

EMC

**60 Day Notice for East Deer Lodge Landscape Restoration Project  
May 11, 2015**

**CERTIFIED MAIL – RETURN RECEIPT REQUESTED**

Chief Tom Tidwell  
USDA Forest Service  
201 14<sup>th</sup> Street SW  
Washington, D.C. 20250

Secretary Tom Vilsack  
U.S. Department of Agriculture  
1400 Independence Ave., SW  
Washington, D.C. 20250-0003

Secretary Sally Jewell  
U.S. Department of the Interior  
1849 C Street, NW  
Washington, D.C. 20240

Rowan W. Gould, Acting Director  
U.S. Fish and Wildlife Service  
1849 C Street, NW  
Washington, D.C. 20240

RE: 60 Day Notice of Intent to Sue under the Endangered Species Act

Chief Tidwell, Secretary Vilsack, Secretary Jewell and Acting Director Gould:

You are hereby notified that Alliance for the Wild Rockies (AWR) and Native Ecosystems Council (NEC) intend to file a citizen suit pursuant to the citizen suit provision of the Endangered Species Act (ESA), 16 U.S.C. Section 1540(g) for violations of the ESA, 16 U.S.C. Section 1531 *et seq.* AWR and NEC will file suit after the 60 day period has run unless the violations described in this notice are remedied. The name, address and phone number of the organizations giving notice of intent to sue are as follows:

Michael Garrity, Executive Director  
Alliance for the Wild Rockies  
P.O. Box 505  
Helena, Montana 59624

Dr. Sara Jane Johnson, Executive Director  
Native Ecosystems Council  
P.O. Box 125  
Willow Creek, MT 59760

## STATEMENT OF FACTS

On March 30, 2015, the Beaverhead-Deerlodge National Forest (BDNF) released a decision by Forest Supervisor Melany Glossa announcing the publication of the Record of Decision (ROD) for the East Deer Lodge Valley Landscape Restoration Management Project (EDLV). The EDLV project area consists of approximately 47,383 acres, with 39,700 acres administered by the BDNF. This project area is located in the East Deer Lodge Management Area, which is one of 8 management areas within the larger Clark Fork-Flint landscape. The project area is located east and southeast of the city of Deer Lodge in southwest Montana. It is located in the Boulder Mountains which slope up to the Continental Divide to the east. The project includes 2,038 acres of clearcutting in 43 units, and 502 acres of partial harvest in 9 units. These 2,541 acres to be logged are all classified as lynx habitat (Project BA 29).

The project also includes 8,768 acres of “restoration treatments” in 19 units; within these unit boundaries, treatments include 2,232 acres of park/meadow treatments, 43 acres of aspen treatments, and 1,836 acres of Douglas-fir thinning including 126 acres of commercial harvest along roadsides (ROD 10). A tally of these restoration acres is not identified in the Project BA. However, 1,874 of these restoration acres are identified as lynx habitat (Project BA at 29), including 1836 acres of Douglas-fir and up to 43 acres of aspen (ROD Table 3 at 11). Thus the Project will remove 4,415 acres of lynx habitat (Project BA 29).

Logging will require 11.2 miles of new temporary road construction, which will be obliterated after project completion (Project BA 8, 19). In addition, 3.5 miles of currently-closed roads will also be used for logging. And the project will convert 1.2 miles of a nonsystem road to a system road. Road/motorized trail decreases will also occur with obliteration of 8.6 miles of system, nonsystem, and user created trails; there will also be 9 miles of road/motorized trail closure with signs, and the conversion of 4.3 miles of a motorized trail to a nonmotorized trail (Project BA Table 2 at 7). As a result, there will be a “net” decrease in motorized access routes due to obliteration/conversion of motorized trail to nonmotorized trail) of 11.1 miles (increase of 1.2 minus decrease of 8.6 miles obliterated and 4.3 miles of converted trail). The Project will take up to 10 years to complete (Project BA 21).

The Project Area is mapped as unoccupied, secondary lynx habitat in the NRLMD ROD (Figure 1-1). Management of lynx habitat is not required by the NRLMD (Project BA 25). The Project Area is historic lynx habitat where reproduction was obviously occurring. The Montana Fish, Wildlife and Parks 1998 map indicates high occupancy of this landscape by lynx, with 5 different areas identified as occupied by lynx, including at quite low elevations. This high historical density of lynx in the Project Area is consistent with Forest Service descriptions of this habitat. It consists of Douglas-fir/pinegrass, Douglas-fir/twinflower, subalpine fir/twinflower, and subalpine fir/grouse whortleberry habitat types (Project FEIS 332, 334; C-68). Three of these habitat types are defined as “cool and moist” or “cool and dry to moist (Objection Appendix A at 1-2). These forest stands would provide the mixed conifer forest conditions that were defined

by Squires et al. (2010) for lynx winter habitat in the Seeley Lake area (22% Douglas-fir, 13% larch, 17% lodgepole pine, and 48% spruce/fir). The Project Area lies directly adjacent to the Continental Divide for approximately 15 miles. This Divide is an identified linkage zone for lynx [Northern Rockies Lynx Management Direction (NRLMD) ROD 2007, Figure 1-1; Project BA 35].

The current status of lynx in the Project Area is unclear. The Project Area is mapped as secondary lynx habitat (Northern Rockies Lynx Management Direction ROD, Figure 1-1). This habitat is defined as either areas with historical records of lynx presence with no record of reproduction, or areas with historical records and no recent surveys that document the presence of lynx and/or reproduction. *Id.* at 32. The high density of occupied lynx habitat in the MFWP 1998 map clearly demonstrates that lynx reproduction was occurring prior to 1998. The current status of lynx in the Project Area is unknown. Surveys were conducted 43 miles north of the Project Area in 2012 without identification of lynx (Project BA 26-27). However, lynx are known to currently occur just several miles east of the Project Area, in the Blackfoot Meadows area of the Helena National Forest (USDA 2014), which is close to the head of Baggs Creek in the EDLV project area. Blackfoot Meadows is located at the southern end of Lynx Analysis Unit (LAU) di-04. *Id.* Lynx are reported to be consistently present along the Continental Divide south of U.S. Highway 12, ranging throughout LAU di-04 and into the western portions of LAU di-05, and are occasionally reported in LAU di-06 as well. *Id.* The Biological Assessment for the Chessman Reservoir Project on the Helena National Forest included the following:

*Since 2005, Wild Things Unlimited of Bozeman has run winter track surveys over a wide area north and south of MacDonald Pass, with survey work concentrated in the period 2006-2001. Most fieldwork has been in the Little Blackfoot and Telegraph drainages, but areas in the upper Tenmile drainage have been surveyed as well (particularly in Minnehaha Creek). Surveys involve systematic back-tracking and collection of hair, scat and urine samples, which are then sent to the USFS Rocky Mountain Research Station in Missoula for DNA analysis [see Gehman 2006; Gehman et al. 2007-2012; Pilgrim 2009-2012; Pilgrim and Schwartz 2007-2008]. DNA analysis allows identification of species and individual animals. Behavior patterns deciphered during 6 seasons of tracking, coupled with the fact that at least 2 lynx have been present for multiple years (one male for 4 years) is a strong indication that some of these animals are local residents rather than transients lingering in the area as they make their way through a linkage zone.....some females have sometimes been detected in the tracking sample.*

One lynx dispersing from Colorado likely moved through the Project Area in 2009 (Project BA 27).

