STATE: Alaska

GRANT AND SEGMENT NR: W-33-3

PROJECT NR: 14.0

WORK LOCATION: Statewide

PROJECT LOCATIONS: Game Management Regions 1, 2, 3, and 5

PERIOD: 1 July 2004–30 June 2005

PROJECT TITLE: The Status of Alaska Wolves and Factors Influencing Their Populations

REPORT DESCRIPTION: This statewide performance report includes the 4 regions involved in wolf survey and inventory activities. Statewide and regional activities are listed before specific activities by herd and game management unit.

The Status of Wolf and Factors Influencing Their Populations in Region I

Regionwide Activities

Activity: Provide information to the Board of Game on wolf management.

   The Board of Game met in Juneau during November 2004. Staff prepared background material on wolf management within each unit and provided recommendations to the board for 8 proposals from the public to change harvest regulations.

Activity: Collect harvest data when wolf pelts are presented for sealing.

   Collected data on 161 wolf pelts presented for sealing.

Activity: Obtain age structure of harvested wolves through examination of foreleg bones attached to pelts presented for sealing.

   Area staff aged leg bones from Region I wolves that were submitted for sealing. About 113 wolf leg bones were collected for aging from the region. The requirement to submit leg bones with pelts for sealing was dropped by the Board of Game at the November 2004 meeting and will be discontinued.

Activity: Contact reliable observers to obtain general information about the status and trends of wolf populations, including the use of an annual trapper survey.
This was done throughout the region as opportunities permitted.

**Activities by Unit**

**Unit 2**

Activity: Use data generated from an ongoing wolf research radiotelemetry research project in the area and standard population modeling techniques to estimate the pre-season number of wolves on Prince of Wales Island.

The wolf research project is winding down at this point, and consequently, the numbers of wolves carrying radio collars has declined. At present only 3 wolves have functional radio collars, and this small sample makes it impossible to infer an accurate unit population estimate.

Activity: Closely monitor wolf harvest during seasons through information gathered during sealing process.

We continue to monitor the wolf harvest by using in-season sealing records and through regular contacts with the sealers and trappers to ensure we stay within the established 30 percent harvest guideline for conservation.

**Other activities funded by Federal Aid on this project:** None

**Stewardship Investment items purchased:** None

**Total Regional Segment Period Project Costs (in thousands):** $2.7

**Submitted by:** Dale L. Rabe – Region I Management Coordinator
The Status of Alaska Wolves
and Factors Influencing Their Populations in Region II

Regionwide Activities
Activity: Collect harvest data when wolf pelts are presented for sealing by trappers and hunters.
    Collected data on 453 wolf pelts presented for sealing.

Activity: Monitor the wolf harvest through field observations, fur sealing reports, trapper questionnaires, and contact with trappers and hunters.
    See individual unit reports below.

Activity: Conduct systematic aerial transect surveys to estimate wolf population densities, pack sizes and distribution.
    See Units 11 and 13 below.

Activity: Develop population estimates using the “Sample Unit Probability Estimator” (SUPE) technique in select areas.
    A SUPE was planned for Unit 16, but not accomplished due to poor weather and snow conditions.

Activity: Provide information to the Board of Game on wolf management.
    Specific reports regarding wolf management in Units 13 and 16 were provided to the Board of Game at its March 2005 meeting. Overviews of wolf management in all other Region II units also were provided.

Activities by Unit
Unit 6
Activity: Monitor the wolf harvest through field observations, fur sealing reports, trapper questionnaires, and contact with trappers and hunters.
    There were 4 wolves harvested in Unit 6.

Units 7 and 15
Activity: Monitor the wolf harvest through field observations, fur sealing reports, trapper questionnaires, and contact with trappers and hunters.
    The preliminary harvest for 2004–05: 40 wolves
    Unit 7  14
    Subunit 15A  8
    Subunit 15B  10
    Subunit 15C  8

Activity 2: Examine pelts presented for sealing for the presence of louse infestation.
Most pelts examined during this reporting period were infested with *Trichodectes canis*. Pelt damage varied from extreme, generally on pups, to mild on adults.

