June 30, 2011

Dixie Bounds, Field Supervisor
United States Fish and Wildlife Service
Division of Ecological Services
9014 East 21st Street
Tulsa, Oklahoma 74129

Dear Dr. Bounds:

This letter is in response to the U.S. Fish and Wildlife Service (USFWS) April 19, 2011, Letter to Interested Parties requesting relevant information for preparing a proposed rule for listing the lesser prairie-chicken (*Tympanuchus pallidicinctus*) (LPC) and designation of critical habitat. I am representing the Western Association of Fish and Wildlife Agencies (WAFWA), whose membership includes 23 states and Canadian provinces, spanning from Alaska to Texas and Saskatchewan to Hawaii. WAFWA thanks you for the opportunity to comment on this proposed rule, and for the extension the USFWS granted to the states on May 24, 2011, to prepare and gather the information for this important decision.

WAFWA is a strong advocate for the rights of states and provinces to manage fish and wildlife within their borders. The Association has been a key organization in promoting the principles of sound resource management and the building of partnerships at the regional, national and international levels to enhance wildlife conservation efforts and the protection of associated habitats in the public interest. This conservation commitment by WAFWA members was enhanced by the creation of the WAFWA Grassland Initiative (WGI) in 2005, which was unanimously approved for a 5-year extension in January 2011. This coordinated approach has been successful in affecting the status of species at the landscape level by implementing conservation actions in a collective manner while sharing resources efficiently and strategically. The LPC is one of the species that falls under the WGI.

A focused conservation effort for LPC was described and approved by WAFWA through the Lesser Prairie Chicken Conservation Initiative (LPCCI), which was drafted by the Lesser Prairie-Chicken Interstate Working Group (LPCIWG) in May 2008 (Davis et al. 2008). The LPCIWG is one of the technical groups associated with the WGI. The five cooperating states have continued to commit staff to this endeavor since it was formally established in 1996. In the LPCCI, the LPCIWG identified a range-wide goal of maintaining habitat to support breeding populations of LPC and identified conservation strategies to work toward this goal.
WAFWA, along with core members of the LPCI WG, has reviewed information, which led the USFWS to change the Candidate Notice of Review (CNOR) rating for LPC from eight to two in 2008. We have also reviewed current information for LPC and the five factors established by the USFWS to evaluate a species’ status for listing under the Endangered Species Act (ESA). The five statutory listing factors are: 1) present or threatened destruction, modification or curtailment of habitat or range; 2) overutilization for commercial, recreational, scientific or educational purposes; 3) disease or predation; 4) the inadequacy of existing regulatory mechanisms; or 5) other natural or man-made factors affecting their continued existence.

WAFWA believes, based on significant actions directed toward LPC conservation efforts, the listing priority status for the LPC should be downgraded back to an eight, and that USFWS may use its resources to pursue the development of proposed rules for higher priority candidate species. Concerns raised in the 2008 CNOR about future decreases in Conservation Reserve Program (CRP) acreage and unregulated wind energy development, which were the basis for the increased listing priority rating, have not proven to be a current or significant risks to the species. These changes in status were not addressed in the 2010 CNOR. WAFWA strongly believes they should be addressed prior to the development of any proposed rule for the LPC. While LPC populations have declined and experienced range contractions in some areas, others areas within the species range have exhibited significant increases and even range expansions.

These population increases are results of the extensive implementation of conservation measures directed toward habitat protection and enhancement. It is estimated hundreds of thousands of acres are currently being managed for the enhancement of LPC through the implementation of a Habitat Improvement Program (HIP) in Colorado, Landowner Incentive Program in Oklahoma and Texas, USFWS Partners for Wildlife program, and NRCS and FSA’s programs such as State Acres for Wildlife Enhancement (SAFE) program, CRP, Wildlife Habitat Improvement Program (WHIP) and Environmental Quality Improvement Program (EQIP). As such, by reviewing the information, we believe the overall status has changed for the species and the threats are not as imminent. Because of this change in status, and the fact the USFWS has higher court-ordered listing priorities than the LPC, WAFWA encourages the USFWS to withdraw from the proposed LPC listing process and direct the funding to pursue other higher listing priorities. We believe maintaining the LPC as a candidate at a Candidate Notice of Review of 8 is not only prudent and justifiable, but would also allow critical time for the voluntary conservation efforts implemented since 2008 to further preclude the need to list the species. Justification for this conclusion on the change in status is as follows:

1. **Present or Threatened Destruction, Modification or Curtailment of Habitat or Range.** LPCs historically occupied sandhill habitat characterized by mixed-grass prairies, shinnery oak (*Quercus havardii*)-bluestem (*Andropogon* spp.) and sand sagebrush (*Artemisia filifolia*)-bluestem communities in the plains of eastern New Mexico and portions of southeastern Colorado, southwestern Kansas, western Oklahoma, and the Texas Panhandle (Davis et. al. 2008).

LPCs require different habitats depending on the season of the year; but it is thought that for a group of birds using a lek complex (breeding area), their range can cover over 12,000 – 20,000...
acres during the course of a year. The LPC uses the different parts of its range according to the needs during each phase of its life cycle.

Since the 19th century, LPC and the habitats upon which they depend have diminished by about 90% (Davis et. al. 2008). According to Davis et al. (2008) habitat losses can be attributed to conversion of native prairie to cropland, poor grazing management practices, habitat fragmentation from different types of energy development, and prolonged drought throughout the LPC range. The current LPC estimated occupied range (EOR) is about 27,900 sq. miles.

WAFWA recognizes a large amount of habitat was converted from native grasslands to croplands in the early 1900s and current impacts from energy development continue to fragment existing habitats at a moderate level; however, there still remains a large amount of occupied habitat made up of native, restored, and manmade grassland habitats for LPC. While this fragmentation has contributed to population declines historically, recent information indicates habitat fragmentation trends have slowed with the implementation of habitat conservation programs. While some populations in the southern portion of the range have declined, there is evidence that LPCs have and continue to expand into other areas such as the shortgrass regions of western Kansas, and Oklahoma and the Texas Panhandles. This belief of intact habitats is further supported by population genetics. According to current information, genetic exchange is still occurring at a significant level to maintain high genetic diversity for the species throughout a significant portion of its range, despite fragmentation levels.

