

FOR FURTHER INFORMATION CONTACT: Mr. Wayne S. White, Chief, Division of Endangered Species, at the above address (503/231-6131 or FTS 429-6131).

SUPPLEMENTARY INFORMATION:

Background

Kangaroo rats (genus *Dipodomys*) are mammals specialized for rapid travel by hopping on their elongated hind legs and for transportation of food in their external cheek pouches. Primarily inhabiting relatively dry, open country of western North America, they construct burrows for shelter and often for food storage. The giant kangaroo rat (*Dipodomys ingens*), found only in south-central California, was described by Merriam (1904) from specimens collected southeast of Simmler, San Luis Obispo County. With a weight of 4.6 to 6.4 ounces (131 to 180 grams), it is the heaviest of all kangaroo rats. Total length is 12.2 to 13.7 inches (311 to 348 millimeters), tail length is 6.2 to 7.8 inches (157 to 198 millimeters), and hind foot length is 1.8 to 2.2 inches (46 to 55 millimeters). Other distinguishing features include the presence of five toes on each hind foot (some other kangaroo rats have only four), short ears and tail in relation to head and body length, and a broad width across the maxillary processes of the zygomatic arches of the skull (Hall 1981). The general coloration is brown above and white below.

The preferred habitat of the giant kangaroo rat is native annual grassland with sparse vegetation, good drainage, fine sandy-loam soils, and a slope of less than 10 percent (Grinnell 1932, Williams 1980). The annual precipitation is typically 5 inches (127 millimeters) or less. As an adaptation to the sparse rainfall and vegetation, the species makes extensive caches of plant seeds just below the surface of the soil during the spring (Shaw 1934). A variety of seeds and their sprouts are harvested during the summer and stored in burrows dug by the animals. The burrows are shallow, approximately 1 foot (300 millimeters) deep, but generally still at a depth greater than that reached by the sparse rainfall (Grinnell 1932). If rains did penetrate into the burrows, winter food supplies would likely spoil. In a recent study of movements, Braun (1985) found that individuals of *D. ingens* typically foraged above ground for less than 20 minutes per night, and within an area of less than a third of an acre (1,200 square meters).

The original distribution of the giant kangaroo rat is known to have extended from southern Merced County, through the San Joaquin Valley, to southwestern Kern County and northern Santa

Barbara County (Hall 1981). Recent status surveys (Williams 1980, 1985) indicate that substantial populations survive in only a few areas at the southern edge of the original range. A principal factor in the decline of the giant kangaroo rat has been the conversion of native grassland to agricultural production. Remaining populations are susceptible to becoming genetically isolated because of habitat fragmentation. They may also be jeopardized by application of rodenticides used to control "target" species such as the California ground squirrel (*Spermophilus beecheyi*), and by recreational activities, other human-induced activity, and predation.

In the **Federal Register** of December 30, 1982 (47 FR 58454), the Service included the giant kangaroo rat in category 1 of the Review of Vertebrate Wildlife. Category 1 indicates taxa for which the Service now has substantial information to support listing as endangered or threatened. In the **Federal Register** of August 13, 1985 (50 FR 32585), the Service proposed the giant kangaroo rat as an endangered species. This final rule places the species under the protection of the Endangered Species Act of 1973, as amended.

Summary of Comments and Recommendations

In the proposed rule of August 13, 1985 (50 FR 32585), and associated notifications, all interested parties were requested to submit factual reports or information that might contribute to the development of a final rule. Appropriate State and Federal agencies, county governments, biologists, and other interested parties were contacted and requested to comment. Newspaper notices inviting public comment were published in the *Hanford Sentinel* (September 17, 1985), *Turlock Journal* (September 19, 1985), *Fresno Bee* and *Bakersfield Californian* (September 20, 1985), *Los Angeles Times* (September 22, 1985), and *Daily Midway Driller* (September 23, 1985). A public hearing was requested by the California Department of Food and Agriculture (CDFA) on September 27, 1985. The hearing was held in Bakersfield on December 16, 1985. A notice of the hearing and of the reopening of the public comment period was published in the **Federal Register** on November 26, 1985 (50 FR 48617). The comment period closed December 31, 1985. During both comment periods, 21 written and 11 oral comments were received. Multiple comments (whether written or oral) by the same individual were regarded as one. Five comments favored listing. 11

DEPARTMENT OF THE INTERIOR

Fish and Wildlife Service

50 CFR Part 17

Endangered and Threatened Wildlife and Plants; Determination of Endangered Status for the Giant Kangaroo Rat

AGENCY: Fish and Wildlife Service, Interior.

