APPENDIX I

WILDLIFE

From the lowest elevations to the highest, respectively, habitat types and phases within the following series are well represented: sagebrush/grass ponderosa pine; Douglas fir; lodgepole pine; Englemann spruce; subalpine fir; whitebark pine; and alpine tundra. A variety of riparian habitat types occur at all elevations. Each of these series will be briefly addressed in the following discussions.

Habitat types within the sagebrush/grass series occur extensively in the lowest elevations within the river breaks or corridors of the main stem, South Fork and Middle Fork of the Salmon River, especially on the hotter, drier southerly aspects. These habitat types within the FC–RONRW, are dominated by bluebunch wheatgrass and Idaho fescue communities and/or by mixed sagebrush/bunch grass communities. These communities are also found at higher elevations in the ponderosa pine and Douglas fir series on favorable southerly aspects where they occur as scattered meadows, which are often included in a mountain grassland habitat type. Scattered stands of mountain mahogany/bluebunch wheatgrass occur within areas dominated by this series, especially on extremely rocky, harsh, southerly-exposed slopes at lower elevations within the river canyons. Elk, mule deer, bighorn sheep and mountain goats utilize these habitats extensively during winter and early spring. However, some native ungulate use occurs during all seasons, especially by ewe/lamb bands in the more rocky portions of the canyons. Endemic species associated with these habitat types include vesper and Brewer's sparrows. The native bunch grass communities within this series are currently being invaded by spotted knapweed, a State-classified noxious weed that is capable of essentially replacing the native perennial grasses. Loss or severe degradation of these communities due to knapweed invasion is the single biggest threat to the functional integrity of the FC-RONRW ecosystem.

The ponderosa pine series replaces the extensive sagebrush/bunch grass communities at slightly higher elevations where minimum moisture requirements for pine establishment occur. Ponderosa pine stands thus constitute the lower elevation timberline with ponderosa pine/bluebunch wheatgrass, ponderosa pine/Idaho fescue and ponderosa pine/common snowberry being the most common habitat types present. These habitat types are most prevalent between elevations of approximately 3,500 feet and 5,500 feet within the FC-RONRW. The ponderosa pine/bluebunch wheatgrass habitat type occupies the warmer, drier southerly aspects while ponderosa pine/Idaho fescue occurs on the moister north slopes. Ponderosa pine/common snowberry generally occupies less steep sites such as stream terraces and alluvial fans. These ponderosa pine types also form a major portion of the available big game winter range and supply both forage and some thermal cover during winter weather extremes. The ponderosa pine/bluebunch wheatgrass provides both winter and early spring forage for elk and bighorn sheep and is also used by mountain goats where rock outcrops for escape cover are present. Large ponderosa pine trees provide important bedding sites for all native ungulates, including mule deer. Mule deer make extensive use of this type if species such as sagebrush, bitter brush, and mountain mahogany are also present in the pine communities. Blue grouse prefer these types for nesting and spring/summer foraging. Wildlife use in the ponderosa pine/common snowberry habitat type is very similar to the ponderosa pine/bluebunch wheatgrass type but also often

