Proposal for a Swan Hunting Season in Northern Idaho

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Idaho Department of Fish and Game

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EXECUTIVE SUMMARY

The Idaho Department of Fish and Game (Department) proposes a 3-year experimental swan hunting season in the Panhandle Region of northern Idaho to commence October 2020. Waterfowl hunters have expressed interest in swan hunting opportunities in northern Idaho, similar to other states in the Pacific Flyway (i.e., Montana, Nevada, and Utah). A general swan hunt in northern Idaho would be directed towards tundra swans, and designed to minimize take of trumpeter swans. Department field staff and members of the public have recorded consistent observations of tundra swans (Cygnus columbianus) during the fall migration in the Panhandle. To date, swan observation data show relatively few trumpeter swans (C. buccinator) migrating through the area; therefore, the Department believes the likelihood of trumpeter swan take is minimal.

The purpose of this proposal is for the Department to obtain approval for a swan hunting season in the Panhandle Region of northern Idaho from the Pacific Flyway Council (Council). Upon approval by Council, the Department would seek subsequent approval from the U.S. Department of the Interior and the U.S. Fish and Wildlife Service (Service) to develop an Environmental Assessment for public review and compliance with the federal National Environmental Policy Act. The proposal follows the procedures identified in the Pacific Flyway Western Tundra Swan Management Plan (2017), to include:

(a) description of hunt area boundaries;

(b) a summary of numbers of swans, species composition, and seasonal use patterns in the proposed hunt area;

(c) number of permits requested;

(d) anticipated harvest;

(e) season length and dates;

(f) description of the permit process;

(g) proposed methods for obtaining reliable data on harvest and hunter activity; and

(h) additional considerations.

Description of hunt area boundaries

Proposed hunt area boundaries include the four most northwestern counties (Benewah, Bonner, Boundary, and Kootenai) of Idaho (Figure 1). The majority of swan observations during fall migration are widely distributed among the abundant rivers, lakes, and wetlands in this portion of northern Idaho. All or portions of game management units 1, 2, 3, 4, 4A, 5, and 6 are contained within these counties.

Summary of numbers of swans, species composition, and seasonal use patterns in the proposed hunt area

Two populations of swans migrate through northern Idaho. They include the Western Population (WP) of tundra swans and the migratory Canadian breeding segment of the Rocky Mountain Population (RMP) of trumpeter swans. Both of these populations have been increasing in number and distribution in recent years. On average, over 123,000 WP tundra swans were recorded over the last ten years during spring waterfowl breeding surveys in western Alaska (Pacific Flyway Council 2017). Nearly 11,000 swans were estimated to belong to the migratory Canadian breeding segment of the RMP in 2015 (Pacific Flyway Council 2017).

The last aerial swan abundance and distribution survey in northern Idaho was conducted in 1985. Consequently, comprehensive swan observation data is limited in northern Idaho. While fall waterfowl migration surveys are conducted on several state-owned Wildlife Management Areas, it was necessary to obtain additional swan species composition and seasonal use data from eBird (eBird 2018). The vast majority of swans observed during fall in northern Idaho are tundra swans (Figure 2). Since 2007, there have been 4,386 tundra swan observations and 74 trumpeter swan observations (Figure 3) during the fall migration period (October–December). On average over the last five years, 500 tundra swans were observed in northern Idaho, while only four trumpeter swans were observed.

Tundra swans arrive in northern Idaho around the first of October and typically leave by the middle of December (Figure 2). The majority of swan observations are reported during November. A small number of trumpeter swans have been observed in October and November (no observations were recorded in September), but observations generally increase during the months of December and January (Figure 3).

During fall migration, tundra swans are well distributed throughout the rivers, lakes, and wetlands in northern Idaho; however, several high use areas occur along the Kootenai River, the northern shore of Lake Pend Oreille, and Coeur d'Alene Lake (Figure 4). Groups of tundra swans ranged in size from one to 264 birds, with an average group size of 22 birds. Trumpeter swans were observed in the same general locations, but in fewer numbers (Figure 5). Groups of trumpeter swans ranged in size from one to 14 birds, with an average group size of three birds.

Beginning in fall 2018, comprehensive swan data will be collected on state-owned Wildlife Management Areas and at high use areas (Figure 4) to gain an additional understanding of swan abundance, species composition, and seasonal use. These fall surveys will follow the Service waterfowl survey protocol established for the Coeur d'Alene River Basin (Appendix A).

Number of permits requested

Proposed number of swan permits would be 50.

Anticipated harvest

It is expected that northern Idaho swan harvest would be similar to harvest success in the Pacific Flyway portion of Montana, which averaged 45% over the last 10 years. Therefore, an anticipated 23 swans would be harvested annually.

Similar to the Montana swan hunting seasons, it is believed the vast majority, if not all, harvest of trumpeter swans during the proposed Idaho season would be of the RMP trumpeter swan population segment that breeds in Canada. The proposed hunt area is generally north and west of the Core Tristate area and few, if any, trumpeter swans are expected to migrate northward during the fall. In the 2003 Environmental Assessment (U.S. Department of the Interior 2003), the Service stated that low harvest levels from these flocks pose no threat to this component of the population; therefore, Idaho requests to be exempt from a trumpeter swan harvest quota.

Based on observations of neck-collared birds, it is unlikely that trumpeter swans from nearby restoration areas in northwest Montana would migrate through northern Idaho (D. Becker, Confederated Salish and Kootenai Tribes, personal communication). In addition, the two breeding pairs of trumpeter swans at Turnbull National Wildlife Refuge (NWR) in Washington are considered primarily non-migratory and not likely to travel into northern Idaho (Mike Rule, Turnbull NWR, personal communication).

Season length and dates

Proposed season dates would be the first Saturday of October to December 1, a maximum of 62 consecutive days. The proposed dates are consistent with the current federal frameworks and swan hunting season dates in Montana. The Idaho swan season dates could be extended to be consistent with other waterfowl hunting season dates (Saturday closest to September 24 through the last Sunday in January, but not exceed 107 days) if federal frameworks change to allow this.