ACTION: Final rule.

SUMMARY: The Service determines endangered status for the giant kangaroo rat, a mammal of south-central California. The historic range of this species has been substantially reduced by agricultural development and other land-modifying actions. Extant populations consist of small, widely scattered colonies that are highly vulnerable to single catastrophic events. The species is jeopardized by the conversion of remaining habitat, other human-induced actions that are occurring within or adjacent to population sites, and natural factors such as predation. This rule implements the protection provided by the Endangered Species Act of 1973, as amended, for the giant kangaroo rat.

DATES: The effective date of this rule is January 5, 1987.

ADDRESSES: The complete file for this rule is available for inspection, by appointment, during normal business hours at the U.S. Fish and Wildlife Service, Lloyd 500 Building, 500 NE, Multnomah Street, Suite 1692, Portland, Oregon 97232.

opposed listing, and 9 expressed no opinion regarding listing. Federal agencies provided no additional biological data on the status of this species, but either indicated that Federal listing would not significantly increase workload requirements, or expressed concern relating to specific projects within the geographic range of the species. Responding Federal agencies were the U.S. Army Corps of Engineers and the Bureau of Reclamation. One State agency, the California Department of Fish and Game (CDFG), supported the proposal, but provided no additional data.

Many of the respondents questioned the accuracy of the Service's data on the status of the giant kangaroo rat, or expressed concern on specific language in the text of the proposed rule. The Service received comments in these categories from four State and three county agencies, four agricultural and pest control agencies and specialists, an oil and gas development interest, and three concerned individuals. Comments have been grouped into several categories depending on content. These comments, and the Service response to each, are listed below.

Comment 1. There is a lack of supportive evidence that rodenticides are contributing to the endangerment of the giant kangaroo rat. No giant kangaroo rats have been documented ever as being killed during rodenticide programs.

Service Response. The Service acknowledges that evidence linking rodenticide application to declines or extirpation of giant kangaroo rat colonies is only circumstantial. However, the Service maintains that such rodenticide-related declines or extirpations of specific colonies may have occurred because the duration of time between ingestion of treated grain baits and death is sufficiently long to allow kangaroo rats to seek refuge underground in burrows after onset of poisoning symptoms. Opportunity of encountering poisoned giant kangaroo rats on the surface is correspondingly low. Application of compound 1080 during 1985 in southeastern San Luis Obispo County may have been undertaken without awareness of specific giant kangaroo rat colony locations. At least twice, application of this rodenticide overlapped a giant kangaroo rat colony site (Dr. Daniel F. Williams, California State University, Stanislaus, pers. comm., August 4, 1985). Although information supplied by Richard Greek, San Luis Obispo County Agricultural Commissioner (pers. comm., December 26, 1985) shows that this

overlap was not extensive, field examinations of colonies adjacent to the rodenticide application area documented recent population declines ranging between 50 and 100 percent (Williams, pers. comm., October 1, 1985). Circumstantial evidence (proximity to known rodenticide application area, lack of surface disturbance to colony site, extirpation apparently coinciding with approximate dates of rodenticide use, and lack of other rodent sign in area) suggests that rodenticide use may have been a causative factor in some of these apparent declines (Williams, pers. comm., October 1, 1985). The Service acknowledges, however, that rodenticide poisoning may have been a factor contributing to population declines in only a small percentage of the historic giant kangaroo rat colonies.

Comment 2. The use of the word "indiscriminate," when addressing effects of rodenticides on the giant kangaroo rat, is misleading and inappropriate.

Service Response. The word "indiscriminate" in the proposed rule text was used to infer application of rodenticides, within the geographic range of *D. ingens*, utilizing accepted dosages and techniques of application without awareness of locations of giant kangaroo rat colonies. The failure to provide various county vertebrate pest control agencies with specific giant kangaroo rat colony locations until after publication of the proposed rule contributed to this lack of awareness.

