MISSOURI-MADISON WILDLIFE TECHNICAL ADVISORY COMMITTEE (WildTAC)

MINUTES OF ANNUAL MEETING FOR 2018

Radisson Colonial Hotel, Helena, MT 5 December 2017

Attendees

Attendees: Jason Brey (USFS); Claire Gower (FWP); Steve Leathe (NWE, Chair); Randy Scarlett (USFS); Mary Gail Sullivan (NWE); Jordan Tollefson (NWE); Andy Welch (NWE); Catherine Wightman (FWP)

Guests: Tara Luna (Rocky Mtn Botany); John Muhlfeld (River Design Group); Anna Noson (U of MT); Tim Dwyer (Friends of Missouri River Breaks Monument); Torrey Ritter (MSU); Jay Erickson (MT Land Reliance)

WildTAC Business Items

Recent NWE Staff Changes/Transition. Andy Welch (NWE) reported that Jon Jourdonnais retired in September and Andy has taken over Jon's duties. Jordan Tollefson (formerly of MT DEQ) was recently hired to take over Andy's former water quality program duties. Andy and Mary Gail Sullivan don't foresee any significant changes in how the fish, wildlife, and water quality protection, mitigation and enhancement programs are implemented.

Revised 5-Year Wildlife Plan For 2018-2022. Steve Leathe (NWE) revised the wildlife plan during fall 2016 and sent out a draft for agency comments at the end of 2016 with comments due 15Feb 2017. Comments indicated the T&E section needed more revision, which was done during March thru June. Raptor protection on recently acquired transmission lines on USFS lands at the Hauser site was identified as another issue, which was addressed during the summer of 2017. The final revised wildlife plan was sent on 29Aug2017 for agency approval and all signatures were obtained by early November. The final approved plan was submitted to FERC in mid-November 2017. Thanks to all who provided review and comments.

Status of Project Completion Reports. Steve reviewed the list of project completion reports and we are in very good shape, with all reports for 2015 projects completed. Only one 2016 report is incomplete and that is because the project is still in progress (O'Dell Phase 13 Design). Most of the 2017 project reports have already been received. Thanks to everyone for taking the time to prepare these reports. NorthWestern Energy needs to submit 5-year progress reports to FERC and it is important to keep up-to-date on project reports so they can be easily gathered and compiled for FERC reporting. We have used the guideline of reports due within 6-9 months of project completion with fairly good success over the years. Reports for habitat improvement projects do not need to be lengthy (2-4 pages often sufficient) and should contain location map(s), timeframe, summary of accomplishment, project photos (especially 'action' shots) and a budget summary that includes all funding amounts and sources as well as an itemization of in-kind services. Reports for monitoring and research projects probably need to be a bit longer but need not be overly comprehensive.

2017 Missouri River Softshell Turtle Estimate. Steve Leathe (NWE) explained that he worked with FWP (Anne Tews - Lewistown) and Dr. Jay Rotella (MSU) to design a long-term softshell turtle population estimate protocol for a representative 10-mile section of the Missouri River just downstream from the mouth of the Judith River. Trapping and tagging was conducted at 20 trap sites during a 2-week period from late July thru early August, 2017. Surprisingly, 16 turtles were recaptured that had been tagged in surveys conducted 8-10 years ago. Female recaps that were 300-400mm when tagged grew surprisingly slowly, averaging less than 2mm per year. We suspect the largest female turtles (>400mm) could be 80 years old, or more. Steve is working on population estimate data entry, which will be delivered to Dr. Rotella.

Review of 2017 Projects

Hebgen Beaver Restoration Study. Torrey Ritter (MSU Graduate Research Assistant) reported on the study to determine habitat selection, movements, and survival of dispersing juvenile beavers in the Hebgen Lake area. Fifty of 55 radio-tagged beaver survived and 15 of the 50 surviving beavers dispersed, usually in spring. Beaver population in the area seems to be near carrying capacity and 14 of the 15 dispersing beavers moved to active, abandoned, or relic colonies. Trapping is very limited in the area and no radio-tagged beavers were taken by trappers during the study. Nine tagged beavers died during the study; 6 from tularemia and 3 from mountain lion predation. MS thesis expected to be completed in spring 2018.