Population shifts and reoccupation have been documented both historically and in the present. For example, an increase of the EOR has been documented in Kansas. Since 1960, LPC were not known to exist north of the Arkansas River. This is known because Kansas Department of Wildlife and Parks (KDWP) first began looking for LPC leks north of the Arkansas River in the 1990s and did not record any leks.

In the spring of 2009, KDWP developed a database to hold the locations of known greater and lesser prairie-chicken lek sites and counts. This information was gathered from lek survey data sheets submitted during previous years and solicited from all KDWP personnel and numerous other conservation partners across the state. An online data entry screen was developed so that people could enter opportunistic lek observations that were made in spring 2009 and subsequent years. Following the 2011 breeding season, the database contained 474 observations of 296 LPC and mixed lek sites that were known to be active at least once since 2005. This includes 126 observations of 68 leks north of the Arkansas River, where LPC were not known to exist only 15 years ago. It is the belief of WAFWA this supports the notion of a population shift.

Texas also has historical and recent information indicating shifts in populations. While these shifts, or reoccupations, are clearly not direct movements of populations, they represent both declines due to habitat degradation and fragmentation, as well as habitat augmentation in other areas. The addition of CRP in areas like western Deaf Smith and south central Bailey Counties in the 1980s represented an augmentation, resulting in range expansions of LPCs into the shortgrass regions. More recent aerial and road surveys in 2010 and 2011 are detecting the effects of other habitat augmentations from habitat conservation practices in the form of new leks outside of the
EOR in Roberts, Ochiltree, Bailey, Cochran, and Yoakum counties. Declines in LPC populations and range contractions in Andrews, Gaines and Wheeler counties reflect habitat degradation through brush encroachment and isolation of populations from habitat fragmentation. This pattern of population shifts and reoccupation of former range has also been identified in other parts of the species range. According to Davis et al. (2008), over the last century a pattern of periodic decline and increase, including reoccupation of former range has occurred in New Mexico.

**Habitat Enhancement and Protection**

We surmise current trends of LPC populations and possible range extensions are the reflection of changing habitat conditions on the landscape created by the implementation of various conservation programs and current climatic conditions across the range. Below is a summation of those conservation efforts by state.

**Colorado**

A variety of conservation efforts are in place to protect and enhance LPC habitat in Colorado. Through FSA, the State Acres for Wildlife Enhancement (SAFE) program was implemented from 2008-2011 with a NRCS LPC Initiative being implemented in 2011. In addition, Colorado has implemented a LPC Habitat Improvement Program (HIP) which provides cost-share to landowners for enrolling fields or conducting habitat enhancements beneficial to LPC. In total, over 58,500 acres of private land has been affected through these programs to benefit LPC in Colorado. Additionally, over 11,000 acres in LPC range is currently protected by conservation easements held by Colorado Division of Wildlife, The Nature Conservancy and Greenlands Reserve Land Trust. These easements provide additional perpetual habitat protections for LPC.

**Texas**

Over the last 2 years, NRCS committed a total of $11.5 million dollars to WHIP and EQIP directed specifically at LPC habitat under the NRCS LPC Initiative in Texas. In a private land landscape like Texas, cost-share programs for habitat improvement are an extremely important tool for habitat management. They provide landowners with financial incentives to manage property for a variety of wildlife species. In 2010, $5.5 million was committed to WHIP and EQIP for LPC habitat, and these funds were targeted across the historic range in the state. Totals were reported by county and 83,907 acres were contracted within the counties that intersected the 2007 LPC EOR for a total cost of $2,777,473. An additional 79,417 acres were contracted outside of the 2007 EOR for a total cost of $2,718,903. In 2011, an additional $6 million was committed to LPC Initiative contracts, but the targeting for those contracts was different. The NRCS State Technical Committee, USFWS, and Texas Parks and Wildlife Department (TPWD) collaborated to develop a three-tiered system for ranking the location of proposed contracts. Tier 1 included the HUC-12 polygons that overlaid the 2007 LPC EOR specified for Mixed Grass Safe Contracts. Tier 2 represented the counties that intersect those HUC-12 watersheds. Tier 3 represented a subset of the counties in the historic range beyond tier 2. Complete numbers for 2011 Lesser Prairie Chicken Initiative contracts are not yet available. NRCS is analyzing these data and updated figures should be available soon, but as of February 25, $2,395,278 had been committed for 88,033 acres. Of those commitments, 27% of the funds were committed to contracts in tier 1, 4.5% in tier 2, and 7.5% in tier 3.
To better target the LPC Initiative funds, NRCS is working on two potential improvements and TPWD is planning to support those efforts. First, NRCS wrote a proposal for State Watershed Action Team (SWAT) funding and was awarded that funding to support up to four private lands biologists positions to be held by Pheasants Forever. These positions will focus on promoting LPC Initiative cost-share programs and CCAAs to private landowners within and around the LPC EOR. TPWD is planning to contribute information about the location of LPC habitat to target these conservation efforts, in-kind support in the form of staff time, and matching funds to support these positions.

Finally, USFWS Partners for Wildlife and TPWD are collaborating on cost-share range management programs primarily for LPCs. USFWS provided funding to TPWD to support a Landscape Conservation Coordinator position for the Panhandle and Southern High Plains region, as well as funding to support LIP projects for LPC habitat improvement in the region. More than $200,000 of USFWS funds were committed in 2010 and an additional $100,000 is committed for 2011.

TPWD is also directly involved in multiple efforts to prevent, minimize and mitigate impacts from wind and transmission development on LPC habitat and populations. TPWD has attempted to cultivate working relationships with wind developers by offering a thorough voluntary comment process on proposed developments whenever requested. TPWD has also developed voluntary mitigation guidelines for all types of developments impacting natural resources, and is in negotiations with Cross Texas Transmission to mitigate for impacts from the Gray to Tesla CREZ (Competitive Renewable Energy Zones) power transmission project in LPC habitat and on the Caprock Canyons Trailway. This mitigation will add important LPC habitat to the TNC Yoakum Dunes Preserve in Yoakum County and will fund more aerial surveys of the LPC EOR and high priority areas outside the EOR but within the historic range. TPWD, along with all the other LPC states, has been directly involved with ongoing development of the Bi-regional Wind Energy HCP for LPCs and Whooping Cranes.