The distribution of snowshoe hares in the project area, both within and outside of past logging units, is unknown due to a lack of hare surveys. Hare densities must be known in order to manage lynx habitat. Snowshoe hare habitat does not develop in

logged units unless conifer regeneration is very dense, up to or exceeding 4,500 stems/acre (Project BA 24). The density of conifer seedling/saplings in past logging units of the EDLV was never measured by the Forest Service, so the value of these units as snowshoe hare winter habitat is unknown. If these stands do not provide winter hare habitat, local populations of hares will not be promoted. This will in turn reduce the availability of hares for lynx in the summer, the time that lynx hunt within this type of habitat. Lynx only hunt hares in the winter in older, multistoried forest stands (Squires et al. 2010).

The historic density of lynx in the EDLV has likely been significantly reduced by past logging for at least 3 reasons. The density of young saplings in old logging units may be too low to provide the dense habitat needed for overwinter survival of hares. Lower winter survival means lower hare populations across this landscape. Logged areas may simply not have regenerated into dense young stands, or dense sapling stands have been precommercially thinned down to just several hundred trees per acre. And logging, both forest thinning and clearcutting, will remove lynx winter habitat (Squires et al. 2010). Up to 10,330 acres of winter lynx habitat has been eliminated in this landscape from logging (FEIS 380, Table 85; FEIS 387). Or over time, in-growth of subalpine fir and lodgepole pine into these stands, as well as deadfall from insect infestations, would have increased multistory conditions, and thus winter lynx habitat, due to forest succession (Objection Appendix A at 2-3). Finally, these 10,330 acres of past logging will have created vast areas of lynx travel barriers. Lynx do not travel through openings and thinned forests in the winter (Squires et al. 2010; Project BA at 24). At some point, a threshold level of habitat unsuitability created by logging (i.e., habitat fragmentation and loss of winter habitat) will prevent lynx from using a given landscape (Squires 2009). For another forest carnivore, the pine marten, this threshold level has been identified as 20-25% of a given landscape (Hienemeyer 2002). Past logging in the EDLV, including public and private lands, currently comprises 22% of this landscape.

The cumulative impacts of logging on historic lynx populations in the larger landscape surrounding the EDLV project area is likely also significant. This larger landscape includes another 29,617 acres on the east side of the Continental Divide. This area includes the 77,000-acre grizzly bear analysis area, as defined in the Project BA at 10, and as mapped in BA Appendix E: Wildlife Secure Areas Map. There has been 18,759 acres of logging from 1940 to present in this larger landscape area (Project BA Table 6 at 17). Thus 24% of this landscape has been logged, removing lynx winter habitat and fragmenting lynx travel habitat.

The EDLV Project Area is occupied by grizzly bears. Bears are expanding south out of the Northern Continental Divide Ecosystem (NCDE), which is believed to be increasing at 3% per year (between 2004-2009) (Project BA 12). This expanding grizzly bear population has moved down into the Divide landscape of the Helena National Forest, south of Highway 12, as well as onto the adjacent BDNF; south of Highway 12, most observations have come from the upper Little Blackfoot watershed and from along the border between the Helena National Forest and the BDNF; the number of credible grizzly bear reports in these areas has been increasing in recent years as the population in

the NCDE expands to the point that more bears are exploring new territory further to the south (USDA 2011). Seven of the credible reports of grizzly bears summarized in the Biological Assessment for the Red-Mountain Flume-Chessman Reservoir Project on the Helena National Forest are on the BDNF (*Id.*, 26; Table 3). The EDLV BA also identifies a number of confirmed observations of a grizzly bears along the Continental Divide area within and adjacent to the EDLV landscape, including the Electric Peak/Thunderbolt Mountain area on the Continental Divide, and in adjacent areas such as Lockhart Meadows, Cottonwood Lake area, the head of Jake Creek, and further south in Elk Park, which is close to Butte (Project BA 9, 16, 17).

The EDLV Project Area lies between the NCDE and the Greater Yellowstone Ecosystem (GYE) grizzly bear population (Project BA at 12, also Appendix E). This landscape thus links these two separated populations. Management of habitat within this linkage zone along and adjacent to the Continental Divide will thus affect genetic exchange between these 2 separated grizzly bear populations. This linkage zone may be especially critical to the long-term viability of the GYE grizzly bear population. This population may be static or possibly declining, due to a series of habitat changes that have reduced historic and high quality food resources, including whitebark pine and cutthroat trout (Doak et al. 2013). This linkage zone will also be important for connecting lynx populations across Montana (NRLMD ROD Figure 1-1).

The EDLV Project is one of three proposed Forest Service projects that threaten function of this key linkage zone. The EDLV Forest Service lands comprise 62 square miles of linkage habitat on the west side of the Continental Divide. As previously noted, the EDVL will clearcut or thin 4,415 acres of lynx habitat (Project BA at 29). This includes 2,038 acres of clearcutting. There will be 7 clearcuts over 100 acres in size, including 2 over 200 acres in size, and one over 300 acres in size due to units being immediately adjacent to one another. There will be 8 restoration thinning units that will exceed 100 acres in size, including two over 300 acres, and one over 400 acres (ROD 9-10). During project activities, there will be 11.2 miles of new logging roads developed.

A second project immediately east of the EDLV project, or across the Continental Divide, is the proposed BDNF Boulder River Salvage and Vegetation Management Project (hereafter Boulder River Salvage Project) (scoping notice of April 13, 2012 attached). The project area is 223 square miles. Potential treatments include 6,174 acres of clearcuts, ranging from 45 to 260 acres, and 439 acres of commercial thinning, with units ranging from 88 to 176 acres, for a total 6,613 acres of logging. The project will require up to 16 miles of new temporary roads.

A third Forest Service project is planned on the east side of the Continental Divide 10 miles to the north of the EDLV and the Boulder River Salvage Project. The 10 Mile South Project on the Helena National Forest encompasses 96 square miles. The Helena National Forest released a scoping notice for this project on October 29, 2014 (attached). This project includes up to 25,027 acres of treatments, with commercial thinning on up to 4,082 acres, and clearcutting/regeneration harvest on up to 4,629 acres, for a total of 8,711 acres of logging. Proposed clearcuts, including within Inventoried

Roadless Areas, include sizes up to roughly 440, 500, 580 and 670 acres. This project may require up to 40 miles of new temporary roads.