Comment 3. Federal listing of the giant kangaroo rat would lead to increased restriction or even elimination of the use of certain rodenticides in areas where giant kangaroo rats are present; large agricultural areas would become out-of-bounds for rodent-control operations.

Service Response. The biology of the giant kangaroo rat, and information available on distribution of current population sites and rodenticide treatment areas for the California ground squirrel, indicate that restrictions over large areas within the historic geographic range of the giant kangaroo rat are not needed to ensure its protection. Restrictions on rodenticide use, imposed for the endangered Morro Bay kangaroo rat (*Dipodomys heermanni morroensis*), are not applicable to the giant kangaroo rat. The former species, confined to a very limited area in San Luis Obispo County, could become extinct from even a single treatment of rodenticides. The giant kangaroo rat, however, occurs as small, disjoint, widely separated populations spread over a much larger geographic area. According to information received

during the public comment process, a significant portion of the range of the giant kangaroo rat does not overlap with rodent-control areas. In areas where overlap does occur, the Service is willing to work closely with respective State and county governments to ensure protection of extant giant kangaroo rat colonies without significantly disrupting California ground squirrel control operations. While this process may restrict application of rodenticides on a site-specific basis, fears regarding large-scale disruption of such programs are unwarranted.

Comment 4. Federal listing of the giant kangaroo rat may curtail rodent-control programs along State and Federal water projects.

Service Response. Listing this species will have no effect on present operations. A prior survey of the State Water Project (Jones and Stokes Associates 1981) did not document the occurrence of any giant kangaroo rats. The Service is not aware of any colonies adjacent to water developments within the geographic range of this species.

Comment 5. Efforts need to be principally focused towards protection of remaining habitats.

Service Response. The Service concurs that protection of remaining habitat for the giant kangaroo rat is a principal management tool that may be applied for long-term perpetuation of this species. Specific measures to be applied to this end will be addressed during development and implementation of a Recovery Plan for this species.

Comment 6. No data are available showing that energy production (i.e., petroleum development) contributes to the decline of the giant kangaroo rat. Federal listing consideration should be deferred until appropriate analysis of these effects is undertaken.

Service Response. Petroleum development activities are land-modifying actions that result in habitat loss, and disruption and mortality to local wildlife populations. These effects may include: (1) Loss of food and cover through removal of vegetation; (2) destruction of burrow systems and other places of refuge and concealment; (3) direct mortality of small mammals by crushing, entrapment, or oil spillage; (4) displacement of some animals to adjacent areas already at carrying capacity; and (5) increased mortality on-site due to increased equipment and vehicle use within the project area. Mortality of giant kangaroo rats has been recently documented from spillage of oil in the Buena Vista Valley. Fourteen giant kangaroo rats were found dead in a drainage contaminated by oil

(Chuck Harris and Thomas O'Farrell, EG&G Energy Measurements Group, Santa Barbara Operations, Goleta, California, pers. comm., March 5 and April 18, 1986). Based on information supplied during the comment period, potential for occurrence of the giant kangaroo rat in many oilfields appears to be low (Williams, pers. comm., December 26, 1985). While the Service agrees that detailed studies on the effects of oil and gas extraction activities on this species are warranted, direct evidence of mortality from these activities has already been documented.

Comment 7. Existing State regulations adequately protect the giant kangaroo rat. Federal listing is therefore inappropriate for this species.

Service Response. The Act provides for consideration of existing regulatory mechanisms in determining appropriate classification of species as endangered or threatened. However, joint efforts undertaken by the State and counties for the protection of the giant kangaroo rat since its State listing as endangered in 1980 have not been successful in securing extant habitats or arresting declines in remaining colonies from a variety of causes (i.e., recreational use, mining, and livestock production). Although specific reasons for the loss or decline in many giant kangaroo rat colonies is not known, the status of the species has continued to deteriorate since State listing.

Comment 8. Designation of critical habitat for the giant kangaroo rat is appropriate at this time.