One of the primary threats cited in 2010 LPC CNOR was the lack of availability of CRP lands for LPC habitat. There are currently more than 1.15 million acres of CRP within the 16 counties that encompass the LPC EOR in Texas and more than 979,000 of those CRP acres are in the nine western and southwestern counties of the EOR, ranging from Deaf Smith southward to Andrews Counties. Those figures have declined because the 2008 Farm Bill required that CRP contracts be limited to 25% of arable lands in any given county. Many of the counties in the western portion of the LPC range in Texas were enrolled to more than 30%, and recent CRP enrollments have been directed at reducing those levels. As of November 2011, all counties in Texas will be enrolled at or below that 25% CRP cap. While contracts on more than 328,000 acres expired in 2011, estimated numbers show only a net loss of 10,947 acres of CRP across all 16 counties. This amounts to less than 1% of the CRP across those counties. If, in the worst-case scenario, all of that acreage were within the EOR, it would represent only 0.35% of the potential habitat in current EOR in Texas.

Besides the loss of CRP lands throughout the LPC range, significant concern was raised in the 2010 LPC CNOR concerning the habitat quality of CRP. This was especially true with Texas. The review cited the enrollment of single species monocultures as a detriment. However, recent
data from the Farm Service Agency suggests that nearly 40% of the CRP in the LPC counties in Texas is classified as native cover. Recent aerial surveys in 2011 are also detecting significant numbers of leks in weeping lovegrass (*Eragrostis curvula*) and mixed native and exotic CRP in the western portion of the range in Texas. TPWD has also been conducting road-based LPC surveys since 2008, and is detecting leks in mixed weeping love grass and native CRP across Bailey, Cochran, and Deaf Smith Counties. CRP acres in those western counties were seeded in either monocultures of weeping lovegrass or, in some cases, native sideoats grama (*Bouteloua curtipendula*). Re-enrollments of existing exotic cover have required enhancement of those acres with burning or mechanical treatment and overseeding with a diversity of native grasses and forbs and this appears to be working in the weeping love grass CRP in those western counties. TPWD biologists also report that recent droughts may kill weeping love grass clumps and favor the deeper rooted native grasses.

**Kansas**

In Kansas, the number of acres enrolled in all CRP practices within the 34 counties intersected by the current LPC EOR was 747,933 in 1998, one year after the USFWS placed the species on the candidate list. Currently, CRP enrollment in those counties is 1,744,960 acres, more than doubling the amount of potential habitat. The increased enrollment is due in part to the fact that the Farm Service Agency (FSA) in cooperation with numerous conservation groups identified all or parts of these counties as conservation priority areas so that offers beneficial to LPC would receive higher priority in the ranking process during several different general sign-up periods. Additionally, a State Acres for Wildlife Enhancement (SAFE) practice was recently created and targeted whole field enrollment in some of those same areas to help keep expiring CRP from being broken for agriculture. Like Texas, KDWP anticipates little to no net loss in LPC from expiring CRP lands. The huge increase in CRP acreage is most likely the major contributing factor to the LPC population growth that has been observed north of the Arkansas River where the species was not known to occur as recently as only 15 years ago.

Since 2009, the USFWS has funded 8 agreements in the Red Hills of Kansas affecting 7,680 acres through the Partners for Fish and Wildlife Program. Most of those projects have focused on tree shearing and prescribed burning.

In 2010-2011, the KDWP put $75,000 toward an agreement with Pheasants Forever (PF) and NRCS to fund 3 farm bill biologist positions within the range of the LPC in Kansas. Those positions are located in Ness City, Ulysses, and Medicine Lodge and those individuals provide technical assistance to Landowners for farm bill conservation programs with an emphasis on practices favorable to the LPC.

The KDWP has targeted LPC habitat improvements through the Landowner Incentive Program (LIP), State Wildlife Grants (SWG), voluntary mitigation projects for energy development, and a state-level wildlife habitat improvement program (State WHIP). From 2007-2011 the LIP was used to fund 20 projects beneficial to LPC in Kansas totaling $801,404 (75% LIP & 25% landowner match). These projects improved 22,531 acres through the following practices: invasive tree removal, solar powered livestock water systems, and cross fencing for rotational grazing management, prescribed burning, and cropland conversion to native grasses. Eighteen of
the 20 projects were located in the Red Hills physiographic region and the other two were located in LPC range in Logan and Gove counties.

The KDWP was awarded a 5-year SWG, which started in 2009, to focus on LPC habitat improvements. During the first funding cycle, a total of $181,127.34 (50% SWG, 25% KDWP, & 25% landowner) was allocated to 6 projects that will provide benefit to the LPC. Those projects will improve habitat on 3,667 acres and they include tree shearing, prescribed grazing, prescribed burning, and perimeter fencing. During two subsequent application periods, an additional 9 projects were funded that will provide LPC benefits. These projects have a total cost of $180,584.57 and will impact an additional 3,260 acres of LPC habitat.

Finally, since 2008, the KDWP has provided $64,836 in landowner cost-share through the State WHIP program on practices beneficial to LPC. The biologists who developed those conservation plans estimated that 5,844 unique acres were improved for LPC.

**Oklahoma**

The Oklahoma Department of Wildlife Conservation (ODWC) has purchased 10,590 additional acres to existing Wildlife Management Areas (WMA) in Beaver and Ellis Counties. ODWC has been able to contract 13,356 acres of private land under management agreements to improve LPC habitat in Beaver, Ellis, and Harper counties. ODWC has given TNC $1,700,000 to spend on conservation easements to benefit LPC conservation, but none have been signed to date. A total of $300,000 was awarded to Oklahoma Conservation Commission as a match for a grant to create a wildlife credit program, but no work has been completed. ODWC has also been able to use state wildlife grant and state legacy funds to purchase two additional WMA’s in Harper and Woods counties inside EOR that total 7,200 acres. These two WMA’s have LPC’s different times of the year. Cimarron Bluff WMA has an active lek that also provides quality nesting and brooding cover. Cimarron Hills provides quality wintering area where LPC’s are regularly seen but to date no active lek has not been located.