These 3 projects combined, all located within the Continental Divide linkage zone for large carnivores, including lynx and grizzly bears, will create up to 12,841 acres of clearcuts, and 5,023 acres of thinned forests, for a total of 17,864 acres. These projects will remove up to 28 square miles of current or developing lynx winter habitat, and create an additional 28 square miles of lynx travel barriers in this linkage zone. These projects include huge losses of cover for the grizzly bear as well, will impact whitebark pine habitats, and will reduce big game winter ranges. These projects will also require the construction of approximately 67 miles of new roads in occupied grizzly bear habitat.

## STATEMENT OF LAW

ESA Section 7 requires that all federal agencies work toward recovery of listed species, and it contains both a procedural requirement and a substantive requirement for that purpose. Substantively, it requires that federal agencies insure that any action authorized, funded or carried out by the agency is not likely to jeopardize the continued existence of any threatened or endangered species, or result in the adverse modification of critical habitat for such species. 16 U.S.C. Section 1536(a)(2). To carry out the duty to avoid jeopardy and adverse modification of critical habitat, ESA Section 7 sets forth a procedural requirement that directs an agency proposing an action (action agency) to consult with an expert agency, in this case, the FWS, to evaluate the consequences of a proposed action on a listed species. 16 U.S.C. Section 1536(a)(2).

The U.S. Court of Appeals for the Ninth Circuit hold that “[o]nce an agency is aware that an endangered species may be present in the area of its proposed action, the ESA requires it to prepare a biological assessment ...” *Thomas v. Peterson*, 753 F. 2d 754, 763(9th Cir. 1985). If the biological assessment concludes that the proposed action “may affect” but will “not adversely affect” a threatened or endangered species, the action agency must consult informally with the appropriate expert agency. 50 C.F. R. Sections 402.14(b)(1), 402.12(k)(1). If the action “is likely to adversely affect” a listed species, the action agency must formally consult with the expert agency, and the expert agency must provide the action agency with a Biological Opinion explaining how the proposed action will affect the species or its habitat. 16 U.S.C. Section 1536(a-c); 50 C.F.R. Section 402.14. If the Biological Opinion concludes that the proposed action will jeopardize the continued existence of a listed species, it must outline “reasonable and prudent alternatives,” if any are available, that would allow an action agency to carry out the purpose of its proposed activity without jeopardizing the existence of listed species. 16 U.S.C. Section 1536(b)(3)(A).

As defined in the ESA’s regulations, an “action” subject to consultation includes all activities or programs of any kind authorized, funded, or carried out, in whole or in part, by Federal agencies in the United States or upon the high seas. Examples include, but are not limited to: (a) actions intended to conserve listed species or their habitat; (b) the promulgation of regulations; (c) the granting of licenses, contracts, leases, easements,

rights-of-way, permits, or grants-in-aid; or (d) actions directly or indirectly causing modifications to the land, water, or air. 50 C.F.R Section 402.02. The U.S. Court of Appeals for the Ninth Circuit holds that this regulatory language “admit[s] of no limitation” and that “there is little doubt that Congress intended to enact a broad definition of agency actions in the ESA...” *Pacific Rivers Council v. Thomas*, 30 F.3d 1050, 1054 (9<sup>th</sup> Cir. 1994). Thus, ESA consultation is required for individual projects as well as for the promulgation of land management plans and standards. *Id.* “Only after the Forest Service complies with Section 7(a)(2) can any activity that may affect the protected [species] go forward.” *Pacific Rivers*, 30 F.3d at 1056-57. The procedural consultation requirements in the ESA are judicially enforceable and strictly construed:

If anything, the strict substantive provisions of the ESA justify more stringent enforcement of its procedural requirements [than the provisions of the National Environmental Policy Act], because the procedural requirements are designed to ensure compliance with the substantive provisions. The ESA’s procedural requirements call for a systematic determination of the effects of a federal project on endangered species. If a project is allowed to proceed without substantial compliance with those procedural requirements, there can be no assurance that a violation of the ESA’s substantive provisions will not result. The latter, of course, is impermissible. *Thomas v. Peterson*, 753 F.2d 754, 764 (9<sup>th</sup> Cir. 1985).

## PROJECT BACKGROUND

### Canada Lynx:

The Forest Service claims that the EDLV Project is not likely to adversely affect the Canada lynx (Project BA 34). The FWS concurred with this determination (Concurrence Letter of 2/20/2015). These claims of no adverse impacts to lynx are not supported by the current best science or facts provided in the Project Record.

The Forest Service claims that logging and thinning will not have any adverse impacts on lynx because this area is mapped as unoccupied secondary habitat (Project BA 34). The FWS concurred with this claim. However, the immediate project area has not been surveyed for lynx. Surveys were conducted 43 miles to the north of the Project Area (Project BA 27). Historic records of lynx show a relatively high density of lynx occupancy (MFWP 1998). Resident lynx are known to be present immediately adjacent to the EDLV Project Area, on the Helena National Forest (USDA 2011).

The Forest Service claims that logging will be a beneficial effect to lynx by creating “better hare habitat;” young forest stands that regenerate after logging may develop summer and winter hare habitat, while existing forests do not contain hares (Project BA 28, 34). Hare densities in the Project Area are actually unknown, as no surveys have been done. The Record shows that much of the forest habitat is suitable for

hares and has or will develop into mixed conifer multistory forests that provide essential winter habitat for both hares and lynx (Squires et al. 2010; Objection Appendix A-2-3). Young regenerated forests do not provide lynx winter habitat, or the habitat that is key to lynx persistence (Squires et al. 2010). Thus the habitat gained from logging (lynx summer habitat) will be far less valuable to lynx than the habitat or potential habitat lost (lynx winter habitat). Logging will therefore be an adverse rather than a beneficial effect to lynx.

The Forest Service claims that logging in the EDLV Project will promote conservation of lynx by creating a “mosaic of forest age classes” (Project BA 34). This recommendation conflicts with the current best science, whereby management of lynx winter habitat is key to persistence. The EDLV Project has no goal or objectives for any level of lynx winter habitat. No old growth surveys were done outside of proposed units (FEIS 346-47). Nor does the agency identify the current level of lynx winter habitat, or habitat that will recruit into lynx winter habitat in the future. Squires et al. (2010) stated there should be “an abundance” of lynx winter habitat, or older growth forests (Project BA 28). This level of lynx winter habitat recommended for persistence has been identified by lynx scientists. McKelvey et al. (1999) in Table 15.1 at 429 identified natural, historic levels of lynx winter habitat based on fire cycles. Forests over 100 years in age would have been 36% for a 100-year fire cycle, 51% for a 150 year fire cycle, and 60% for a 200-year fire cycle (*Id.* Table 15.1 at 429). Although lodgepole pine doesn’t reach maturity until 120 years in age, and Douglas-fir doesn’t reach maturity until 200 years in age (Objection Appendix A 24), multistory forest conditions can develop in immature mixed conifer forest or pure lodgepole pine stands thanks to the mountain pine beetle. The mountain pine beetle is known to create lynx winter habitat (Gilman 2009).

