



The Snow Leopard *Panthera uncia*

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Range and Habitat

Range:
High mountains of Central Asia including China, Bhutan, Nepal, India, Pakistan, Tajikistan, Afghanistan, Kyrgyzstan, Uzbekistan, Russia, Kazakhstan, and Mongolia.

Habitat:
Alpine and subalpine ecological zones including steep terrain broken by cliffs, ridges, gullies, and rocky outcrops. Non productive habitat with scarce prey and plant life.

Species: *Panthera uncia*
Order: Carnivora
Family: Felidae
Locomotion: Scansorial

Sociality and Mating Season

The snow leopard is a solitary animal that only come together for mating and raising young.

- Mating season is between December - March where the male will leave afterwards having no part in caring for the young. Showing parental care.
- Litter sizes range from 1 - 5 cubs and the mother will care for them for up to 1-2 years. The separation may be Triggered by the presence of an adult male and / or when the mother is ready to mate again.
- Snow leopards communicate via marking their territories. Multiple snow leopards will also mark the same area as a communal sign post. This sign post acts as a way for them to avoid confrontation with other snow leopards and other species such as wolves.



“Have you seen the snow leopard?
No! Isn't that wonderful?”
- Peter Matthiessen

Conservation

Snow Leopards are listed as vulnerable on ICUN Red list as of 2017, prior to this they were endangered.

- The USAID funded \$7.3 million conservation and adaption in Asia's high mountains will conduct field activities and build alliances among 6 of the snow leopards 12 range countries
- The Snow Leopard Trust allows people to donate or “adopt” a snow leopard. As well as constantly posting websites or programs to donate to or get involved in.

Threats

- Poachers - can sell pelts for up to \$10,000
- Habitat loss - human expansion
- Climate change - loss of at least 30% of the snow leopards habitat in the Himalayas alone



Physiological Adaptations and Diet

Diet:

Prey of preference is Siberian ibex (*Capra sibirica*), Himalayan tahr (*Hemitragus jemlahicus*), blue sheep (*Pseudois nayaur*), marmots (*Marmota spp*), argali (*Ovis ammon*), and some plant life.

Adaptations for Locomotion:

The snow leopards forearm is adapted with a large rotator cuff and large scapular muscle for their unique overhead ambush of prey to stabilize while pouncing unlike other Carnivora taxa where they hunt with rapid pursuit. They also have a large tail, big paws for walking on snow, and a unique digit for climbing and catching prey.

Adaptations to high elevation:

The snow leopard has thick fur, small rounded ears to let out less heat, and a large nasal cavity with specialized sinus passages that allows them to warm cold air before it reaches their lungs.

Adaptations for communication:

The snow leopard has small pointed vocal chords making them unable to roar, instead they can produce long moaning calls, chuffing, or purrs. They are the only Panthera taxa that cannot roar.

Evolution

All species of leopard inhabit Eurasia or Africa. 180 mya the continents split leaving a land bridge between Eurasia and Africa allowing the species to travel amongst these two continents to mate and evolve together. Starting 65 mya the land bridge became smaller and smaller which lead to less movement and eventually allowed the snow leopard to evolve in isolation giving the species its unique distribution qualities and habitat.

Watch a snow leopard hunt!
Skip to 2:30



Scan for marking and snow leopard call

