

Findings for the Alaska Board of Game
2012-193-BOG
Unit 26B Muskoxen Findings
January 18, 2012

The Board of Game finds as follows, based on information provided by Department staff, Alaska residents and other users of muskoxen in Unit 26(B). These findings are supplemental to the findings set forth in 5AAC 92.126.

1. Unit 26(B) muskoxen are not managed intensively for high levels of human harvest, but they are managed to provide hunting opportunities. The population objective is a minimum of 300 muskoxen \geq 1 year old during April surveys. The harvest objective is 3–9 muskoxen annually, once the population reaches 300 and a harvestable surplus is available.
2. The Unit 26(B) muskox population and harvest objectives are not being met. The muskoxen population size was estimated at 190 in April 2011 which is below the population objective of 300. The hunting season for Unit 26(B) muskoxen has been closed since regulatory year 2006–2007 because there is no harvestable surplus.
3. Predation by brown bears was identified as a primary source of mortality on muskoxen and is an important cause of the failure to achieve the population and harvest objectives. During 2007—2011, brown bear predation was identified as the primary source of mortality. Sixty-two percent of the documented total adult muskoxen mortality ($n=73$) was attributed to brown bear predation, which accounted for an average of 9 adult muskoxen deaths annually. During the same time period, 58 percent of documented calf mortality ($n=45$) was caused by brown bear predation. This resulted in an annual average of 5 calves known to be preyed on by brown bears.
4. During 2007–2011, the habitat appeared capable of supporting a larger muskoxen population. Captured muskoxen were generally in good condition, and birth rates were sufficient to provide for population growth, but growth was not realized because of poor survival.
5. Reducing predation can reasonably be expected to aid in achieving the objectives. During 2004–2011, the population remained relatively stable at around 200 muskoxen. Evidence indicates that the number of yearlings being recruited annually approximately equaled the number of adult muskoxen dying annually. If survival rates of either adult muskoxen or calves increase, then the muskoxen population is expected to increase. Reducing predation on adults and calves should change survival rates of one or both. During 1987–1995, the annual rate of increase for the entire population was 7%. This time period should be representative of what the population growth rate Unit 26(B) muskoxen could experience if bear predation is reduced and habitat is not limiting.
6. Reducing predation is likely to be effective given land ownership patterns. Most of Unit 26(B) is state land; the land ownership pattern is 69 percent state, 29 percent federal, and 2 percent private. Of the 29 percent federal lands, 12 percent is Bureau of Land Management,

Objectives are unlikely to be achieved in the foreseeable future unless predator control is conducted.

8. Increases in moose recruitment and abundance in the Subunit 15A population are achievable utilizing the recognized and prudent active management technique of predator control in combination with habitat improvement.
9. Reducing predation can reasonably be expected to achieve a sex and age structure that will sustain the population, provide for harvest, and allow growth toward objectives.

Vote: 7-0
January 18, 2012
Anchorage, Alaska



Cliff Judkins, Chairman
Alaska Board of Game