

TO DEN, OR NOT TO DEN, THAT IS THE QUESTION:
PREY AVAILABILITY AND PREDATION RISK DRIVE
DEN SITE SELECTION IN PUMAS



Photo: Sebastian Kennerknecht

MAIN QUESTION:

HOW DO FACTORS SUCH
AS PREY AVAILABILITY
AND RISK OF
PREDATION INFLUENCE
DEN SITE SELECTION OF
PUMAS WITHIN THEIR
HOME RANGE?



HYPOTHESIS:

1) IF PREDATION RISK IS A MAJOR FACTOR AFFECTING DEN SITE SELECTION, WE MAY SEE DENS ESTABLISHED IN HABITAT WITH EITHER LOW VISITATION OR LACK OF MESOPREDATORS (COYOTES: *CANIS LATRANS*, BOBCAT: *LYNX RUFUS*, GRAY FOX: *UROCYON CINEREOARGENTEUS*), AND OTHER CONSPECIFICS (PUMA: *PUMA CONCOLOR*).





Photo:Mercury News

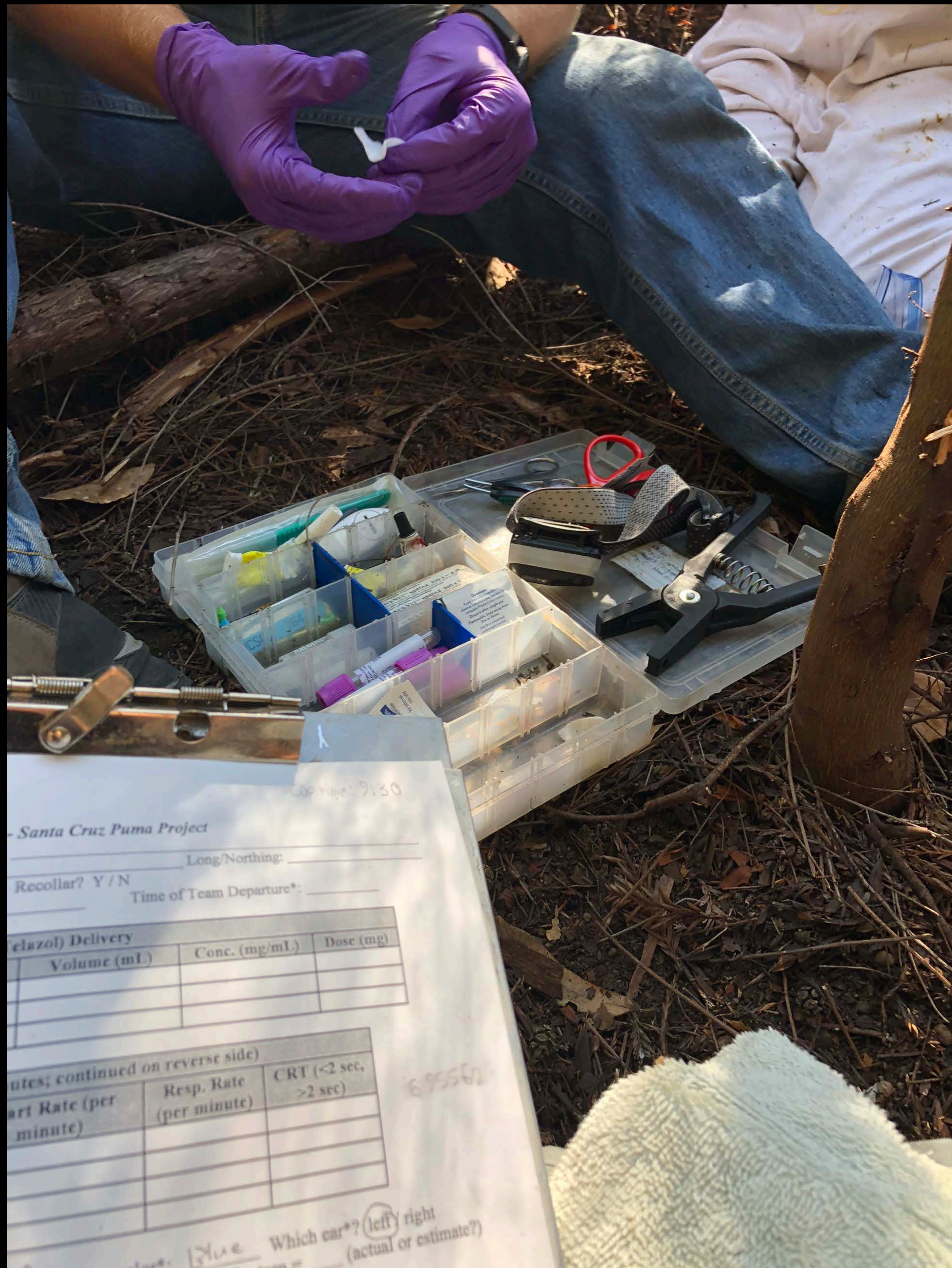
2) THAT IF ACCESS TO FOOD IS AN IMPORTANT DRIVER OF DEN SITE SELECTION, DENS WOULD BE CONCENTRATED IN PRODUCTIVE HABITAT WHERE DOMINANT PREY BLACK-TAILED DEER (*ODOCOILEUS HEMIONUS*) WAS ABUNDANT