provides important elk and deer birthing and rearing areas. Black bear use this type heavily for foraging on perennial grasses year-round. Endemic species associated with these pine-dominated communities include the pygmy nuthatch and flammulated owl. These habitat types are also being invaded, in many areas, by knapweed and are currently at great ecological risk. The Douglas fir series occupies the broadest range of environmental conditions of any coniferdominated vegetative communities within the FC-RONRW. Habitat types common within this series range from savannah-like stands of Douglas fir/bluebunch wheatgrass, Douglas fir/Idaho fescue and Douglas fir/pinegrass to very dense mixed stands of Douglas fir and ponderosa pine in the Douglas fir/ninebark habitat type. Ponderosa pine is a common seral species in many of the habitat types within this series (Steele, et al. 1981). Large, essentially pure stands of Douglas fir are present in the Wilderness. The large area dominated by Douglas-fir and the extremely diverse array of wildlife habitats offered by the various vegetative communities within these habitat types makes this series extremely important to many indigenous species of wildlife ranging from wild ungulates to neotropical migratory songbirds. Mule deer and elk make extensive use of this series for winter thermal cover at the lower elevations, summer thermal cover at mid- to higher elevations, hiding cover on both summer and winter ranges, forested forage areas all year and birthing/rearing areas, especially along ecotones where Douglas fir habitats abut nonforested sagebrush/grass habitats. Perennial grasses and forbs in the Douglas fir communities provide extremely important winter forage for bighorn sheep and, if sagebrush, bitterbrush or mountain mahogany are present, mule deer. All native ungulates, plus black bear, forage extensively in all of these types, except Douglas fir/pinegrass, in early spring. Mule deer and elk use the Douglas fir/ninebark communities for year-round cover and for birthing and rearing areas. Douglas fir communities provide vital habitat for a diverse array of small mammals and birds ranging from pine marten to raptors, western tanagers and blue grouse. Blue grouse depend upon the large old Douglas fir trees, especially along ridgetops, for winter forage and shelter. Endemic species associated with this series include ruby-crowned kinglet and northern goshawk.

The subalpine fir series contains many different habitat types and collectively occupies a large acreage at higher elevations within the FC–RONRW. The most common types within this series include subalpine fir/bluejoint, subalpine fir/beargrass and subalpine fir/grouse whortleberry. Douglas fir, lodgepole pine and Englemann spruce are important seral species in all of these habitat types. Large stands of lodgepole pine are perpetuated in this series through stand-replacing wildfires. Upper elevation sites within this series often attain climax conditions and remain in subalpine fir stands for long periods. These stands often grade into whitebark pine at the upper elevational limit of this series. The large, relatively unbroken forested expanses within this series occur primarily at mid-slope to upper-slope, and provide extremely important cover blocks and key summer ranges for elk, moose, black bear and mule deer. Subalpine fir/bluejoint and subalpine fir/grouse whortleberry habitat, types offer forested forage areas as well as summer hiding and thermal cover for big game. Elk and moose make wallows in the wet seeps

that are common in the upper elevations of these types and seral states, particularly in the subalpine fir/bluejoint type, which often provide abundant forage in the form of willows and

sedges. All types within this series provide key rutting or breeding areas for elk and moose. Blue grouse and spruce grouse use this series extensively for summer forage and nesting. However, habitat types such as subalpine fir/beargrass are essentially devoid of big game forage and are only used for cover. Stand-replacing wildfire mosaics provide important foraging areas within this series until canopy closure of regenerating lodgepole pine stands occurs. Species endemic to this series include Franklin's or spruce grouse, great gray and boreal owls.

The whitebark pine series occupies the highest forested areas of the FC–RONRW where it normally constitutes the upper timberline. Habitat types within this series have not been extensively studied but probably include whitebark pine/grouse whortleberry, whitebark pine/elk sedge and whitebark pine/Idaho fescue (Steele, et al.1981). Habitat types within this series generally occupy dry exposed ridgetops and often extend downslope where they merge with subalpine fir communities. Productivity is low and regeneration of such stands is slow to occur after disturbances. Whitebark pine stands provide important summer/early fall habitat for mule deer, bighorn sheep, mountain goats and elk. High summer and fall forage values are present, especially where elk sedge or Idaho fescue occurs, and these stands are used extensively as summer bedding areas to escape heat and insects. Key wintering areas for mountain goats often occur in these habitat types and bighorn also use them for lambing and rearing areas. In the fall, blue grouse uses these communities extensively. Whitebark pine nuts also provide an important late-fall food source for black bear just prior to denning. The only species known to be endemic to these communities is the Clark's nutcracker, which is largely responsible for perpetuation of whitebark pine stands via cone caches.

