

Public Comments Processing  
Attn. Docket No. FWS-HQ-ES-2018-0097  
US Fish & Wildlife Service Headquarters  
MS: BPHC  
5275 Leesburg Pike  
Falls Church, VA 22041-3803

July 15, 2019

**Re: Minnesota Department of Natural Resources Comments on the U.S. Fish and Wildlife Service's Proposed Rule "Removing the Gray Wolf (*Canis lupus*) From the List of Endangered and Threatened Wildlife", 84 Fed. Reg. 9648 ((March 15, 2019) (to be codified at 50 CR 117)).**

To Whom it May Concern:

The Minnesota Department of Natural Resources (DNR) submits the following comments to the U.S. Fish and Wildlife Service (USFWS) regarding its Proposed Rule "Removing the Gray Wolf (*Canis lupus*) From the List of Endangered and Threatened Wildlife" (Proposed Rule). The primary focus of the Minnesota DNR's comments is on the Minnesota Gray Wolf (wolf or gray wolf) population in relationship to the Proposed Rule. While focusing the bulk of our comments on the recovery of Minnesota's wolf population, the Minnesota DNR recognizes that a blanket delisting across the United States may not be warranted. DNR further recognizes that there are important systemic questions about delisting under the Endangered Species Act (ESA) raised by the USFWS's recent proposal. These broader questions are also discussed below.

At the outset, the Minnesota DNR acknowledges that the recovery of the gray wolf in Minnesota has been a resounding success. In 1978, when the gray wolf was reclassified in Minnesota from endangered to threatened, there were approximately 1,000 gray wolves located in the lower 48 states and these were all located in the tip of the Minnesota Arrowhead Region and on Isle Royale in Lake Superior. 84 Fed. Reg. at 9655. As further outlined below, the Minnesota gray wolf population is currently estimated at 2,655, far in exceedance of its recovery goal of 1,251 -1,400.<sup>1</sup> Furthermore, gray wolves in Minnesota are currently occupying all of their suitable range.<sup>2</sup>

Today, of the estimated 6,000 gray wolves in the lower 48 states, nearly one-half are in Minnesota. As the Proposed Rule sets forth, Minnesota has been the foundation for wolf

---

<sup>1</sup> Although the precise number of wolves located in Minnesota pre-settlement is unknown, the wolf population in Minnesota pre-settlement is estimated to have ranged from 4,000 to 8,000. 84 Fed. Reg. at 9655.

<sup>2</sup> For a discussion of what constitutes suitable range for gray wolves in Minnesota *see* Minnesota DNR comments at page 4.

recovery in the lower 48 states. The Minnesota DNR is committed to the long-term conservation of wolves. Consistent with the state's wildlife trust obligations, should the gray wolf be delisted in Minnesota, the DNR will manage the species for its long-term sustainability and for the benefit of both present and future generations of Minnesotans.

### **Minnesota's Gray Wolf Population is Recovered and No Longer Threatened in Minnesota**

After passage of the ESA, Minnesota served as the foundation for wolf recovery efforts in the United States. The 1978 Eastern Timber Wolf Recovery Plan (1978 Recovery Plan)<sup>3</sup> set forth wolf management zones for Minnesota, the need for reestablishment of wolves outside of Minnesota, and reclassification of wolves in Minnesota (Bailey 1978). In the 1978 Recovery Plan, the Eastern Timber Wolf Recovery Team (Recovery Team) recognized that the Minnesota wolf population represented a viable wolf population that should be expanded.

The 1992 Wolf Recovery Plan for the Eastern Timber Wolf (1992 Recovery Plan) stated that the primary objective of recovery is "to maintain and reestablish viable populations of the eastern timber wolf in as much of its former range as is feasible." (USFWS 1992). The 1992 Recovery plan identified two criteria against which to measure recovery:

1. The survival of the wolf in Minnesota is assured.
2. At least one viable population outside of Minnesota and Isle Royale in the contiguous 48 states is reestablished.