**Units 9 and 10**

Activity 1: Monitor the wolf harvest through field observations, fur sealing reports, trapper questionnaires, and contact with trappers and hunters.

The preliminary wolf harvest for 2004–05 was 59 in Unit 9 and none from Unimak Island. Poor snow conditions hampered travel and trapping effort.

**Units 11 and 13**

Activity: Monitor the wolf harvest through field observations, fur sealing reports, trapper questionnaires, and contact with trappers and hunters.

The preliminary 2004–05 harvest was:

<table>
<thead>
<tr>
<th>GMU</th>
<th>Wolves</th>
</tr>
</thead>
<tbody>
<tr>
<td>13</td>
<td>126</td>
</tr>
<tr>
<td>11</td>
<td>14</td>
</tr>
</tbody>
</table>

Activity: Conduct surveys to estimate wolf population densities, pack sizes and distribution.

Preliminary fall 2004 estimates:

<table>
<thead>
<tr>
<th>GMU</th>
<th>Wolves</th>
<th>Packs</th>
</tr>
</thead>
<tbody>
<tr>
<td>13</td>
<td>370</td>
<td>69</td>
</tr>
<tr>
<td>11</td>
<td>122</td>
<td>20</td>
</tr>
</tbody>
</table>

**Unit 14**

Activity: Monitor the wolf harvest through field observations, fur sealing reports, trapper questionnaires, and contact with trappers and hunters.

Preliminary 2004–05 harvest numbers are reported as follows:

<table>
<thead>
<tr>
<th>Subunit</th>
<th>Males</th>
<th>Females</th>
<th>Unknown</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>14A</td>
<td>16</td>
<td>11</td>
<td>0</td>
<td>27</td>
</tr>
<tr>
<td>14B</td>
<td>0</td>
<td>1</td>
<td>0</td>
<td>1</td>
</tr>
<tr>
<td>14C</td>
<td>0</td>
<td>2</td>
<td>0</td>
<td>2</td>
</tr>
<tr>
<td>Unit 14</td>
<td>16</td>
<td>14</td>
<td>0</td>
<td>30</td>
</tr>
</tbody>
</table>

Activity 2: Examine pelts presented for sealing for the presence of louse infestation.

There were 5 reported cases of lice infestation and 5 confirmed reports of lousy wolves in Unit 14 during this reporting period. There also was one reported DLP (defense of life or property) wolf mortality in the unit during this reporting period. This animal was in poor condition, but was not determined to be lousy.

**Unit 16**

Activity 1: Monitor the wolf harvest through field observations, fur sealing reports, trapper questionnaires, and contact with trappers and hunters.

Preliminary harvest for 2004–05 is reported as follows:
Activity 2: Examine pelts presented for sealing for the presence of louse infestation.

There were 5 confirmed cases of lice or evidence of lice on wolves sealed this season from Unit 16B. Also, several of the SDA wolf control pilots reported aerial observations of several wolves with very poor hide and/or hair condition.

Unit 17

Activity 1: Monitor the wolf harvest through field observations, fur sealing reports, trapper questionnaires, and contact with trappers and hunters.

Results: 61 wolves reported harvested in 2004–05.

Stewardship Investment items purchased: None.

Total Regional Segment Period Project Costs (in thousands): $71.2

Submitted by: Gino Del Frate, Regional Management Coordinator
The Status of Wolves
and Factors Influencing Their Populations in Region III

Regionwide Activities

Activity: Collect harvest data when wolf pelts presented for sealing by trappers and hunters and analyze harvest data.

Collected harvest data when 422 wolf pelts were presented for sealing by trappers and hunters and analyzed harvest data.

Activity: Monitor the wolf harvest through field observations, fur sealing reports, trapper questionnaires, and contact with trappers and hunters.

Monitored harvest of 422 wolves through field observations, fur sealing reports, trapper questionnaires and contacts with trappers and hunters.

Activity: Provide information to advisory committees on wolf management.