The Forest Service claims that habitat changes to lynx in the action area will be insignificant at 2% (Project BA 34). The FWS concurred with the Forest Service by noting that only 38 acres of hare habitat would be affected. The “action area” is 115,185 acres (*Id.* at 21). The lynx habitat impacted by the Project includes 4,415 acres (*Id.* at 29). This is actually 4% of the action area impacted. Use of a large analysis area washes out localized impacts. The direct impacts within the Project Area are clearly significant. Past logging has impacted 10,330 acres, or 22% of the Project Area. Impacts on forests within the Project Area would be greater. The additional loss of lynx winter and recruitment winter habitat of 4,415 acres within the 47,383 acre project area would be another 9%. This would bring the total loss of lynx winter habitat and/or recruitment winter habitat to 31% of the Project Area. Habitat losses for another forest carnivore, the pine marten, that exceed 20-25% are believed to prevent persistence (Heinemeyer 2002).

The Forest Service claims that the Project will not impede lynx movement and does not reduce habitat connectivity in this identified linkage area (Project BA 35). The FWS agreed with this claim. No actual analysis was provided to support this claim. The current and proposed acreage of lynx travel corridors is never identified for the Project. The current best science states that lynx avoid crossing openings and thinned forests in the winter (Squires et al. 2010). This science also reports that lynx avoid crossing regenerated clearcuts/logging unit until new tree regeneration reaches over 4 inches in

diameter breast height. Thus the barrier impacts of logging will last for decades. It is impossible that the logging of 4,415 acres of lynx habitat in the Project Area will not increase barriers by 4.415 acres. These new barriers of 9% of the landscape will add to existing barriers created by past logging. The barrier impact of 10,383 acres of past logging is not identified for the Project.

Finally, the Forest Service claims that all treatments are in compliance with the NRLMD vegetative standards and are not expected to preclude any future use of the area by transient lynx if they chose to do so (Project BA 35). The FWS concurred with this claim. However, the agency is likely violating 2 vegetation standards in the NRLMD. They appear to be violating NRMLD standard VEG 6, by logging multistoried lynx winter habitat. And they are clearly violating the NRLMD standard ALL S1.

As was addressed above, it is highly improbable that logging/thinning 4,415 acres of lynx habitat in the Project Area will not increase movement barriers for lynx by 4,415 acres, or 9% of the Project Area. Although “maintenance” of connectivity does not necessarily mean maintaining the status quo, there clearly has to be some level of connectivity needed for lynx to travel through a landscape as well as to use winter habitat within this landscape. The agency provided no analysis as to what level of connectivity constitutes “maintenance,” or what the current and proposed levels of connectivity will be in the EDLV Project.

It also seems likely that many of the lodgepole pine stands slated for logging (2,038), and mixed conifer stands slated for thinning (502 acres) qualify as Region 1 old growth habitat, and are progressing into multistory lynx winter habitat. The minimum requirements for Code 6 lodgepole pine old growth is only 12 trees per acre over 10 inches dbh (Objection Appendix A 3-4). The Record indicates that many lodgepole stands still meet this minimum requirement in spite of pine beetle mortality. *Id.* 6. The status of the 1,874 acres of Douglas-fir that will be noncommercially thinned in regards to lynx winter habitat is unclear. These stands are dominated by Douglas-fir, including merchantable trees; conifers less than 7 inches dbh would be removed (ROD 8). It seems likely that some of these areas currently suitable lynx winter habitat.

The Forest Service did not complete any analysis of cumulative effects of vegetation treatments on lynx in the EDLV Project Area, even though 22% of this landscape has already been logged. The current best science indicates that past logging on 22% of the Project Area significantly impacted lynx habitat by removing lynx winter habitat, or habitat that was recruiting to lynx winter habitat. The EDLV Project will remove a potential 9% additional lynx winter habitat, or developing lynx winter habitat. The level of lynx winter habitat required for viability as per historic amounts (likely 36% or greater, depending on the fire cycle in various forest types as per McKelvey et al. 1999) was not identified in the Project BA. The FWS notes in their concurrence letter of 2/20/15 that effects to lynx from the EDLV Project were considered “insignificant” and thus fail to qualify as an adverse effect. Logging on 31% of the Project Area is a significant amount of 36% older forest habitat required for lynx persistence, and by FWS criteria, would qualify as an adverse effect to lynx.

The Forest Service failed to identify or evaluate the cumulative impacts that will result from an additional logging project that is planned immediately adjacent to the EDLV Project, on the east side of the Continental Divide, the Boulder River Salvage and Vegetation Management Project. This Project is also planned in unoccupied lynx secondary habitat (NRLMD ROD Figure 1-1; Boulder River Salvage and Vegetation Management Project Scoping Notice). The two adjacent projects combined will create 11,028 acres of lynx winter travel barriers, which is over 17 square miles of habitat. The proposed logging includes 8,212 acres of clearcuts ranging up to over 300 acres in size. These impacts will occur in the Continental Divide linkage zone for lynx (NRLMD ROD, Figure 1-1).

The FWS also concluded that secondary unoccupied habitat would reasonably be expected to provide adequate connectivity and opportunistic foraging habitat for lynx to allow dispersal, despite the lack of management direction for these areas (NRLMD ROD 33-34; 41). The EDLV project will reduce landscape connectivity by at least 9% over existing conditions; 22% of this landscape has already been logged, creating additional lynx movement barriers. The combined impact of the EDLV Project and the adjacent Boulder River Salvage project will create 17 square miles of lynx travel barriers in secondary unoccupied habitat that is mapped as a linkage zone. The FWS clearly erred in their BiOp suggesting that connectivity will be maintained in secondary unoccupied habitat. A revised BiOp is clearly required to address the flawed conclusions in the 2007 BiOp for the NRLMD.

The FWS also failed to require formal consultation for the EDLV Project because the 9% loss of lynx travel habitat conflicts with the conservation recommendations provided in the 2007 BiOp for the NRLMD. The FWS in their 2007 BiOp for the NRLMD identified 3 conservation recommendations for lynx. Recommendation 1 was that the Forest Service should ensure to the extent possible that unoccupied habitat continues to facilitate and allow dispersal of lynx into the future; therefore the FWS recommends the management direction regarding linkage areas and connectivity be applied to unoccupied areas, including ALL S1 (NRLMD ROD 30-31). This conservation recommendation will not be met for the EDLV Project.

