

**DEPARTMENT OF THE INTERIOR****Fish and Wildlife Service****50 CFR Part 17****Determination That *Pediocactus peeblesianus* var. *peeblesianus* Is an Endangered Species**

**AGENCY:** Fish and Wildlife Service, Interior.

**ACTION:** Final rule.

**SUMMARY:** The Service determines *Pediocactus peeblesianus* var. *peeblesianus* (Peebles Navajo cactus), a native plant of Arizona, to be an Endangered species. Gravel extraction, highway construction operations, and cattle grazing have led to degradation and loss of the plants' restricted habitat. The plants are in demand by cactus collectors, and removal by commercial suppliers and private collectors has caused a decline in the natural population. This determination will extend to this cactus the protection provided by the Endangered Species Act of 1973, as amended.

**DATE:** This rulemaking becomes effective on November 28, 1979.

**FOR FURTHER INFORMATION CONTACT:** Mr. John L. Spinks, Jr., Chief, Office of Endangered Species, Fish and Wildlife Service, U.S. Department of the Interior, Washington, D.C. 20240, 703/235-2771.

**SUPPLEMENTARY INFORMATION:****Background**

The Secretary of the Smithsonian Institution, in response to Section 12 of the Endangered Species Act, presented his report on plant taxa to Congress on January 9, 1975. This report, designated as House Document No. 94-51, contained lists of over 3,100 U.S. vascular plant taxa considered by the Smithsonian Institution to be endangered, threatened, or extinct. On July 1, 1975, the Director published a notice in the **Federal Register** (40 FR 27823-27924) of his acceptance of the report of the Smithsonian Institution as a petition within the context of Section 4(c)(2) of the Act, and of his intention thereby to review the status of the plant taxa named within, as well as any habitat which might be determined to be critical.

On June 16, 1976, the Service published a proposed rulemaking in the **Federal Register** (41 FR 24523-24572) to determine approximately 1,700 vascular plant taxa to be Endangered species pursuant to Section 4 of the Act. This list of 1,700 plants was assembled on the basis of comments and data received by the Smithsonian Institution and the Service in response to House Document

No. 94-51 and the above mentioned **Federal Register** publication.

*Pediocactus peeblesianus* var. *peeblesianus* was included in both the July 1, 1975, notice of review and the June 16, 1976, proposal. A public hearing on this proposal was held on July 22, 1976, in El Segundo, California. A second public hearing was held on July 11, 1979, in Phoenix, Arizona for five Arizona cacti proposed as Endangered species, including this *Pediocactus*. In the June 24, 1977, **Federal Register**, the Service published a final rule (42 FR 32373-32381, codified at 50 CFR Part 17) detailing the permit regulations to protect Endangered and Threatened plant species. The rule established prohibitions and permit procedures to grant exceptions to the prohibitions under certain circumstances.

The Department has determined that this listing does not meet the criteria for significance in the Department regulations implementing Executive Order 12044 (43 CFR Part 14) or require the preparation of a regulatory analysis.

**Summary of Comments and Recommendations**

In keeping with the general content of Section 4(b)(1)(C) of the Act, a summary of all comments and recommendations received is published in the **Federal Register** prior to adding any plant species to the List of Endangered and Threatened Wildlife and Plants.

Hundreds of comments on the general proposal of June 16, 1976, were received from individuals, conservation organizations, botanical groups, and business and professional organizations. Few of these comments were specific in nature in that they did not address individual plant species. Most comments addressed the program or the concept of Endangered and Threatened plants and their protection and regulation. These comments are summarized in the April 26, 1978, **Federal Register** publication which also determined 13 plant species to be Endangered or Threatened species (43 FR 17909-17916). Some of these comments had addressed the general problems of conservation of cacti.

Additionally, many comments on the cactus trade were received in response to the June 7, 1976, proposed rule (41 FR 22915) on prohibitions and permit provisions for plants under Sections 9(a)(2) and 10 of the Act. These comments are summarized in the June 24, 1977, **Federal Register** final rule (42 FR 32373-32381) on plant trade prohibitions and permit provisions.

With the July 2, 1979, **Federal Register** notice (44 FR 38611) for the second public hearing on certain proposed southwestern cacti, comments on the

taxon were again solicited, with an official comment period of July 2 through July 23, 1979. The Governor of Arizona was notified of the proposal to list *Pediocactus peeblesianus* var. *peeblesianus* as an Endangered species. Although the Governor himself submitted no comment on the proposed action, the Arizona Commission of Agriculture and Horticulture reported that the cactus is already under State law, and concurs that it be listed as an Endangered species.