Provided information to advisory committees and the Board of Game on wolf management.

Activities by Unit

Units 21B, 21C, 21D

Activity: Conduct aerial wolf population estimation surveys in cooperation with U.S. Fish and Wildlife Service (FWS). (Operating costs funded by FWS).

Did not conduct surveys due to lack of funding from FWS.

Activity: Encourage participation in the statewide trapper questionnaire when wolf trappers present pelts for sealing.

Encouraged participation in the statewide trapper questionnaire when wolf trappers presented pelts for sealing by explaining the importance of the questionnaire data.

Unit 24

Activity: Conduct aerial wolf population estimation surveys in cooperation with FWS. (Operating costs funded by FWS).

Did not conduct surveys due to lack of funding from FWS.

Activity: Encourage participation in the statewide trapper questionnaire when wolf trappers present pelts for sealing.

Encouraged participation in the statewide trapper questionnaire when wolf trappers presented pelts for sealing by explaining the importance of the questionnaire data.

Stewardship Investment items purchased: None.

Total Regional Segment Period Project Costs (in thousands): $51.0

Submitted by: Roy A. Nowlin, Management Coordinator
The Status of Wolf and Factors Influencing Their Populations in Region V

Regionwide Activities

Activity: Maintain the ability in all units to monitor harvests by collecting data through the wolf sealing process.

The area offices in Barrow, Bethel, Kotzebue, and Nome maintained agents throughout villages in each game management unit to collect harvest information when wolves were brought in for sealing.

Activity: Distribute the annual statewide trapper questionnaire to obtain harvest and population assessment information.

A general summary of wolf harvest and abundance for Units 18, 22, 23, and 26A was written for the Trapper Questionnaire annual report. A list of active hunters/trappers was compiled, a cover letter was written, and trapper questionnaires with annual reports were sent from the Juneau office.

Activity: Develop updated population objectives in cooperation with the public and other agencies.

Unit 18: We reviewed wolf population objectives internally but did not make progress toward involving the public or other agencies, and therefore we made no changes to the objectives.

Unit 22: During 2 moose meetings with Unalakleet residents, staff discussed the possibility of reducing wolf numbers in Unit 22A to aid in moose population recovery.

Unit 23: No changes were made to Unit 23 wolf population objectives during this period.

Unit 26(A): At North Slope Borough (NSB) Fish and Game Management Committee meetings, we discussed the effect of seismic exploration operations on wolf populations and peoples’ ability to trap wolves.

Activity: Use public communication and education to obtain better harvest data through increased observance of sealing requirements.

Unit 18: We wrote newspaper articles that explained the importance of sealing data and harvest reporting, and we opportunistically discussed sealing data and harvest reporting with trappers/hunters, and the public. During public meetings we explained the importance of harvest reports and encouraged trappers to report their harvest.

Unit 22: Staff traveled to 2 villages with a wildlife protection officer to discuss the reasons for and importance of harvest reporting with the general public and at a high school. We opportunistically discussed sealing data and harvest reporting with trappers/hunters, and the public. During public meetings we explained the importance of harvest reports and encouraged trappers to report their harvest.

Unit 23: We spoke to many hunters about the need to collect accurate harvest information through sealing documents.
Unit 26(A): We spoke to high school students, hunters, and the NSB Fish and Game Management Committee about the need to collect accurate harvest information through sealing documents.

Activities by Unit

Unit 18

Activity: Monitor wolf harvests through the fur sealing program, fur acquisition reports, interviews with village residents, and annual hunter/trapper questionnaires.

We monitored Unit 18 wolf harvests using fur sealing data for the 2004–2005 trapping season. Harvest figures are preliminary, but include at least 60 wolves.

Activity: Assess population status and trends utilizing sealing records, track surveys, hunter/trapper interviews and questionnaires, and observations by staff and the public.

We analyzed sealing data over several years and determined that the Unit 18 wolf harvest is generally increasing, but during years with poor travel conditions or when caribou are not readily available, the harvest is low and doesn’t follow the trend. The wolf population is increasing throughout Unit 18 as prey populations, particularly moose, increase. This is corroborated by hunter/trapper interviews, observations by staff and the public, and opportunistic track sightings made during aerial work for other species.

