PROPOSAL FOR INCLUSION OF SPECIES ON THE APPENDICES OF THE CONVENTION ON THE CONSERVATION OF MIGRATORY SPECIES OF WILD ANIMALS

A. PROPOSAL: Inclusion of all subspecies of Khulan or Asiatic wild ass *Equus hemionus* to the Appendix II of the Convention on the Conservation of Migratory Species of Wild Animals:

B. PROPONENT: Mongolia

C. SUPPORTING STATEMENT

1. **Taxon**

   1.1. Classis: Mammalia
   1.2. Ordo: Perrissodactyla
   1.3. Familia: Equidae
   1.4. Genus: Equus
   1.5. Species: *Equus hemionus* Pallas, 1775
   1.6. Common names:  
      - English: Asiatic wild ass or Khulan
      - French: Ane sauvage de l’Asie, hemione
      - German: Asiatischer Wild esel, Halbesel
      - Spanish: Asno salvaje asiatico
      - Italian: Asino selvatico asiatico
      - Russian: Kulan
      - Chinese:

2. **Biological data**

   2.1 **Distribution:**

   During the late Pleistocene, 40,000 years ago, Asian wild asses are known to have roamed as far as West Germany (Kurten 1968, cited in Feh et al. 2001). The Asiatic wild ass *Equus hemionus*, or khulan, once ranged across much of Central Asia, but is now globally threatened. The largest free-ranging populations are now restricted to a 250-km wide area (range 100-400km) across the Gobi Desert region of southern Mongolia. Over the last 23 years the population has moved further north and east into its former range (Reading et al. 2001). Mongolia represents one of the last strongholds for Asian wild asses, a wide ranging species that inhabits the Middle East (*E.h.onager*), Central Asia (*E.h.kulan*), parts of India (*E.h.khur*), and the Gobi desert of China and Mongolia (Reading et al. 2001). About the taxonomy of khulan G. Schaller (1998) noted that ‘the kiang has often been considered to be a subspecies of *Equus hemionus*: *E.h.kiang*’. On the basis of such morphological features as shape of rump, angle of upper incisors, and color pattern, Groves and Mazak (1967) placed the kiang into its own species *E. kiang*’ (Schaller 1998). Only two small, fragmented khulan populations remain in China, one in Junggar Basin of northern Xinjiang and the other in western Inner Mongolia (Zhang et al. 1997). Wang and Schaller (1996) suggest that khulan, and several other species inhabiting the Gobi Desert, are sustained in China only by migration from Mongolia

Khulan distribution has been reduced in the last 100-150 years, due to the impact of human activities, and a few discrete populations remained in northern Iran, Western Afghanistan and India, southern Mongolia and Turkmenistan, north-west of China and Tibet (Bannikov, 1981). Recent field research and surveys suggest that populations in Mongolia may, however, be increasing and expanding further northward into the semi-desert steppe zones, especially in the
Eastern portion of its range (Mix et al. 1995). The latest surveys showed that the overall estimate for Mongolia is between 35,000 to 60,000 animals (Reading et al. 2001).

2.2. Population:
The number of khulan estimated in Mongolia is largely variable, and thus, remains unknown. The IUCN has designated khulan as threatened; estimating that the total population occurring in both Mongolia and China is 10,000 animals. The Mongolian Biodiversity Project, sponsored by the United Nations Development Program (UNDP), estimated that 30,000 animals occur in Mongolia alone. Previous researchers estimated variable numbers of khulan in Mongolia, including 4,000-15,000 in the 1970s (Sokolov et al. 1978; Mongolian Red Book. 1997) and 6,000-15,000 in the 1980s (Bannikov 1981; Zhirnov and Ilyinsky 1986, cited in Reading et al. 2001). G. Schaller (1998) wrote that 'remnant populations of a few hundred to a thousand or two persist in Iran, Turkmenistan, and India, but only in southern Mongolia and a small part of bordering China does the species survive in numbers that possibly exceed 8000'

2.3. Habitat:
Khulan’s habitat characterized as a high upland (c. 1000m) with dry streambeds and hummocks, rocky outcrops, and mountain massifs rising to >2000 m above the surrounding landscape. Springs and other water sources are rare. Climate is strongly continental and arid, characterized by cold winters (to –35°C), dry, windy springs (to 5 m/s), and relatively wet, hot summers (to 40°C). Precipitation in the Gobi is low, for example averaging 100mm/year in Great Gobi region B, 127.2 mm/year in Omnogobi province and 116.7 mm/year in Dornogobi province.