The Englemann spruce series is poorly represented within the FC–RONRW. The three habitat types within this series that do occur are: Englemann spruce/sweet scented bedstraw; Englemann spruce/soft leaved sedge and Engelmann spruce/common horsetail. These types are present as incidental habitat types and only occupy small, scattered acreages within the FC–RONRW. Engelmann spruce stands are usually found on moist, cool slopes associated with seeps, especially on higher elevation north slopes, and along streams, alluvial terraces or bottomlands. Though present in limited amounts, these moist, cool sites provide important summer thermal cover and bedding areas for deer, elk, moose, and black bear. In addition, bull elk generally uses these sites very heavily during summer and fall as wallow/rutting areas. Dense spruce stands along streams also provide important denning habitat for pine marten and nesting habitat for birds such as the hermit thrush and Swainson's thrush.

Non-forested alpine plant communities have not been systematically described in central Idaho, including the FC–RONRW. Although alpine grass/forb and shrub communities do not occupy a large part of the Wilderness, these plant associations are very important to many species of wildlife. These low-production communities are dominated by shrubs such as mountain heathers and Labrador tea, grasses such as Scribner's wheatgrass, fescues, alpine timothy and various sedges, rushes and forbs, especially in the small wet areas that occur down-slope from semi-permanent snowbanks. Mountain goats and bighorn sheep uses alpine habitat types extensively during summer months and, to a lesser degree, by summering elk and mule deer. These sites

also constitute very important denning and foraging habitat for pika, marmots and wolverine when interspersed with rock outcrops, talus and scree slopes. Endemic bird species found in alpine habitats during nesting season include water pipits and rosy finches.

Riparian community types that occur within the FC-RONRW include those dominated by coniferous trees, deciduous trees, shrubs and herbaceous vegetation (Youngblood, et al. 1985). Riparian areas within all types provide key wildlife habitats for many different species ranging from nesting neotropical migratory songbirds to elk cow/calf summering bands. These community types provide important elements of structural diversity, especially when interspersed within large areas dominated by habitat types such as lodgepole pine/grouse whortleberry or Douglas-fir/pine grass, thus greatly increasing available niches for many species. Although the land area is estimated to be less than 10 percent, the ecological importance of such areas cannot be overstated. At mid-to high elevation, Englemann spruce and subalpine fir form the tree canopy in the conifer-dominated riparian communities. These types provide nesting and foraging habitats for birds such as mountain chickadees, ruby-crowned kinglets, yellow-rumped warblers and pine siskin. Bull moose and bull elk use these areas extensively during late summer and early fall. Pine marten find excellent foraging and denning sites in these types during all seasons. At lower elevations, these communities often contain aspen and/or cottonwood as co-dominants (Padgett, et al. 1989). These species along with dense shrub layers consisting of v species such as willow and red-osier dogwood provide even greater habitat diversity for small birds and mammals. In addition, browse provided by such shrubs is often critically important to wintering elk, moose and deer during periods of deep snow and extremely cold temperatures. At mid- to lower elevations, lodgepole pine, Douglas fir and/or ponderosa pine also occur in riparian communities. Wildlife uses of these communities are similar but species shifts occur in the bird and small mammals inhabiting them. Beaver are endemic to these riparian communities and some shrub-dominated types. Lewis' woodpeckers utilize the lower elevation communities where cottonwoods dominate.

Both willow and non-willow shrub-dominated riparian communities occur at all elevations in the FC–RONRW. These types provide extremely important vertical structural diversity and thus a broad array of habitats for many avian species such as yellow warblers and small mammals such as snowshoe hare and mink. Browse for big game species such as elk, mule deer, moose and white-tailed deer is abundant in these shrub communities and the dense thickets are also commonly used by all four species for rearing young.

Riparian communities dominated by herbaceous plants including grasses, forbs and grass-like species (i.e., sedges and rushes) occur throughout the Wilderness. These communities represent a broad environmental spectrum ranging from ponded or perennially saturated sites to sites that are only wet seasonally (Padgett, et al.1989). Wildlife uses range from seasonally important habitat components such as providing lush forage for lactating cow elk to season-long habitats for amphibians and reptiles such as spotted frogs and long-toed salamanders. Birds such as great blue herons, common snipe, savannah sparrows and sandhill cranes utilize these types for

foraging and/or nesting. Small mammals, including the northern water shrew, occur in these riparian communities.