Description of the permit process

Swan hunting will only be allowed by special state-issued permits. Swan tags will be offered through a controlled hunt or on a first-come, first-served basis. For controlled hunts, each hunter must submit an application to enter a random drawing for the chance to be a tag holder. Successful applicants will receive a swan tag.

Similar to the Utah model, applicants would be required to successfully complete a one-time swan hunting orientation course to be entered in the controlled hunt drawing. Applicants will be asked to take the Utah course until an Idaho-specific course has been developed.

Proposed methods for obtaining reliable data on harvest and hunter activity

Following the Montana bill measurement card model, all hunters that harvest a swan must complete and submit a harvest report with bill measurement and color information within 72 hours of harvest. Successful hunters will be encouraged to visit a local Conservation Officer or

Regional Office to have their swan examined by a biologist to determine species and age. Check stations will also be considered by the Department. After the season, unsuccessful tag holders will be contacted to determine harvest success and hunter effort. Individuals that do not comply with harvest reporting regulations will not be eligible to apply for a swan tag the following year.

Additional Considerations

Soliciting input-

Due to the potential for controversy with this proposal, the Department has reached out to local tribes (i.e., Coeur d'Alene Tribe of Indians, Kalispel Tribe of Indians, and the Kootenai Tribe of Idaho), local representatives of federal agencies (i.e., U.S. Fish and Wildlife Service, Bureau of Land Management, and U.S. Forest Service) and the Kootenai Valley Resource Initiative to solicit input. The Department has also consulted The Trumpeter Swan Society (TTSS) and the Northern Rockies Trumpeter Swan Stewards (NRTSS) on the hunt proposal. An Idaho swan hunt was discussed at recent Pacific Flyway Study Committee and Greater Yellowstone Trumpeter Swan Working Group meetings.

To date, there has been no objection to a proposed swan hunting season in northern Idaho. However, some concern has been expressed about a potential season. The Trumpeter Swan Society and the NRTSS specifically suggested a proposed season be considered experimental and include a trumpeter swan harvest quota. They also expressed concern about connectivity among trumpeter swan restoration sites (i.e., Flathead Indian Reservation and Turnbull NWR).

The Department will continue to solicit input during fall 2018 and winter 2019 on the northern Idaho swan hunting season proposal from members of the public and other interested parties. Interested and concerned parties will have an opportunity to provide comments on the Department proposal through public meetings, open houses, sportsman group meetings, or online comments.

Heavy metal contaminants-

Heavy metal contaminants found in the Coeur d'Alene River Basin, from historic metal mining, cause fatal lead poisoning of tundra swans every spring (average 35 swans/year; Unpublished data: USFWS). According to spring waterfowl surveys conducted by the Service, a minimum of 353 swans have died from lead poisoning during 2009-2018. Although no swan mortalities due to lead poisoning have been documented in the fall, it is unknown if contaminant levels in their muscle tissue pose a health risk for human consumption. Swans migrating during fall appear to have shorter stopover durations than during spring. Furthermore, swans have reduced access to contaminated wetlands in fall because lower water levels make foraging unsuitable.

To measure lead levels and assess the risk to human consumption of swans using the Coeur d'Alene River Basin, Department staff may collect up to 15 tundra swans during fall 2018 and 2019. Swans will be collected throughout the proposed season dates to capture the variation in lead levels that may exist based on length of stopover and seasonal conditions. During the 2020 harvest season, a piece of muscle tissue will be sampled from each harvested swan that is

brought to a local Conservation Officer or a Regional Office for examination to further test for lead and other heavy metal levels.

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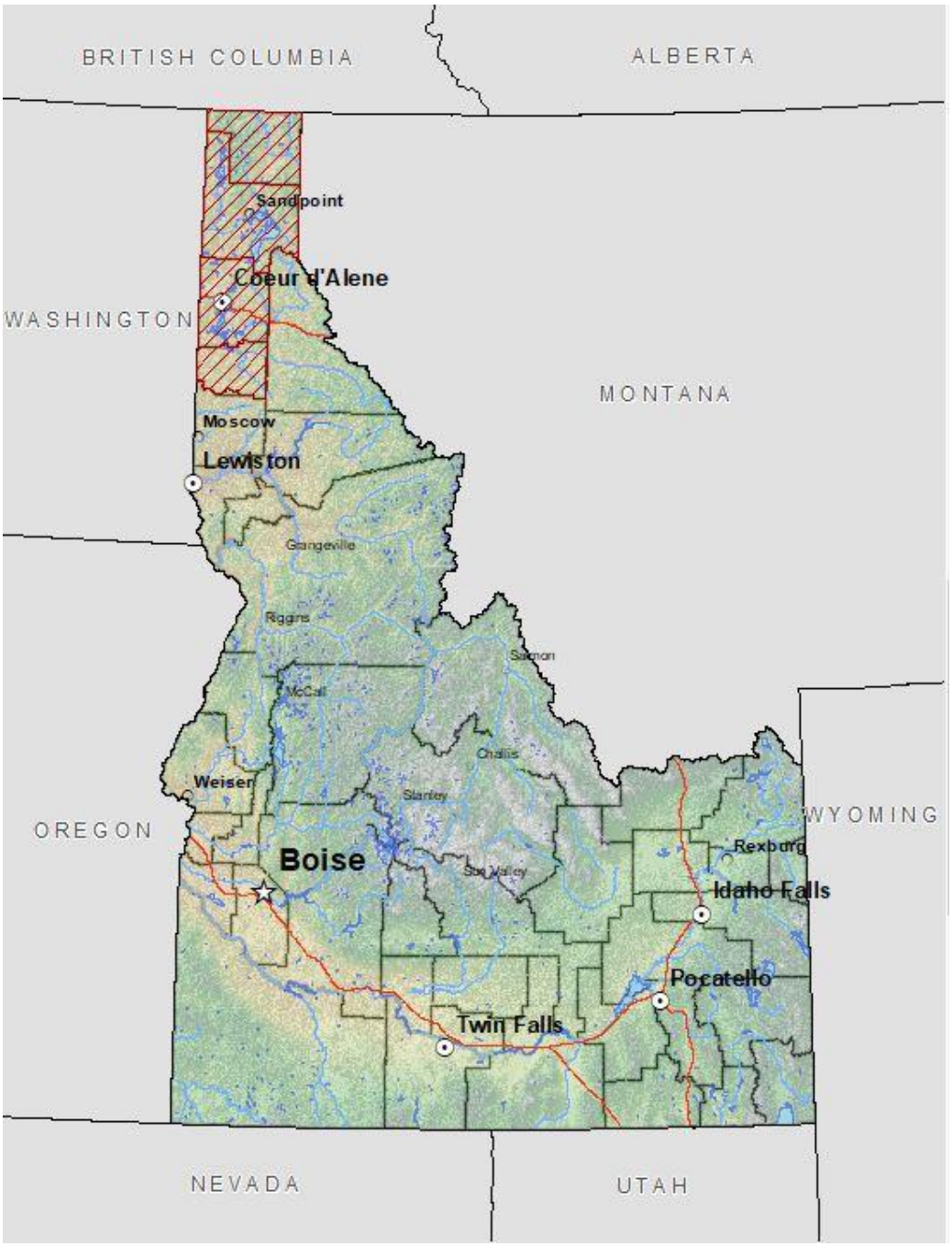