Vegetation is sparse, especially in the southern regions, and generally increases northward. Fine-leafed grasses and onions dominate vegetation of the Gobi-steppe. The semi-desert regions are characterized by semi-shrubs, shrubs, and some grasses. The true Gobi desert contains little vegetation. Semi-shrubs, shrubs, and scrub vegetation dominate. Oases support the greatest density of vegetation in the region, and are dominated by Phragmites communis, Juncus spp. And Achnatherum splendens (Reading et al. 2001).

2.4. Migrations:
The species is rare in adjacent areas of China, especially Inner Mongolia, where the population may be sustained only by migration from Mongolia (Xiaoming and Schaller 1996). Substantially larger numbers have been located in the desert and semi-desert regions of Mongolia (Zhirnov and Ilyinsky 1986, Mix et al. 1995, Xiaoming and Schaller 1996).

3. Threat data

3.1 Direct threat of the population
Concern about the numbers of khulan has become an increasingly important conservation issue in Mongolia because khulan are largely considered by many Mongolian herdsmen and some government officials in the Gobi region to compete with livestock for the limited forage and water in this desert environment. In the Dornogov (East Gobi) aimag, for example, poaching has apparently increased over the last 5-10 years. Poaching has occurred in response to the belief that khulan populations are increasing while simultaneously expanding their range to new areas. It is also commonly believed that khulan overgraze forage and displace livestock from water sources.

3.2 Habitat destruction
More recently, growing pressures resulting from livestock grazing, legal and illegal mining, and poaching in China and parts of Mongolia have reduced the khulan’s primary range to the Gobi region within southern Mongolia.
3.3 **Indirect threat**
In the last few decades, khulan were reported as declining, being forced into more marginal habitats as a result of competition for forage and water (Zhirnov and Ilyinsky 1986).

3.4 **Threat connected especially with migrations**
The Chinese population of Khulan is mostly supported by migrants from Mongolia (Xiaoming and Schaller 1996). Khulan is most likely hunted in China when they cross border.

3.5 **National and international utilisation**
Throughout the range khulan is hunted for their meat.

4 **Protection status and needs.**

4.1 **National protection status**
Khulan are listed as a threatened species in the Mongolian Red Book (1997) and are protected by the Mongolian Hunting Law (Wingard 1996). Several protected areas have been created within the khulan’s range in Mongolia, and khulan populations are in all of them (Johnstad, Reading and Wingard 1996). The largest of these is the two-section, 53.117 km$^2$ Great Gobi Strictly Protected Area in the Dzungarian and south-western Gobi. Gobi Gurvan Saikhan National Conservation Park protects 21.717 km$^2$ in the South Gobi, but only a small portion of the park’s area (in the south) includes khulan. Two new protected areas were created primarily for khulan conservation in 1996. Baga Gobi Strictly Protected Area covers 18.391 km$^2$ in a two-section reserve on the Chinese border in the south-eastern Gobi and Zagiin Us Nature Reserve protects 2.763 km$^2$ further north. Khulan also inhabit three smaller protected areas: Ergeliin Zoo Nature Reserve (609 km$^2$), Ikh Nartin Khad Nature Reserve (437 km$^2$), and Suikhent Natural Monument (48km$^2$).

4.2 **International protection status**
A globally threatened species, *Equus hemionus* is also included in Appendix I of the Convention on the International Trade of Endangered Species of Flora and Fauna (CITES) and classified as Vulnerable by the World Conservation Union (IUCN 1996). The *E.h.luteus* subspecies is listed as ‘data deficient’ in China and Mongolia (IUCN 1996). Similarly, the IUCN’s Equid Specialist Group records the khulan as ‘insufficiently known’ (Duncan 1992). Khulan were included in the list of Annex I, Convention on International Trade of Endangered Species (CITES, 1973)

4.3 **Additional protection needs**
Khulan inhabited the Great Lake Basin in west-central Mongolia as recently as the 1950s (Bannikov 1954), and conservationists might consider attempting to encourage re-establishment of a population in this area. Although Mongolia’s livestock and human populations are growing (Mueller and Janzen 1997), both remain well below densities found throughout most of the rest of the Asian wild ass’ range, providing conservationists with the opportunity to initiate pro-active wild ass conservation in Mongolia (Reading et al. 2001). The taxonomy question has to be resolved urgently in order to know at which level conservation actions should be taken (Feh et al. 2001).

5. **Range States**
Range states for *E.h.hemionus* are Mongolia and China; for *E.h.onager* is Turkmenia; *E.h.kiang* is China (including Tibet), Nepal; *E.h.khur* – India and Pakistan; for *E.h.hemippus* – Siria, Palestin, Iraq.

6. **Comments from Range States**
Not applicable
7. **Additional Remarks**
   Not applicable
8. References