Riparian Bird Monitoring – **Madison & Missouri Rivers.** Anna Noson (UM) reported that surveys were conducted at the original 223 survey points on the 524 miles of Madison and Missouri rivers plus the 90 new points added in 2015 on the upper Madison and in the Missouri River Breaks. This is the 5th time the basin-wide project has been conducted and the project has produced the largest long-term database on riparian birds in MT. A total of 6,714 birds representing 112 species were recorded, including 12 MT species of concern and the first peregrine falcon seen in surveys in the Breaks. Playback call surveys were conducted for 4 priority species (Yellow & Black-billed Cuckoos; Eastern & Western Screech Owls). No Yellow-billed Cuckoos were detected, while Black-billed Cuckoos were found at Woods Bottom and Rowe Coulee (both just upstream from Loma), and in a cottonwood patch on the CMR Wildlife Refuge. Anna is working with Aaron Flesch (U of Arizona) on statistical analysis to determine population trends of key riparian bird species.

Cottonwood Planting – Missouri River. Tim Dwyer (Friends of the Missouri Breaks Monument) reviewed the results of recent cottonwood plantings done on the river downstream from Fort Benton. Nearly 500 cottonwoods have been planted at 7 locations over the past 5 years, with 392 of these trees surviving. WildTAC has provided funding for this project since 2015 and 418 trees have been planted/watered with NWE help. Sixty-five cottonwoods were planted on ABN Ranch (site of one of the 2018 WildTAC conservation easement proposals) in 2015 and 83% of these trees have survived. Planted trees are 12-ft saplings gathered on Arrow Creek and the saplings are watered during May thru Oct for two years. Only 38% of saplings planted at the Dark Butte site in 2014 survived without 1st year watering, while 80% survived at the same site with watering. Two sites are proposed for planting in 2018, one site near Upper Eagle Creek, and one site near Pablo Rapids.

Hebgen Area Projects. Randy Scarlett (USFS) summarized progress made on Hebgen/Quake area projects in the upper Madison drainage during 2017. Bald eagle monitoring (Project 2017-4) revealed one new nesting territory that apparently successfully fledged at least one bird in 2017. Nine nesting territories were occupied in 2017 and 2015, which is the most recorded since monitoring began in 1977, when only one nesting territory was occupied. Two 1,000-gallon wildlife water developments ('Guzzlers') were installed in the Hebgen Flats area during summer 2017 (Project 2017-5). Each was primed with 600 gallons, received use approximately 2 weeks after installation, and was filled by rain/snow after one month. The guzzlers were used by small mammals, birds, deer, elk and moose during the first season and it is expected that more ungulates and other animals will use them in subsequent years. The grizzly bear conflict mitigation project (2017-6) was successful in 2017. The NWE funding resulted in 19 days of patrol and one day at a public event for the bear education technician in 2017, resulting in 345 bear education contacts at recreation sites in the field and an additional 480 contacts at the public event.

Trumpeter Swan Restoration. Claire Gower (FWP) reported that 2017 was the 6th year of swan release and four more cygnets were released on O'Dell this past summer with many local citizens in attendance. The plan is to continue releasing 5 birds per year thru 2021. A total of 29 young captive-raised swans have been released on O'Dell over the past 6 years and observers have seen 15 or more trumpeter swans at one time in the area. A nesting survey flight conducted in June 2016 revealed 2 trumpeter swans on a nest in the Red Rocks Refuge. The June 2017 flight revealed 4 pairs of trumpeters with young in the Red Rocks and Henry's Lake areas. One of the yearling trumpeters released at O'Dell in 2013 may have nested successfully and produced young at a nest located at the inlet to Ennis Lake in 2016. The swans have not nested at O'Dell yet, but are forming 'pair bonds', which is a good sign. Swans introduced in the Blackfoot watershed did not nest until 7 years after initial re-introduction.

