



Trilateral Committee Meeting  
San Diego  
April 13, 2015  
Species of Common Concern Table

# Jaguar Recovery in the Northwestern Recovery Unit

2014



Photo: Carlos López González

2015



Erin Fernandez presenting for  
Marit Alanen  
Arizona Ecological Services  
U.S. Fish and Wildlife Service  
Tucson, Arizona

# Jaguar Recovery in the U.S. and Mexico

- Overview
- Binalational Jaguar Recovery Team assembled 2010
- Working on Jaguar Recovery Plan with emphasis on NRU
- Implementing jaguar recovery projects





# Jaguar Recovery in the U.S. and Mexico

## 2014–2015 Accomplishments



- **PVA**
  - **Conducted by Conservation Breeding Specialist Group of the Species Survival Commission/International Union for the Conservation of Nature**
  - **Final report addendum completed in August 2014**





# Jaguar Recovery in the U.S. and Mexico

## 2014–2015 Accomplishments



- **Jaguar Location Database**
  - **Developed by the Wildlife Conservation Society**
  - **Database converted to on-line with an administrative and public interface**
  - **Final details currently being completed before full public launch**



# JAGUAR

OBSERVATIONS DATABASE



Observation	Year	Observation type	Evidence types	Pan/zoom	Details
Arias 1989 Sierra Bacatete SON	1989	Live sighting	Photograph or video Second hand report		<a href="#">View</a>
Baird 1859 Eagle Pass TX	1859	Skin or skull seen	First hand report		<a href="#">View</a>
Barnett 1961 Total Wreck Mine AZ	1961	Killed after predation	Photograph or video Second hand report Skull and/or bones		<a href="#">View</a>

Showing 21 to 40 of 167 entries

Previous 1 2 3 4 5 9 Next

## Selected search criteria

**Textual search:** none**Years:** From any year To any year**States:** all (except unknown)**Location types:** Defined Point, Determined Point, Defined Area**Observation types:** Bounty paid, Dead specimen, Hunting event, Jaguar capture, Killed after predation, Live sighting, Other mortality, Photograph seen, Predation event, Scientific study, Skin or skull seen, Structured interviews, Tracks or sign seen, Trapping event[Export](#)[Change search criteria](#)



# Jaguar Recovery in the U.S. and Mexico

## 2014–2015 Accomplishments



- **Jaguar survey and monitoring effort along the AZ/NM border with Mexico**
  - **Conducted by the University of Arizona**
  - **Field work began spring/summer 2012 and ended February 2015**
  - **Paired cameras at 120 locations set up from Baboquivari Mountains (AZ) to Animas Mountains (NM)**
  - **~96 photos of 1 jaguar and 12 photos of 3 ocelots**
  - **Report to follow**



# [https://www.flickr.com/photos/usfws\\_southwest/sets/72157632294203147/](https://www.flickr.com/photos/usfws_southwest/sets/72157632294203147/)

Inbox (47) - erin\_fernande x Erin's fws.gov Tasks - A x Jaguar/Ocelot Survey Viewing Mitch Sternberg's desktop

← → ↻ 🏠 [https://www.flickr.com/photos/usfws\\_southwest/sets/72157632294203147/](https://www.flickr.com/photos/usfws_southwest/sets/72157632294203147/) ☆ 📧 📅 📁 🔍 Sign In

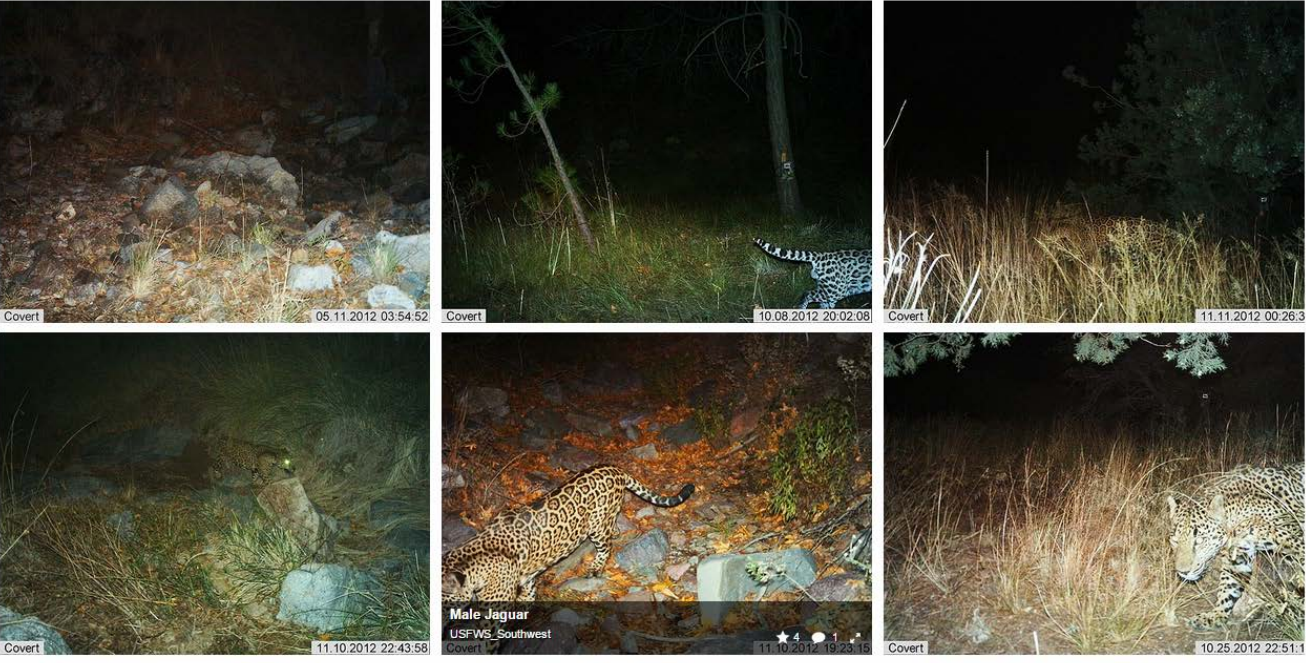
Y Mail Search News Sports Finance Weather Games Answers Screen Flickr Mobile More ▾