Activity: Assess the effects of wolf predation on prey populations through field observations and interviews with hunters/trappers.

Hunters/trappers frequently comment during interviews that wolves are having a negative impact on moose populations and other prey species. However, moose populations are probably still growing throughout Unit 18, but the Mulchatna caribou herd is declining. The extent to which wolf predation contributes to the caribou decline is not known.

Activity: Provide public education regarding wolves through the media, during public meetings, and other opportunities.

In Russian Mission we addressed the importance of sealing data for harvest reporting and provided information regarding wolf biology. We also provided wolf education through newspaper articles.

Unit 22

Activity: Monitor wolf harvest through the fur sealing program, annual hunter/trapper questionnaires and Community-based Harvest Assessments conducted annually in selected villages.

Unit 22 sealing records show a harvest of 38 wolves: 12 from Unit 22A, 8 from Unit 22B, 13 from Unit 22D, and 7 from Unit 22E. Community-based Harvest Assessment surveys completed in Koyuk and Unalakleet show 4 additional wolves taken in Koyuk and 0 additional wolves taken in Unalakleet.
Activity: Assess population status and trends utilizing sealing records, hunter/trapper interviews and questionnaires, Community-based Harvest Assessments and observations by staff and the public.

Wolf densities are believed to be highest in Units 22A and eastern 22B, but harvest data and observations by staff and local residents indicate wolves are becoming more numerous in all parts of the unit. Large numbers of caribou wintered in the Nulato Hills and abundant wolf sign was seen in the vicinity of caribou and moose wintering areas during a March 2005 moose census of Central Unit 22A. Reported wolf harvest was higher in Units 22D and 22E than ever before, and local observations indicate wolf numbers were higher than in previous years. The increasing number of wolves on the Seward Peninsula is attributed to the large number of Western Arctic herd caribou that have typically wintered on the peninsula since 1996, as approximately 75,000 caribou did during this reporting period.

Activity: Cooperate with reindeer herders to evaluate methods for reducing adverse interactions between wolves and reindeer while conserving wolves.

Nome staff participated in the annual Reindeer Herders Association meeting and addressed the herders’ concerns about wildlife issues, but wolves were not brought up for discussion.

Units 23 and 26A

Activity: Monitor wolf harvest through the fur sealing program, annual hunter/trapper questionnaires and Community-based Harvest Assessments conducted annually in selected villages.

Unit 23: Ninety seven wolves (47 males, 37 females and 13 unknown sex) were reported taken. Forty-four wolves were trapped and 44 were shot (the method of take was unknown for 9 wolves). Airplanes were used for transportation to take 3 wolves, boats for 2 wolves, a 4-wheeler for 1 wolf and snowmachines for 79 wolves (means of transport was unknown for 12 wolves).

Unit 26(A): Sealing certificates indicated that of the 5 wolves sealed in 2004–2005, three were males and 2 were females. Two of the wolves were trapped and 3 were shot. All 5 wolves were taken by residents of Unit 26A.

Activity: Conduct aerial surveys in selected portions of Unit 26A during late winter to assess population status.

Due to poor snow conditions, a sample unit probability estimate (SUPE) survey was not conducted.

Activity: Record wolf sightings during moose censuses in Units 23 and 26A as an indicator of wolf population trends.

Unit 23: Opportunistic observations of wolves were recorded during wildlife surveys and other activities.

Unit 26(A): Two wolves were seen during 10.5 hours of moose composition counts along the Colville drainage trend count area in October 2004. During the April 2005 spring moose count in the Colville trend area, 16 wolves were seen in approximately 25 hours of flying.
Stewardship Investment items purchased: None.

Total Regional Segment Period Project Costs (in thousands): $2.7

Submitted by: Peter Bente, Management Coordinator

Statewide Project Costs (in thousands):
State Share = $31.23  Federal share = $93.68  Total costs = $124.9