Six other written comments were received concerning this cactus. The Arizona State Office of the Bureau of Land Management concurs that the cactus be listed as Endangered. The Southwest Region Office of the Bureau of Reclamation indicated concern that there was a lack of supporting data for the listing, and a lack of detailed information on Critical Habitat for the cactus. Extensive information on the cactus is on file and available in the Service's Albuquerque Regional Office and Washington Office of Endangered Species; it is not prudent to determine Critical Habitat for the cactus because it would increase threats to it, as explained further below. Four letters or statements from botanists were received; all strongly supported listing this *Pediocactus* as an Endangered species. In addition, the Service has received a detailed contracted status report from the Museum of Northern Arizona and a provisional U.S. Forest Service status report concluding that the taxon is Endangered.

At the July 11, 1979, public hearing in Phoenix, Arizona, the listing of this cactus as an Endangered species was supported by six statements, from the Arizona Commission of Agriculture and Horticulture, the Central Arizona Cactus and Succulent Society, and professional botanists employed in academia and governments; none opposed the listing. One statement also indicated the difficulty encountered in enforcing existing prohibitions of cacti, such as those constraints on collecting cacti under State law, and expressed hope that enforcement would increase through provisions of the Endangered Species Act, including possibilities through Federal/State plant cooperative agreements.

In this regard, Section 3(15) of the Act has placed the responsibility for enforcement of the trade provisions which pertain to import and export with the Secretary of Agriculture, and this responsibility has been delegated to their Animal and Plant Health Inspection Service. Interstate trade enforcement is the responsibility of the

U.S. Fish and Wildlife Service, Division of Law Enforcement. Permits for activities allowed through Section 10 of the Act and the regulations of June 24, 1977 (42 FR 32373-32381), are the responsibility of the U.S. Fish and Wildlife Service, Federal Wildlife Permit Office, Washington, D.C. 20240, 703/235-1903.

### Conclusion

After a thorough review and consideration of all the information available, the Director has determined that *Pediocactus peeblesianus* (Croizat) L. Benson var. *peeblesianus* (Peebles Navajo cactus; synonyms: *Navajoa peeblesiana*, *Toumeyia peeblesiana*, *Echinocactus peeblesianus*, *Utahia peeblesiana*) is in danger of becoming extinct throughout its limited range due to one or more of the factors described in Section 4(a) of the Act.

These factors and their application to *Pediocactus peeblesianus* var. *peeblesianus* are as follows:

(1) *The present or threatened destruction, modification, or curtailment of its habitat or range.* This cactus is known from only a few locations in Navajo County, Arizona, from near Joseph City to the Marcou Mesa region northwest of Holbrook. An unknown proportion of the original habitat of this taxon, perhaps 10-25 per cent, has been destroyed through gravel pit operations on the private lands on which it occurs, and the recent construction of Interstate 40 around Holbrook, Arizona. There are several gravel pits near the habitat; one of the gravel pit operations within 1/5 km of the known distribution of the plants is stripping much of the area. Rock collecting also occurs in the area, with the resulting trampling of plants and disturbance of habitat. The total area in which this substrate-restricted, narrow endemic could potentially occur is estimated to be seven square km; habitat on which it occurs within that area is even more restricted, so it is quite susceptible to unplanned habitat change.

(2) *Overutilization for commercial, sporting, scientific or educational purposes.* This taxon is in world-wide demand by collectors of rare cacti, and removal of plants from native habitats by both private collectors and commercial suppliers occurs.

(3) *Disease or predation* (including grazing). Cattle grazing, adversely affecting the plants by trampling, especially during wet seasons of the year when the ground is muddy and the plants are emergent, is a definite potential threat on the portions of the range which are Bureau of Land Management and State of Arizona

administered, and to a lesser extent a potential threat on the privately owned parts of the range of the taxon.

(4) *The inadequacy of existing regulatory mechanisms.* This species is offered protection under Arizona law, A. R. S. Chapter 7, Article 1, Section 3-901, specifically prohibiting collection of *Pediocactus peeblesianus* (listed as *Toumeyia peeblesiana*) as well as all other members of the Cactaceae (Cactus family), except by permit. All native cacti are on Appendix II of the Convention on International Trade in Endangered Species of Wild Fauna and Flora. However, this Convention only regulates export of the taxon, and therefore does not regulate internal trade in the cactus, or habitat destruction.

Although Bureau of Land Management regulations prohibit the removal, destruction, and disturbance of vegetative resources unless such activities are specifically allowed or authorized (43 CFR 6010.2), the prohibitions are difficult to enforce. The Endangered Species Act offers additional protection for the cactus as indicated in part below, which will reinforce the Bureau's regulations.

(5) *Other natural or man-made factors affecting its continued existence.* Restriction to a very specialized and localized soil type in a small geographical area, restriction to flat areas or gentle slopes in an area which is rather hilly, and a very low total population level (a few hundred to 1,000 plants in the wild) with a resultant restricted gene pool, are all factors which tend to intensify threats to the plants or their habitat.