O'Dell Creek Project Updates. John Muhlfeld (River Design Group) provided updates on projects completed in the O'Dell Creek watershed (Madison drainage) in 2017. The Phase 14B stream/wetland restoration project (2017-7) was

completed on schedule and on-budget with 4100 feet of spring creek channel and 30-35 acres of emergent and open-water wetland restored. A wetlands inventory (project 2017-10) was conducted in a 2,500-acre assessment area using high-resolution aerial photographs taken using a drone aircraft during summer 2017. Results showed 165 wetland acres existed in the area prior to the initiation of wetland restoration and enhancement work in 2005 and wetland area has increased to 888 acres post-restoration. Design work was completed on the planned Phase 15 restoration project (2017-8) which included GPS surveys, wetland delineation, cultural survey, permit application and contractor pre-bid tour.

O'Dell Creek Rare Plant & Vegetation Monitoring. Tara Luna (Rocky Mtn Botany LLC) reported on 2017 vegetation monitoring at O'Dell. Two rare perennial plant species (Mealy Primrose and Slender Indian Paintbrush) continued to increase while two rare annual plant species (Wedge Leaf Saltbush and Lesser Indian Paintbrush) decreased. The latter two species tend to do best in the first 1-4 years following ground disturbance. O'Dell has the largest Mealy Primrose (*Primula incana*) population in the lower 48 states. Wedge Leaf Saltbush is known from only one other location in MT. Experimental planting of Narrowleaf Cottonwood, Sandbar Willow and Bebb's Willow was conducted in early spring. Cottonwood cuttings failed to root, apparently due to their small size (50-60cm long; 1.5-2.5cm diameter) and desiccation by warm, dry winds. Directly planted Sandbar Willow cuttings (1-2m pole cuttings) did very well in gravelly soils (81% survival) while Bebb's Willow cuttings did not do very well (30% survival).

Review of Projects Carried Over From Previous Years

O'Dell Creek Phase 13 Design (Granger). Project design has been delayed due to water rights questions and the fact that the existing channel is partially located on State land. River Design Group has indicated any further design costs for this project will be funded by Granger Ranches.

Review of 2017 Expenses & Reserve Account

The WildTAC budget for 2017 was approximately \$366K and the WildTAC approved 12 projects totaling \$354K, for an estimated budget underspend of approximately \$12K. Estimated actual WildTAC expenses for 2017 were approximately \$354K as of 28Dec2017, leaving approximately \$12K unspent that will be added to the Reserve Account at the beginning of 2018. The Reserve Account balance was approximately \$167K at the beginning of 2017, and approximately \$6K was spent from this account in 2017. Addition of estimated \$12K unspent funds from the 2017 budget results in a projected Reserve Account balance of approximately \$174K in the account at the beginning of 2018. The cap amount for the Reserve Account was increased to \$250K beginning in 2017 per the new Project 2188 MOU between NWE and the state and federal agencies for 2017-2026. The estimated year-end 2017 budget projection appears below:

Wildlife	TAC Expenditures for CY2017 (as of 28De	c2017)		
Project #	Project description	Approved amount for 2017	Estimated amt spent in 2017	Numbers in PINK are estimates
2017-1	Beaver Restoration Study - Hebgen/Quake	\$5,760	\$5,760	Added \$3K for bear safety assistant
2017-2	Riparian Bird Monitoring - Systemwide	\$38,298	\$38,298	
2017-3	Cottonwood Planting - Missouri River	\$45,000	\$45,000	
2017-4	Bald Eagle Monitoring - Hebgen & Quake	\$4,185	\$4,185	
2017-5	Hebgen Flats Water Developments	\$9,390	\$9,390	
2017-6	Hebgen Grizzly Bear Conflict Mitigation	\$3,160	\$3,160	
2017-7	O'Dell Cr Phase 14B Design/Construct - Longhorn Ranch	\$187,190	\$186,845	
2017-8	O'Dell Cr Phase 15 Design - Longhorn Ranch	\$27,970	\$27,958	
2017-9	O'Dell Cr Rare Plant & Vegetation Monitoring	\$5,000	\$5,000	
	O'Dell Cr Wetland Inventory	\$12,931	\$12,931	
2017-11	Trumpeter Swan Restoration - Madison	\$5,000	\$5,000	
	Weed Control - Hebgen & Quake	\$10,000	\$10,000	
	TOTAL	\$353,884	\$353,527	
	Budget for CY2017	\$365,521		
	Total approved for CY2017	\$353,884	C44 004	
	Balance	\$11,637	\$11,994	
	RESERVE ACCOUNT			
	Projects Approved in Prior Year(s) But Not Fu			
	Project	Remaining Commitment	Estimated Amt Spent in 2017	Balance of Remaining Commitment
2016-7	O'Dell Cr Phase 13 Design - Granger Ranch	\$7,184	\$5,774	\$0
	TOTAL		\$5,774	
	Reserve Account balance beginning of 2017		\$167,344	
	Amount spent from Reserve Account in 2017		\$5,774	
	Estimated unexpended WildTAC funds from CY2017 budget		\$11,994	
	Estimated Reserve Account balance at beginning of CY2018 (capped at \$250K beginning in 2017)		\$173,564	

