



JAGUAR NEWS

www.jaguar.org.br | Issue 27 | April 2009
[Previous Issues](#) | [Português](#) | [Español](#)

Conserving the jaguar by providing shelter for animals confiscated from illegal captivity

By Mirella D'Elia e Christina Gianni, NEX

Founded in 2000, the non-governmental organization NEX – No Extinction has as its objective the conservation of the Brazilian felids. Located on the Preto Velho farm, Goiás state, about 80 km from Brasília, our installations provide shelter for all eight felid species that occur in Brazil: jaguar (*Panthera onca*), puma (*Puma concolor*), jaguarundi (*Puma yagouaroundi*), ocelot (*Leopardus pardalis*), margay (*Leopardus wiedii*), pampas cat (*Leopardus colocolo*), Geoffrey's cat (*Leopardus geoffroyi*) and oncilla (*Leopardus tigrinus*).

Most cats we receive come from the wild and have been confiscated from illegal trade or captivity, or are individuals that turned into problem animals due to domestic livestock predation in some region of Brazil. Among these animals, NEX already received six jaguars that today live within our installations.

With the objective to provide our animals with an environment that resembles the wild and reduce stress associated with captivity, the jaguar enclosures vary in size from 100 to 300 m², with a height of four to five meters. This structure



Jaguar couple in an enclosure at NEX installations, Goiás state. By Mirella D'Elia



provides the animal with plenty of exposure to sunlight. All enclosures are also enriched with small to medium sized trees, tree trunks, an artificial lake with waterfall, grass as ground cover and a hiding place in the form of a cave. Apart from that, boardwalks at a height of 2 to 3 meters provide additional movement and exercise opportunities for the cats.

Environmental enrichment is implemented constantly and involves tires, balls, meat hidden in cartons, coconut shells or tires and distributed in the enclosure or put in the artificial lake. This combination of activities has a strong influence on the recuperation and maintenance of life quality of the animals in our care.

Apart from that, NEX develops environmental and social projects, as we believe that these aspects are integral for a complete conservation plan for the jaguar and the other Brazilian felids. The survival of our institution depends on the expansion of our installations so that we can continue our projects. Therefore, we need the support of donors and partners dedicated to conservation, as the costs generated by construction of the enclosures, infrastructure and maintenance are constant.

Get to know NEX: Visit our blog with a large number of pictures and videos and contribute to the conservation of the Brazilian felids.

<http://www.nex.org.br>.

Our contact phone number: +55 61 9223-4141

Blog: <http://crisithie.vox.com>

Male jaguar at NEX installations feeding on meat that was put in the artificial lake of its enclosure as part of environmental enrichment. By Mirella D'Elia.

[ARTICLE]

Feeding ecology of the jaguar in the Pantanal of Mato Grosso do Sul state, Brazil

By: Jaguar Conservation Fund



The jaguar is a top of the food chain predator and its diet has been described as opportunistic, meaning that it consumes prey species according to their availability, abundance and vulnerability.

The Pantanal harbors one of the largest jaguar populations and is considered a priority region for conservation of the species (Sanderson et al., 2002). As abundance of a predator depends directly on abundance of its prey, understanding how the jaguar uses available food resources is fundamental for its conservation.

Jaguar Conservation Fund team consisting of a scat detector dog, its handler and a field assistant searching for jaguar scats in the Pantanal, Mato Grosso do Sul state.



Jaguar scats collected in the field put in the sun to dry after being washed for posterior dietary analysis.

Feces were collected during wet and dry season with the help of jaguar scat detector dogs, a pioneering experience using this technique in the Pantanal. In addition, camera traps were used to determine prey abundance and activity patterns of jaguars and prey species. Jaguar diet differed between wet and dry season: during wet season, the species most frequently consumed were agoutis (*Dasyprocta azarae*) (24.0%), armadillos (*Dasypodidae* family) (10.0%), deer (*Cervidae* family) (8.0%), and capybara (*Hydrochaeris hydrochaeris*) (8.0%). During dry season, species most frequently consumed were agoutis (*Dasyprocta azarae*) (17.6%), cattle (*Bos taurus*) (17.6%), deer (*Cervidae* family) (10.0%) and white-lipped peccaries (*Tayassu pecari*) (9.2%). While the jaguar took prey species according to their abundance, overlap of activity pattern with prey species did not influence the frequency of consumption.

This study affirms the opportunistic feeding behavior of the jaguar. Although the study area is well preserved and jaguars fed primarily on wild prey species, cattle were an important food source for the species. Thus, regional jaguar conservation depends not only on maintaining the natural prey community, but also on management of the conflict between jaguars and cattle ranching. With its abundant mammal fauna, the Pantanal is capable of supporting high jaguar densities.

References:

¹Sanderson E. W., Redford K. H., Chetkiewitz C. B., Medellin R. A., Rabinowitz A. R., Robinson J. G. e Taber A. B. 2002. Planning to Save a Species: the Jaguar as a Model. *Conservation Biology* 16 (1), 58-72.

In this context, this study carried out in 2008 had the objective to describe the diet of the jaguar through analysis of feces at the Caiman Ecological Refuge, located in the Miranda region of the Pantanal of Mato Grosso do Sul state, Brazil. The study was carried out by biologist Grasiela Porfírio, researcher of the Jaguar Conservation Fund and Master's student in Ecology at the Federal University of Mato Grosso do Sul. Specific objectives of the study were to verify whether jaguar diet varied between wet and dry season and whether prey species were consumed according to their abundance and overlap of activity pattern with the jaguar.

[PICTURE OF THE MONTH]



These two jaguars were camera-trapped in one of our 5 study sites, The Mountain Pine Ridge Forest Reserve, Belize, in 2007. This area is interesting because it is comprised of tropical pine forest, rather than broadleaf rainforest. The Ix- Jaguar Project, through Virginia Tech, has been surveying the pine forest since 2004 and jaguars do appear to live there full time. After a large fire swept through the area in 2007, we still photo-captured the cats regularly in the burned area. The two cats together appear to be a mother and her large cub, giving further evidence of jaguars living and reproducing in pine forest habitat.

By Marcela Kelly

If you have a picture catching a glimpse of a jaguar's life in the wild and want to distribute it through our newsletter, please send it to jaguar@jaguar.org.br with a description of the location, date and credits of the picture.

If you don't want to receive this newsletter, please send a cancellation email to jaguar@jaguar.org.br

The Jaguar Conservation Fund is not responsible for the content of texts written by members of other institutions.

"Our mission is to promote the conservation of the jaguar, its natural prey and habitat throughout the species geographical range, as well as its peaceful coexistence with man through research, management and conservation strategies."

Contact information in Brazil:

Leandro Silveira, President

CP 193 - Mineiros GO

Contact information in USA:

Sara E. Shute, Executive Director

334 East King Street - First Floor

75.830-000 - Brazil
l.silveira@jaquar.org.br
(+55) 64 36618026

Malvern - PA 19355 USA
seshute@aol.com
215-778-5979