

## Visit to the Rabbit Project in La Malinche, Tlaxcala Mexico



Telenax team Carmen Chavez and Alex Campos visited the research about Rabbits located on the base of the mountain La Malinche in the state of Tlaxcala, Mexico o May 27th and 28th, 2006.

This project is lead by the Master in Science Jorge Vázquez Pérez, member of the Laboratory of Ecology of the University of Tlaxcala.

This Project bought 12 collar type transmitters and the reception equipment from Telenax, to be used on Mountain Rabbit *Sylvilagus cunicularius*. This specie is the largest rabbit in Mexico and is threatened to extinction.

The biologist in charge had been able to deploy one collar about 10 days we visited the area. On Saturday they captured another rabbit a little before we arrived. At sunrise on Sunday we were lucky enough to witness the capture of a third rabbit.

It is worth to mention how interesting the capturing method they use. Since the time of the day when they have the most chances to capture the animals is at night, they have to hide with night vision binoculars, waiting for the rabbits to get into the traps. These traps include an improvement designed by Jorge so they pull up a rope and trigger the tramp that locks the rabbit.

These images show the trap before and alter being triggered:



Once captured the process includes taking samples, measures, weight, tattooing, collar attachment and finally the rabbit is set free

On this picture Humberto and Verónica are taking out the rabbit for the studies.



The rabbit is ready to be set free.  
You can see the transmitter and its antenna.



Telenax team performed some test with its own Telemetry equipment and also with equipment that belongs to the investigation. We walked throughout the area to track the transmitters that are already on the rabbits and also some transmitters that were deployed on known places. The tests were performed with the help of Guadalupe, member of the investigation team, and Ph.D. Veronica Farias, expert in Rabbits and Hares who traveled with us from Mexico City to give some training to the project. The results were very good:

The transmitters for this specie are model TXE-311C with the following characteristics:

Weight: 29.5 grams

Approximate Battery life: 2 years.

Sensors: Activity/Inactivity and Mortality

Tracking Distance: 25 km under direct LOS (Line Of Sight – No obstacles)

The distance to which we were able to hear the collars already deployed on rabbits considering this semi-dense forest was of about 2 kilometers. This is within our expectations as the tracking distance is of 25 km without obstacles.



Carmen is tracking down in the forest

## Vegetation in the research area



We were also able to compare the performance of a Telonics TR-4 receiver with our Telenax receiver model RX-TLNX, and a 3 element Yagi antenna from AF Antronics with our Telenax antenna Y3.

In all cases we did not detect any difference as for the performance of the reception equipment. This is, whatever the combination antenna-receiver we did, we always got the same result, if the signal was heard, it was heard with all combinations. This allows us to get to the conclusion that at least for the human ear the TR-4 has as good reception as the RX-TLNX and also the Yagi antenna made by AF Antronics is as good as the one manufactured by Telenax.