Photo: Sebastian Kennerknecht




PHOTO: JOUKO VAN DER KRUIJSSEN



UHF and VHF Radio Telemetry (left), Camera Traps, Equipment for kitten collarings (top) and data collection of the GPS Location of den and den camera placements (bottom)




Bushnell

 59°F 15°C



03-16-2017 13:06:34




Bushnell


 59°F 15°C

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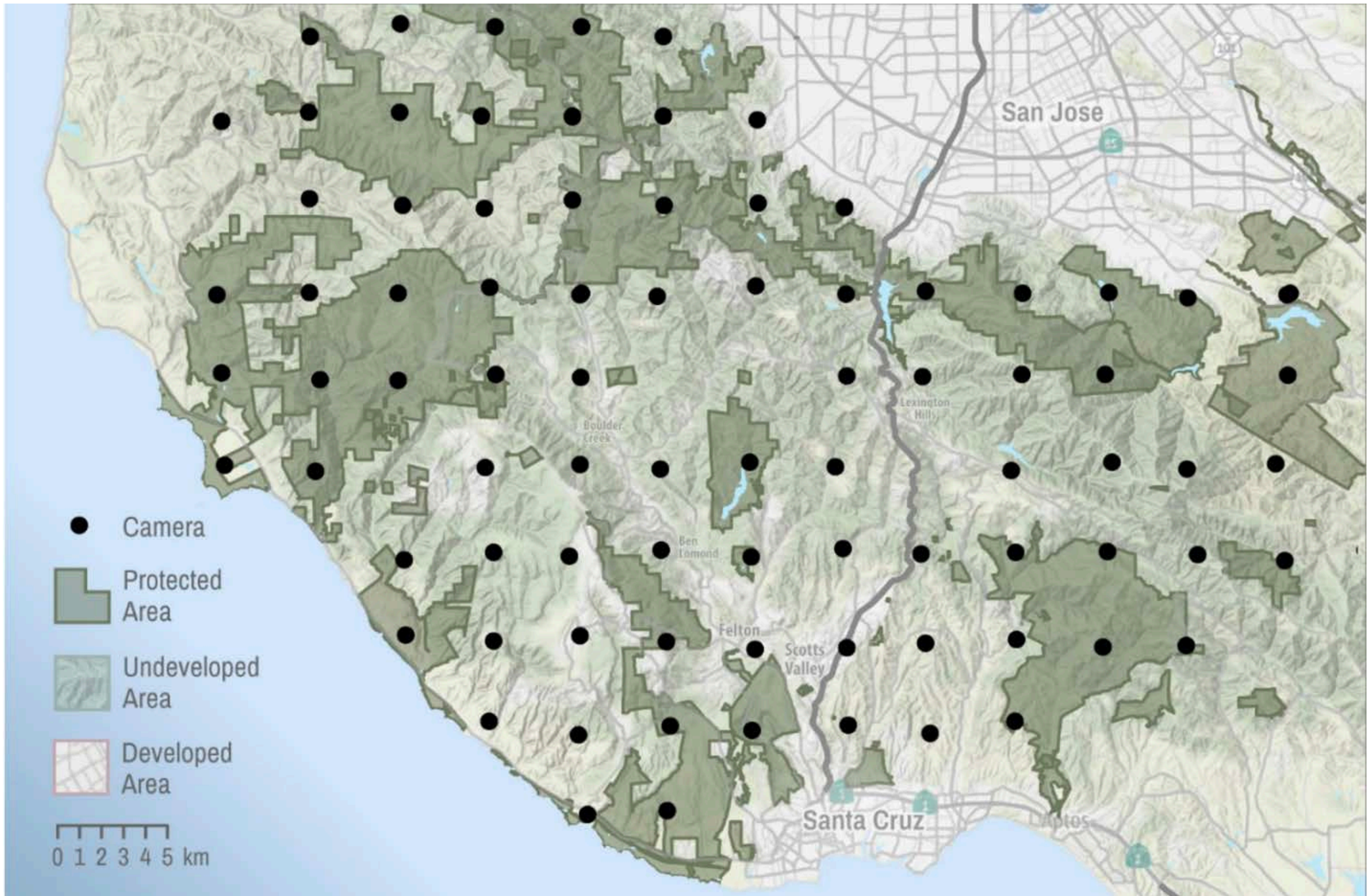