The FC–RONRW is both large enough and diverse enough to provide all habitat requirements for most of the indigenous animal species. Exceptions include species that are, by nature, migratory such as neotropical migratory songbirds and waterfowl. Portions of all available habitats may be directly and/or indirectly affected by this proposed management plan since it covers the entire FC–RONRW. Effects will be most pronounced at portals such as trailheads and airstrips, along access corridors including the Middle Fork and the main stem of the Salmon River, and near administration sites and designated special use campsites, all places where humans congregate. Effects will be almost non-existent in the vast majority of the Wilderness where humans seldom visit.

Federally Listed Species

The U.S. Fish and Wildlife Service has identified two mammals (Canada lynx and gray wolf) and one bird species (bald eagle) that are currently listed as Threatened or Endangered that could potentially occur on the Salmon-Challis National Forest portion of the FC–RONRW. The current species list, Number 1-4-03-SP-629, dated May 30, 2003, does not include any listed plant species or proposed species of flora or fauna. However, it does include one candidate species that is not known to nest in central Idaho or the FC–RONRW, the yellow-billed cuckoo. This candidate species will not be addressed further in this assessment. Although the grizzly bear is currently still included on the MIS list for the Nez Perce National Forest, it no longer appears on the 90-Day Species List Updates for that forest and will not be discussed further in this report. No additional listed species are included on applicable Species Lists for other administrative units in the wilderness.

Canada Lynx-On July 8, 1998, the USFWS published a proposed rule to list the Canada lynx as a threatened species under the Endangered Species Act of 1973, as amended. The normal 12 month rule-making process was extended for an additional six months to allow for consideration of new scientific information and additional public comments on the proposed rule. An interagency lynx coordination effort that included the USFWS, US Forest Service (FS), Bureau of Land Management (BLM), and the National Park Service (NPS) participated in the publication of lynx conservation documents. Three products produced by the interagency team that are important to the conservation of lynx on federally managed lands include:

- The Scientific Basis for Lynx Conservation (Ruggiero, et al. 2000);
- The Lynx Conservation Assessment and Strategy (LCAS) (Ruediger, et al. 2000); and
- The Lynx Conservation Agreement (CA) (USDA Forest Service 2000).

The Canada lynx was classified as Threatened in Idaho on March 24, 2000, and is currently protected under the Endangered Species Act. A recovery plan for the Canada lynx has not yet been completed.

The Forests identified and mapped lynx analysis units (LAU), based on general guidance provided in the Lynx Conservation Assessment and Strategy (Ruediger, et al. 2000), across suitable habitats in both wilderness and non-wilderness areas. LAU boundaries are primarily based on HUC6 watershed boundaries and are generally larger than 10,000 acres. The Wilderness (project) area contains approximately one million acres of potentially suitable habitat for lynx. The acres mapped as suitable lynx habitat in the Wilderness include all riparian, deciduous and conifer potential vegetation types, except ponderosa pine, dry Douglas fir and whitebark pine.

There are very few authenticated records of lynx in central Idaho where a photograph, skull or pelt and a specific location are documented. Probably less than 15 to 20 authenticated accounts of lynx in the FC–RONRW and contiguous areas have been documented in the past 20 to 30 years. The Idaho Conservation Data Center has 215 records of lynx observations in Idaho from 1874 to1998, some well documented while others are simply reports of track and/or animal observations. The limited amount of verified observations and harvest records does not provide sufficient data for a determination of population trends, historic or current. It is recognized in the literature (Ruediger, et al. 2000) that the number of lynx in the contiguous United States is low. Several research studies involving radio collared lynx in Montana, Wyoming and Colorado are currently in progress and will hopefully help answer some of the many questions concerning this species near the southern limits of its range.