Service Response. Concerns originally provided in the proposed rule relating to designation of critical habitat for the giant kangaroo rat remain valid. At some future point, if critical habitat is recommended for this species, comments and opinions will be solicited from all interested parties prior to any final determination.

Comment 9. Predation and/or disease may be significant impacts on the giant kangaroo rat and were not adequately addressed in the proposed rule. Many sites now occupied by this species show signs of visits by predators, such as the badger and kit fox.

Service Response. Text in the final rule has been revised to more accurately reflect these issues. Although extent of predation on the giant kangaroo rat is unknown, the small size, low population numbers, and high degree of isolation of local populations of this species make them highly vulnerable to extirpation from single catastrophic events (Williams, pers. comm., October 1, 1985). Although kangaroo rats are preyed on by the kit fox, the latter species also utilizes a wide array of other prey,

including the California ground squirrel (O'Farrell 1983, Balestreri 1981). No information is available on the susceptibility of the giant kangaroo rat to plague.

Comment 10. Interested parties, such as private landowners and leaseholders, were not provided an opportunity to comment prior to publication of the proposed rule in the *Federal Register*. Regulations pertaining to listing provisions of the Endangered Species Act require the Service to consult with affected States, interested organizations, and other Federal agencies.

Service Response. The Service did attempt to solicit both agency and individual comments on the proposed listing of the giant kangaroo rat. As part of this process, notification was specifically forwarded to elected officials; Federal, State, and county agencies; and individuals with specific knowledge of this species. The publication of the proposed rule in the *Federal Register*, the opening of public comment periods, the public hearing, and advertisement in several newspapers soliciting comment were also part of this process. Regulations pertaining to listing procedures, however, do not specify contacting all potentially interested landowners and leaseholders prior to publication of a proposed rule.

Comment 11. Significant data are lacking relative to present range and status of the giant kangaroo rat. Information in the proposed rule on these topics was incorrectly presented.

Service Response. Text changes in the final rule have been made to accommodate these concerns to the extent appropriate. The Service notes that information provided during the comment period indicates that the extent of overlap between the species' range and rodenticide application areas is not extensive, and that projections in remaining habitats indicate a downward trend for future agricultural development. The Service recognizes that little life history information is available concerning cyclic population fluctuations that may result from natural factors such as disease or predation. Nonetheless, available information indicates that many populations of the giant kangaroo rat in Fresno, Kern, and San Luis Obispo Counties have been extirpated or have experienced recent precipitous declines (Williams 1985; and pers. comm., December 26, 1985). This trend, if left unchecked, could result in a significant loss of remaining colony sites within a short period of time. Although the cause of these declines is not clearly understood in many instances, the

overall trend in the status of this species is dramatic and negative.

The Service's original description of the extent of the historic range of the species was based on the estimate provided by Williams (1980). A subsequent estimate of historic range was substantially higher (Robert Harrison, Western Oil and Gas Assoc., pers. comm., December 12, 1985). This estimate, however, did not exclude several locality records with voucher specimens that had been mislabeled or incorrectly identified (Williams, pers. comm., December 26, 1985). The Service acknowledges that estimates of original geographic range are gross. While estimates of historic range lost to land-modifying actions may vary, it is evident that a significant proportion has been lost. Comments relating to a comparison between historic range and current habitat have been made in the text. Comparison between historic and extant occupied habitat is difficult for any given species for several reasons: (1) Usually few early data on distribution and extent of habitat are available prior to onset of surface-modifying actions; (2) the species is generally not distributed uniformly, even when habitat exists; and (3) acquisition of range-wide data is usually difficult or impossible due to land access, availability of funding, and manpower constraints. Data available to the Service for the giant kangaroo rat show a downward, rapid decline in extant colony sites irrespective of percentage of overall habitat loss (Williams 1980, 1985; and pers. comm., October 1, 1985, December 26, 1985). Although additional giant kangaroo rat colonies likely will be discovered during future inventories, the Service concludes, based on current data, that information documenting current condition of known colony sites accurately represents the current status of the species as a whole. Should future studies locate additional, significant, viable giant kangaroo rat colonies, the Service will reassess the status of this species at that time.