Review of 2018 Proposals & Funding Decisions

There were 11 proposed projects for 2018, totaling approximately \$419K. In most cases, there was little discussion following the brief presentations by project sponsors and most projects were quickly approved. There were questions or comments on a few of the proposals as follows:

Cottonwood Restoration and Weed Inventory - Missouri River. Friends of the Missouri Breaks Monument, in partnership with the BLM proposed this \$45K project to continue planting and watering cottonwood saplings in select areas and also to fund an invasive weed inventory on the entire river corridor within the National Monument. Steve Leathe (NWE) indicated the company does not support the weed inventory aspect of this project for several reasons. The company already funded a project in 2014 to inventory and remove invasive Saltcedar in this river stretch (\$28K total, split between WildTAC and MoTAC). The company also provided \$19K funding to BLM in 2008 to remove invasive Russian Olive trees on islands near the Judith River confluence. The company believes there is a substantial risk that funding a general weed inventory in the Monument could eventually lead to future funding proposals for weed inventory and control projects along most, if not all of the 500+ mile river corridor from the upper Madison to the headwaters of Fort Peck Reservoir. This would be unaffordable and, in NWE's opinion, not compliant with FERC license requirements. The license contains no weed control requirements other than those mentioned in USFS Section 4(e) conditions that pertain to hydro facilities on National Forest System land. The license does highlight the importance of riparian areas (dominated by cottonwoods and willows) and NWE believes it is reasonable to focus on protection of those habitats via fencing, livestock grazing management, and periodic removal of Russian Olive and Saltcedar. NWE believes the latter two invasive weed species should remain the focus for the NWE fish and wildlife protection, mitigation and enhancement programs on the Missouri River.

WildTAC funding for the Missouri River cottonwood planting program began in 2015 when \$17,900 was approved. This increased to \$40K in 2016 and \$45K in 2017. The cottonwood planting program is described in the 2018 proposal from the Friends as a 'five-year plan'. Given that the 2018 WildTAC proposals exceed the 2018 budget by approximately \$46K, Steve proposed to decline funding the 'weed inventory' aspect of the cottonwood/weed proposal and the funding level for this project be returned to approximately the 2015 level (~\$20-\$25K). There was considerable discussion about these issues and FWP and USFS representatives felt there was value in conducting the inventory and also felt that completion of the inventory would not necessarily result in future TAC funding for control of invasive weeds other than Russian Olive and Saltcedar.

Conservation Easements – Missouri River (ABN & Tall Grass ranches). Jay Erickson, a Managing Director for MT Land Reliance, attended the meeting and described the proposals and answered questions regarding proposed conservation easements along the Missouri River in the Loma and Coalbanks areas. There were several questions about the terms of the easements and if conditions could be added to ensure protection of riparian and upland habitats. Jay indicated the easements would include language to minimize subdivision and there might be opportunities to include habitat protection conditions in the easement management plan. Both easements have a significant amount of funding provided thru the NRCS Agricultural Land Easement Program (ALE) and this program requires development of an agricultural land easement plan. The land management plans for these two easements will be written by MT Land Reliance and will be reviewed and approved by the State office of NRCS. The general consensus of the WildTAC was to tentatively approve these two easement proposals with the condition that we will work with NRCS, MLR, and the landowners to incorporate habitat protection measures to the extent possible. Steve will coordinate that effort and will keep key WildTAC and MoTAC reps involved and informed. Anna Noson (UM) mentioned the Tall Grass property was one of only 3-4 spots on the entire river where Black-billed Cuckoos (a MT and USFWS species of concern) have been found.