Gray wolf- Gray wolves were considered eradicated from most western states, including Idaho, by the mid-1900 and were listed as an Endangered species in the lower 48 states in 1973. The United States Fish and Wildlife Service (USFWS) is currently measuring wolf recovery in the Rocky Mountains on a "recovery area" basis. Three recovery areas have been identified: Central Idaho, Northwest Montana, and the Greater Yellowstone Area. The Recovery Plan population target (or primary objective) is to secure and maintain at least 30 breeding pairs of wolves, dispersed over three recovery areas, with a minimum of 10 breeding pairs maintained in each of the three recovery areas, for a minimum of 3 successive years (USFWS 1987). The wolf may be reclassified to "Threatened" status over its entire range when at least 20 breeding pairs are secured and maintained, with a minimum of 10 breeding pairs in each of two recovery areas, for 3 successive years. Individual recovery areas may have their wolf status reclassified to "Threatened" when a minimum of 10 breeding pairs are secured and maintained in that recovery areas may have their wolf status reclassified to "Threatened" when a minimum of 10 breeding pairs are secured and maintained in that recovery areas may have their wolf status reclassified to "Threatened" when a minimum of 10 breeding pairs are secured and maintained in that recovery areas may have their wolf status reclassified to "Threatened" when a minimum of 10 breeding pairs are secured and maintained in that recovery areas for a minimum of 3 successive years.

Wolves began to re-colonize northern areas of some western states in the 1980's. During that time, occasional reports of individuals were noted in Idaho but no pack activity or known reproduction was reported. In 1994 after an EIS was prepared by the USFWS, a decision was published by the Secretary of Interior to reintroduce wolves into Yellowstone National Park and

Central Idaho as a "nonessential experimental population". The Nez Perce Tribal Wolf Recovery and Management Plan for Idaho permits the Tribe to act as lead agency responsible for the recovery and management of wolves in this state.

Idaho contains portions of three wolf recovery areas that each has a slightly different management strategy because of different endangered species status of wolves in those areas. The Salmon National Forest is one of eight National Forests that form the core of the Central Idaho Experimental Management Area (CIEMA), which is managed by the Nez Perce Tribe. CIEMA takes in all of Idaho located south of I-90 and that portion of Montana that is also south of I-90 and west of I-15. The FC–RONRW (project area) is wholly located within CIEMA. Wolves in this area are currently still managed as a "nonessential experimental population" (USFWS 1987).

A total of 35 wolves, 15 in January 1995 and 20 in January 1996, were released into the FC– RONRW in the heart of the CIEMA, as identified in the Northern Rocky Mountain Wolf Recovery Plan (USFWS 1987). These wolves were released in concert with the FEIS for the Reintroduction of Gray Wolves to Yellowstone National Park and Central Idaho (USFWS 1994) and are thus considered to be part of the nonessential experimental population.

Bald Eagle - The bald eagle was federally listed "Endangered" in 1978 and reclassified in Idaho to "Threatened" in 1995. Known bald eagle populations increased very soon after the species was listed due probably to the initiation of intensive nesting surveys. The Fish and Wildlife service began the process to de-list the bald eagle in 1998 with the expectation that the agency would declare the species fully recovered by July 2000. However, the bald eagle currently remains listed as a threatened species due to concerns about future threats to source habitats once the species is taken off the list. In Idaho, bald eagle breeding population trends increased steadily from the time records were initiated (following listing) until 2001 when they appeared to stabilize (Sallabanks 2002). There are no documented active or historic nests within the FC–RONRW and no historic records for the Salmon River or its tributaries are noted in Birds of Idaho (Burleigh 1972). The nearest two currently active nests are located on the Salmon River approximately 30 to 40 airline miles East of the wilderness boundary.

The recovery goals established in the Pacific Bald Eagle Recovery Plan (USFWS 1986) are:

• A minimum of 800 pairs nesting in the seven state recovery area

• An annual average of 1.0 fledged young per pair, with average success rate per occupied site of not less than 65 percent over a 5-year period.

• Meeting the recovery goals within at least 80 percent of the management zones with nesting potential.

No evidence of persistent, long-term decline in any sizeable wintering aggregation. Since 1979, the number of bald eagle nesting territories, known to be occupied, in Idaho has risen steadily from 11 to 113 with 19 of those occurring in the central portion of the State but outside the Wilderness (Sallabanks 2002). During this same time period, the number of wintering bald eagles in Idaho has risen from 404 to 862 while the number in the Salmon River portion of central Idaho has risen from 17 to approximately 100. The actual number of wintering eagles in this area probably exceeds the annual count because much of the FC–RONRW is not surveyed due to logistic problems during winter months.