Summary of Factors Affecting the Species

After a thorough review and consideration of all information available, the Service has determined that the giant kangaroo rat should be classified as an endangered species. Procedures found at Section 4(a)(1) of the Endangered Species Act (16 U.S.C. 1531 *et seq.*) and regulations (50 CFR Part 424) promulgated to implement the listing provisions of the Act were followed. A species may be determined to be an endangered or threatened

species due to one or more of the five factors described in Section 4(a)(1). These factors and their application to the giant kangaroo rat (*Dipodomys ingens*) are as follows:

A. *The present or threatened destruction, modification, or curtailment of its habitat or range.* Recent surveys by Dr. Daniel F. Williams of California State University, Stanislaus (1980, 1985; and pers. comm., October 1, 1985, December 16, 1985, December 26, 1985), and Dr. Thomas O'Farrell of EG&G Energy Measurements Group, Santa Barbara Operations, Goleta, California (pers. comm., July 26, 1983), indicate that habitat loss has been a major factor in the decline of the giant kangaroo rat. Most optimal habitats, situated on the floor of the San Joaquin Valley, have been lost to agricultural development. These habitats supported population densities of nearly 21 kangaroo rats per acre (52 per hectare). Estimates of historic geographical range of this species vary between 1,300,000 acres (527,600 hectares) (Williams 1980) and 2,500,000 acres (1,000,000 hectares) (Harrison, pers. comm., December 12, 1985) in southern Merced, eastern San Benito, western Fresno, southwestern Kings, eastern San Luis Obispo, western Kern, and northern Santa Barbara Counties.

During the 20th Century, conversion of native habitat to crop production resulted in a precipitous drop in the numbers and distribution of the giant kangaroo rat. The species cannot survive where the processes of cultivation destroy its burrows and food caches. As recently as the late 1950s, population densities remained high over substantial areas, but major water diversion projects in the late 1960s and 1970s stimulated the agricultural conversion of many of these areas. Agricultural production, most notably dryfarming, is still occurring near remaining giant kangaroo rat populations in western Kern and southeastern San Luis Obispo Counties. However, cultivated land has declined in recent years, with no current signs that this trend will reverse in the near future (Greek, pers. comm., December 16, 1985). Additional habitat may also have been lost to urbanization.

Several human-induced factors other than agricultural production have been noted as impacting the giant kangaroo rat and its habitat. These include collapse of kangaroo rat burrows and obliteration of a colony from mining activity, extirpation of a large colony from construction of a rifle range, trampling of and precipitous declines in a population from camping activities,

collapse of kangaroo rat burrows and declines in two colonies where concentrated livestock use has occurred, partial destruction of a large colony from road widening, construction of several structures along the edge of a colony, and direct impacts to extant colonies from off-road vehicle use (Williams; and 1985 pers. comm., October 1, 1985, December 26, 1985). Although the extent of effects of oil and gas development on the species is not known, intensive development, requiring almost complete alteration of native habitats and recontouring of soil surface profiles, could adversely affect this species by direct and indirect means.

In 1980, colonies consisted of widely scattered small populations within a total area of less than 76,800 acres (31,000 hectares); subsequent surveys of these areas indicate that extant habitat has been reduced by at least 50 percent (Williams, pers. comm., December 26, 1985). The giant kangaroo rat apparently has been completely exterminated in Merced County, and only a few small, isolated colonies survive in San Benito, Fresno, and Kings Counties. The last relatively large blocks of suitable habitat are at the southern edge of the historic range of the species, in the upper Buena Vista Valley of western Kern County, the Elkhorn and Carrizo Plains of eastern San Luis Obispo County, and the Cuyama Valley of northern Santa Barbara County. Surveys made in 1985 have documented precipitous declines in populations present on the Carrizo and Elkhorn Plains while the current status of the Cuyama Valley population is not known (Williams, pers. comm., December 26, 1985).

B. *Overutilization for commercial, recreational, scientific, or educational purposes.* Not applicable to this species.

C. *Disease or predation.* Many extant colonies are small in population size and vulnerable to single catastrophic events (Williams, pers. comm., October 1, 1985). A recent survey of several colonies provided widespread evidence of carnivore disturbance of giant kangaroo rat burrow systems. As a result, Williams (pers. comm., October 1, 1985) concluded that predation could be a factor in the decline or even extirpation of small, isolated populations. The nature of these colonies also suggests a high vulnerability to extirpation via disease, although this has not been documented as a cause of decline.

