

PREDATOR and ELK RESEARCH UPDATE¹

January 2019

Piceance and Arkansas River Predator/Deer Project

The Parks and Wildlife Commission approved the Piceance and Arkansas predator research proposals at its meeting in Fort Collins in December 2016.

Injunction

WildEarth Guardians (WEG) filed for an injunction in May 2017. Judge McGahey denied the request.

Court Ruling

On November 18, 2019 in Denver District Court, judge McGahey ruled favorably on the predator law suit filed by WEG. He rejected all the arguments raised against the two predator studies by WEG and supported CPW's authority to conduct the research.

Piceance Study

This is a 3-year research project designed to examine the impact of spring bear and lion predation on mule deer fawn recruitment.

The predator removal component of the study ended early this summer. CPW is continuing to follow the fates of the 2019 fawn crop through the winter. Analysis of the data will begin in 2020.

Arkansas Study

This is a 9-year project. The first 3 years have concluded. We just entered the "pause" phase where we let the treatment and control areas return to some form of natural equilibrium for 3 years. Then the "cross-over" (i.e., switch) phase of the project will begin. In this third and final phase, the treatment and control units for years 1-3 will be reversed for years 7-9.

CPW is monitoring doe and fawn survival and the lion population (e.g., density, survival, reproduction, conflict).

D-16 is the initial higher lion harvest unit. D-34 is the initial control (then the units are reversed for phase 3). In other words, D-34 begins with low lion harvest (years 1-6) and ends with higher harvest in years 7-9). D-16 follows the reverse course.

Mule deer survival appears relatively high at this very early juncture. Pregnancy rates also appear high. Body condition is overall higher than found in other Colorado studies.

Predation appears to be a significant mortality factor, as information suggested prior to the study.

Lion mortality factors include hunting, conflict, and lion-on-lion, as expected.

Elk Recruitment Studies

These studies were initiated because of concern about declining calf: cow ratios in the southern half of the state.

Pilot studies in Trinidad and Montrose began in 2017. Cow elk body condition did not appear to be a factor in poor elk calf recruitment.

There are several causes of mortality, but predation played a significant role, especially during the first few months after calves were born.

CPW initiated a 6-year follow-up study beginning in 2019.

Bears Ears was added as a control unit (high calf: cow ratios). We are looking at body condition, pregnancy rates, causes of mortality, etc., from birth to age 1.

Elk and Recreation Studies

CPW has begun a 6-year study of the impacts of outdoor recreation (specifically trails) on elk recruitment.

Study areas are the Avalanche Creek elk herd near Aspen and the Bears Ears herd near Steamboat.

Some aspects of this study are similar to the other elk recruitment study, with the addition of the recreational impact assessment component.

¹By providing this summary, CPW does not intend to waive its rights under the Colorado Open Records Act, including CPW's right to maintain the confidentiality of ongoing research projects. CRS § 24-72-204.