

APPROVED JURISDICTIONAL DETERMINATION FORM
U.S. Army Corps of Engineers

This form should be completed by following the instructions provided in Section IV of the JD Form Instructional Guidebook.

SECTION I: BACKGROUND INFORMATION

A. REPORT COMPLETION DATE FOR APPROVED JURISDICTIONAL DETERMINATION (JD): June 18, 2012

B. DISTRICT OFFICE, FILE NAME, AND NUMBER: Sacramento District, BLM - Condor Canyon, SPK-2012-00558-SG

C. PROJECT LOCATION AND BACKGROUND INFORMATION:

State: **Nevada** County/parish/borough: **Lincoln** City:

Center coordinates of site (lat/long in degree decimal format): Lat. **37.843°**, Long. **-114.349°**

Universal Transverse Mercator: **11 733257.83 4191734.36**

Name of nearest waterbody: **Meadow Valley Wash**

Name of nearest Traditional Navigable Water (TNW) into which the aquatic resource flows: **Kiln Wash**

Name of watershed or Hydrologic Unit Code (HUC): **Meadow Valley Wash, Nevada, Utah., 15010013**

Check if map/diagram of review area and/or potential jurisdictional areas is/are available upon request.

Check if other sites (e.g., offsite mitigation sites, disposal sites, etc...) are associated with this action and are recorded on a different JD form:

D. REVIEW PERFORMED FOR SITE EVALUATION (CHECK ALL THAT APPLY):

Office (Desk) Determination. Date: **June 18, 2012**

Field Determination. Date(s):

SECTION II: SUMMARY OF FINDINGS

A. RHA SECTION 10 DETERMINATION OF JURISDICTION.

There **Are no** "navigable waters of the U.S." within Rivers and Harbors Act (RHA) jurisdiction (as defined by 33 CFR part 329) in the review area. [Required]

Waters subject to the ebb and flow of the tide.

Waters are presently used, or have been used in the past, or may be susceptible for use to transport interstate or foreign commerce.

Explain:

B. CWA SECTION 404 DETERMINATION OF JURISDICTION.

There **Are** "waters of the U.S." within Clean Water Act (CWA) jurisdiction (as defined by 33 CFR part 328) in the review area. [Required]

1. Waters of the U.S.

a. Indicate presence of waters of U.S. in review area (check all that apply):¹

TNWs, including territorial seas

Wetlands adjacent to TNWs

Relatively permanent waters² (RPWs) that flow directly or indirectly into TNWs

Non-RPWs that flow directly or indirectly into TNWs

Wetlands directly abutting RPWs that flow directly or indirectly into TNWs

Wetlands adjacent to but not directly abutting RPWs that flow directly or indirectly into TNWs

Wetlands adjacent to non-RPWs that flow directly or indirectly into TNWs

Impoundments of jurisdictional waters

Isolated (interstate or intrastate) waters, including isolated wetlands

b. Identify (estimate) size of waters of the U.S. in the review area:

Non-wetland waters: **26250** linear feet, wide, and/or acres.

Wetlands: **50** acres.

c. Limits (boundaries) of jurisdiction based on: Established by OHWM.

Elevation of established OHWM (if known):

2. Non-regulated waters/wetlands (check if applicable):³

Potentially jurisdictional waters and/or wetlands were assessed within the review area and determined to be not jurisdictional.

Explain:

SECTION III: CWA ANALYSIS

A. TNWs AND WETLANDS ADJACENT TO TNWs: NA

¹ Boxes checked below shall be supported by completing the appropriate sections in Section III below.

² For purposes of this form, an RPW is defined as a tributary that is not a TNW and that typically flows year-round or has continuous flow at least "seasonally" (e.g., typically 3 months).

³ Supporting documentation is presented in Section III.F.

B. CHARACTERISTICS OF TRIBUTARY (THAT IS NOT A TNW) AND ITS ADJACENT WETLANDS (IF ANY):

This section summarizes information regarding characteristics of the tributary and its adjacent wetlands, if any, and it helps determine whether or not the standards for jurisdiction established under *Rapanos* have been met.