D. *The inadequacy of existing regulatory mechanisms.* The California State Fish and Game Commission listed the giant kangaroo rat as endangered in 1980. State law regulates and prohibits

taking. Efforts for the protection of this species since its State listing have failed to curtail habitat loss, secure high density population sites, or arrest declines and extirpation of remaining colonies from a variety of causes. A joint program in effect between the CDFG, the CDFA, and various county agencies, designed to protect the giant kangaroo rat, has been ineffective in reducing declines of this species.

E. *Other natural or manmade factors affecting its continued existence.* Many populations of the giant kangaroo rat have recently been extirpated or have exhibited severe population declines without any visible on-site disturbance (Williams 1985; and pers. comm., October 1, 1985). Although the specific causes of these downward trends may not be understood, and may warrant additional investigation, the overall trend in the status of this species is characterized by dramatic declines in numbers and distribution. Based on comparison of historic giant kangaroo rat colony sites between 1980 and 1985, Williams (pers. comm., December 26, 1985) estimated that more than half of the populations extant in 1980 had been extirpated, and that those remaining have all declined in density. Rodent control programs and the use of rodenticides for "target" species, such as the California ground squirrel, may have eliminated or reduced some colonies of the giant kangaroo rat (Williams 1980, 1985; and pers. comm., August 4, 1985). Remaining populations are located in marginal habitats where probability for extirpation is high and potential for dispersal and recolonization to adjacent, previously occupied areas is remote (Williams, pers. comm., December 26, 1985). Braun (1985) reported that whereas *D. ingens* once occupied large tracts of land, to the total exclusion of other rodent species, in her study area it shared its habitat with at least six other rodents; this and most other areas still used by *D. ingens* are not likely prime habitat for it.

The Service has carefully assessed the best scientific information available regarding the past, present, and future threats faced by this species in determining to make this rule final. Based on this evaluation, the preferred action is to list the giant kangaroo rat as endangered. The species is currently faced with a multiplicity of problems resulting in recent precipitous declines of extant populations and habitats. This trend, if left unchecked, could result in extinction. A decision to take no action or to determine only threatened status would not accurately express this situation. Critical habitat designation is

not included in this rule for the reasons discussed below.

Critical Habitat

Section 4(a)(3) of the Act, as amended, requires that to the maximum extent prudent and determinable, the Secretary designate critical habitat at the time a species is determined to be endangered or threatened. The Service finds that designation of critical habitat is not prudent for the giant kangaroo rat at this time. As discussed under factors "D" and "E" in the "Summary of Factors Affecting the Species," the giant kangaroo rat is threatened by taking, the prevention of which is difficult to enforce. During the public hearing of December 16, 1985, it was brought out that several persons had expressed the desire to eliminate by poisoning the populations of the giant kangaroo rat on the Elkhorn Plain. These populations are the most significant that still survive. Publication of precise critical habitat descriptions and maps could make these and other populations even more vulnerable. Such published descriptions and maps are not necessary to protect the habitat of the giant kangaroo rat, as that will be addressed through the recovery process and Section 7 consultation (see following section).

Available Conservation Measures

Conservation measures provided to species listed as endangered or threatened under the Endangered Species Act include recognition, recovery actions, requirements for Federal protection, and prohibitions against certain practices. Recognition through listing encourages and results in conservation actions by Federal, State, county, and private agencies, groups, and individuals. The Endangered Species Act provides for possible land acquisition and cooperation with the States and requires that recovery actions be carried out for all listed species. Such actions are initiated by the Service following listing. The protection required of Federal agencies and the prohibitions against taking and harm are discussed, in part, below.