Figure 1. Proposed swan hunt area boundary including Benewah, Bonner, Boundary, and Kootenai counties (red cross-hatched area).

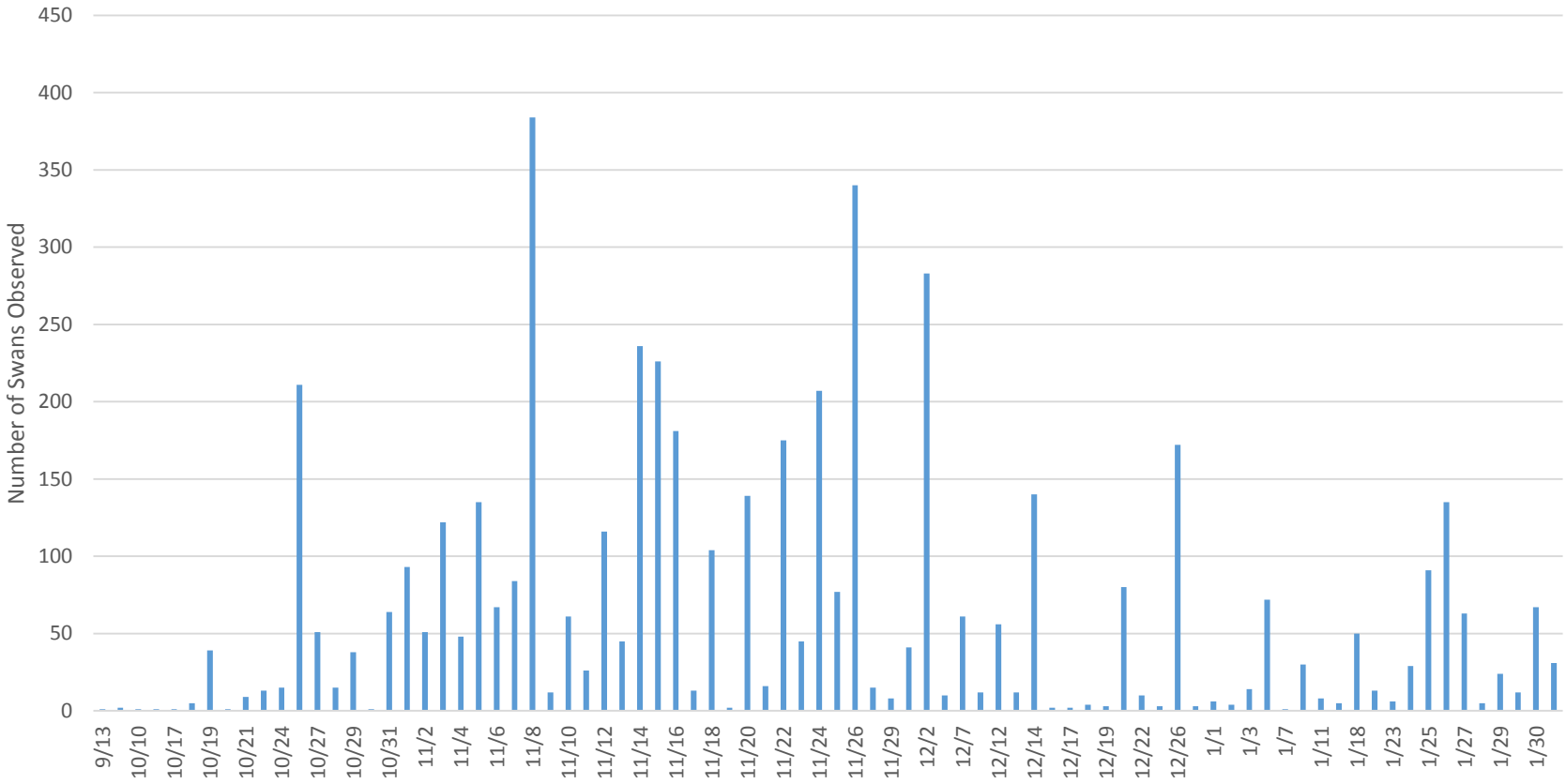

Figure 2. Tundra swan observations in northern Idaho from September through January, 2007-2017. (Unpublished data: Idaho Department of Fish and Game, eBird 2018).

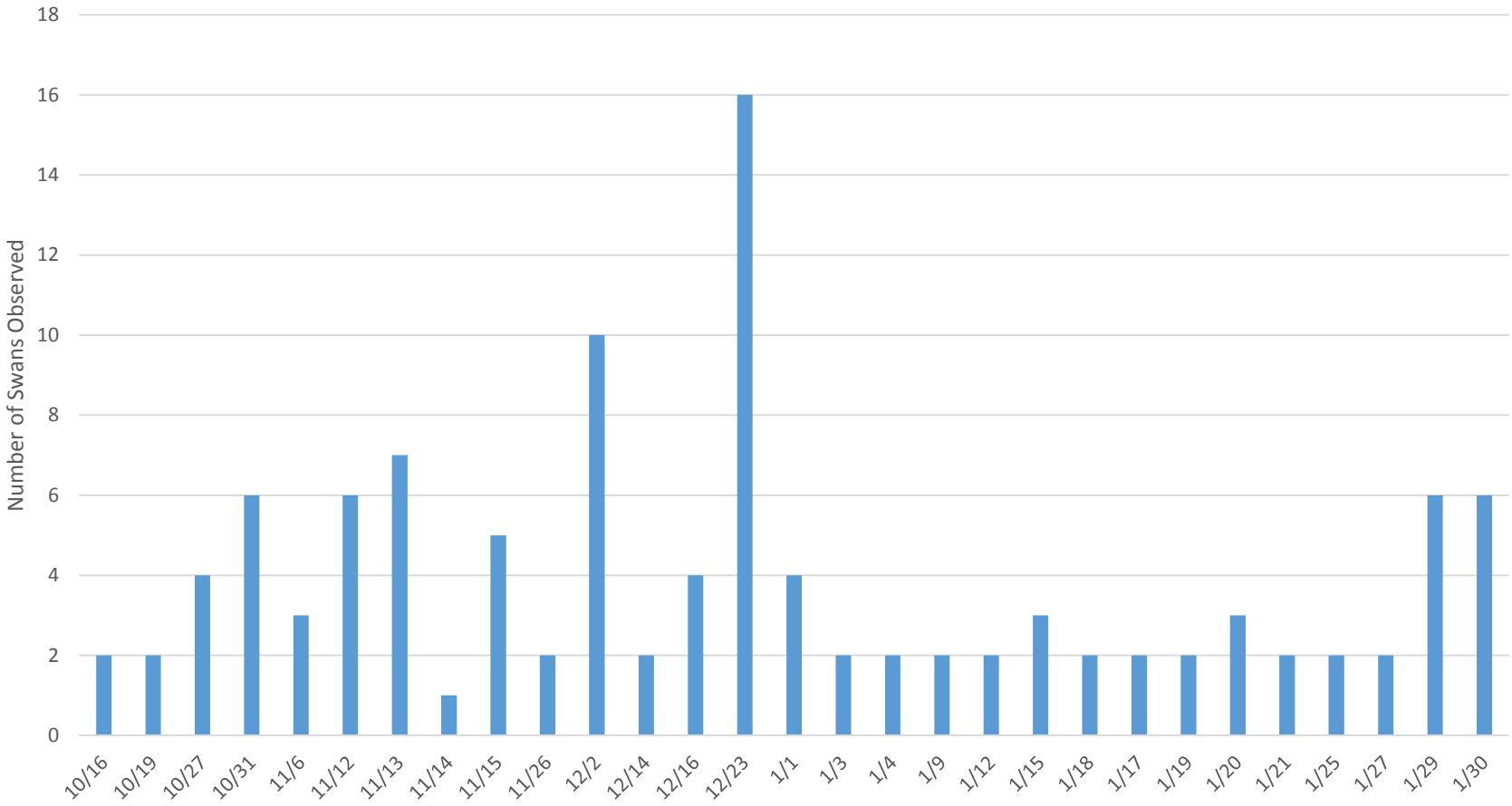

Figure 3. Trumpeter swan observations in northern Idaho from October through January, 2007-2017. (Unpublished data: Idaho Department of Fish and Game, eBird 2018).

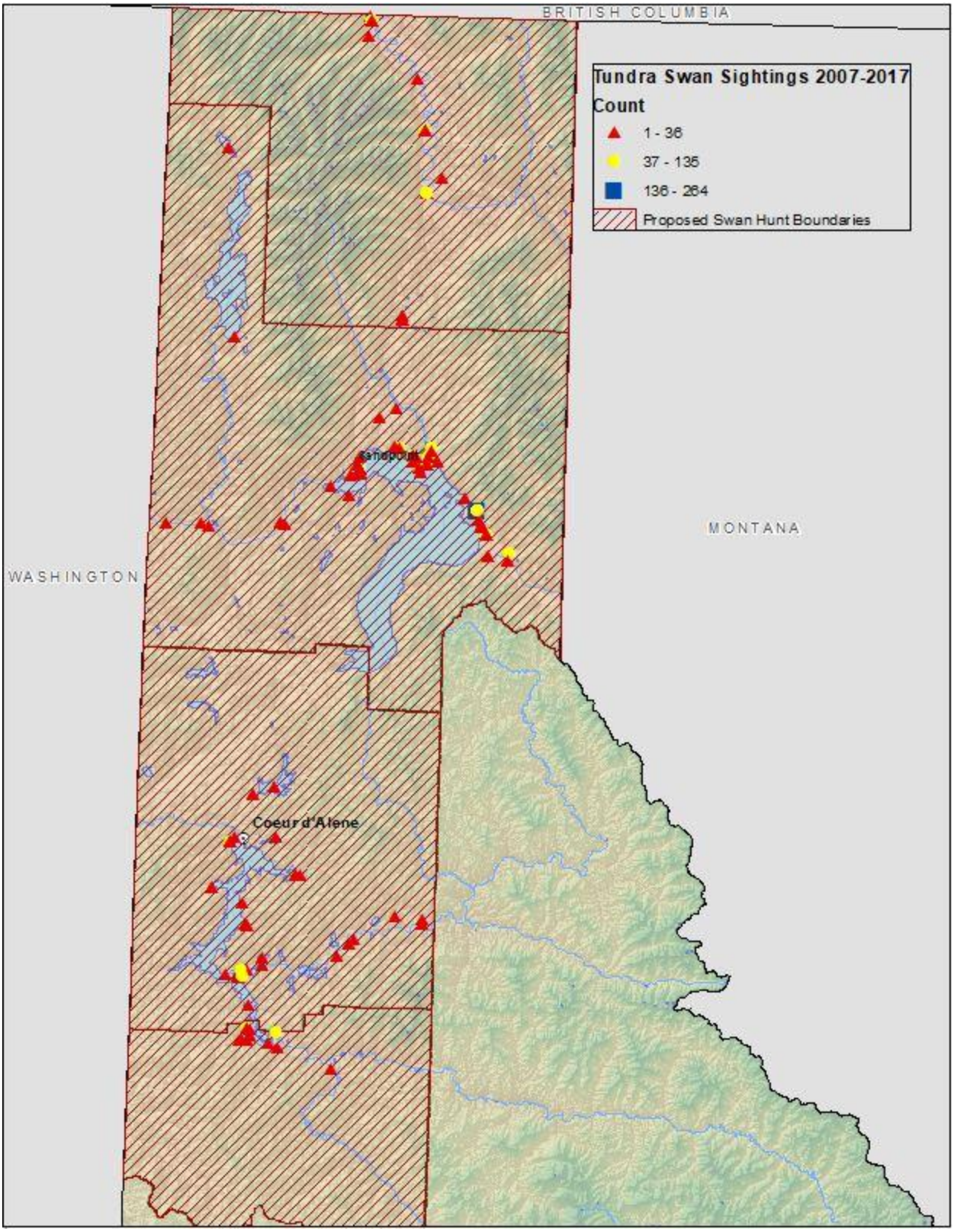

Figure 4. Locations of tundra swan observations during fall migration (September to January), 2007-2017 (Unpublished data: Idaho Department of Fish and Game, eBird 2018).

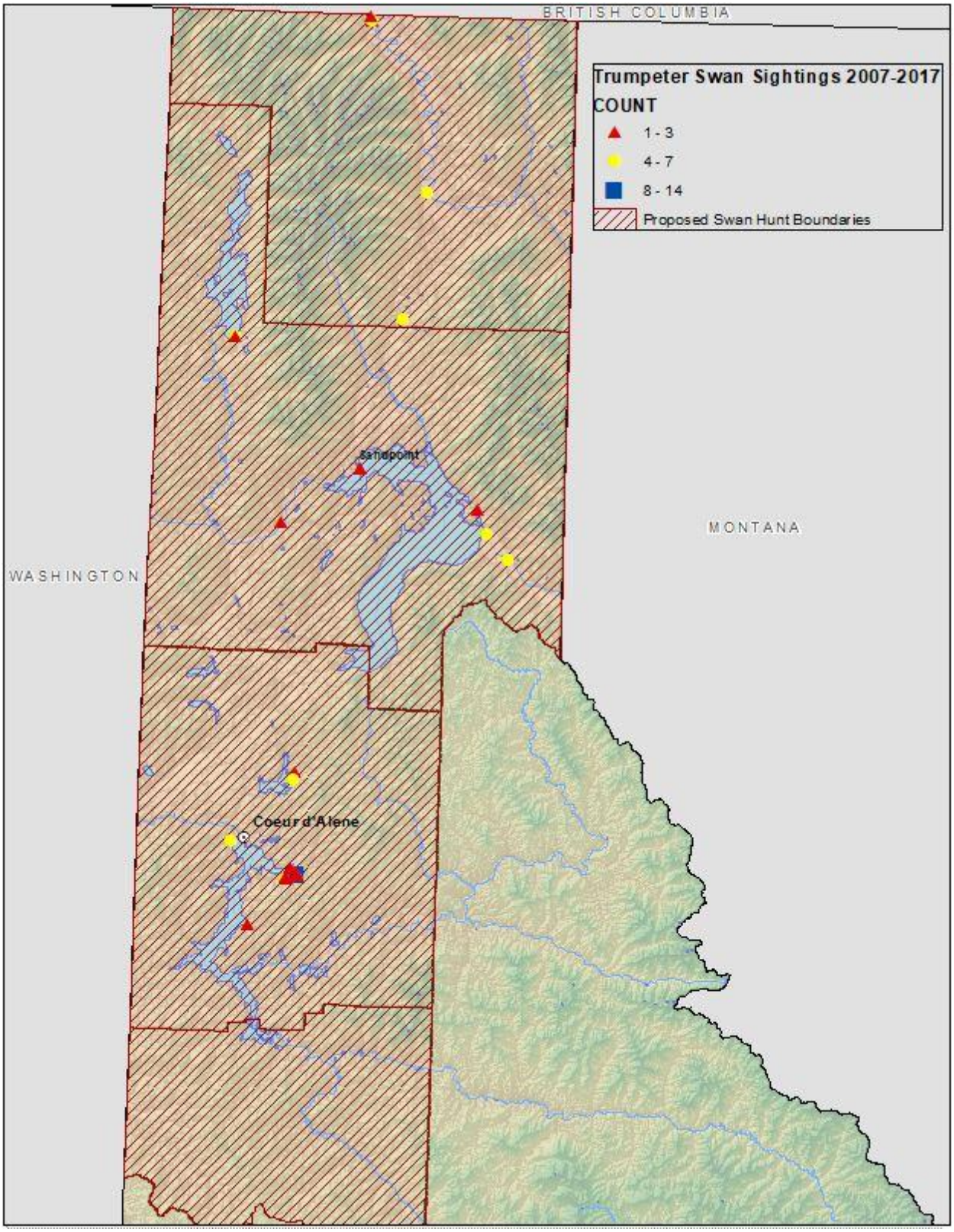

Figure 5. Locations of trumpeter swan observations during fall migration (October to January), 2007-2017. (Unpublished data: Idaho Department of Fish and Game, eBird 2018).

Appendix A.

North Idaho Field Office (NIFO)
Standard Operating Procedure (SOP)

NIFO 2014.1013 Waterfowl Survey in the Coeur d'Alene River Basin

Prepared: 01/06/04 (Originally UCFWO 1020.1013)
Revised: 02/19/08; 09/08/10 (name change to NIFO 2010.1013); 10/03/14 (added detailed information on procedures, two new survey wetlands, and name change to NIFO 2014.1013)

I. General

This SOP outlines waterfowl surveys conducted by the U.S. Fish and Wildlife Service (Service) Northern Idaho Field Office (NIFO) at the Bunker Hill Mining and Metallurgical Complex Operable Units 2 (OU2) and 3 (OU3) within the Coeur d'Alene River Basin (Basin). The Service is responsible for conducting biological resource monitoring to assist the U.S. Environmental Protection Agency (EPA) in evaluating the success of the Selected Remedies for these OUs. This work is supported through an Interagency Agreement with EPA (#DW1492256601) and follows the framework of the OU2 Environmental Monitoring Program (EMP) and the OU3 Basin Environmental Monitoring Program (BEMP).

Waterfowl surveys provide relative measures of waterfowl abundance, wetland use, and tundra swan mortality in the Basin. Surveys are conducted during spring migration at all major wetlands, marshes, sloughs and lakes from Smelterville Flats down river to the confluence with Coeur d'Alene Lake.

II. Equipment

The following equipment is needed to conduct waterfowl surveys:

A. Field data forms
B. Maps of observation points (GPS locations)
C. Binoculars and spotting scope (window and/or tri-pod mounts)
D. Camera/video camera, GPS, compass, and counter
E. Idaho Road Atlas
F. Field identification guides (e.g., *The Sibley Guide to Birds*)

III. Procedure

Twelve weekly surveys are conducted between February 7 and May 1 (Table 1). Surveys are completed within a single day, and on the same day per week whenever possible. Waterfowl surveys are vehicle-based and conducted along a pre-designated route where observation points have been determined to maximize wetland visibility. The route consists of observation points along Highway 97, Highway 3, Killarney Lake Road, River Road, Canyon Road, and Interstate 90. Specific observation points enumerated below are mandatory; however, opportunistic

observations from other vantage points and/or wetlands should also be recorded. Prior to each weekly survey event, start location and route direction are randomly selected (e.g., driving from Mission Slough west to Harrison Slough vs. driving from Harrison Slough east to Mission Slough) to avoid observing wetlands during the same time of day on every survey date. Time and weather constraints allow for modifications of these surveys. Any modifications, and reasons for the modifications, should be documented on the field data form for that particular survey date.

Table 1. Weekly Waterfowl Survey Dates

Week	Date
Week 1	February 7-13
Week 2	February 14-20
Week 3	February 21-27
Week 4	February 28-March 6
Week 5	March 7-13
Week 6	March 14-20
Week 7	March 21-27
Week 8	March 28-April 3
Week 9	April 4-10
Week 10	April 11-17
Week 11	April 18-24
Week 12	April 25-May 1

At each survey location and for each waterfowl species observed, estimates of the number of individuals engaged in a particular behavioral activity (Table 2) are recorded on the field data form (see attached). Incidental observations of non-waterfowl species (e.g., shorebirds and/or raptors) should be noted, but not included in overall waterfowl totals. For consistency between years, surveys conducted outside of the established weekly dates are not included in analyses. It's also important to recognize that waterfowl likely remain in the Basin for more than one week during spring migration and may be counted as individuals across multiple weeks, thereby overestimating actual waterfowl abundance.

Table 2. Waterfowl Behavioral Activities

Activity	Definition
Feeding (F)	Bird actively consuming vegetation/substrate.
Resting (R)	Bird on water and not feeding.
Loafing (L)	Bird on land/ice and not feeding.
Nesting (N)	Bird on nest.

Unusual dispositions of tundra swans (e.g., ill/isolated and dead individuals) are recorded including detailed field notes regarding their location (i.e., azimuth/bearing/trip odometer) to avoid double counting carcasses on subsequent survey dates.

Waterfowl observation points for OU2 (Page Ponds and Smelterville Flats) and OU3 are depicted on respective maps (see attached). Route stops are as follows:

1) Mission Slough (3 stops) – turn out along I-90 at the west end of the slough. West Cataldo East Cataldo ponds - turn out on mission access road approximately 0.25 miles and 0.1 miles from the overpass.
2) Page Ponds (4 stops) – pull out on the Silver Valley Road adjacent to West Swamp; survey wastewater treatment ponds from access road between ponds; proceed east on Silver Valley Road to view East Swamp.
3) Smelterville Flats (6 stops) – turn out on West Airport Road to view Emerald Pond (northeast of airport). Proceed through gate at west end of runway, follow paved road past hangers, and continue west on dirt road. From the beginning of the dirt road make the following stops: 0.1 miles near dirt piles to view pond to northwest; 0.3 miles to view ponds to the north; 0.5 miles to view ponds to northwest (this stop is at west end of county airport runway); view the next two ponds at 0.7 and 0.8 miles along dirt road. If dirt road conditions are hazardous, observe wetlands from shoulder of I-90 west-bound.
4) Whiteman's Slough (2 stops) – turn out 0.1 miles west of the mission overpass. Turn out 100 yards south of Canyon Road along the mission access road.
5) Cataldo Slough (1 stop) – turn out at dumpsters along Canyon Road (northwest end of slough).
6) Canyon Marsh (2 stops) – turn out approximately 0.3 miles and 0.75 miles from the junction of Tamarack and River roads.
7) Orling Slough (2 stops) – turn out at the east end of the slough, and 0.5 miles from the west end of the slough along River Road.
8) Porter Slough (1 stop) – turn out along Highway 3.
9) Bull Run Lake (2 stops) – turn out on Bull Run Road at the northeast end of the lake and along the dike separating the lake from Black Rock Slough (see below).
10) Black Rock Slough (2 stops) – along the dike separating Black Rock Slough from Bull Run Lake (0.5 miles southwest of Bull Run Road), and turn out on Black Rock Road 0.3 miles east of Highway 3.
11) Gleason's Field (2 stops) – along Killarney Lake Road, approximately 0.5 miles and 1.75 miles from Highway 3 turnoff.
12) Strobl Marsh portion of Killarney Lake (2 stops) – turn out just past the relay station 2.7 miles west of Highway 3 on Killarney Lake Road, and near the dike separating Strobl Marsh from Killarney Lake.
13) Killarney Lake (3 stops) – boat launch and turn outs 0.2 and 1.4 miles past the sportsman access on Killarney Lake Road.
14) Lane Marsh (2 stops) – north and mid-marsh turnouts along Highway 3.
15) Schlepp property east field (2 stops) – along Highway 3 at east end of wetland, and turn out along Robinson Creek dike (west end of wetland; east of homestead).

16) Robinson Creek (2 stops) – approximately 40 yards and 0.2 miles south along Brown Road from the junction with Highway 3.

17) Schlepp property west field (2 stops) – along Robinson Creek dike between east and west fields (near east field pump), and on west field access road near west field pump.

18) Moffit Slough (2 stops) – along north side of Rainy Hill Road approximately 0.2 miles east of the Medicine Lake stop and at turn out approximately 150 yards north of Rainy Hill Road on Highway 3.

19) Medicine Lake (1 stop) – Rainy Hill Campground and boat launch approximately 0.25 miles from Medimont Road on Rainy Hill Road.

20) Cave Lake (2 stops) – turn out at bridge separating Cave from Medicine Lake approximately 0.5 miles west of Highway 3 on Medimont Road (east end of lake), and near dumpsters at the Cave Lake Resort (west end of lake).

21) Swan Lake (1 stop) – Vista View on Highway 3 at mile marker 102.

22) Harrison Marsh (1 stop) – turn out on Highway 97 across from the Osprey Inn Bed and Breakfast.

23) Anderson Lake (1 stop) – turn out 0.5 miles east of Highway 97 on Bell Canyon Road.

24) Thompson Marsh (3 stops) – 0.2 and 0.7 miles east on Blue Lake Road from the junction with Highway 97; Wildlife Observation Site approximately 1.5 miles east of Highway 97 on Thompson Lake Road.

25) Thompson Lake (4 stops) – turn outs approximately 1.5 and 2.2 miles east of Highway 97 along Blue Lake Road, and adjacent to Bare Marsh; turn out on north side of lake near barn on Thompson Lake Road.

26) Bare Marsh (1 stop) – Coeur d'Alene River WMA office 2.5 miles east of Highway 97.

27) Harrison Slough (3 stops) – At the junction of Highway 97 and Harlow Point Road; approximately 1 and 2 miles west of Highway 97 on Harlow Point Road.

IV. Documentation and Storage

All relevant survey information is recorded on associated fields of the data forms. Original copies of data forms are retained at the Service's NIFO, Spokane, WA. Electronic data is submitted to USEPA via the Water Quality Exchange (WQX), and made available to the public at the STORET Warehouse and Water Quality Portal (http://www.epa.gov/storet/).

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Revised By: Jim Hansen 02/19/08, Roy Brazzle 09/08/10, Brittany Morlin 10/03/14

Approved By: _____ 10/3/2014
Toni Davidson — Date
Resource Contaminant Specialist
Northern Idaho Field Office