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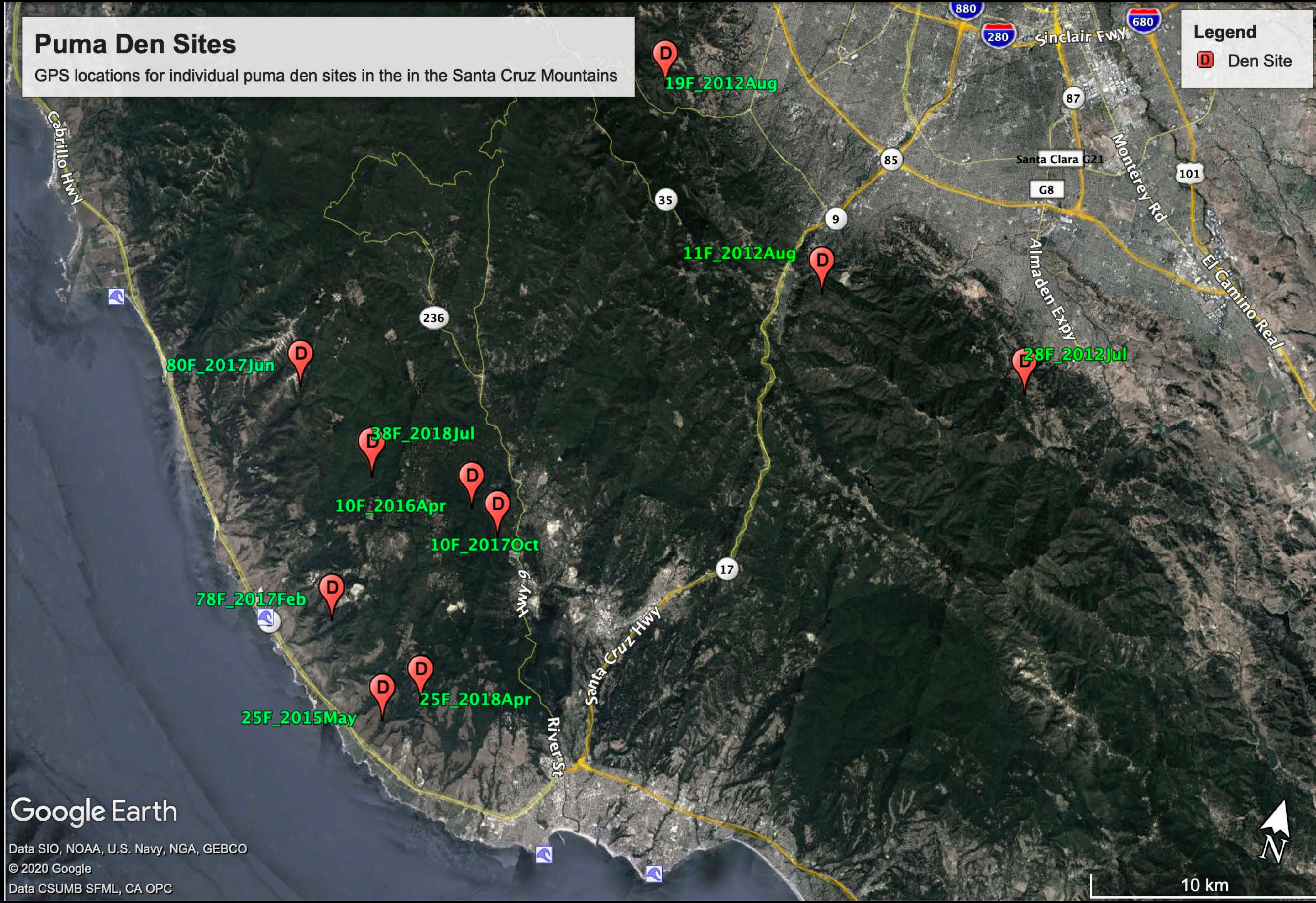
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Puma Den Sites

GPS locations for individual puma den sites in the in the Santa Cruz Mountains

Legend
D Den Site



Google Earth

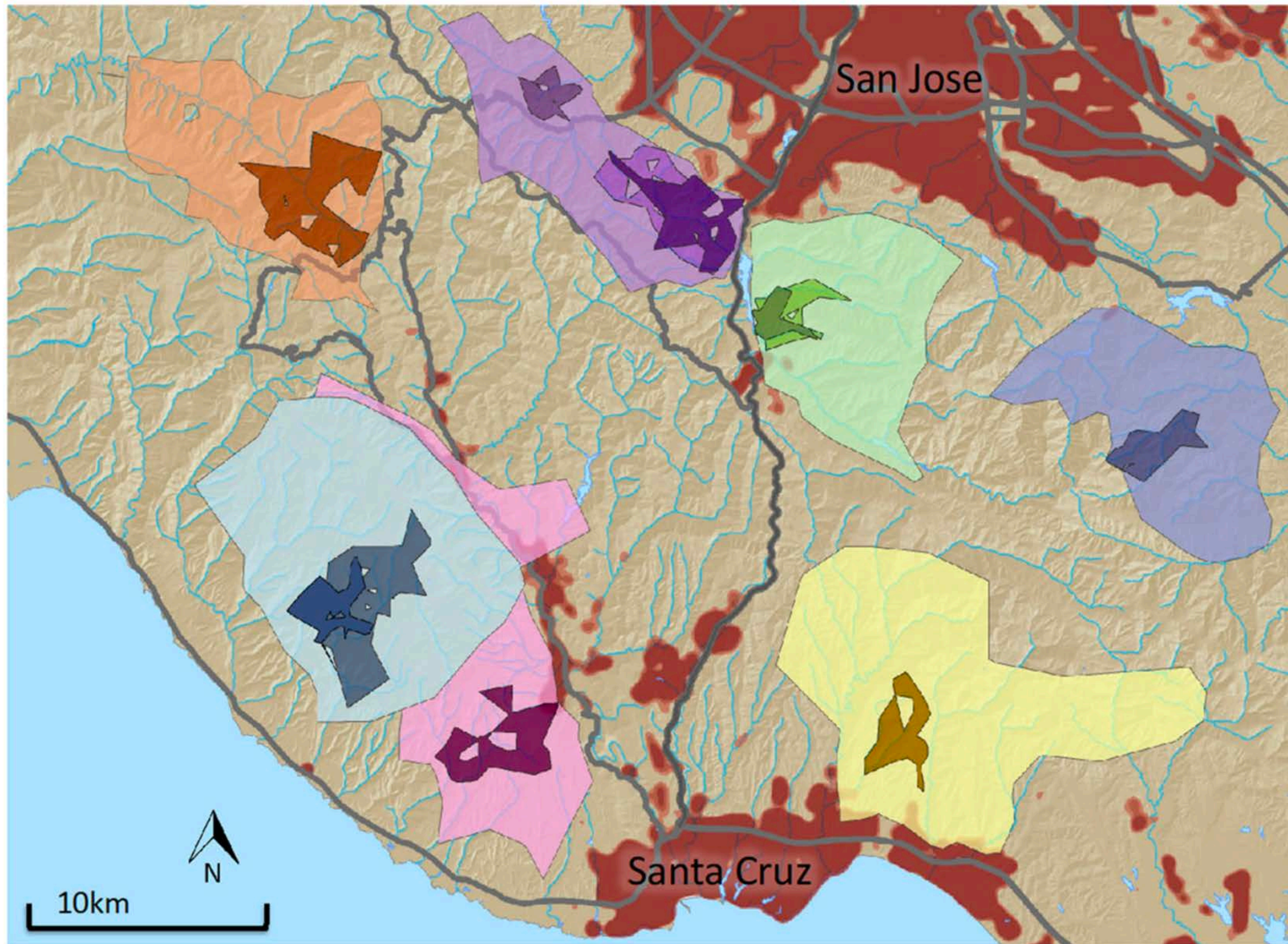