A State Acres for Wildlife Enhancement (SAFE) practice was created in Oklahoma with collaboration with USDA, to target habitat improvement work in LPC range. Oklahoma was allowed 15,100 acres but to date there has been 4,067 acres enrolled in the program and practices are at varies stages of completion. FSA reports as of October 2010 there were 627,426 acres still under contract under general CRP sign up but a majority of those acres are in introduced grasses in LPC range. However, most of all the new CRP sign ups are targeted in LPC range and are going to be native grass mixtures.

The ODWC has a state Wildlife Habitat Improvement Program (WHIP) that is designed for habitat creation, enhancement, and management for all wildlife species. During the last 2 years state WHIP has targeted money in EOR for LPC habitat work. During those 2 years ODWC has been able to work on 835 acres spending $60,230. These funds have been provided through the USFWS Partners for Fish and Wildlife Program.

The ODWC has had an agreement with the NRCS to assist with a variety of cost share programs. Oklahoma NRCS has been able to complete 136,447 acres of brush management, 456,562 acres
of prescribed grazing, and 75,625 acres of prescribed burning through WHIP and EQIP in LPC range over the last 10 years.

New Mexico
The New Mexico Department of Game and Fish (NMDGF) currently owns and manages 30 Prairie Chicken Areas (PCAs). These range in size from 28 acres to about 7,200 acres and total approximately 28,000 acres. In addition, the 28,000 acre Milnes and Prairie Preserve in the core of LPC is owned and managed by The Nature Conservancy for LPC. Also, the Bureau of Land Management owns and operates the 58,000 acre Sand Ranch in the area. Between these three entities, 113,182 acres within the core population area of LPC in New Mexico is managed for their benefit. In addition, the BLM has carried out numerous projects under the Restore New Mexico program to improve habitat quality. To date the BLM’s Pecos District has treated 366,350 acres to reduce the amount of mesquite in LPC habitat. BLM will also treat another 317,220 acres in the near future. Besides direct habitat restoration, the BLM has reclaimed 1,325 acres of abandoned well pads and roads.

Since 2001, in New Mexico, NRCS has administered 34 contracts totaling $2,516,098 and 270,795 acres from these programs, including $1.2 million available for 2011. There are a total of 424,287 acres of CRP enrolled in New Mexico within LPC range. Of these, 299,438 acres (70.5%) will be expiring by the year 2015. In 2010, the cap for New Mexico’s Conservation Reserve Program (CRP) acres in Curry, Quay and Roosevelt counties decreased from 35 percent to 25 percent of each county’s cropland. This revision is caused many of the CRP acres to expire from the program starting in 2010. To combat this 10 percent reduction on top of the regular expiring acres and to continue to protect these expiring CRP acres, the New Mexico NRCS created the New Mexico Grass Banking Pilot Program. The program offers ranchers the opportunity to evaluate the benefits and effects of a planned grazing system without any risk or cost as well as provide an opportunity to establish a documented grazing history. The benefit to the farmer is a continued incentive payment, though reduced from regular CRP rental rates.

In 2008, the State Acres for Wildlife Enhancement (SAFE) program was developed as a continuous CRP sign-up program. The focus species for New Mexico was the LPC, and 2600 acres was made available to ranchers in LPC habitat in Lea County.

Conservation Planning
The LPC is a species that truly requires management at the landscape level and various strategies must be implemented to further stabilize the population and monitor conservation efforts. To grow and maintain populations a two-prong conservation planning approach is being pursued by WAFWA.

To assist with management decisions in regards to LPC, the Western Governors Association (WGA), LPCIWG, and the Playa Lakes Joint Venture (PLJV) are collaborating on a range-wide decision support system (DSS) directed at project site location for energy development and targeting of conservation efforts. Large patches of native prairie and CRP are important LPC habitats, but connection between those patches is also important. Managing for connected landscapes is particularly difficult in private land-dominated landscapes. Accomplishing landscape-level management requires state of the art tools, as well as coordination and
engagement of agencies, NGO conservation partners, and industry. The WGA LPC-DSS effort is on the verge of accomplishing both objectives for LPC conservation.

The LPC-DSS will incorporate layers from modeling efforts like the range-wide lek and nest habitat model, and possibly, an update of the PLJV Core/Core Buffer model to identify existing landscape-level habitat patches, as well as a least cost path analysis to identify existing and potential corridors between habitat patches. All components will be integrated in a web-based public tool directed at industry, agency, and NGO use, while maintaining data confidentiality required by individual state laws.

The first iteration of this tool will be completed by August 2011 and web deployment is planned for 2012. The conservation potential of a common public DSS across an entire 5-state range is extraordinary. It allows for industry, public utilities, and consulting firms to conduct transparent tier-one analyses for project sighting with current data sources, which will benefit both industry costs and conservation of the species. This DSS will also be particularly useful in developing landscape-level conservation strategies for the five state wildlife agencies across the range of the species, and targeting conservation funds from other sources such as compensation/mitigation dollars and other cost-share habitat improvement programs like Partners for Wildlife and the Landowner Incentive Program. NRCS is planning to use an internal version of this tool along with FSA Common Land Use data to target future LPC Initiative funds.

In addition, ODWC partnered with USFWS, TNC, Sutton Avian Research Center, Oklahoma State University, Oklahoma Secretary of Environment, and PLJV to create a spatial planning tool for energy development to use to minimize impacts to LPC. This tool puts a dollar figure on the impact of the development in the area on LPC. This is a Voluntary Offset Payment that will be used to help conserve LPC. To date, Oklahoma Gas and Electric (OG&E) is the only company that has made a voluntary payment totaling $8,650,000.