The FWS also concluded in their 2007 BiOp for the NRLMD that unoccupied secondary habitat may be degraded by management activities, but the resulting conditions would typically be temporary, not permanent (NRLMD ROD 34). The loss of lynx winter habitat, and recruiting lynx winter habitat, is clearly not temporary, as it will take over 100 years for logged forest stands to grow to maturity again. Their BiOp for management impacts on unoccupied lynx secondary habitat is clearly wrong, and requires a reanalysis.

### **Grizzly Bear:**

The IGBC (1998) recommends that road impacts on grizzly bears be measured by density, including measurements of Open Motorized Access Route Density (OMARD) and Total Motorized Access Route Density (TMARD), and by availability of security.

These are the accepted measures of adverse impacts to grizzly bears. Research continues to identify an association between grizzly bear mortality risk with open road densities (Wiegus et al. 2002; Schwartz et al. 2010; Boulanger and Stenhouse 2014) as well as availability of secure habitat (Schwartz et al. 2010). These density measures for roads, as well as measures of security, are currently being applied to both of Montana's grizzly bear populations, both the Northern Continental Divide Ecosystem (NCDE) Recovery Zone (Protocol Paper 2008) and the Greater Yellowstone Ecosystem grizzly bear Recovery Zone (USGS 2012). In addition, in the GYE grizzly bear occupied habitat, security habitat is monitored outside the Recovery Zone (USGS 2012). These criteria are also to be applied to grizzly bear management (Conservation Strategy) if and when this threatened species is delisted (USDI 2006 at 4-5). Measurements of these grizzly bear habitats requires the establishment of bear management units. Within the Recovery Zone in the GYE, these are called Bear Management Units (BMUs), while outside the Recovery Zone these are called Bear Analysis Units (BAUs) (USGS 2012; USDI 2006; Protocol Paper 2008). BAUs in the GYE range in size from 36 square miles up to 527 square miles. The average BAU sizes per Forest include 240 square miles for the Beaverhead-Deerlodge National Forest, 423 square miles for the Bridger-Teton National Forest, 304 square miles for the Caribou-Targhee National Forest, 254 square miles for the Custer National Forest, 237 square miles for the Gallatin National Forest, and 220 square miles for the Shoshone National Forest (USGS 2012 Table 7 at 89-90)..

The southern portion of the BDNF has 13 BAUs mapped (USGS 1012, Table 7 at 89). However, the northern portion of the BDNF has not been mapped for BAUs, including occupied grizzly bear habitat along the Continental Divide area within the EDLV and Boulder River Salvage Project Areas. There are thus no current means of measuring or monitoring changes in grizzly bear displacement and mortality risk when vegetation management actions, such as the two identified projects, would occur. There are also no means of identifying any surrogate measures of take of grizzly bears that would be triggered by these projects. The FWS has used OMARD, TMARD and security as surrogate measures for incidental take of grizzly bears in the past, but has not used it for the EDLV Project. No explanation was ever provided in their concurrence letter on the EDLV Project as to why measurements of road density and security were not used as a surrogate measure of take.

Examples of past FWS measures of surrogate take of grizzly bears include 2 BiOps provided for the Gallatin National Forest. One was provided in 1995 (attached) for the Gallatin Forest Plan. A second BiOp was provided in 2006 for the Travel Plan Amendment to the Gallatin Forest Plan (USDI 2006, attached). Within the Recovery Zone on the Gallatin National Forest, take is to be measured by OMARD, TMARD, and security within BMUs, while outside the Recovery Zone in occupied habitat, incidental take is to be measured by levels of habitat security within BAUs (USDI 1995, USDI 2006, USGS 2012).

The FWS recently provided a BiOp for the Revised BDNF Forest Plan in 2013 (FWS Concurrence Letter for EDLV Project 2/20/15). This BiOp did not use the current best science for measuring take of grizzly bears, which is the density of roads and

availability of security within BMUs or BAUs. Instead, the FWS provided an incidental take statement for the BDNF allowing for up to 70 miles of new temporary road construction across the entire BDNF during the life of the Revised Forest Plan. This incidental take statement also allows any amount of permanent road construction that would not exceed the desired open motorized road and trail densities in the RFP. *Id.* For the EDLV project, this RFP direction requires that the OMARD density in the Clark Fork Flint Landscape Area not exceed 1.9 OMARD (Project BA 16, Table 5). This LA is below this objective, at 1.7 OMARD. *Id.* To exceed this objective in the Clark Fork Flint landscape of 379,208 acres, or 593 square miles (Objection Appendix A-1), the BDNF would have to construct an additional 119 miles of permanent road to exceed allowed take levels of grizzly bears. It is basically impossible for the BDNF to exceed their allowed take of grizzly bears based on permanent road construction within the Clark Fork Flint Landscape where the EDVL Project is planned. That project will actually reduce total miles of permanent road by obliterating 2.7 miles of system road, and converting 4.3 miles of motorized trail to nonmotorized trail, while only constructing 1.2 miles of permanent road (Project BA at 7, including Table 2). The EDLV Project will also meet the 2013 programmatic BiOp because it requires only 11 miles of new temporary roads (Project BA 19, Table 7), when 70 total miles across the entire BDNF are allowed. Based on the allowed level of take of grizzly bears, the FWS determined that EDVL Project is within the scope of allowed take, and thus no second-tier formal consultation was required (FWS concurrence letter).

The FWS did not address why their 2013 BiOp was suitable for the Clark Fork Flint Landscape, which has an objective of 1.9 miles of OMARD. These objectives are different for the various Landscapes, so each LA needs to be considered individually in a BiOp. The EDLV Project is within an identified linkage zone for grizzly bears between the NCDE and the GYE, so its values to bears will be different from many other areas of the BDNF. Linkage zones, or zones of habitat connectivity within or between populations of animals, foster the genetic and demographic health of the species (USDI 2006 at 8). There is no information provided by the FWS as to why 1.9 miles of OMARD within the EDLV Project Area within this linkage zone will promote conservation, recovery and the associated dispersal of grizzly bears. Levels exceeding 1 mile of open motorized route per section are known to reduce grizzly bear habitat use, as are total road densities exceeding 2 miles per section (USDI 2006 at 33; BDNF RFP Appendix G-48). In addition, the LA objective of 1.9 miles per section does not include periods when projects are active, so there is actually no limit to OMARD as per the RFP (RFP Appendix G-46).