Data SIO, NOAA, U.S. Navy, NGA, GEBCO

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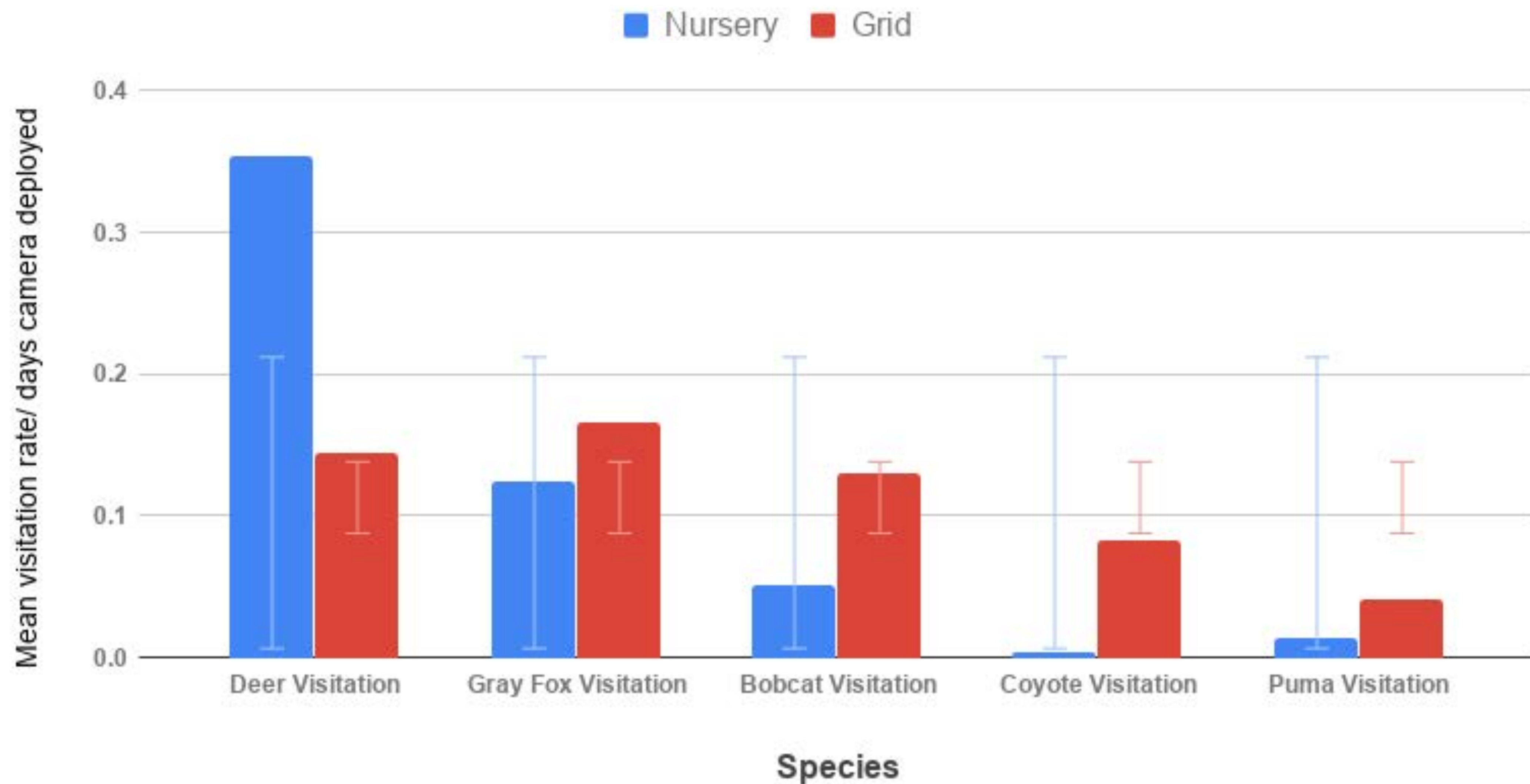
Data CSUMB SFML, CA OPC