Source Habitat Families for Federally Listed Species

The following sections contain discussions of the affected environment and environmental consequences, together by source habitat family, for each listed species. Each family discussion includes a description of species population and habitat trends in the affected environment section followed by discussion of effects and determinations in the environmental consequences section.

Family 3 Forest Mosaic Family- Canada Lynx

Analysis Area

Selected analysis area for the lynx is the entire FC–RONRW, which has been, subdivided into individual lynx analysis units (LAU's).

Affected Environment

Species in Family 3 are habitat generalists and use all structural stages of a variety of different habitats in the lower-montane, montane, subalpine and riparian woodlands. Special habitat features include downed logs that are used for denning sites (Wisdom, et al. 2000).

The FC–RONRW, situated in central Idaho and extending some 60 miles from east to west and 80 miles from south to north, is within the historical range of Canada lynx in the western contiguous United States (Lewis and Wenger 1998). This large block of undeveloped land encompasses virtually all of the Middle Fork of the Salmon River, watershed and approximately 50 miles of the Salmon River and its tributaries. This wilderness adjoins the Gospel Hump Wilderness to the west and the Selway-Bitterroot Wilderness to the north and is thus connected via unbroken mountainous terrain with boreal forests in Canada. Landscape connectivity provided by such extensive blocks of continuous habitat go beyond the function of allowing daily and seasonal movements between home range segments. In a fragmented habitat matrix such as this, such blocks may provide key connectivity between subpopulations in large habitat patches, functioning as landscape linkages and dispersal corridors (Harris 1984).

Lodgepole pine and Douglas fir that transition to spruce and subalpine fir, and other moist vegetation types that support a dense understory characterize lynx habitat within the project area. Lynx habitat mapped within the Wilderness area totals nearly one million acres. Aspen, snowberry, serviceberry, and chokecherry, and dense stands of young conifer provide important habitat for snowshoe hare, the primary prey species for lynx. Mature closed canopy forests provide habitat for the red squirrel an important alternate prey species for lynx. Riparian

habitats, willow, cottonwood and other streamside vegetation provide important travel corridors for lynx.

The Wilderness, by definition, is unroaded. However, several "cherry stem" access roads, though technically outside the Wilderness boundary, do exist in lynx habitat. The only other motorized intrusions within the project area are jet boats that operate on the main Salmon River and aircraft, which utilize the various public and private landing strips within the Wilderness. Summer/fall recreational activities in lynx habitat within the Wilderness include back packing and horseback trips, fishing and hunting. Outfitted and guided hunting and fishing trips are also popular activities throughout the Wilderness. Virtually all of the water-based recreation, both floating and jet boating, occurs outside mapped lynx habitat. A low level of administrative presence, including activities such as trail maintenance, also occurs within lynx habitat. Winter activities in lynx habitat within the Wilderness include very light levels of dispersed recreation in the form of cross-country skiing, snowshoeing, trapping and hunting. Several outfitters and guides conduct mountain lion and bobcat hunts during the winter season. However, human presence in lynx habitat within the Wilderness during winter months is extremely uncommon.

Based upon the presence of apparently suitable habitat and occasional reports of tracks, lynx are assumed to be present within the FC–RONRW. However, no verified reports (i.e. skins, skulls, photos or hair from hair snare transects) have been documented in the past decade and there is no evidence of reproductive activity. Although many populations in Alaska and Canada are fairly well studied and considered stable, very little is known about this species in the western states, including Idaho where no research has occurred to date.

Family 5 Forest and Range Mosaic Family- Gray Wolf

Analysis area

The Central Idaho Experimental Management Area (CIEMA), which encompasses the FC–RONRW, is used for this analysis of gray wolf populations (USFWS 1995).

Affected Environment

Source habitats for species in Family 5 include a very broad range of forests, woodlands and rangelands, including all terrestrial community groups except exotics and agricultural. Freedom from human disturbance is a primary factor affecting most species within this family.