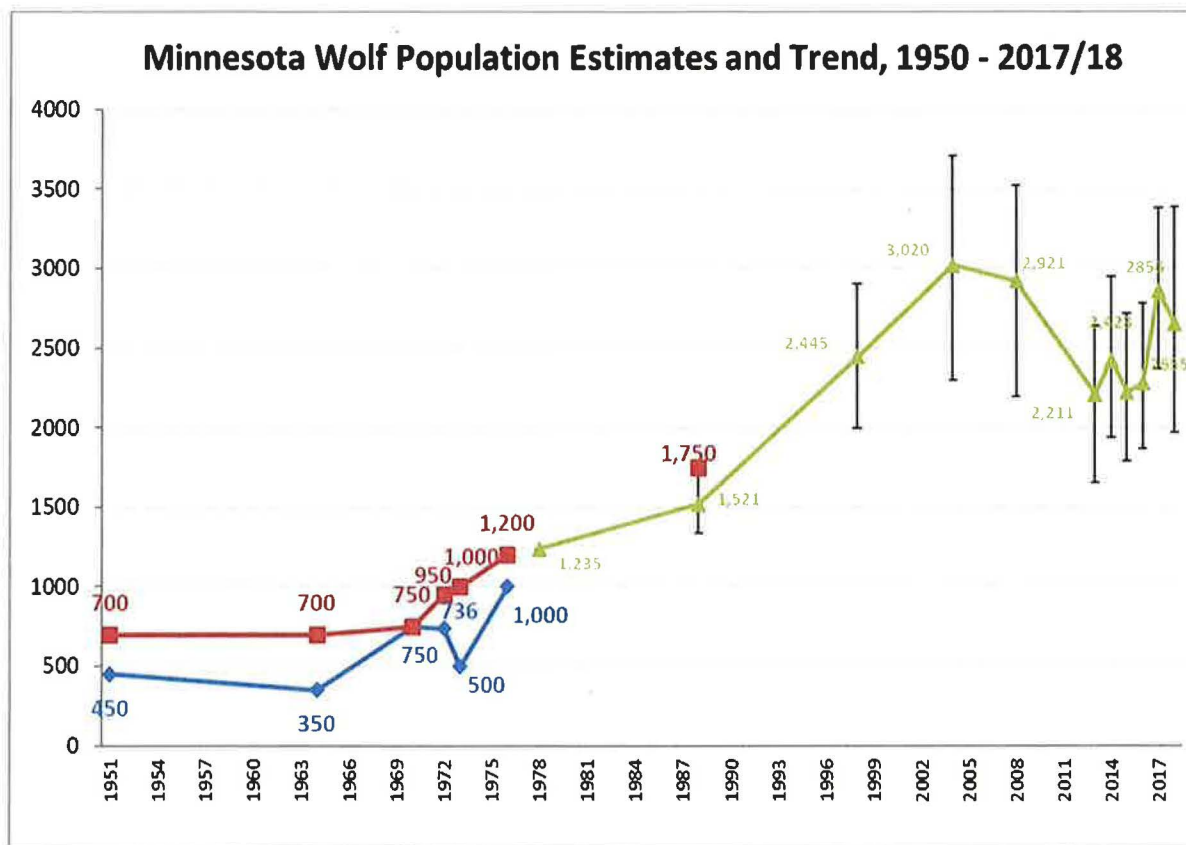
Determining whether the "first criterion" has been met requires ongoing monitoring of the Minnesota gray wolf population.

Efforts to delineate wolf distribution in Minnesota and enumerate populations have been made at various times over the last 70 years. (Berg and Kuehn 1982, Fuller 1992, Berg and Benson 1998, Erb and Benson 2004, Erb 2008, Erb and Sampson 2013, Erb et al. 2018). Survey results are corroborated by additional data from annual scent station survey, winter track survey, and number of verified depredations.

Since the late 1970s, the Minnesota DNR has monitored its statewide wolf population using an approach that combines several sources of data. DNR wolf surveys in Minnesota initially took place at ten-year intervals (1978-79, 1988-89, 1997-98), then transitioned to more frequent surveys (2003-04, 2007-08, 2012-13). The Minnesota DNR has conducted annual gray wolf population estimates since 2012-13. The most recent Minnesota DNR wolf survey in 2017-18 estimated the state's wolf at 2,655, with a 90% confidence interval of 1,972 to 3,387. (Erb et al. 2018.) As illustrated in Figure 1, data on Minnesota's wolf population, including historic data and survey results since 1950, show an increase in the Minnesota wolf population commencing in approximately 1963. Since 1998, there has been no statistically significant change in Minnesota's wolf population.

---

<sup>3</sup> The Recovery Plan refers to the Great Lakes gray wolf population as the Eastern Timber Wolf. For purposes of this document, the Eastern Timber Wolf is referenced as the gray wolf, as it is in the Proposed Rule.