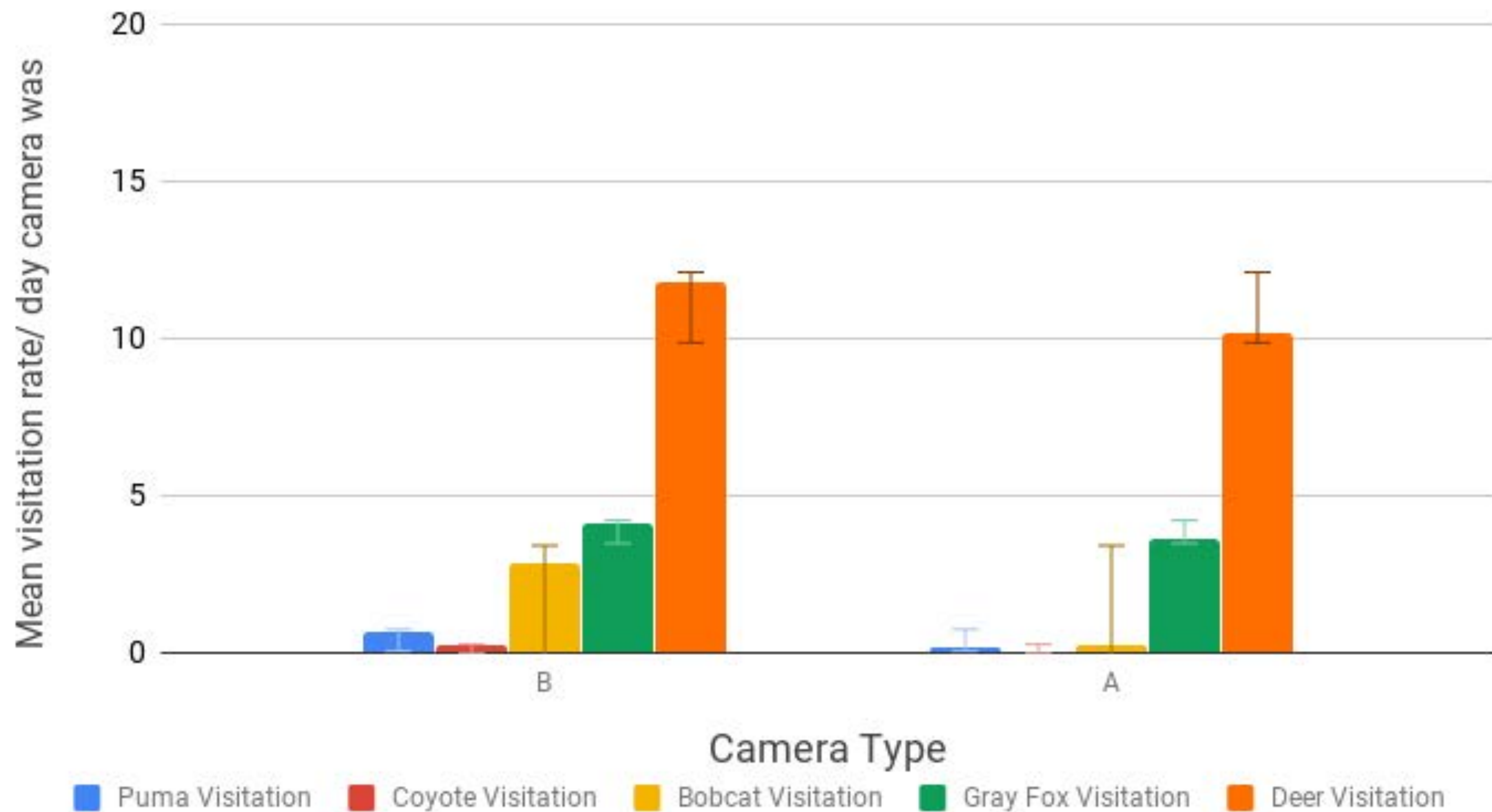
10 km

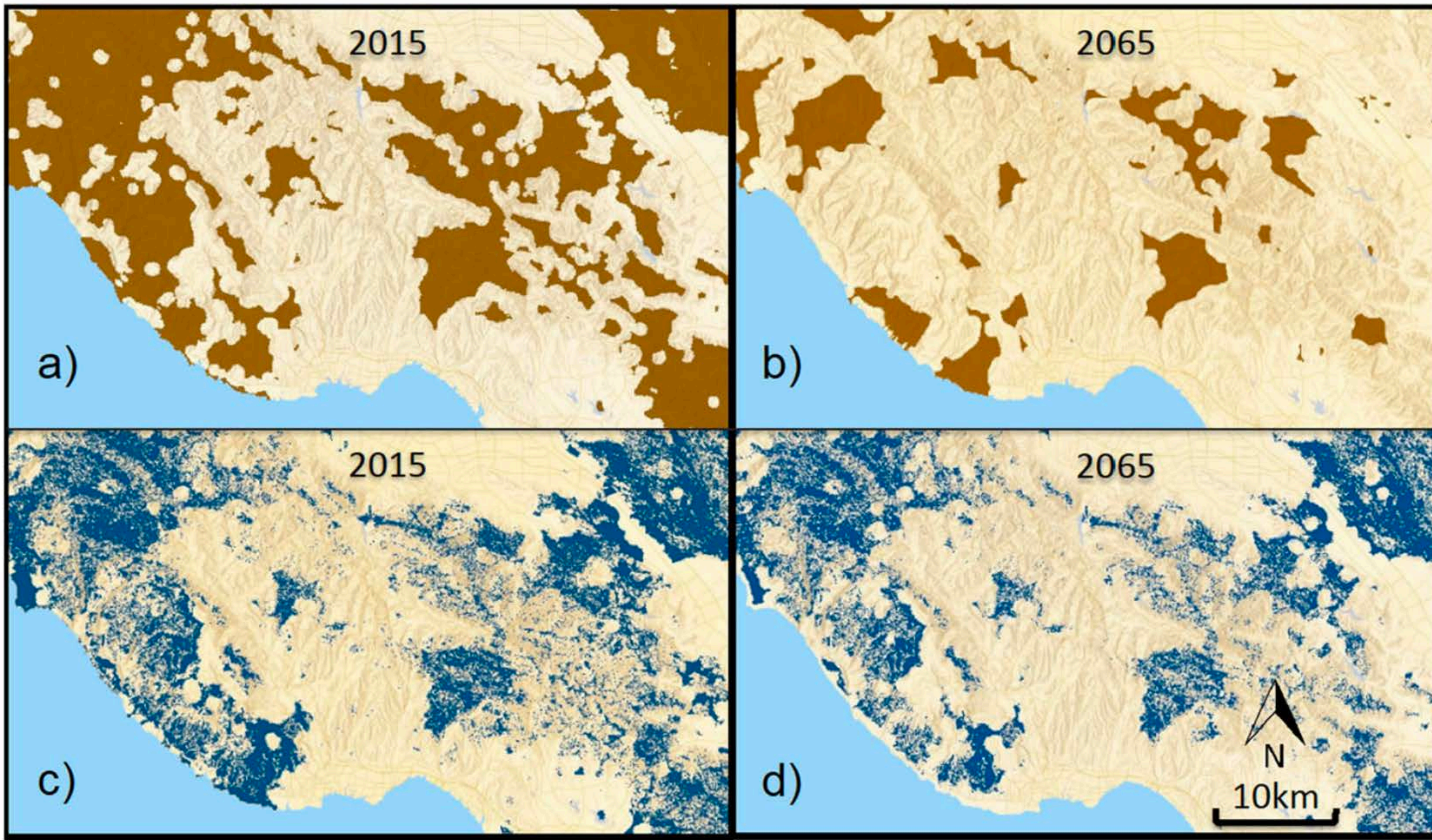


Mean Species Visitation Rate Between Nursery and Grid Cameras



Mean Species Visitation Rate of A and B Nursery Cameras





■ Nursery Habitat
■ Scrape Habitat

■ Unsuitable Habitat
■ Water

THANK YOU

ANNA NISI
CHRIS WILMERS
KARINA FRAZIER
RICHIE KING