### Effects of the Rulemaking

Section 7(a) of the Act, as amended, provides:

The Secretary shall review other programs administered by him and utilize such programs in furtherance of the purposes of this Act. All other Federal agencies shall, in consultation with and with the assistance of the Secretary, utilize their authorities in furtherance of the purposes of this Act by carrying out programs for the conservation of endangered species and threatened species listed pursuant to section 4 of this Act. Each Federal agency shall, in consultation with and with the assistance of the Secretary, ensure that any action authorized, funded, or carried out by such agency (hereinafter in this section referred to as an 'agency action') does not jeopardize the continued existence of any endangered species or threatened species or result in the destruction or adverse modification of habitat of such species which is determined by the Secretary, after consultation as appropriate with the affected States, to be critical, unless such agency has been granted an exemption for such action by

the Committee pursuant to subsection (h) of this section.

Provisions for Interagency Cooperation were published on January 4, 1978, in the *Federal Register* (43 FR 870-876) and codified at 50 CFR Part 402. These regulations are intended to assist Federal agencies in complying with Section 7(a) of the Act. This rule requires Federal agencies to satisfy these statutory and regulatory obligations with respect to this taxon. New rules implementing the 1978 amendments to Section 7 of the Act are being prepared now by the Service.

Endangered and Threatened species regulations in Title 50 of the Code of Federal Regulations set forth a series of general prohibitions and exceptions which apply to all such species. The principal regulations which pertain to Endangered plant species are found at Sections 17.61-17.63 (42 FR 32378-32380) and are summarized below.

All provisions of Section 9(a)(2) of the Act, as implemented by Section 17.61, would apply. These prohibitions, in part, would make it illegal for any person subject to the jurisdiction of the United States to import or export, or to deliver, receive, carry, transport, or ship in interstate or foreign commerce in the course of a commercial activity, or to sell or offer for sale this taxon in interstate or foreign commerce. Certain exceptions would apply to agents of the Service and State conservation agencies.

Section 10 of the Act and regulations published in the *Federal Register* of June 24, 1977 (42 FR 32373-32381), and codified in 50 CFR Part 17, provide for the issuance of permits, under certain circumstances, to carry out otherwise prohibited activities involving Endangered plants, such as trade in specimens of cultivated origin.

### Effect Internationally

In addition to the protection provided by the Act, all native cacti are on Appendix II of the Convention on International Trade in Endangered Species of Wild Fauna and Flora, which requires a permit for export. The Service will review *Pediocactus peeblesianus* var. *peeblesianus* to determine whether it should be considered under the Convention on Native Protection and Wildlife Preservation in the Western Hemisphere or other appropriate international agreements.

### National Environmental Policy Act

An Environmental Assessment has been prepared and is on file in the Service's Washington Office of Endangered Species. The assessment is the basis for a decision that this

determination is not a major Federal action which would significantly affect the quality of the human environment within the meaning of Section 102(2)(C) of the National Environmental Policy Act of 1969.

**Critical Habitat**

The Endangered Species Act Amendments of 1978 added the following provision to subsection 4(a)(1) of the Endangered Species Act of 1973:

At the time any such regulation [to determine a species to be an Endangered or Threatened species] is proposed, the Secretary shall also by regulation, to the maximum extent prudent, specify any habitat of such species which is then considered to be critical habitat.

*Pediocactus peeblesianus* var. *peeblesianus* has already been reduced in numbers and is threatened by taking, an activity not directly prohibited by the Endangered Species Act of 1973. Publication of Critical Habitat maps would make this taxon more vulnerable to further taking and, therefore, the Service determines that it would not be prudent to determine Critical Habitat.

*Pediocactus peeblesianus* var. *peeblesianus* was proposed on June 16, 1976 (41 FR 24536), and since Critical Habitat is not being determined for this taxon, the Service is proceeding at this time with a final rule to determine this species to be Endangered pursuant to the Endangered Species Act of 1973, as amended. This rule is issued under the authority contained in the Endangered Species Act of 1973, as amended (16 U.S.C. 1531-1543; 87 Stat. 884).

The primary author of this rule is Dr. Bruce MacBryde, Office of Endangered Species, U.S. Fish and Wildlife Service, Washington, D.C. 20240, (703/235-1975). Dr. Arthur M. Phillips, III, Dr. Barbara G. Phillips, and Ms. Elaine M. Peterson, Museum of Northern Arizona, compiled the status report and other provisional documents for this taxon.

**Regulation Promulgation**

Accordingly, Section 17.12 of Part 17 of Chapter I of Title 50 of the U.S. Code of Federal Regulations is amended as follows:

1. Add in alphabetical order by family, genus, species, the following plant:

**§ 17.12 Endangered and threatened plants.**

Species		Range		Status	When listed	Special rules
Scientific name	Common name	Known distribution	Portion endangered			
Cactaceae—Cactus family:						
<i>Pediocactus peeblesianus</i> var. <i>peeblesianus</i>	Peebles Navajo cactus.	U.S.A. (AZ)	Entire	E	67	NA

Dated: October 22, 1979.

**Robert S. Cook,**  
Acting Director, Fish and Wildlife Service.