**Figure 1.** Minnesota wolf population estimates and extrapolated trends based on periodic surveys, 1950 to 2018. Prior to 1978, estimates were derived from variable approaches and often included a low estimate (blue line) and high estimate (red line) based on different methods or assumptions. Starting in 1978 (green line), survey methods were standardized and beginning in 1988, formal 90% confidence intervals (shown as vertical black error bars) were calculated from this single survey approach. A separate population estimate using a different method was also calculated in 1989 (shown in red).

The current Minnesota gray wolf population far exceeds the Recovery Plan population goal of 1,251-1,400 (1978 Recovery Plan; 1992 Recovery Plan; Minnesota DNR 2001). In fact, the population has not dropped below 1,200 since the late 1970s. As determined in 1978, when the gray wolf was downlisted to threatened, the Minnesota gray wolf was not in danger of extinction throughout all or a significant portion of its range in Minnesota. 43 Fed. Reg. 9607 (March 9, 1978). Recent and current wolf population estimates indicate that wolves currently occupy all of the areas in Minnesota that are likely to sustain wolves. Today, the gray wolf range and population expansion in Minnesota shows wolves are no longer threatened or likely to become endangered on suitable range in Minnesota.

The Minnesota wolf population has recolonized portions of Wisconsin and Michigan, resulting in a regional population of over 4,200 wolves. The most recent wolf population estimates



for Michigan and Wisconsin are 662 and 905, respectively (USFWS 2018, <https://dnr.wi.gov/topic/Wildlifehabitat/wolf/documents/2017-18wolfcountbrief.pdf>).

As noted in the proposed Federal Rule, when assessing whether the wolf should be delisted, the ESA directs that the USFWS consider whether the wolf is still threatened or endangered across a significant portion of its range as a result to the five listing factors that caused it to be listed. 16 U.S.C. 1533. Loss of suitable associated habitat and human-caused mortality were the primary listing criteria that led to wolf decline and its eventual listing both in Minnesota and across the United States. 84 Fed. Reg. at 9659- 9664. Neither of those factors continue to have a significant impact on Minnesota's gray wolf population.

The primary listing factor that led to listing was range. 84 Fed. Reg. at 9662 – 9665. Gray wolves are occupying all suitable habitat within their range in Minnesota. Wolf survey results show a geographically and numerically expanding population until the 1997-98 survey. Since 1998, there has been little geographic expansion of gray wolf range in Minnesota. (Erb et al. 2018). Suitable habitat within wolf range in Minnesota is dependent upon prey density, primarily white-tailed deer populations. White-tailed deer are abundant across Minnesota; however, lower densities exist in the farmland region. Other important variables in predicting suitable wolf habitat are low road density and areas that have low agriculture use (Mladenoff 2009). DNR wolf survey results are very consistent with predictions of habitat mapping from this study showing that wolves tend to form viable packs in geographic areas with high prey density, low road density, and with low agricultural land use. Minnesota's assessment of suitable wolf habitat indicates that further wolf range expansion in Minnesota is unlikely because gray wolves currently occupy all of their suitable habitat in the state

A second factor leading to listing in the lower 48 was human-caused mortality, particularly human "persecution". Human persecution was evidenced by wolf bounties and negative human attitudes towards wolves. 84 Fed. Reg. at 9659 - 9662 and 48 Fed. R. 36256 (Aug. 10, 1983). Minnesota eliminated its wolf bounty program in 1965 and began regulation of the species as a protected species, which included prohibiting the taking of wolves. Regardless of their federal status, wolves will continue to be treated as a "protected wild animal" managed by state law. *See, e.g.,* Minn. Stat. § 97B.645 et seq.

Shortly after ESA listing of the gray wolf, the Minnesota DNR began an effort to better understand the attitudes of Minnesotans towards wolves. The Minnesota DNR recognizes that individuals value wolves differently, that the non-hunting public likely have different attitudes towards gray wolves than do hunters and trappers, and that Minnesotans' attitudes have evolved. The attitude of the general public towards wolves is less well understood than that of hunters and trappers, however, as part of the Wolf Planning process Minnesota will be evaluating general public attitudes toward wolves.

The attitudes of hunters and trappers towards wolves have are better understood and appear to be, in part, related to their perception of gray wolves' impact on deer populations, as evidenced by early public hearings during the development of the state's wolf management plan. Additionally, Kellert (1985) found that one-third of hunters and trappers in Minnesota said they might shoot a wolf if they encountered one while deer hunting. However, appreciation for wolves

appears to have increased from 1985 to 1999 (Kellert 1999). More recently, Minnesota wolf hunters and trappers indicated generally positive attitudes towards wolves. (Schroeder et al. 2018).

These nuanced and evolving human attitudes towards wolves make wolf management complex and often controversial. Minnesotans interested in wolf management have a diversity of, and often-diverging viewpoints. The Minnesota DNR continues to collect social science information using accepted methodologies to understand attitudes towards gray wolves across the state to help inform potential management actions.

In sum, all evidence indicates that the gray wolf population in Minnesota has recovered and that the listing factors that led to its listing in Minnesota have been addressed.

### **Minnesota's Past and Ongoing Commitment to Sustainable Wolf Management**

The State of Minnesota has adequate regulatory mechanisms in place to assure that recovery of the gray wolf in Minnesota will be maintained. The Minnesota DNR is committed to supporting a sustainable wolf population over time in a manner consistent with its wildlife trust obligations. This includes our commitment to assure that adequate habitat and prey populations exist within suitable Minnesota wolf range.

In 1965, prior to listing, the Minnesota legislature eliminated Minnesota's wolf bounty. This resulted in some expansion of the Minnesota wolf population.

In 1998, in anticipation of a federal wolf delisting, the DNR began development of a wolf management plan. In developing that plan, the Minnesota DNR went through a lengthy public input process. This process included a number of public information meetings and the creation of a wolf management roundtable to develop recommendations regarding Minnesota's management plan.<sup>4</sup>

While the DNR was in the process of developing a wolf management plan, the Minnesota legislature, in 2000, passed the Wolf Management Act (Act). *See* Minn. Stat. §§ 97B.645- 48. Minnesota Statute section 97B.646 specifically requires the DNR to adopt a wolf management plan that includes, among other factors, the goal of ensuring the "long-term survival of wolves in Minnesota". The Act requires preparation of a wolf management plan, establishes gray wolf zones<sup>5</sup>, prohibits the taking of wolves in violation of federal law, prohibits the harassment of gray wolves, and authorizes the destruction of individual wolves threatening human life and posing imminent threat to cattle or domestic pets. Minn. Stat. § 97B.645. Finally, the Act establishes a

---

<sup>4</sup> The roundtable was composed of thirty-three (33) individuals who represented government agencies with an interest in wolf management as well as stakeholders from agricultural, environmental, hunting, trapping and wolf advocate organizations. (Management Plan, 2001).

<sup>5</sup> The federal zones 1 through 4 are roughly the equivalent of Minnesota's Zone A. Minnesota's Zone B is the equivalent of federal zone 5. A further discussion of what constitutes suitable habitat in Minnesota can be found on page 4 of these comments.

civil penalty for the unlawful take, transport, or possession of a wolf in violation of Minnesota's game and fish laws. Minn. Stat. § 97B.648.

In 2001, the Minnesota DNR adopted a Wolf Management Plan (Management Plan). This Management Plan is intended to meet Minnesota's commitment to maintain a healthy and viable wolf population in Minnesota. The Management Plan addresses wolf population monitoring and management, depredation management, habitat management, law enforcement, public information and education, research, program administration, and wolf-human conflicts. (Minnesota DNR 2001)

Despite the changes in the legal status of wolves under the ESA since listing the Minnesota DNR has maintained the commitment to monitor and responsibly manage Minnesota's wolf population. *See* 84 Fed. Reg. at 9650 through 9651 (documenting changes in wolf status since listing). Since 1978, the DNR has conducted wolf population surveys at periodic intervals. DNR wildlife research staff conduct these population surveys with the assistance of other state, federal, and tribal natural resource agency staff. In addition to population assessments, the state has committed significant resources to wolf research to understand more fully the ecology of wolves in Minnesota and their suitable habitat.

Since the 1980s, the DNR has employed specific staff dedicated to wolf research and management, including implementation of the Management Plan. Staff continues to contribute to the conservation of wolves in Minnesota through coordinating management, enforcing the prohibition against illegal take, investigating livestock depredation claims, and conducting population monitoring and research. DNR conservation officers continue to enforce the requirements of the Wolf Management Act. Additionally, the Minnesota Department of Agriculture administers a compensation fund that provides payments in instances where wolves cause confirmed damage to livestock. Currently Minnesota spends approximately \$250,000 per year on wolf depredation management, excluding staff time.

The Minnesota DNR is committed to updating its Management Plan. The Management Plan is intended to ensure long-term viability of Minnesota's wolf population. The process used to update the Wolf Management plan will comply with the state's wildlife trust obligations, all applicable laws, and will employ extensive public engagement and tribal consultation. Importantly, the complex questions that must be addressed in updating Minnesota's Wolf Management Plan are separable from the determination of whether the wolf is recovered under the ESA.

### **Additional Observations and Concerns**

#### ***Wolf Taxonomy***

The Proposed Rule again raises the issue and importance of wolf taxonomy in the Great Lakes Region. 84 Fed R. 9654 -9655. Our understanding of gray wolf taxonomy in Minnesota, which is part of the Great Lakes Region, continues to develop. We recognize the uncertainty in genetic makeup and interpretation of genetic ancestry of the wolf population as set forth in Proposed Rule. *Id.* Although this continues to be of scientific interest and will continue to

evolve as new information and genetic techniques are developed, it does not change the conservation or the recovery status of wolves.

Taxonomy issues aside, the facts indicate that when wolves were reclassified in Minnesota as threatened, the wolf population in northern Minnesota flourished. Since reclassification, the wolf population has been reestablished throughout its suitable range in Minnesota, Wisconsin, and Michigan. In short, the population of wolves that was protected under the ESA in northern Minnesota has now established across these three states.

### ***Recovery and Delisting Under the ESA***

The Minnesota DNR recognizes the importance of the ESA in protecting and recovering species threatened and endangered with extinction such as the gray wolf. We also recognize that the recovery of species in general can have a positive impact on the health of ecosystems. Therefore, it is vital that we have a functioning ESA. We are also mindful that the ESA has been criticized as inflexible, imposing undue burdens, and lacking clear criteria for recovery. If the ESA is to continue to serve its important role in species conservation, the Minnesota DNR believes it is critical to find a functional road to delisting species where they have recovered by any reasonable metrics.

When the ESA was passed in 1973, Congress spent extensive time debating how to determine whether a species was endangered or threatened with extinction and the protections that should be afforded to them, but spent much less time defining the parameters of recovery and delisting. *See generally*, H.R. Rep. 93-412 (1973) and S. Rep. No. 93-307 (1973) reprinted in 1973 U.S.C.C.A.N. 2989. In 1982, Congress amended the ESA and clarified that “delisting species should be based on the same criteria and conducted according to the identical procedures as listing a species.” H.R. Rep. 97-567, at 12 reprinted in 1982 U.S.C.C.A.N. 2812.

The ESA itself provides that delisting shall occur when the species is no longer threatened or endangered throughout a significant portion of its range as a result of an analysis of the ESA’s five listing factors )16 U.S.C. 1533 (a)(c)(2)(B) and 16 U.S.C. 1532 (6) and (20)). Delisting under the ESA is not, however, the equivalent of recovery. (Williams 2015). This distinction has been an important part of the past decade of litigation challenging the USFWS’s numerous attempts to delist the gray wolf. (Williams 2015). Unless a realistic path towards delisting can be resolved it is unlikely to expect that that the wolf can be delisted across the lower 48 states. (Williams 2015, Doremus 2000).

If the USFWS cannot identify and apply delisting criteria in a geographical and appropriate manner, it may undermine the importance of the ESA in ensuring the long-term conservation of species biodiversity. With specific regard to the gray wolf, we urge the USFWS to take a more pragmatic approach to delisting, one that looks to the security of the species from biological threats and human behavior threats (Doremus 2000). This could provide a basis for delisting in smaller geographic sections of the country where the delisting criteria have been met, while continuing to list the wolf in those significant portions of its range where the wolf does not meet the delisting criteria. By way of example, we point to the gray wolf in Minnesota, where the species is recovered across all biologically suitable range, and does, in fact, meet the criteria

for delisting. Today in Minnesota, gray wolves occupy substantially all of their suitable range; their population are approaching historic numbers; and the state has adopted extensive regulatory mechanisms to preclude the degradation of Minnesota's gray wolf population.

### **Conclusion**

In closing these comments, the Minnesota DNR reaffirms its commitment to gray wolf recovery. Without expressing an opinion on the status of gray wolves outside its borders, the Minnesota DNR recognizes that the recovery of gray wolves in Minnesota has been an over fifty-year process requiring the commitment of extensive federal, state, and tribal resources. Regardless of the outcome of this Proposed Rule, the Minnesota DNR intends to continue to manage Minnesota's wolf population to ensure the sustainability of our gray wolves now and in the future, consistent with our wildlife trust obligations. The Minnesota DNR is further committed to managing its gray wolves to contribute to the success of wolf recovery beyond Minnesota.