The FC–RONRW is within the original or historic range of the gray wolf, which was found throughout Idaho (Young and Goldman 1944). The historical distribution of wolves in Idaho was well researched by Kaminski and Hansen (1984) and will not be repeated in this document. Wolves were apparently quite abundant in the central Idaho area until the early 1900's (Smith 1970) and were occasionally observed and/or killed until about 1940 (Young and Goldman 1944). From then until the early 1970's, reported wolf observations in the Wilderness were infrequent (Becker 1980) but were consistently received, especially from the Bear Valley and Chamberlain Basin areas (Kaminski and Hansen 1984). However, from the 1970's until the

recent reintroduction, wolves were more frequently reported, both in and surrounding the FC–RONRW, and in the late 1980's a female wolf was killed in Bear Valley Creek in the southern portion of the FC–RONRW.

During the winter of 1983, big game winter ranges within the Wilderness were intensively surveyed for signs of wolf activity. Wolf tracks were observed in the Big Creek drainage, just south of Chamberlin Basin. Details of this study are presented in Progress Report #2, 29 January -1 July (Kaminski 1983). Wolf activity within the FC–RONRW was also assessed via questionnaire returns from outfitters and other users and the results of this study are discussed in Kaminski and Hansen (1984). The questionnaire results generally agreed with the ground and air surveys in both locations of wolf activity and numbers present. Key components of wolf habitat include: abundant, year-round wild prey, suitable denning and rendezvous sites, and large areas with a low level of human activity. The majority of the FC-RONRW, at least seasonally, meets these criteria but key areas that best meet all criteria include Chamberlain Basin, the South Fork of the Salmon River, upper Middle Fork of the Salmon River, including major tributaries such as Camas Creek and Loon Creek, the Seafoam area and Big Creek, including Monumental Creek, and the Bear Valley-Warm Lake area. These areas are discussed more fully in Kaminski and Hansen (1984).

Presence of the Selway-Bitterroot Wilderness, immediately adjacent to the north, adds to the suitability of the FC–RONRW for occupancy by wolves. These large undeveloped areas are directly connected along the Idaho/Montana border by a relatively unbroken forested corridor that joins occupied wolf habitat in Canada. The extremely rough topography that characterizes the canyon winter ranges for elk and deer within the Wilderness may somewhat affect the hunting efficiency of wolves, a coursing predator. However, the abundance of available prey probably more than compensates for any such loss. Habitat quality, prey availability, prey consumption, etc., are fully discussed in Kaminski and Hansen (1984) and in the FEIS for the Reintroduction of Gray Wolves to Yellowstone National Park and Central Idaho (USFWS 1994).

Since the reintroduction of the 35 wolves from Canada, those wolves and their offspring have now successfully reproduced and spread throughout both the FC–RONRW and the CEIMA. There are currently 17 established packs and an estimated 260 to 300 wolves in the CIEMA. This gray wolf population has increased to the point where recovery goals have been met and the trend is expected to continue upward. This nonessential experimental population is now eligible for de-listing and/or management under a state wolf management plan.

Habitat Conditions

The gray wolf uses all of the structural stages in the montane, lower montane and subalpine community types. Special habitat features include riparian, woodlands, shrublands, and herblands that provide forage for large ungulate prey species. Wolves require an adequate supply of vulnerable prey, ideally in an area with a low risk of human-induced mortality. Both of these conditions exist throughout the FC–RONRW as evidenced by the successful and rapid colonization of this reintroduced species.

The wolf is a predator primarily of large, wild ungulates. This prey is generally depended upon for food year-round. In the FC–RONRW, the principal prey species are elk, mule deer, whitetail deer, moose and bighorn sheep, roughly in order of importance. Smaller mammals such as beaver, marmots, ground squirrels, snowshoe hare, pocket gophers, and voles can be important alternative prey in snow free months. As a result of recent large wildfires within the Wilderness, summer and winter range habitat for the major wolf prey species is probably adequate to maintain near historical population levels of these species for the foreseeable future.

The primary threat to the quality of habitat this large block of Wilderness provides for large wild ungulates and their predators, including gray wolves, is noxious weed invasion and the subsequent loss of native herbaceous forage. Active weed suppression and prevention activities will continue under the Selected Alternative.