O'Dell Creek Projects. Jason Brey (USFS) mentioned that the cost of the proposed O'Dell Phase 15 restoration project (\$195K) was more than half of the 2018 budget and there was not much cost share. This is a valid concern which has been discussed at times in past meetings as well. Steve indicated this level of spending is fairly consistent with spending for O'Dell projects in past years. So far, we have not been able to locate a project area anywhere else in the Madison or Missouri drainages that had so much potential for wetland and riparian habitat restoration (700+ acres of natural wetland re-creation thus far) with cooperative private landowners. Wildlife response (especially songbirds, waterbirds, waterfowl) has been phenomenal. John Muhlfeld (River Design Group) indicated that the Phase 15 project will be the first one to involve planting of several thousand willow cuttings. There are few large willows in the restoration areas thus far though plenty of willows may be found in upstream and downstream areas. John thinks that willows were eliminated by

livestock grazing or perhaps by herbicide use. Addition of willow stands will add to habitat complexity and should further benefit migratory songbirds and other wildlife.

2018 Budget & Reserve Account Projection

After some discussion, the WildTAC voted unanimously to approve all 11 projects as proposed without changes for 2018, for a total commitment of approximately \$419K. This exceeds the 2018 budget (\$373K) by approximately \$46K.

The Reserve Account balance is expected to be approximately \$179K at the beginning of 2018 with no outstanding commitments. The Reserve Account is nearing its capped amount of \$250K, so WildTAC decided to use Reserve Account funds to pay for the expected \$46K 2018 budget overspend. The projected 2018 budget is attached below:

Wildlife	TAC Projects & Budget for CY2018				
Project #		Proposed amount for 2018	Approved amount for 2018	Page #	Numbers in PINK are estimates
2018-1	Bird Monitoring - O'Dell Cr Project Area	\$26,417	\$26,417	1	
2018-2	Cottonwood Restore & Weed Inventory - Mo River	\$45,000	\$45,000	5	
2018-3	Bald Eagle Monitoring - Hebgen & Quake	\$3,675	\$3,675	11	
2018-4	Hebgen Area Aspen & Cottonwood Restoration	\$5,100	\$5,100	14	
2018-5	Hebgen Grizzly Bear Conflict Mitigation	\$6,200	\$6,200	17	
2018-6	Mo River Conservation Easement - ABN Ranch	\$75,000	\$75,000	23	
2018-7	Mo River Conserv Easement - Tall Grass Ranch	\$16,700	\$16,700	26	
2018-8	O'Dell Cr Construction - Phase 15 - Longhorn	\$195,435	\$195,435	29	
2018-9	Middle O'Dell Cr Restoration Plan	\$29,900	\$29,900	35	
2018-10	Weed Control - Hebgen & Quake	\$12,000	\$12,000	41	
2018-11	Trumpeter Swan Restoration - Madison	\$4,000	\$4,000	44	
	TOTAL	\$419,427	\$419,427		
	Budget for CY2017		\$372,831		
	Total approved for CY2017		\$419,427		
	Balance		(\$46,596)		
	RESERVE ACCOUNT				
	Projects Approved in Prior Year(s) But Not Fully Completed:				
	Project	Project Cost	Amount Spent in 2017	Remaining Commitment	
			TOTAL	\$0	
			/ ۱.		
	Estimated Reserve Account balance beginning of 2018 (Reserve Account capped at \$250K beginning in 2017)		\$178,564		
	Subtract Remaining Reserve Account Commitments for 2018		\$0		
	Estimated Uncommitted Reserve Account funds available in 2018		\$178,564		