The FWS's 2013 programmatic BiOp for roads on the BDNF cannot be applied to the EDVL project because the incidental take allowance applies to the entire BDNF, not the EDLV Project Area. A take limit of 70 miles of new temporary roads is meaningless because it does not limit local densities of roads, which are key to grizzly bear management. This take level is also flawed because it does not address the miles of currently-closed roads, both permanent and nonsystem roads, that will be opened for logging. The increase in open road density during project activities is the only factor that will provide a measure of increased mortality risk to bears. If this increased risk is not

measured, it is unknown. So the FWS is providing a exemption for an unidentified level of take of grizzly bears based on temporary as well as permanent road impacts.

Although the open road density during project implementation was never identified by either the Forest Service or the FWS, Objectors did evaluate this important factor regarding grizzly bears (Objection at 32-33). Current open road density in the EDLV Project Area with both roads and motorized trails is 2.54 miles per section. New construction (misidentified as 9.9 instead of 11 miles in Objector's analysis) along with 3.5 closed roads that will be opened for logging, along with 4.3 miles of conversion of motorized trails to nonmotorized trails (Project BA at 7) will create a motorized route density of 2.7 miles per section during project activities. There is no specific project-area exemption for take of grizzly bears due to this specific increased open road density. There is also no analysis of how traffic volume will affect grizzly bear use of and movement through the EDLV Project Area. Traffic volume will clearly increase, and thus the impact of existing open roads will also increase (Chruszcz et al. 2003).

The 2013 FWS programmatic BiOp for grizzly bear management on the BDNF also cannot be applied to the EDLV project because that BiOp only dealt with roads. It did not address logging or restoration activities, or how these activities will impact grizzly bears. The FWS concurrence on the EDVL Project also did not address impacts on vegetation. Their assessment was limited to a statement that short term displacement impacts due to increased human presence will be mitigated by security habitat within this landscape. A 10-year project is not short term according to the BDNF, where short-term is defined in the RFP as 3 years or less (RFP Appendix G-46). And there will be no mitigation for the security losses that will occur during the project. It will decrease, not be maintained, with project activities. Mitigation would require the creation of new security habitat to compensate for that which will be lost during logging and restoration activities. This claim that security will be mitigated is also unfounded as the Forest Service never actually defined what the level of security will be for grizzly bears during the 10-year project either in the Project Area or larger landscape (Project BA at 16, Table 4). There was also no information provided as to why current and post-project security levels are considered adequate for grizzly bears. This 27% security in the 77,000 acre analysis area is well below recommended levels. Security for the NCDE is recommended to be 68% of the landscape (Protocol Paper 2008), and 58% in the GYC (Mattson 1991). These levels are noted to be adequate to promote conservation of grizzly bears in the Recovery Zones. Lower levels will clearly result in "take" of grizzly bears, including 27%. This ongoing take of grizzly bears in the EDLV Project has not been exempted by an incidental take statement.

The habitat changes proposed by the EDLV Project are very high. These changes include 2,541 acres of logging, and activities across another 8,768 acres in the Project Area for restoration activities (ROD 9-10). These activities will cover 29% of the Forest Service lands (39,652 acres) in the Project Area. Within these total restoration acres, there will be 1,836 acres of Douglas-fir thinning, 2,232 acres of park/meadow restoration, and 43 acres of aspen treatments. The thinning/slashing/mastication of hiding cover that occurs within portions of these 8,768 acres will clearly affect the quality of grizzly bear

habitat. The Project BA at 18 and 20 notes that treatments can change the structure and age classes of vegetation, while at 21 the agency claims these changes will be temporary in nature. The only other information and analysis of the impact of vegetation treatments on grizzly bears was in regards to whitebark pine. The Project BA at 19 recognizes that whitebark pine is an important food source for grizzly bears, but purports that it will be protected where it occurs within logging/treatment units. These mitigation measures are defined in the Project BA at 8 for units 25T (230 acres) and 40T (55 acres) of clearcuts (ROD 6). The agency will attempt to protect these whitebark pine seedlings and saplings that occur on these 285 acres of proposed clearcuts by controlling skid trails, directionally falling trees, and designating concentration patches as special treatment areas. These mitigation measures are meaningless for managing whitebark pine for grizzly bears. In order to be available to grizzly bears, whitebark pine cones have to be stashed by red squirrels (Kendall 1980). Clearcut stands will not contain squirrels (Herbers and Klenner 2007, Holloway and Malcom 2006). Even forest thinning will reduce squirrels, and thus reduce the availability of whitebark cones to grizzly bears. The current best science indicates that management of whitebark pine habitats requires provision of adequate amounts of older forest habitats in the surrounding landscapes, not just for red squirrels, but for one of the primary agents for whitebark pine regeneration, or the Clark's nutcracker (Wells 2011). In the EDVL Project Area, cone resources for the Clark's nutcracker will include whitebark pine, limber pine and Douglas-fir (Fisher and Myres 1979, Vander Wall and Hoffman 1982, Vander Wall 1988). The EDLV Project will reduce populations of the Clark's nutcracker by commercial and noncommercial thinning of Douglas-fir habitats on 502 and 1,836 acres, respectively (ROD 7, 10), and will thus adversely impact whitebark pine habitats used by grizzly bears, including those that are not actually within treatment units.

The changes in vegetation which will result in a loss/reduction of hiding cover, and a removal and/or degradation of mature forest habitats due to thinning and clearcutting, were also never addressed by either the Forest Service or the FWS for the EDLV Project. It has been noted in the past that hiding cover is important to grizzly bears. Blanchard (1983) reported that 90% of locations of grizzly bears in the GYE were in timber too dense to observe the bear; 56% of feeding activities observed were in timber over 3 meters tall, and only 6% were in timber less than 3 m tall. Although many locations of bears occurred within 100 m of an opening, Mattson and Knight (1991) noted that virtually all of the data these measures were based on were for natural versus than man-made ecotones, in remote wilderness areas; natural timber edges tend to differ from edges associated with timber harvest because natural edges more often reflect natural ecotones and attendant greater vegetational diversity. Blanchard (1983) concluded in her paper that since Yellowstone grizzly bears use forested areas to a large extent, any alterations in the quantity and/or quality of timber cover may affect the availability of preferred habitat; radio relocations and feeding sites indicate the majority of feeding activities and day beds occur in mixed age and species stands of moderate to dense (26-75%) canopy cover; conventional logging negatively affects grizzly bears through reduction of shelter. She noted that clearcuts should be irregularly shaped and be no wider than 300 m. There are no restrictions for clearcut widths in the EDLV Project.

Also in the GYE, Mattson and Knight (1991) reported that any timber harvest activities and associated activities should be assumed to have a negative affect on grizzly bears unless proven to not contribute to habitat degradation. They noted that the idea that food availability increases in early stages of forest succession does not generally hold in the Yellowstone area; the use of 2 key food resources for grizzly bears, whitebark pine and ungulate carcasses, occur in older forested stands. Berries used by grizzly bears typically occur in shaded forest stands; and foliage in recently harvested areas predictably cures sooner than foliage in shaded areas, and would be effectively available for a shorter period; they recommended that no clearcutting of grizzly bear habitat occur, and that logging grizzly bear habitat in whitebark pine and Douglas-fir habitats will most likely degrade grizzly bear habitat. Yet the EDVL Project has over 2,000 acres of clearcuts.

In the NCDE, timber harvest may not attract grizzly bears. For example, McClellan and Hovey (2001) reported that regenerating cutblocks in the Flathead River drainage consistently ranked lowest in habitat selection for grizzly bears. Apps et al. (2004) reported also in British Columbia that there was a strong negative association by bears to very young, logged forests.

The effect of clearcuts and forest thinning in the EDVL Project on grizzly bear is unknown in regards to creating new forage resources. However, it is clear that these extensive vegetational changes will significantly degrade grizzly bear habitat by reducing elk winter range. As noted above as per Mattson and Knight 1991, grizzly bear use elk carcasses; this is one of the important spring uses of forested habitats by grizzly bears. In the GYE, ungulate carcasses may provide as much as one-half the energy required by grizzly bears during the nondenning season; much of this ungulate use is by scavenging during the spring when mortality of ungulates peaks (Green et al. 1997). Grizzly bear use of carrion on winter ranges is affected by both the number of winter-killed ungulates, as well as distance from roads and human facilities. *Id.* This heavy use of ungulates by grizzly bears in the GYE continues (Fortin et al. 2013).

The Forest Service only briefly mentioned the importance of elk winter ranges to grizzly bears in the EDVL Project. The Project BA at 10-11 notes that upon emergence from the den, grizzly bears seek lower elevations, drainage bottoms, avalanche cuts and big game winter ranges where their food requirements can be met. And this BA at 12 notes that upon emergence from dens, grizzly bears move considerable distances to lower elevations to reach emerging vegetation or to feed on winter-killed or weakened ungulates on winter ranges. This is the extent of the agency's analysis of logging elk winter ranges, including during the winter, for the EDVL Project. The determination of impacts does not discuss the loss of elk winter range thermal cover for this project. The FWS did not identify this has a habitat impact on grizzly bears as well.

The EDVL Project will remove thermal cover, including clearcuts, on 5,639 acres of elk winter range (FEIS 474, Table 126). Elk winter range on forested sites will be eliminated by logging and/or forest thinning as snow depths will increase, as will crusting of snow due to wind exposure (Tyers 2003; Fager 1993). Forage within clearcuts and thinning units will be covered with snow and thus be unavailable to elk. *Id.* These

reductions on elk winter range will be exacerbated by the fragmentation impacts of logging; due to increased snow depths in clearcuts and thinning units, snow depths and crusting may prevent elk from accessing remaining forested portions of their winter range; the energy expended by elk to reach remaining forested winter ranges will also be increased (Tyers 2003). Due to some clearcuts being located next to one another, clearcut openings on elk winter range will reach up to 380 acres. The loss of forested winter range on treated acres will be essentially permanent. Thermal cover on these winter ranges will take up to 100 years or longer to reestablish.

In addition to removal of elk winter range, there will be extensive late winter-early spring disturbances during the 10 years the EDLV Project is implemented. There will be logging of elk winter range during the winter. To allow this logging, Forest Plan winter travel restrictions for big game winter range are being lifted for this project (Project BA at 8). The following haul routes will be open during the winter for logging: 705, 1518, 5169, 5170 5171, 8518, 9317, 9320, 9455, 19729, 19731, 19732, 19733, 19735, 19736, 19738, 19869, 78319, 9491A, UR8-35, UR8-63, UR8-66, and UR8-120. *Id.* Neither the Forest Service or the FWS identified this failure to adhere to RFP winter travel restrictions as an adverse impact on grizzly bears. This winter activity, with both logging and hauling, will clearly displace many elk from this winter range, which in turn will reduce ungulate carrion for grizzly bears in the spring.

The Forest Service and the FWS did not address cumulative impacts of other projects planned in the landscape surrounding the EDVL Project, and along the Continental Divide linkage zone for grizzly bears. The EDVL Project, along with the Boulder River Salvage Project, will create 27 miles of new temporary roads, and open additional miles of currently-closed roads for logging. Thus the OMARD will increase in this linkage zone on both sides of the Divide. Both projects will create a combined 13 square miles of clearcuts, which will not only remove shelter for grizzly bears, but will change vegetational conditions. The impact of these activities on the ability of grizzly bears to successfully disperse into and through this Continental Divide landscape is unknown, due to a lack of analysis.

## LEGAL VIOLATIONS

### **Lynx:**

1. The Forest Service and FWS (hereafter 'the agencies') will violate the ESA for failing to complete formal consultation for the EDLV Project to address significant direct and cumulative adverse impacts the Project will have on lynx and lynx habitat.
2. The agencies will violate the ESA due to their failure to use the current best science in their determination that the EDLV Project will have no significant adverse impacts on the lynx habitat; the Project will create a long-term, generally

irretrievable cumulative loss of up to 31% of historic lynx winter habitat (current or recruiting).

3. The agencies will violate the ESA by applying the first-tier BiOp for the NRLMD to the EDVL Project; second-tier formal consultation is required to address site-specific adverse impacts to lynx and/or their habitat.
4. The agencies will violate the ESA by applying the first-tier BiOp for the NRLMD to the EDVL Project; that BiOp failed to address logging impacts on recruitment lynx winter habitat, or habitat fragmentation.
5. The FWS is violating the ESA by failing to reassess their determination in the NRLMD BiOp that the NRLMD will prevent severe (significant) fragmentation in lynx linkage areas in secondary unoccupied habitat, and or that the NRLMD direction will generally maintain lynx habitat quality so these areas can become reoccupied by lynx; the EDLV Project will create 9% additional areas of the landscape as travel barriers for lynx, adding to up to 22% existing barriers within a designated linkage area along the Continental Divide; habitat connectivity will not be maintained; winter habitat will not be maintained as well, as it will be reduced by 31% in the EDLV Project Area; contrary to the FWS claims in their BiOp on the NRLMD, management activities for the EDLV Project may make this secondary unoccupied habitat unsuitable to lynx.
6. The agencies are violating the ESA by failing to use the current best science in their determination that the EDLV Project Area is poor quality lynx habitat, and is currently unoccupied, factors that were used in their determinations that no adverse impacts would result from this project; the current best science demonstrates the project area had a relatively high density of lynx historically; lynx are known to occur immediately adjacent to the project area as per long-term survey efforts, and may occur in the EDLV Project Area as well.
7. The agencies are violating the ESA by failing to apply the current best science in their determination that the EDLV Project will have no significant cumulative adverse impacts on lynx; there was no assessment of the cumulative loss of lynx travel habitat or lynx winter habitat in the general landscape of the Continental Divide where 3 Forest Service vegetation projects are planned, with vegetation treatments on up to 28 square miles of habitat.

### **Grizzly Bear:**

1. The agencies will violate the ESA by failing to enter into formal consultation to address the significant adverse impacts the EDLV Project will have on the threatened grizzly bear.
2. The agencies will violate the ESA by applying a first-tier BiOp for grizzly bears on the BDNF that applied only to roads; that BiOp does not apply to the vegetation treatments proposed in the EDLV Project.

3. The agencies will violate the ESA by relying on an invalid BiOp completed for grizzly bears for the BDNF RFP in regards to temporary roads; that BiOp did not use the current best science to measure grizzly bear habitat quality as affected by new temporary roads, or changes in this quality created by vegetation management projects, for OMARD, TMARD, and security; the RFP BiOp used the entire BDNF instead of BAUs as a basis for road construction; this BiOp did not look at how new temporary road construction would affect OMARD, TMARD and security within site-specific project areas, as the EDLV area; as a result, changes created by vegetation management projects can not be measured or assessed according to that BiOp, which makes it meaningless to measure increased mortality risk and loss of habitat security for grizzly bears in site-specific project areas.
4. The agencies will violate the ESA by relying on an invalid BiOp completed for grizzly bears for the BDNF RFP in regards to permanent roads; that BiOp determined that the OMARD identified for Landscape Areas of the BDNF was an adequate measure of take of grizzly bears, without identifying how this was determined; for the Clark Fork Flint LA where the EDLV Project is planned, the BiOp determined that 1.9 OMARD is suitable for grizzly bears in a key linkage area; the BiOp never identified that this allows up to 119 miles of new permanent road construction in that LA; this level of new permanent road construction is highly unlikely to occur, and thus provides an unlimited allowance of take for grizzly bears.
5. The agencies will violate the ESA by failing to use the current best science in their determinations that the vegetation treatments will not adversely impact the grizzly bear; the severe adverse impacts on big game winter range, as well as reduction of whitebark pine/red squirrel habitat/Clark's nutcracker habitat, will significantly reduce forage resources for grizzly bears in this linkage area.
6. The agencies will violate the ESA by failing to use the current best science in their determinations that there will be no cumulative adverse impacts on grizzly bears in the general landscape of the EDLV Project Area along the Continental Divide linkage zone for grizzly bears; the agencies did not discuss how three vegetation treatments projects that would impact 28 square miles of grizzly bear habitat, and construct up to 67 miles of new temporary roads, would affect dispersal of grizzly bears into and through this key linkage habitat between the NCDE and GYE grizzly bear populations.

## **CONCLUSION**

The ESA is designed to conserve and protect the ecosystem upon which endangered and threatened species depend. 16 U.S.C. Section 1531(b). Section 7 of the ESA requires federal agencies, in consultation with the FWS, to ensure that actions "authorized, funded, or carried out" by the agency are "not likely to

jeopardize the continued existence of any endangered species or threatened species or result in adverse modification” of critical habitat. 16 U.S.C. Section 1536(a)(2). In complying with Section 7 requirements, agencies must use the “best scientific and commercial data available.” 16 U.S.C. Section 1536(a)(2). Section 9 of the ESA prohibits “take” of threatened and endangered species. 16 U.S.C. Section 1538(a)(1)(B). If a proposed action is likely to cause take, the FWS may issue a written statement setting forth the predicted impact to the species, reasonable and prudent measures necessary to minimize take, and terms and conditions for implementing those measures. 16 U.S.C. Section 1536(b)(4); 50 C.F.R. Section 402.14(i).

The agencies’ consultation and environmental analysis for this Project did not apply the best available science regarding the Canada lynx and the grizzly bear and/or was arbitrary and capricious, and thus inadequate under Section 7 of the ESA. The project also will result in unauthorized take under Section 9 of the ESA. Therefore, the agencies have violated their duties under the ESA, 16 U.S.C. Section 1531 *et seq.*, to ensure that their actions do not jeopardize threatened and endangered species, that their actions do not result in unauthorized take of these species of wildlife, and that their actions promote recovery of these species. The agencies actions in this matter represent an unlawful departure from the legally binding mandate to protect and recover imperiled species and their habitats.

If the violations of law described above are not cured within sixty (60) days, AWR and NEC intend to file suit for declaratory and injunctive relief, as well as attorney and expert witness fees and costs. The intent of this action is to require the USDA Forest Service and the FWS to come into full compliance with the ESA requirements.

Sincerely,



Sara Johnson

cc: Loretta Lynch, U.S. Attorney General  
U.S. Department of Justice  
950 Pennsylvania Avenue, NW  
Washington, D.C. 20530-0001

## ATTACHMENTS

The following research papers and/or reports have been attached to this 60 Day Notice because they were not previously cited in NEC/AWR’s objection for the GRLA projects:

- Apps, C., B. McClellan, J. Woods, and M. Proctor. 2004. Estimating grizzly bear distribution and abundance relative to habitat and human influence. *Journal of Wildlife Management* 68:138-152.
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- Schwartz, C., M. Haroldson, and G. White. 2010. Hazards affecting grizzly bear survival in the Greater Yellowstone Ecosystem. *Journal of Wildlife Management* 74:654-667.
- Tyers, D. 2003. Winter ecology of moose on the Northern Yellowstone winter range. Ph.D. Thesis. Montana State University.
- USDA. 2012. Scoping notice for the Boulder River Salvage and Vegetation Management Project, BDNF. April 13, 2012.
- USDA. 2014. Biological Assessment and Decision Notice for the Red Mountain Flume Chessman Reservoir Project (cited portions), Helena National Forest.
- USDA. 2014. Scoping notice for the Tenmile – South Helena Project, Helena National Forest, October 29, 2014.
- USDI. 1995. Biological opinion for the Gallatin National Forest Forest Plan.
- USDI. 2006. Biological opinion on the effects to grizzly bears and bald eagles from the Gallatin National Forest Travel Plan.
- USGS. 2012. Yellowstone Grizzly Bear Investigations: Report of the Interagency Grizzly Bear Study Team.
- Wells, G. 2011. Clarks' nutcracker and whitebark pine: can the birds help the embattled high-country pine survive: Science Findings 130. USDA, Forest Service, Pacific Northwest Research Station.
- Wielgus, R., P. Vernier, and T. Schivatcheva. 2002. Grizzly bear use of open, closed and restricted forestry roads. *Can. J. For. Res.* 32:1597-1606.