Sincerely,

A handwritten signature in blue ink, appearing to read "Sarah Strommen", with a long horizontal flourish extending to the right.

Sarah Strommen  
Commissioner  
Minnesota Department of Natural Resources

Encl.



## Minnesota Comments Wolf Bibliography

---

- Bailey, R. 1978. Recovery plan for the eastern timber wolf. U.S. Fish and Wildlife Service, Washington, D.C., 79pp.
- Berg, W., and S. Benson. 1998. Updated wolf population estimate for Minnesota, 1997-98. Pages 85 – 98 in B. Joselyn, editor, Summaries of wildlife research findings, 1998. Minnesota Department of Natural Resources, St. Paul.
- Berg, W. E., and D. W. Kuehn. 1982. Ecology of wolves in north-central Minnesota. Pages 4-11 in F. H. Harrington and P. D. Paquet, editors. Wolves: a worldwide perspective of their behavior, ecology, and conservation. Noyes Publishing, Park Ridge, New Jersey
- Doremus, Holly. 2000. "Delisting Endangered Species: An Aspirational Goal, Not a Realistic Expectation" *Environmental Law Reporter* 30: 10434 -10454.
- Eastern Timber Wolf Recovery Team, U.S. Fish and Wildlife Region 3, *Recovery Plan for the Eastern Timber Wolf* (June 5, 1978)
- Eastern Timber Wolf Recovery Team, U.S. Fish and Wildlife Region 3, *Revised Recovery Plan for the Eastern Timber Wolf* (January 31, 1992).
- Erb, J. and S. Benson. 2004. Distribution and abundance of wolves in Minnesota, 2003-04. Minnesota Department of Natural Resources, St. Paul.
- Erb, J. 2008. Distribution and abundance of wolves in Minnesota, 2007-08. Minnesota Department of Natural Resources, St. Paul.
- Erb, J. and B. Sampson. 2013 Distribution and abundance of wolves in Minnesota, 2012-13. Minnesota Department of Natural Resources, St. Paul.
- Erb, J., C. Humpal, and B. Sampson. 2018. Distribution and abundance of wolves in Minnesota, 2017-18, Minnesota Department of Natural Resources, St. Paul.
- Fuller, T. K., W. E. Berg, G. L. Radde, M. S. Lenarz, and G. B. Joselyn. 1992. A history and current estimate of wolf distribution and numbers in Minnesota. *Wildlife Society Bulletin* 20:42-55.
- H.R. Rep. 93-412 (1973) and S. Rep. No. 93-307 (1973) reprinted in 1973 U.S.C.C.A.N. 2989.
- Kellert, S. R. 1985. The public and the timber wolf in Minnesota. New Haven: Yale University Press.
- Kellert, S. R. 1999. The public and the wolf in Minnesota. Minneapolis: Report to the International Wolf Center.
- Mladenoff, D. J., M. K. Clayton, S. D. Pratt, T. A. Sickley, and A. P. Wydeven. 2009. Change in occupied wolf habitat. In *Recovery of Gray Wolves in the Great Lakes Region of the United States*. Edited by A. P. Wydeven, T. R. Van Deelen and E. J. Heske. Springer, New York.

Minnesota Department of Natural Resources. 2001. Minnesota wolf management plan. St. Paul, Minnesota.

Schroeder, A. S., D. C. Fulton, and L. Cornicelli. 2018. How Minnesota wolf hunter and trapper attitudes and risk- and benefit-based beliefs predict wolf management preferences. *Human Dimensions of Wildlife*. 23:552-568.

*Reclassification of the Gray Wolf in the United States and Mexico with Determination of Critical Habitat in Michigan and Minnesota*, 43 Fed. Reg. 9607 (March 9, 1978)

*Endangered and Threatened Wildlife and Plants; Regulations Governing the Gray Wolf in Minnesota*, 48 Fed. Reg. 36256 (August 10, 1983).

*Proposed Rule Removing the Gray Wolf (Canis lupus) From the List of Endangered and Threatened Wildlife*, 84 Fed. Reg. 9648 ((March 15, 2019)

U.S. Fish and Wildlife Service. 2018. Gray Wolf Biological Report: Information on the Species in the Lower 48 United States.

U. S. Fish and Wildlife Service. 1992. Recovery Plan for the Eastern Timber Wolf. Twin Cities, Minnesota.

Williams, Martha. 2015. "Lessons from the Wolf Wars: Recovery v. Delisting Under the Endangered Species Act." *Fordham Envtl. L. Rev.* 27:106-156.