The agencies will assert jurisdiction over non-navigable tributaries of TNWs where the tributaries are “relatively permanent waters” (RPWs), i.e. tributaries that typically flow year-round or have continuous flow at least seasonally (e.g., typically 3 months). A wetland that directly abuts an RPW is also jurisdictional. If the aquatic resource is not a TNW, but has year-round (perennial) flow, skip to Section III.D.2. If the aquatic resource is a wetland directly abutting a tributary with perennial flow, skip to Section III.D.4.

A wetland that is adjacent to but that does not directly abut an RPW requires a significant nexus evaluation. Corps districts and EPA regions will include in the record any available information that documents the existence of a significant nexus between a relatively permanent tributary that is not perennial (and its adjacent wetlands if any) and a traditional navigable water, even though a significant nexus finding is not required as a matter of law.

If the waterbody⁴ is not an RPW, or a wetland directly abutting an RPW, a JD will require additional data to determine if the waterbody has a significant nexus with a TNW. If the tributary has adjacent wetlands, the significant nexus evaluation must consider the tributary in combination with all of its adjacent wetlands. This significant nexus evaluation that combines, for analytical purposes, the tributary and all of its adjacent wetlands is used whether the review area identified in the JD request is the tributary, or its adjacent wetlands, or both. If the JD covers a tributary with adjacent wetlands, complete Section III.B.1 for the tributary, Section III.B.2 for any onsite wetlands, and Section III.B.3 for all wetlands adjacent to that tributary, both onsite and offsite. The determination whether a significant nexus exists is determined in Section III.C below.

1. Characteristics of non-TNWs that flow directly or indirectly into TNW

(i) General Area Conditions:

Watershed size: **2.4 million acres**
Drainage area: **544269 Pick List**
Average annual rainfall: **13.76 inches**
Average annual snowfall: **35.2 inches**

(ii) Physical Characteristics:

(a) Relationship with TNW:

- Tributary flows directly into TNW.
- Tributary flows through **1** tributaries before entering TNW.

Project waters are **30 (or more)** river miles from TNW.
Project waters are **1 (or less)** river miles from RPW.
Project waters are **30 (or more)** aerial (straight) miles from TNW.
Project waters are **1 (or less)** aerial (straight) miles from RPW.
Project waters cross or serve as state boundaries. Explain: **Meadow Valley Wash does not cross or serve as a state boundary**

Identify flow route to TNW⁵: **Meadow Valley Wash is a Tributary to the Muddy River, which historically was a tributary of the Virgin River, but now flows directly into Lake Mead (Colorado River).**

Tributary stream order, if known:

(b) General Tributary Characteristics (check all that apply):

Tributary is: Natural
 Artificial (man-made). Explain:
 Manipulated (man-altered). Explain:

Tributary properties with respect to top of bank (estimate):

Average width: **12 feet**
Average depth: **0.7 feet**
Average side slopes: **2:1**.

Primary tributary substrate composition (check all that apply):

- | | | |
|---|--|-----------------------------------|
| <input checked="" type="checkbox"/> Silts | <input type="checkbox"/> Sands | <input type="checkbox"/> Concrete |
| <input checked="" type="checkbox"/> Cobbles | <input checked="" type="checkbox"/> Gravel | <input type="checkbox"/> Muck |
| <input checked="" type="checkbox"/> Bedrock | <input type="checkbox"/> Vegetation. Type/% cover: | |

⁴ Note that the Instructional Guidebook contains additional information regarding swales, ditches, washes, and erosional features generally and in the arid West.

⁵ Flow route can be described by identifying, e.g., tributary a, which flows through the review area, to flow into tributary b, which then flows into TNW.