Another proactive conservation planning effort is the pursuit of Candidate Conservation Agreement with Assurances (CCAA/CCA) by states and their partners. For example, TPWD has teamed with USFWS and the Dorothy Marcille Wood Foundation to develop outreach on Candidate Conservation Agreement with Assurances (CCAA) for LPCs in Texas. This program informs landowners about the requirements to work with TPWD staff other agencies, or NGOs to develop, agree to, and carry out a TPWD and USFWS-approved management plan specifically targeted at LPC conservation. In return, the landowners receive a certificate of inclusion in the CCAA, which provides regulatory assurances to ensure their operations will not be significantly impacted by a future listing. This plan also helps direct landowners to cost-share opportunities for brush control, native plant seeding, and water development and fencing to support improved grazing management. These programs include the TPWD Landowner Incentive Program (LIP), USFWS Partners for Wildlife, and the NRCS Wildlife Habitat Improvement Program (WHIP) and Environmental Quality Improvement Program (EQIP). Since 2010, eight landowners have signed up over 115,000 acres in the CCAA. Ten more landowner CCAAs are currently in development.

The CCA/CCAA developed by the USFWS and the BLM in New Mexico are historic in their approach and acceptance by ranchers and oil and gas companies. The CCA/CCAA already has
15 ranchers who have enrolled 623,000 combined acres and another 18 ranchers totaling 594,000 acres are being reviewed for inclusion. The New Mexico State Land Office is also actively considering enrolling their unleased lands in the CCA/CCAA to help provide protections for LPC. In addition to the ranchers who have signed up, there is an additional 115,363 acres of oil and gas leases on Federal minerals that are signed up on approved Certificates of Participation. These voluntary agreements have also resulted in over $750,000 being contributed by industry to fund on-the-ground habitat improvement projects such as reclamation of man-made infrastructure (well pads and roads), removal of powerlines, and vegetation (mesquite) treatments.

Population Estimation and Monitoring
All states within the occupied range monitor LPC breeding populations annually, however, monitoring efforts have differed markedly among agencies and inferences have been made about populations using a variety of methods. Variation in survey effort complicates attempts to understand LPC population trends and make comparisons among areas and agencies difficult. Despite problems associated with the collection and analysis of lek count data, these datasets represent the only long-term database available for LPC populations and generally appear to provide reliable, but non-comparable data on population trends and shifts.

In June 2011, the LPCIWG was awarded a grant from the Great Plains Landscape Conservation Cooperative (GPLCC) to utilize and build upon the knowledge, information, and expertise of the five state wildlife agencies to develop and test a LPC range-wide sampling framework to estimate abundance and monitor population trends. This effort will provide managers within the GPLCC a consistent monitoring approach for LPC trends across the five-state species’ range, and possibly over time, detecting shifts in populations. Testing of the method is projected to occur March-May 2012.

We conclude that the best scientific and commercial information available indicates the LPC is not in the foreseeable future threatened by this factor and there is adequate evidence to reduce the listing priority rating for the LPC to eight, which should have been done with the 2010 CNOR. Habitat conservation programs are succeeding in efforts to protect and even expand LPC habitats and populations across portions of the range of the species. Expected declines in CRP enrollment that brought on the increase in the listing priority rating in the 2008 CNOR, and maintained in the 2010 CNOR, have not occurred and concerns over exotic CRP are significantly less than expected in 2008 and 2010.

2. OVERUTILIZATION FOR COMMERCIAL, RECREATIONAL, SCIENTIFIC OR EDUCATIONAL PURPOSES.
Currently, regulatory authority of the LPC rests entirely with the states. States within the LPC range manage scientific collection and hunting through permitting and licensing processes and setting of hunting seasons. For scientific collection each application is reviewed on a case-by-case basis and there is no indication LPC are being over utilized from a scientific standpoint. Various regulations are in place for LPC for recreational use and are summarized below by state.

New Mexico manages LPC under the statutory authority of Chapter 17 of New Mexico Statutes Annotated 1978. It is the purpose of this act and the policy of the state of New Mexico to provide an adequate and flexible system for the protection of the game and fish of New Mexico and for
their use and development for public recreation and food supply, and to provide for their 
propagation, planting, protection, regulation and conservation to the extent necessary to provide 
and maintain an adequate supply of game and fish within the state of New Mexico.”

In 1997, NMDGF was petitioned to investigate the status of the LPC for listing. The Department 
found that the prospects for survival and recruitment of the LPC are not jeopardized to a degree 
that constitutes classification as threatened or endangered under the Wildlife Conservation Act 
(Davis 2006). The Department’s recommendation regarding the LPC Investigation was brought 
before the State Game Commission in November 2006. The motion to accept the Final Listing 
Investigation Report and recommendation that the LEP not be listed under the Wildlife 
Conservation Action was carried unanimously. The LPC hunting season in New Mexico is 
currently closed.

TPWD manages LPC under the authority of PWC Title 2 Chapters 11 and 12, and PWC Title 5 
Chapters 61 and 64. The mission of TPWD is to manage and conserve the natural and cultural 
resources of Texas and to provide hunting, fishing, and outdoor recreation opportunities for the 
use and enjoyment of present and future generations. In Texas, LPCs are considered game birds, 
however, harvest and hunting seasons for this species were suspended indefinitely in 2009.

The ODWC manages LPC under authority given by Title 29, Oklahoma Statutes, §29-3-103 
Functions, powers and duties of the Commission, which states: “A. The Wildlife Conservation 
Commission shall constitute an advisory, administrative and policymaking board for the 
protection, restoration, perpetuation, conservation, supervision, maintenance, enhancement, and 
management of wildlife in this state as provided in the Oklahoma Wildlife Conservation 
Code….,” (http://www.lsb.state.ok.us/OKStatutes/CompleteTitles/os29.rtf). The mission of the 
ODWC is to manage Oklahoma’s wildlife resources and habitat to provide scientific, 
educational, aesthetic, economic and recreational benefits for present and future generations of 
hunters, anglers and others who appreciate wildlife. LPC are considered game birds in 
Oklahoma, but there has been no open season since 1997.

Kansas manages LPC under the authorities in Kansas Statutes Annotated (KSA) 32–702 which 
states: “It shall be the policy of the state of Kansas to protect, provide and improve outdoor 
recreation and natural resources in this state and to plan and provide for the wise management 
and use of the state’s natural resources, thus contributing to and benefiting the public’s health 
and its cultural, recreational and economic life. For these purposes, the secretary, the 
commission and the department are hereby vested with the duties and powers hereinafter set 
forth.” Hunting of LPC is closely regulated in Kansas through bag limits and seasons. Research 
has indicated that hunter harvest is an insignificant source of mortality in Kansas (Hagen et al. 
2006, Hagen et al. 2007, Fields 2004, Pitman unpublished data). Removing that source of 
mortality will not result in a significant increase in population growth (Hagen et al. 2009).

CDOW has responsibility for the management and conservation of wildlife resources, including 
the conservation and management of threatened and endangered species, within their borders as 
defined and directed by state laws (i.e., Colorado Revised Statutes, Title 33, Article 1). Title 33 
Article 1-101, Legislative declaration states: “It is the policy of the State of Colorado that the 
wildlife and their environment are to be protected, preserved, enhanced and managed for the use,
benefit, and enjoyment of the people of this state and its visitors. It is further declared to be the policy of this state that there shall be provided a comprehensive program designed to offer the greatest possible variety of wildlife-related recreational opportunity to the people of this state and its visitors and that, to carry out such program and policy, there shall be a continuous operation of planning, acquisition, and development of wildlife habitats and facilities for wildlife-related opportunities.” LPC are not hunted in Colorado.

We conclude that the closure of LPC hunting seasons across most of its range warrants a reduction of the listing priority ratings to eight. The best scientific and commercial information available indicates that the LPC is not now, or in the foreseeable future, threatened by the overutilization for commercial, recreational, scientific or educational purposes to the extent that listing under the ESA as a threatened or endangered species is warranted at this time.

3. DISEASE OR PREDATION
As identified in the LPCCI (Davis et al. 2008), LPC have a short life expectancy and, as with most prairie grouse, eventually die from predation (Bergerud 1988). Rough-legged hawk (Buteo lagopus), red-tailed hawk (Buteo jamaicensis), prairie falcon (Falco mexicanus), Cooper’s hawk (Accipiter cooperii), northern harrier (Circus cyaneus), ferruginous hawk (Buteo regalis), golden eagle (Aquila chrysaetos), great horned owl (Bubo virginianus), coyote (Canis latrans), and badger (Taxidea taxus) have all been identified as predators of LPC adults and chicks. Nesting hens, eggs, and chicks are most vulnerable to predation, especially where nesting cover and brood habitat are inadequate to provide for concealment and escape. Predators of nests include Chihuahuan raven (Corvus cryptoleucus), striped skunk (Mephitis mephitis), ground squirrels (Spermophilus spilosoma), and bullsnakes (Pituophis melanoleucus), raccoons, bobcats, as well as coyotes and badgers.

Predation of prairie grouse is often considered a consequence of habitat quality and juxtaposition, prairie grouse density, and predator numbers. While inadequate habitat quality increase the predation risk and numerous studies have found higher rates of nest predation on grouse species in fragmented landscapes containing more edge and smaller patch sizes. The introduction of trees, power lines, or other vertical structures into prairie habitats provides hunting perches for raptors and may indirectly increase raptor predation on LPC. While this assessment identifies predation as an impact, it can be decreased by habitat improvements like those being implemented now.

To date, there have been no identified diseases that have population impacts on LPC populations. Hagen and Giesen (2005) reported no available information on ectoparasites or infectious diseases in LPC, although several endoparasites including nematodes and cestodes are known to infect the species (Addison and Anderson 1969, Stabler 1978, Pence and Sell 1979, Robel et al. 2003). In a recent study in New Mexico, LPC tested positive for Eimeria and Plasmodium species, however, the parasite load was not perceived as a significant contributor to LPC mortality (Smith et al. 2003). Hagen et al. (2002a) found low levels (<5%) of Mycoplasma spp. antibodies in LPC sera in Kansas and also concluded that such levels were not limiting to populations.
We conclude, with existing habitat conservation practices being implemented to reduce habitat fragmentation, and the best scientific and commercial information available, the LPC is not now, or in the foreseeable future, threatened by predation or disease to the extent that listing under the ESA as a threatened or endangered species is warranted at this time.

4. THE INADEQUACY OF EXISTING REGULATORY MECHANISMS

All the states within the range of the LPC have the regulatory authorities in place to protect LPC from unpermitted take. In Colorado, the LPC was listed as threatened in 1973 under its Nongame and Endangered or Threatened Species Act. All the states within the range have the species listed as a species in need of conservation under their State Wildlife Action Plan, which focuses conservation measures to reduce impacts to the species. These authorities allow states to enter into regulatory conservation programs like a CCAA with landowners and the USFWS. In addition, voluntary programs are employed to encourage conservation.

For example, with the exception of those species listed under the Kansas Nongame and Endangered Species Conservation Act, all impacts to wildlife as a result of energy production/transmission are voluntarily addressed on a case-by-case basis in Kansas. Energy development (production and transmission) is under the authority of the Kansas Corporation Commission (KCC). KDWP continues to foster and maintain a cooperative relationship with the KCC in an effort to integrate wildlife concerns into their regulatory process. At this time, the KCC does not have authority over the sighting of renewable energy projects such as wind and solar. To date, KDWP has developed a sound relationship with most renewable energy developers and as a result have avoided substantial impacts to the LPC.

In Texas, the Railroad Commission of Texas (RRC, Commission) is the state agency with primary regulatory jurisdiction over the oil and natural gas industry, pipeline transporters, natural gas and hazardous liquid pipeline industry, natural gas utilities, the LP-gas industry, and coal and uranium surface mining operations. The Oil and Gas Division of the Commission is responsible for new field designations and review and approval of directional surveys, drilling and pipeline permits, waste management permitting and administrative compliance. Individual industry associations such as the Permian Basin Petroleum Association (PBPA) and Panhandle Producers and Royalty Owners Association (PPROA) have expressed interest in voluntary regulation through a Candidate Conservation Agreement with Assurances (CCAA) for the LPC. TPWD plans to pursue that option with these associations over the next year.

The Public Utility Commission (PUC) of Texas regulates the state’s electric and telecommunication utilities, implements respective legislation, and offers customer assistance in resolving consumer complaints. The PUC also oversees transmission development projects, selects the location of those projects, and permits those projects through the issuance of a Certificate of Convenience and Necessity (CCN). Requirements for wind energy developments in Texas include county zoning permits and Federal Aviation Administration (FAA) permits. In addition, wind energy developers must provide an economic plan detailing benefits to the state and local community to the Texas Comptrollers Office to receive tax abatement. TPWD, has taken an active role in efforts to inform the PUC on potential effects of proposed developments.
on the LPC, and is pursuing efforts for voluntary mitigation of transmission impacts to LPC habitat.

In New Mexico, oil and gas development is permitted and regulated by the Oil Conservation Division of the New Mexico Energy, Minerals and Natural Resources Department (EMNRD). One of the primary goals of the EMNRD is to protect the environment and ensure responsible reclamation of land and resources affected by mineral extraction. Individual oil and gas companies within the Permian Basin Petroleum Association have also committed to voluntary regulation of impacts on LPC habitat by entering into CCA/CCAs.

Federal land management agencies have the ability to identify areas as special management areas for sensitive species. The USDA Forest Service (USFS) regards the LPC as a sensitive species and a Management Indicator Species on the Comanche and Cimarron National Grasslands (USDA–FS 2003). The Bureau of Land Management (BLM) also considers the LPC in its regional management plans (BLM 2005).

We conclude that the best scientific and commercial information available indicates the LPC is not now, or in the foreseeable future, threatened by this factor and a reduction of the listing priority rating to eight is warranted, as should have been done in 2010. Voluntary regulation efforts through CCA/CCAA programs in place, and in development, as well as voluntary offsets and mitigation are bolstering existing regulatory mechanisms for protecting LPC populations and habitat.

5. OTHER NATURAL OR MAN-MADE FACTORS AFFECTING THEIR CONTINUED EXISTENCE.
There are a variety of factors both natural or man-made that may affect LPC populations. Below we summarize those factors that some believe could impact the existence of LPC.

**Climate change and severe weather**
Understanding how weather and long-term climatic events affect LPC survival and reproduction is important to develop adequate conservation strategies that will sustain populations. Weather events can have a negative effect on recruitment of young into the population through variety of mechanisms; hail, untimely rain, and extreme temperatures. Future projections for the western United States generally include increased summer temperatures and decreased summer precipitation (Field *et al.* 2007).

Drought impacts LPC through its effect on seasonal growth of vegetation necessary to provide nesting and roosting cover, food, and escape from predators. Major droughts of the 1930s, 1950s, and early 1990s markedly reduced LPC populations across their range (Davis 2008). Increased annual precipitation resulted in small population increases in the mid-1980s, but drought conditions in early 1990s caused noticeable range-wide impacts. The sensitivity of LPC to drought was discussed by Crawford (1980) and Hamerstrom and Hamerstrom (1961); home ranges may be larger in drought years (Copelin 1963, Merchant 1982), and recruitment may be less likely after drought years (Merchant 1982, Morrow 1986, Giesen 1998). Southern portions of LPC range in New Mexico, which on average receive less total precipitation (e.g., the Carlsbad region), are impacted more frequently and more severely by drought. LPC populations
in these areas may have always been smaller and more variable than those farther to the north, although population data are insufficient to say this with certainty. Along with other prairie grouse, LPC have a high reproductive potential in years of adequate conditions. Thus, drought conditions are unlikely to be the sole causative factor in long-term LPC population declines. The effects of drought on population growth rate may be more significant in small, isolated populations.

Predictive models of climate change suggest greater fluctuations in weather patterns at all temporal scales. Increasing temperatures will likely result in a northward shift of the climatic conditions most suitable to the species, possibly resulting in the southernmost parts of the current LPC range becoming unsuitable. Such range shifts are already occurring in many species (Root et al. 2003), and as implied in this letter, may be occurring for the LPC. However, this climatic shift appears as though it may occur more quickly than appropriate habitats can correspondingly shift northward, potentially creating a disconnect between appropriate climatic conditions and suitable habitat conditions (Inkley et al. 2004). Fortunately, extensive habitats that are probably suitable for the species (sandsage prairie and mixed-grass prairies) already exist to the north of the current LPC range, particularly in northeastern Colorado, northwestern Kansas and western Nebraska, and as implied earlier, LPC could shift into these more-northern habitats as temperatures increase.

Energy development and infrastructure
Energy exploration and development occur on public and private lands throughout the range of LPC. Although the effects of oil and gas developments on LPC are poorly understood, recent studies suggest development of oil and gas resources negatively impact prairie grouse, particularly during the breeding season (Lyon and Anderson 2003, Pitman et al. 2005). As mentioned before, LPC require large, mostly-contiguous tracts of prairie ecosystems to fulfill their life history requirements. The cumulative impacts of roads and increased traffic, well pads, pipelines, overhead transmission lines, compressor stations, and production facilities not only result in direct habitat loss but fragment remaining suitable habitat deterring use by LPC (Pitman et al. 2005). Prairie grouse avoid areas near improved roads, power lines, and other man-made infrastructures (Pitman et al. 2005). Crawford and Bolen (1976) noted that LPC leks adjacent to heavily traveled roads were abandoned at higher rate than those found further from anthropogenic disturbance. The effect of daily vehicular traffic associated with maintenance of oil and gas operations along these road networks can also impact breeding activities and may further decrease the availability of habitat (Braun et al. 2002). Construction of transmission lines also provides perches for various raptor species, which could potentially increase the mortality rate of LPC (Bidwell et al. 2003). Noise associated with pumping and oil field activities may impact breeding activities if background noise interferes with mating display vocalizations. Further, sage-grouse lek attendance was lower on breeding grounds located in close proximity to active mineral resource developments compared to less disturbed lek sites (Braun et al. 2002). Braun (1986) speculated if noises associated with pumping and oil field activity deter recruitment of yearling sage-grouse males to breeding grounds, leks could become extinct.