Section 7(a) of the Act, as amended, requires Federal agencies to evaluate their actions with respect to any species that is proposed or listed as endangered or threatened and with respect to its critical habitat if any is being designated. Regulations implementing this interagency cooperation provision of the Act are codified at 50 CFR Part 402 (see revision at 51 FR 19926; June 3, 1986). Section 7(a)(2) requires Federal agencies to ensure that activities they authorize, fund, or carry out are not likely to jeopardize the continued

existence of a listed species or to destroy or adversely modify its critical habitat. If a Federal action may affect a listed species or its critical habitat, the responsible Federal agency must enter into formal consultation with the Service.

Known Federal activities that may affect the giant kangaroo rat are rodent control operations, the issuance of leases for grazing and other agricultural purposes on Bureau of Land Management (BLM) holdings, sanctioned use of motorized vehicles off-road within giant kangaroo rat habitat, and the issuance of leases subsequent to oil or natural gas exploration and development on both BLM and Department of Energy (DOE) lands. Portions of the range of the giant kangaroo rat in the Buena Vista Valley are within the Elk Hills Naval Petroleum Reserve (NPR-1) and the Buena Vista Naval Petroleum Reserve (NPR-2) where possible exploration and development may occur. Actions that may affect the giant kangaroo rat in these areas may also affect the San Joaquin kit fox (*Vulpes macrotis mutica*) and blunt-nosed leopard lizard (*Gambeli silus*), which are currently classified as endangered pursuant to the Act. No major conflicts are known or expected at this time. The Service will work with BLM and DOE to attempt to accommodate both the listed species and oil and gas exploration and development. The involved Federal agencies are already consulting with the Service, and additional impacts due to this listing are expected to be minimal.

The Act and implementing regulations found at 50 CFR 17.21 set forth series of general prohibitions and exceptions that apply to all endangered wildlife. These prohibitions, in part, make it illegal for any person subject to the jurisdiction of the United States to take, import or export, ship in interstate commerce in the course of commercial activity, or sell or offer for sale in interstate or foreign commerce any listed species. It also is illegal to possess, sell, deliver, carry, transport, or ship any such wildlife that has been taken illegally. Certain exceptions apply to agents of the Service and State conservation agencies.

Permits may be issued to carry out otherwise prohibited activities involving endangered wildlife species under certain circumstances. Regulations governing permits are at 50 CFR 17.22 and 17.23. Such permits are available for scientific purposes, to enhance the propagation or survival of the species, and/or for incidental take in connection with otherwise lawful activities. In some

instances, permits may be issued during a specified period of time to relieve undue economic hardship that would be suffered if such relief were not available.

National Environmental Policy Act

The Fish and Wildlife Service has determined that an Environmental Assessment, as defined under the authority of the National Environmental Policy Act of 1969, need not be prepared in connection with regulations adopted pursuant to Section 4(a) of the Endangered Species Act of 1973, as amended. A notice outlining the Service's reasons for this determination was published in the *Federal Register* on October 25, 1983 (48 FR 49244).

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Author

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List of Subjects in 50 CFR Part 17

Endangered and threatened wildlife,
Fish, Marine mammals, Plants
(agriculture).

Regulation Promulgation

PART 17—[AMENDED]

Accordingly, Part 17, Subchapter B of

Chapter I, Title 50 of the Code of Federal Regulations, is amended as set forth below:

1. The authority citation for Part 17 continues to read as follows:

Authority: Pub. L. 93-205, 87 Stat. 884; Pub. L. 94-359, 90 Stat. 911; Pub. L. 95-632, 92 Stat. 3751; Pub. L. 96-159, 93 Stat. 1225; Pub. L. 97-304, 96 Stat. 1411 [16 U.S.C. 1531 *et seq.*].

2. Amend § 17.11(h) by adding the following, in alphabetical order under MAMMALS, to the List of Endangered and Threatened Wildlife:

§ 17.11 Endangered and threatened wildlife.

* * * * *
(h) * * *

Species		Historic range	Vertebrate population where endangered or threatened	Status	When listed	Critical habitat	Special rules
Common name	Scientific name						
MAMMALS							
Rat, giant kangaroo	<i>Dipodomys ingens</i>	U.S.A. (CA)	Entire	E	250	NA	NA

Dated: December 2, 1986.

P. Daniel Smith,

Acting Assistant Secretary for Fish and Wildlife and Parks.

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