Other. Explain:

Tributary condition/stability [e.g., highly eroding, sloughing banks]. Explain: **Meadow Valley Wash within Condor Canyon is relatively stable, but has become entrenched because of historical practices upstream (mining, grazing).**

Presence of run/riffle/pool complexes. Explain: **Present, but needs restoration**

Tributary geometry: **Meandering**

Tributary gradient (approximate average slope): **1.6 %**

(c) **Flow:**

Tributary provides for: **Perennial**

Estimate average number of flow events in review area/year: **2-5**

Describe flow regime: **The Delmue springs provide a base flow of approximately 0.45 cfs. Flows ranged from 2.25 cfs to 6.9 cfs during a 1987 Aquatic Inventory of the wash.**

Other information on duration and volume:

Surface flow is: **Discrete and confined.** Characteristics:

Subsurface flow: **Unknown.** Explain findings:

Dye (or other) test performed:

Tributary has (check all that apply):

Bed and banks

OHWM⁶ (check all indicators that apply):

clear, natural line impressed on the bank

changes in the character of soil

shelving

vegetation matted down, bent, or absent

leaf litter disturbed or washed away

sediment deposition

water staining

other (list):

Discontinuous OHWM.⁷ Explain:

the presence of litter and debris

destruction of terrestrial vegetation

the presence of wrack line

sediment sorting

scour

multiple observed or predicted flow events

abrupt change in plant community

If factors other than the OHWM were used to determine lateral extent of CWA jurisdiction (check all that apply):

High Tide Line indicated by:

oil or scum line along shore objects

fine shell or debris deposits (foreshore)

physical markings/characteristics

tidal gauges

other (list):

Mean High Water Mark indicated by:

survey to available datum;

physical markings;

vegetation lines/changes in vegetation types.

(iii) **Chemical Characteristics:**

Characterize tributary (e.g., water color is clear, discolored, oily film; water quality; general watershed characteristics, etc.).

Explain:

Identify specific pollutants, if known: **Watershed is relatively undeveloped but has been impacted by mining and ranching. Pollutants are probably limited to sediment.**

(iv) **Biological Characteristics. Channel supports (check all that apply):**

Riparian corridor. Characteristics (type, average width): **Woody vegetation consists of black willow, tamarisk, box elder, and coyote willow. Cottonwoods are also present. Cattails, redtop, sedges and rushes occur within patches along and within the stream channel. Average width varies from 1-2 feet to wide areas of 100 or more feet.**

Wetland fringe. Characteristics: **As above - cattails, sedges and rushes are found sporadically along the stream channel.**

Habitat for:

Federally Listed species. Explain findings: **The project is for restoration and enhancement of Big Spring spinedace (*Lepidomea mollispinis pratensis*), which is found only within the reach of Meadow Valley Wash from Condor Canyon to Panaca, Nevada.**

Fish/spawn areas. Explain findings:

Other environmentally-sensitive species. Explain findings: **There are three known BLM Special Status Animal Species or their habitat known to occur within Condor Canyon or the project area: Meadow Valley Wash desert sucker, Meadow Valley Wash speckled dace, and unoccupied desert bighorn sheep habitat.**

⁶A natural or man-made discontinuity in the OHWM does not necessarily sever jurisdiction (e.g., where the stream temporarily flows underground, or where the OHWM has been removed by development or agricultural practices). Where there is a break in the OHWM that is unrelated to the waterbody's flow regime (e.g., flow over a rock outcrop or through a culvert), the agencies will look for indicators of flow above and below the break.

⁷Ibid.

Aquatic/wildlife diversity. Explain findings:

2. Characteristics of wetlands adjacent to non-TNW that flow directly or indirectly into TNW

(i) Physical Characteristics:

(a) General Wetland Characteristics:

Properties:

Wetland size: ~50 acres

Wetland type. Explain: **The wetlands associated with this project are riverine wetlands and occur within a narrow band along Meadow Valley Wash**

Wetland quality. Explain: **Wetland quality is medium to high. The area is currently a monoculture of cattails with little diversity. There are inclusions of higher quality habitat throughout with scrub-shrub willow.**

Project wetlands cross or serve as state boundaries. Explain: **The wetland does not serve as a state boundary or extend beyond a state boundary.**

(b) General Flow Relationship with Non-TNW:

Flow is: **Perennial flow**. Explain: **This section of Meadow Valley Wash is fed by Delmue Springs and provides for year round flow into the wash.**

Surface flow is: **Discrete**

Characteristics:

Subsurface flow: **Unknown**. Explain findings:

Dye (or other) test performed:

(c) Wetland Adjacency Determination with Non-TNW:

Directly abutting

Not directly abutting

Discrete wetland hydrologic connection. Explain:

Ecological connection. Explain:

Separated by berm/barrier. Explain:

(d) Proximity (Relationship) to TNW

Project wetlands are **30 (or more)** river miles from TNW.

Project waters are **30 (or more)** aerial (straight) miles from TNW.

Flow is from: **Wetland to navigable waters**.

Estimate approximate location of wetland as within the **2-year or less** floodplain.

(ii) Chemical Characteristics:

Characterize wetland system (e.g., water color is clear, brown, oil film on surface; water quality; general watershed characteristics; etc.). Explain:

Identify specific pollutants, if known: **Area is relatively undeveloped but has undergone significant impacts from past mining and ranching operations. Sediment is probably the most prevalent pollutant.**

(iii) Biological Characteristics. Wetland supports (check all that apply):

Riparian buffer. Characteristics (type, average width): **Woody vegetation consists of black willow, tamarisk, box elder, and coyote willow. Cottonwoods are also present. Cattails, reedtop, sedges and rushes occur within patches along and within the stream channel. Average width varies from 1-2 feet to wide areas of 100 or more feet.**

Vegetation type/percent cover. Explain: **See above.**

Habitat for:

Federally Listed species. Explain findings: **See above**

Fish/spawn areas. Explain findings:

Other environmentally-sensitive species. Explain findings:

Aquatic/wildlife diversity. Explain findings:

3. Characteristics of all wetlands adjacent to the tributary (if any)

All wetland(s) being considered in the cumulative analysis: **1**

Approximately **~45** acres in total are being considered in the cumulative analysis.

For each wetland, specify the following:

Directly abuts? (Y/N)
Y

Size (in acres)
~50

Directly abuts? (Y/N)

Size (in acres)

Summarize overall biological, chemical and physical functions being performed: **The wetlands associated with this project provide for biological support for migratory birds, one species of threatened fish and three fish species considered special status species by the BLM. The area provides nutrient uptake, sediment trapping, and inputs of organic material for downstream resources. Physical functions include water delivery, flood flow storage and attenuation,**

C. SIGNIFICANT NEXUS DETERMINATION: NA

D. DETERMINATIONS OF JURISDICTIONAL FINDINGS. THE SUBJECT WATERS/WETLANDS ARE (CHECK ALL THAT APPLY):

1. TNWs and Adjacent Wetlands. Check all that apply and provide size estimates in review area: NA

2. RPWs that flow directly or indirectly into TNWs.

- Tributaries of TNWs where tributaries typically flow year-round are jurisdictional. Provide data and rationale indicating that tributary is perennial: **Past aquatic studies of the area have indicated that Delmue Springs contributes approximately 0.45 cfs of constant flow to the stream reach. In 1987, aquatic studies found that the flow was typically 2.25 cfs to 6.9 cfs.**
- Tributaries of TNW where tributaries have continuous flow "seasonally" (e.g., typically three months each year) are jurisdictional. Data supporting this conclusion is provided at Section III.B. Provide rationale indicating that tributary flows seasonally:

Provide estimates for jurisdictional waters in the review area (check all that apply):

- Tributary waters: **26250** linear feet wide.
- Other non-wetland waters: _____ acres.
- Identify type(s) of waters:

3. Non-RPWs⁸ that flow directly or indirectly into TNWs. NA

4. Wetlands directly abutting an RPW that flow directly or indirectly into TNWs.

- Wetlands directly abutting an RPW and thus are jurisdictional as adjacent wetlands.
- Wetlands directly abutting an RPW where tributaries typically flow year-round. Provide data and rationale indicating that tributary is perennial in Section III.D.2, above. Provide rationale indicating that wetland is directly abutting an RPW: **Meadow Valley Wash is confined to Condor Canyon through the reach. In an arid environment, wetlands do not exist if sufficient moisture is not present. This typically only occurs along stream reaches. In the case of Meadow Valley Wash, the wetlands are also confined to an area within the canyon.**
- Wetlands directly abutting an RPW where tributaries typically flow "seasonally." Provide data indicating that tributary is seasonal in Section III.B and rationale in Section III.D.2, above. Provide rationale indicating that wetland is directly abutting an RPW:

Provide acreage estimates for jurisdictional wetlands in the review area: **50** acres.