**flickr** Sign Up Explore Create Upload

**Jaguar/Ocelot Survey**  
USFWS\_Southwest  
An adult male jaguar and three adult male ocelots have been photographed in two separate southern... See more

108 Photos 13,188 Views

View all albums Photos



Covert 05.11.2012 03:54:52 Covert 10.08.2012 20:02:08 Covert 11.11.2012 00:26:3

Covert 11.10.2012 22:43:58 Male Jaguar USFWS\_Southwest 11.10.2012 19:23:16 Covert 10.25.2012 22:51:1

[https://www.flickr.com/photos/usfws\\_southwest/8292419326/in/set-72157632294203147](https://www.flickr.com/photos/usfws_southwest/8292419326/in/set-72157632294203147)

# Jaguar Recovery in the U.S. and Mexico

## 2014–2015 Accomplishments



- Similar jaguar survey and monitoring effort in the Baboquivari Mountains on the Tohono O'odham Nation
  - Conducted by tribal members
  - Currently implementing survey





# Jaguar Recovery in the U.S. and Mexico

## 2014–2015 Accomplishments



- **Survey of AZ/NM Residents' Attitudes on Jaguar Conservation**
  - Conducted by Harris Environmental Group
  - Surveying stakeholders about attitudes, knowledge, and related concerns regarding jaguars and jaguar conservation
  - Will produce report explaining opportunities and challenges
  - Will construct survey tool for future studies



# Jaguar Recovery in the U.S. and Mexico

## 2014–2015 Accomplishments



- **Develop Jaguar Survey and Monitoring Protocol**
  - **Wildlife Conservation Society**
  - **Completed jaguar survey and monitoring protocol applicable in NRU**
  - **Protocol will assist in determining if recovery criteria are being met**
  - **Reports available in English and Spanish**

# Jaguar Recovery in the U.S. and Mexico

## 2014–2015 Accomplishments



- **Recommendations for Road Crossing Designs**
  - Developed by the Wildlife Conservation Society
  - Completed:
    - Review of road crossing designs
    - Recommendations for road crossing designs
    - Identified locations for these designs in NRU
  - Reports available in English and Spanish

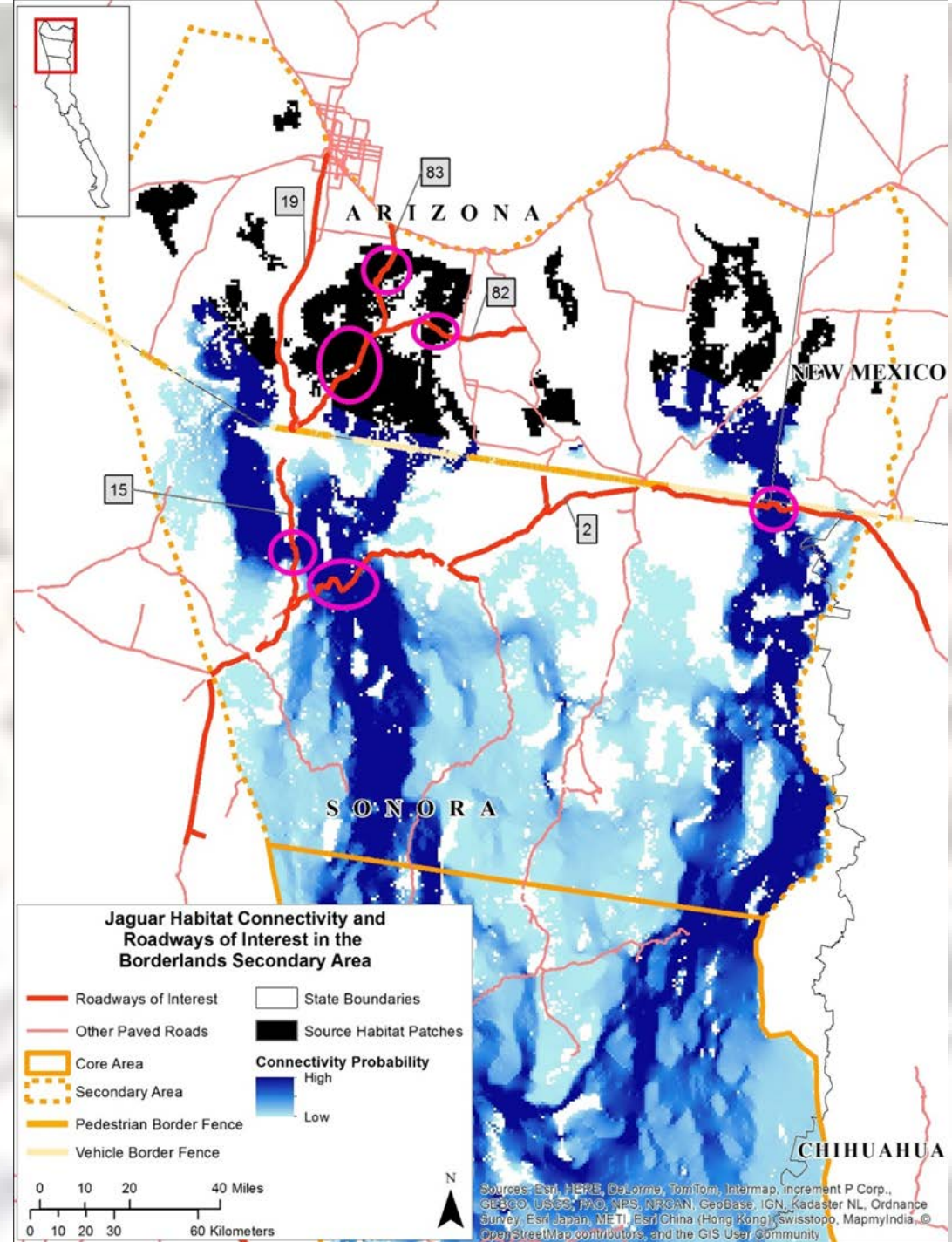


# Recommendations for road crossing locations for jaguars in the NRU

- Example - Borderlands Secondary Area



© Rony Garcia/Totally Tandem/WCS  
Tikal National Park, Maya Biosphere Reserve,  
Guatemala





# Jaguar Recovery in the U.S. and Mexico

## 2014–2015 Accomplishments



- **Citizen Science/Education/Outreach**
  - USGS and the University of Arizona
- **Conducting Education and Outreach on Jaguar Conservation**
- **Implementing Citizen Science Program for Jaguar Monitoring**
- **Writing Grants for Jaguar Conservation**





# Jaguar Recovery in the U.S. and Mexico

## 2014–2015 Accomplishments



- **Implement Ranch Owner/Manager Assistance and Incentive Program for Jaguar Conservation**
  - USGS and the University of Arizona
  - M.S. and Ph.D. funded by this project
  - Interviews with ranchers
  - Rancher surveys
  - Rancher Workshops





# Jaguar Recovery Implementation

- ❖ Jaguar survey and monitoring in Arizona and New Mexico
- ❖ Jaguar survey and monitoring on the Tohono O'odham Nation
- ❖ Jaguar survey and monitoring protocol development
- ❖ Survey of citizens' attitudes toward jaguars in Arizona and New Mexico
- ❖ Jaguar habitat mapping and on-line jaguar detection database development
- ❖ Jaguar population viability analyses
- ❖ Jaguar road crossing design recommendations
- ❖ Rancher/landowner outreach
- ❖ Citizen science/education and outreach program
- ❖ Jaguar genetic analysis

Reports posted: <http://www.fws.gov/southwest/es/arizona/Jaguar.htm>



# Jaguar Recovery in the U.S. and Mexico

## 2015–2016 Goals

- The Jaguar Recovery Team will:
  - Produce a draft Recovery Plan (2015)
    - Will be made available for public comment
  - Produce a final Recovery Plan (2016)
  - Continue to implement recovery with partners in U.S. and Mexico



# A binational puma.....



U.S. Border Patrol



# Jaguar Recovery in the U.S. and Mexico

- The U.S.- Mexico Jaguar Recovery Team and the USFWS request Trilateral Committee endorsement to continue jaguar recovery planning and implementation efforts in the U.S. and Mexico



## Questions?

Marit Alanen

Arizona Ecological Services Office  
(520) 670-6150 x 234

[Marit\\_alanen@fws.gov](mailto:Marit_alanen@fws.gov)

<http://www.fws.gov/southwest/es/arizona/Jaguar.htm>