Family 7Forest, Woodland, and Sagebrush Family- Bald EagleAnalysis Area

The FC-RONRW is selected as the analysis area for the Bald eagle.

Affected Environment

All species in this Family use a mosaic of forest, woodland, and sagebrush vegetation types and structural stages as their source habitat (Wisdom, et al. 2000). Several of the species in this group have canyons, cliffs or caves as a special requirement for roosting or nesting; and most require proximity to water to meet habitat needs. The bald eagle uses waterways for hunting fish, their primary prey. Special nesting and roosting requirements that depend on cliffs and crevices have probably not changed much from historic conditions.

Habitat Conditions

The FC–RONRW is thought to be within the historical nesting and wintering range for bald eagles in Idaho. Although bald eagles still utilize portions of the Wilderness, including the Middle Fork and main stem of the Salmon River, for migration stops and wintering habitat, none are presently known to nest there. In fact, there are apparently no historical records of bald eagles nesting within the portion of central Idaho that is now designated as the FC–RONRW. However, this species is occasionally observed on the lower Salmon River above the mouth of the South Fork during the nesting season, and is known to nest in the main Salmon River corridor approximately 40 miles upstream from the Wilderness boundary. Consequently, it is possible (though unlikely given the high number of recreationists who use the river corridors each summer and the lack of reported observations) that a nest is present but undetected within the FC–RONRW.

The three primary types of habitat necessary to support a population of this species are: nesting, foraging (hunting) and wintering/migration. Preferred nesting habitat is generally the largest or

most prominent tree available, especially if the top is deformed (Robbards and King 1966). Nest trees are generally in close proximity to water and nests are often used for many years. Freedom from human disturbance during the nesting period is thought to be a critical or limiting factor as such disturbance has been known to cause nest abandonment and/or cessation of nesting (Snow 1973). Preferred foraging or hunting habitat primarily consists of streams and lakes with adequate fish populations. Such habitat must be in close proximity to the nest site during nesting and rearing. Wintering and migration habitat must include open (i.e., ice-free) water with adequate available fish prey; however, carrion from big game winterkills or predator kills is often utilized extensively. The large numbers of wintering elk and deer within the FC-RONRW, especially along the Middle Fork and main stem of the Salmon River, undoubtedly contribute to wintering eagle habitat suitability during times when extreme cold limits the amount of open water. Relatively recent declines in anadromous fisheries in the Salmon River and all tributaries have probably reduced the quality of foraging habitat for nesting and wintering eagles and may be one of the reasons for lack of known nesting pairs. However, the high level of recreation river traffic and thus human disturbance during the nesting or brood rearing season may also be a contributing factor. Over 10,000 people float the Middle Fork each summer and the main river hosts an additional 7,000 floaters along with heavy jet boat traffic. The decisions made in the current management plan would not affect the current levels of bald eagle use within the wilderness.

Sensitive Species

Sensitive wildlife species are those wildlife species, identified by the Regional Foresters, for which population viability is a concern. This is evidenced by significant current or predicted downward trends in population numbers or density, or a significant current or predicted downward trend in habitat capability, that would reduce a species existing distribution.

The objectives of management for sensitive species are to ensure their continued viability throughout the range on National Forest lands, and to ensure that they do not become threatened or endangered because of Forest Service actions (FSM 2670.22).

There are 13 terrestrial vertebrate species currently on the R4 and R1 Regional Forester's Sensitive Species List for the various forests in this Region that make up the FC–RONRW and that are known or thought to occur within the Wilderness. In addition to those species, the R1 Regional Forester's Sensitive Species List includes three other species (black-backed woodpecker, white-headed woodpecker and boreal toad) that occur or potentially may occur in portions of the Wilderness. All terrestrial sensitive species known to occur within the entire Wilderness have been included for analysis and will also be discussed in the Biological Evaluation for this proposal. Table 3.9 displays those terrestrial vertebrate species on the composite sensitive species list for the FC–RONRW and will be discussed in conjunction with MIS in this report, unless otherwise noted: