely that this segment could support*
466 *a higher use. EPA approved the limited aquatic life and secondary contact use*
467 *designations for this segment on August 31, 2007."*
468 (SWQB Rebuttal Exhibit 6)

469

470 **AB:** The UAA also does not take into account the well-documented presence of shellfish and
471 macroinvertebrates that are indicators of a 101(a)(2) use.

472

473 **Rebuttal Response:** As noted in the testimony above, the WQCC found that the UAA does
474 acknowledge the presence of aquatic invertebrates, and even amphibians, however it concluded
475 that that the waters cannot attain the CWA §101(a)(2) goal. It is important to note that
476 designation of limited aquatic life use for the ephemeral and intermittent streams in Segment 128
477 does not ignore the presence of macroinvertebrates, including shellfish and clams. In fact, the
478 definition for limited aquatic life states that the subcategory *"includes surface waters that*
479 *support aquatic species selectively adapted to take advantage of naturally occurring rapid*

480 *environmental changes, ephemeral or intermittent water, high turbidity, fluctuating temperature,*
481 *low dissolved oxygen or unique chemical characteristics."* Subparagraph 20.6.4.7.L (2) NMAC
482
483 **AB:** Amigos Bravos suggests that in accordance with the federal regulations in 40 CFR
484 §131.20(a), the SWQB should reevaluate the waters in Segment 128 by applying use of the HP.
485
486 **Rebuttal Response:** The SWQB does not agree. The federal regulations in 40 CFR §131.20(a)
487 do not require states to revisit every UAA, or to generate new data. Rather, the SWQB is
488 required to consider if new data are available for segments without CWA §101(a)(2) uses, and
489 whether those data indicate that a higher use is attainable. The SWQB is not aware of, nor has
490 Amigos Bravos presented, new and credible data demonstrating that the marginal warmwater
491 aquatic life use is existing or attainable in Segment 128.
492
493 **AB:** Segment 128 should be assigned the warmwater aquatic life use consistent with the default
494 uses and criteria (e.g., acute and chronic) consistent with intermittent streams in Section
495 20.6.4.98 NMAC.
496
497 **Rebuttal Response:** It is not required, nor is it necessarily appropriate, to always assign default
498 uses and criteria (e.g., under Sections 20.6.4.97 through .99 NMAC) to certain types of water
499 bodies when using the UAA methodology. Instead, the WQS require that UAA methods must be
500 scientifically defensible, and provides examples of such methods (Subsection 20.6.4.15.B
501 NMAC). In the case of Segment 128, the UAA for this segment acknowledges the presence of
502 aquatic invertebrates, wildlife, amphibians, but not fish, and therefore concludes that the waters

503 cannot attain the CWA §101(a)(2) goal of water quality providing for the "protection and
504 propagation of fish, shellfish and wildlife." (SWQB Rebuttal Exhibit 3) The UAA also
505 acknowledges that the ephemeral and intermittent streams in this segment experience a low-flow
506 regime subject to high variability, which limits the aquatic species to those well adapted to those
507 conditions, such as for the limited aquatic life use defined in Subparagraph 20.6.4.7.L (2)
508 NMAC.
509
510 **AB:** Amigos Bravos points to the HP as new guidance, which was in development during the
511 2008-2009 Triennial Review process[6] that provides better and clearer guidance on how to
512 complete UAAs in ephemeral and intermittent streams. They assert that if this new protocol had
513 been used, many of the waters in these segments would merit the protections of a marginal
514 warmwater aquatic life use designation rather than a limited aquatic life use designation.
515
516 **Rebuttal Response:** Amigos Bravos states in testimony that according to the HP, "…the
517 presence of macroinvertebrates signal that the water is in fact intermittent, not ephemeral, and
518 therefor merits CWA §101(a)(2)…" [Conn Testimony, Amigos Bravos NOI, Pleading Log Item
519 19 p. 3] While this is correct, it is important to understand that the HP UAA is designed to be an
520 expedited process to demonstrate that attainment of CWA §101(a)(2) aquatic life and
521 recreational uses are not feasible due to the factor identified in 40 CFR §131.10(g)(2): *natural,*
522 *ephemeral, intermittent, or low flow conditions or water levels prevent the attainment of the use*.
523 Due to the expedited nature of the HP the presence of macroinvertebrates requires additional data

[6] The HP was approved by the WQCC on May 10, 2011 and by the EPA on December 23, 2011 as Appendix C of the state's Water Quality Management Plan (WQMP) / Continuing Planning Process (CPP) document.

collection, beyond the basic Level 1 Evaluation, to demonstrate that limited aquatic life is the highest attainable use.

As such, the HP notes that for the Level 1 Evaluation, ephemeral streams with scores below 9 but in which aquatic macroinvertebrates and/or fish have been observed, the stream is at least intermittent. [HP Table 5, p.33] However, the HP further states that:

> *"…In most instances, the use of a Level 1 Evaluation should be sufficient to make a final hydrological determination.* ***If after conducting Level 1 Evaluation, a hydrological determination cannot be made because more information is required, then a Level 2 Evaluation which uses more intensive data collection can be conducted."***