0xx Waterfowl Surveys Week No. _____ Date: _____ Wetland: _____

tart time: _____ End Time: _____ Temp °F: _____ %Cloud: _____ Observers: _____

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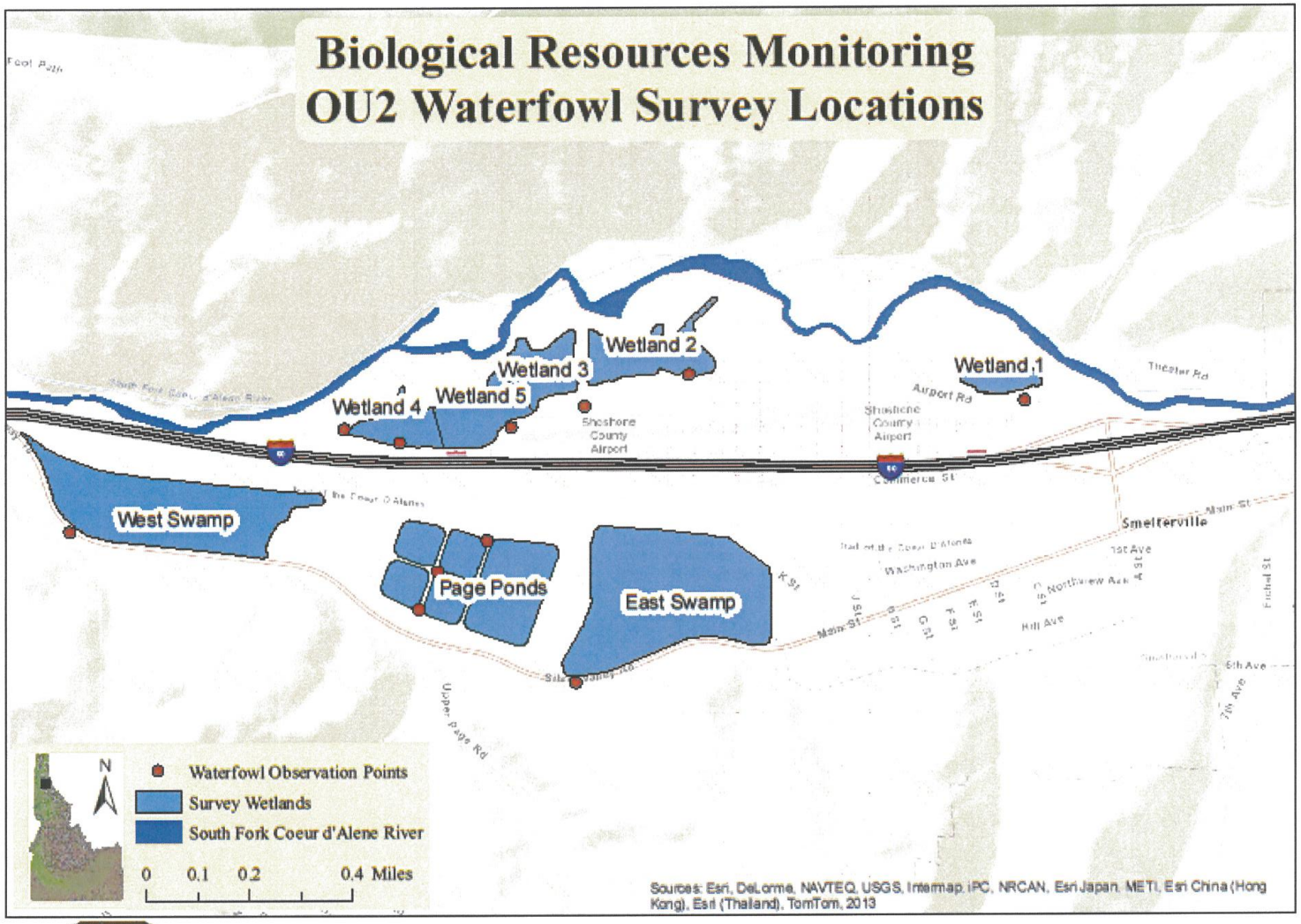

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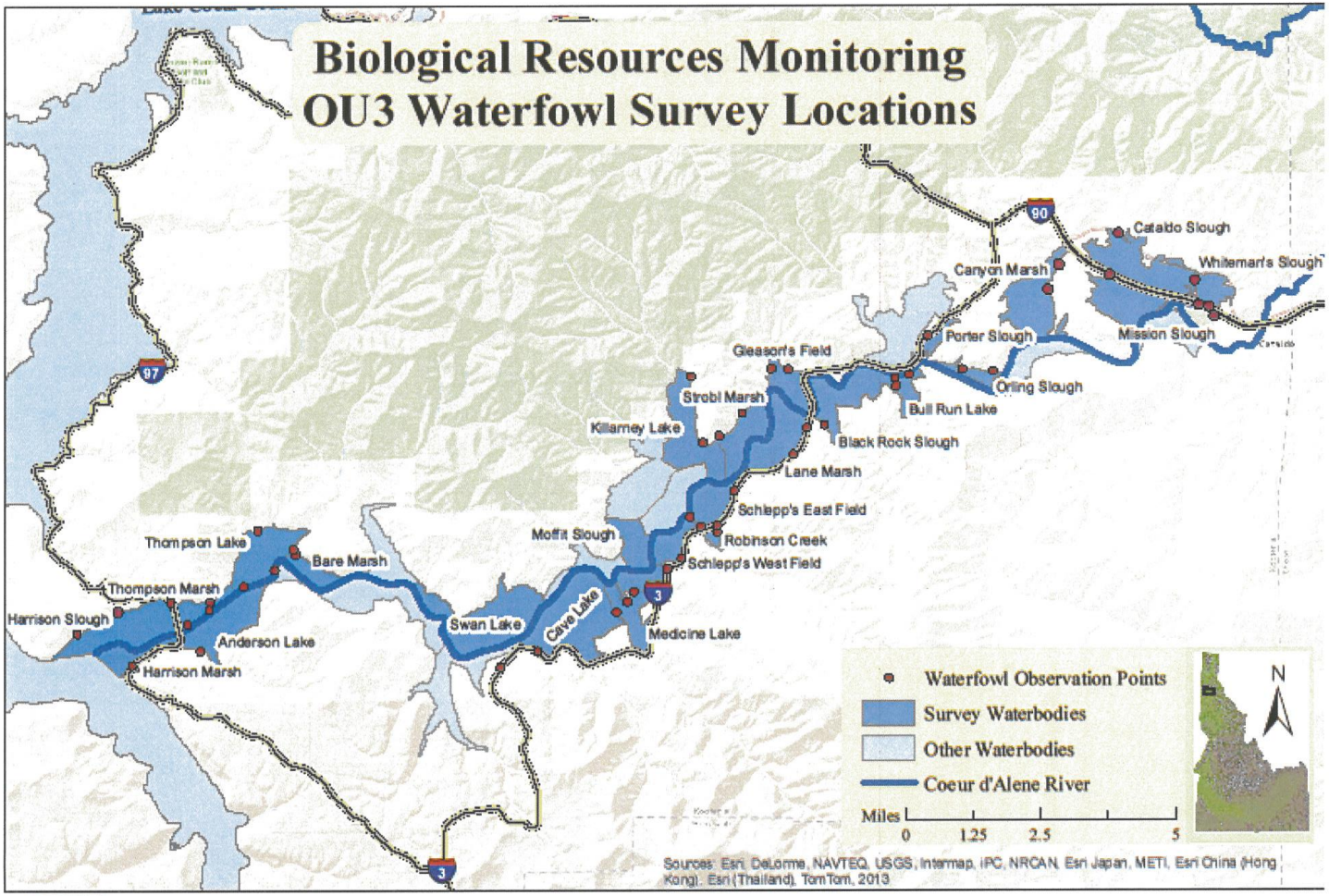

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