Presently, little is known on how wind power developments affect LPC and/or LPC habitats. To date, the effects are speculative and are not justification for listing. Areas within the range of LPC are currently being monitored for suitability as wind energy sites. These developments
include the towers and turbines that harness the energy, as well as access roads and transmission line connections to substations or other existing power grids. Physical disturbance affected by the construction of turbines, turbine noise, and physical movement of turbines during operation have the potential to disturb nesting LPC (Robel et al. 2004). However, behavioral avoidance of these facilities by prairie grouse has the potential to greatly broaden the negative impacts of the project area. The effects of habitat fragmentation may indirectly affect local LPC populations by decreasing the area of habitat available for nesting and brood-rearing (Pitman et al. 2005). While in earlier studies the behavioral response of the greater prairie-chicken (GPC) appeared to be similar to that of the LPC, recent studies by Kansas State University is finding minimal impacts to GPC. The prediction that nesting and brood-rearing hens of both species will avoid large wind turbines by at least a one-mile radius made by Robel et al. 2004 may not hold true. Fragmentation and changes in habitat structure may increase the amount of edge, which may serve as travel lanes for terrestrial predators (Kuehl and Clark 2002). Such areas are consequently avoided by LPC for nesting and general habitat use (Robel 2002a, Pitman et al. 2005). In addition to the effects of habitat fragmentation, prairie grouse avoidance of vertical structures (Anderson 1969, Manes et al. 2002) and human disturbance activities may further impact LPC movements and habitat use (Robel 2002a, b). Therefore, this type of land use change has a variety of potential impacts to LPC.

The 2008 CNOR cited the potential for unregulated wind energy development as evidence for increasing the LPC listing priority rating. Since that time, there has been very little wind energy development within the current estimated occupied range. This trend appears to be related, in part, to the recent economic slowdown and scarcity of credit. However, wind developers appear to be focusing more on areas outside of the range of the species, and are working towards ways to minimize and compensate for future take within that range. Thirteen of the largest wind energy companies in the United States are working with USFWS on the development of a Habitat Conservation Plan (HCP) for LPCs across the range.

**Hybridization**

Historically, the breeding distributions of LPC and greater prairie-chickens overlapped in a zone approximately 50 miles wide in west-central Kansas (Schwilling 1955, Aldrich 1963). The range of sharp-tailed grouse (*Tympanuchus phasianellus*) also overlapped LPC range in both western Kansas and southeastern Colorado (Aldrich 1963). It is likely all 3 of these prairie grouse species hybridized to a limited extent in these historical areas of overlap, just as sharp-tailed grouse and greater prairie-chickens have continued to hybridize in the Nebraska Sandhills (Sisson 1976). Range contractions eliminated these regions of prairie grouse overlap in west-central Kansas, approximately from the 1930’s forward (Schwilling 1955).

With the addition of extensive native, mixed-species grasslands provided by CRP in Kansas, both LPC and greater prairie-chickens extended their modern ranges back into the historical zone of overlap in west-central Kansas (Rodgers 1999, Rodgers and Hoffman 2005). In this region, mixed leks and limited hybridization between these species have again occurred (Bain 2002, Rodgers and Hoffman 2005). With approximately 10 years passing since mixed leks and hybrids were re-identified in Kansas, monitoring by the KDWP in the region of overlap has not detected any change in the prevalence of either species or in the proportion of hybrids present. Bain (2002) detected no instances of successful mating by hybrids. Thus, it appears this reuniting of
LPC and GPC within their historic range of overlap poses no threat to the genetic integrity of either species.

We conclude that efforts by wind energy developers to minimize or compensate for future LPC take and a general lack of expansion of wind energy across the range of the species over the past three years warrant a reduction in the listing priority to eight. The best scientific and commercial information available indicates other natural and man-made factors indicates the LPC is not now, or in the foreseeable future, threatened by this factor and a reduction of the listing priority rating to eight is warranted, as should have been done in 2010. As implied in this letter, LPC may be reacting to climate change by shifting their range but these and other potential impacts (hybridization and energy development and infrastructure) are not fully known or understood.

Conclusions and Recommendations
A significant portion of the LPC EOR is on private land where the ESA has less ability to influence land and species management and where voluntary private landowner agreement is necessary for successful conservation on a landscape scale. Many private landowners are reluctant to partner to conserve a species if they believe they are risking ESA restrictions in the future. However, increasing occupied acreage and the level of active conservation on private land are necessary to meet any population objectives or change a trend. Private landowners must be part of the solution, and that depends on their successful interaction with state wildlife agencies. We believe increased trust by private landowners and the greatest conservation success will be met by leaving LPC management under state wildlife agency authority.

WAFWA believes the threats specified in the 2008 CNOR, such as expiration of CRP and potential for habitat loss caused by energy development, which led to the increase in listing priority have been addressed and warrant a reduction in CNOR ranking to the pre-2008 level of eight. We believe that changes in these factors and voluntary conservation efforts, such as CCA/CCAA programs and mitigation efforts, have significantly reduced the threats to the species. Those changes were not acknowledged and adequately evaluated and addressed in the 2010 CNOR, and more than likely, changed the USFWS listing priority. WAFWA requests the USFWS address these issues and reduce the listing priority prior to the development of a proposed rule, and that USFWS may use its resources to pursue the development of proposed rules for higher priority candidate species.

As demonstrated over the past 15 years, WAFWA states within the range of the LPC remain committed to leading the multi-state conservation effort for grassland-associated species and the habitats they depend upon to survive. This partnership has promoted on-the-ground conservation efforts to enhance grassland wildlife populations. We believe this ongoing partnership and continued partnerships with private landowners are critical to the continue conservation of LPC.

Thank you again for the opportunity to provide input on the proposed listing of LPC. If you have any questions about information in this letter please contact Bill Van Pelt, WAFWA Grassland Coordinator at 623-236-7573.
Sincerely,

[Signature]

WAFWA President

Attachment (1): Literature Cited

cc: WAFWA LPC Grassland Initiative Directors
    Bill Van Pelt, WAFWA Grassland Coordinator
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