5. Wetlands adjacent to but not directly abutting an RPW that flow directly or indirectly into TNWs.

- Wetlands that do not directly abut an RPW, but when considered in combination with the tributary to which they are adjacent and with similarly situated adjacent wetlands, have a significant nexus with a TNW are jurisdictional. Data supporting this conclusion is provided at Section III.C.

Provide acreage estimates for jurisdictional wetlands in the review area: _____ acres.

6. Wetlands adjacent to non-RPWs that flow directly or indirectly into TNWs. NA

7. Impoundments of jurisdictional waters. NA

E. ISOLATED [INTERSTATE OR INTRA-STATE] WATERS, INCLUDING ISOLATED WETLANDS, THE USE, DEGRADATION OR DESTRUCTION OF WHICH COULD AFFECT INTERSTATE COMMERCE, INCLUDING ANY SUCH WATERS (CHECK ALL THAT APPLY): NA

F. NON-JURISDICTIONAL WATERS, INCLUDING WETLANDS (CHECK ALL THAT APPLY): NA

SECTION IV: DATA SOURCES.

⁸See Footnote # 3.

A. SUPPORTING DATA. Data reviewed for JD (check all that apply - checked items shall be included in case file and, where checked and requested, appropriately reference sources below):

- Maps, plans, plots or plat submitted by or on behalf of the applicant/consultant: **U.S. DOI, BLM, application package (Submitted 5/31/2012)**
- Data sheets prepared/submitted by or on behalf of the applicant/consultant.
 - Office concurs with data sheets/delineation report.
 - Office does not concur with data sheets/delineation report.
- Data sheets prepared by the Corps:
- Corps navigable waters' study:
- U.S. Geological Survey Hydrologic Atlas:
 - USGS NHD data.
 - USGS 8 and 12 digit HUC maps.
- U.S. Geological Survey map(s). Cite scale & quad name: **1:24K; NV-PANACA**
- USDA Natural Resources Conservation Service Soil Survey. Citation:
- National wetlands inventory map(s). Cite name:
- State/Local wetland inventory map(s):
- FEMA/FIRM maps:
- 100-year Floodplain Elevation is: (National Geodectic Vertical Datum of 1929)
- Photographs: Aerial (Name & Date):
or Other (Name & Date):
- Previous determination(s). File no. and date of response letter: **SPK-2010-01000 - August 25, 2010; SPK-2010-00458 - April 9, 2010;**
- Applicable/supporting case law:
- Applicable/supporting scientific literature: **U.S. DOI, Bureau of Land Management. 2012. Preliminary Environmental Assessment: Condor Canyon Restoration Project. Rush, F.E. 1964. Groundwater appraisal of the Meadow Valley Area, Lincoln and Clark Counties, Nevada. State of Nevada, Department of Conservation and Natural Resources, Carson City. Bio-West. 2005. Meadow Valley Wash Final Baseline Ecological Assessment. Lincoln County, Nevada.**
- Other information (please specify):

B. ADDITIONAL COMMENTS TO SUPPORT JD:

Meadow Valley Wash is a tributary of the Muddy River, which flows directly into Lake Mead. Although the distance is approximately 85 miles to the confluence with the Muddy River and Lake Mead, Meadow Valley Wash is known to have significant impacts to downstream resources during 25-year events. Provencher and others (2003) identified the Meadow Valley Wash as ecologically significant because it contains the only remaining bird migration corridor between the Great Basin and the Mohave Desert and still contains a large amount of native vegetation. As per the above study, Meadow Valley Wash is considered perennial through the study area because of the influence of Delmue Springs. From Caliente to Elgin, the wash is also perennial, this from personal observations and additional studies that have been done (Bio-West 2005). The wetland through the project area are directly abutting and receive flow either directly from MVW or provide flow to MVW through springs.