Wolf Management Report and Plan, Game Management Unit 5:

Report Period 1 July 2015–30 June 2020, and

Plan Period 1 July 2020–30 June 2025

Roy Churchwell

2021

Alaska Department of Fish and Game Division of Wildlife Conservation

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Hunters are important founders of the modern wildlife conservation movement. They, along with trappers and sport shooters, provided funding for this publication through payment of federal taxes on firearms, ammunition, and archery equipment, and through state hunting license and tag fees. These taxes and fees fund the federal Wildlife Restoration Program and the State of Alaska's Fish and Game Fund, which provided funding for the work reported on in this publication.

Species management reports and plans provide information about species that are hunted or trapped and management actions, goals, recommendations for those species, and plans for data collection. Detailed information is prepared for each species every 5 years by the area management biologist for game management units in their areas, who also develops a plan for data collection and species management for the next 5 years. This type of report is not produced for species that are not managed for hunting or trapping or for areas where there is no current or anticipated activity. Unit reports are reviewed and approved for publication by regional management coordinators and are available to the public via the Alaska Department of Fish and Game's public website.

This species management report and plan was reviewed and approved for publication by Richard L. Nelson, Management Coordinator for the Division of Wildlife Conservation.

Species management reports and plans are available via the Alaska Department of Fish and Game's public website (www.adfg.alaska.gov) or by contacting Alaska Department of Fish and Game's Division of Wildlife Conservation, PO Box 115526, Juneau, AK 99811-5526; phone: (907) 465-4190; email: dfg.dwc.publications@alaska.gov. The report may also be accessed through most libraries, via interlibrary loan from the Alaska State Library or the Alaska Resources Library and Information Services (www.arlis.org).

This document, published in PDF format only, should be cited as:

Churchwell, R. T. 2021. Wolf management report and plan, Game Management Unit 5: Report period 1 July 2015–30 June 2020, and plan period 1 July 2020–30 June 2025. Alaska Department of Fish and Game, Species Management Report and Plan ADF&G/DWC/SMR&P-2021-23, Juneau.

Please contact the authors or the Division of Wildlife Conservation at (907) 465-4190 if you have questions about the content of this report.

Cover Photo: Gray wolf in snow Southeast Alaska ©1990 ADF&G. Photo by John Hyde.

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Purpose of this Report

This report provides a record of survey and inventory management activities for wolves in Unit 5 for the 5 regulatory years 2015–2019 and plans for survey and inventory management activities in the following 5 regulatory years, 2020–2024. A regulatory year (RY) begins 1 July and ends 30 June (e.g., RY14 = 1 July 2014–30 June 2015). This report is produced primarily to provide agency staff with data and analysis to help guide and record agency efforts but is also provided to the public to inform it of wildlife management activities. In 2016 the Alaska Department of Fish and Game's (ADF&G, the department) Division of Wildlife Conservation (DWC) launched this 5-year report to more efficiently report on trends and to describe potential changes in data collection activities over the next 5 years. It replaces the wolf management report of survey and inventory activities that was previously produced every 3 years.

I. RY15–RY19 Management Report

Management Area

The Unit 5 management area is 5,800 mi^2, including the mainland Gulf of Alaska coast from Cape Fairweather to Icy Bay, and inland to the Canadian border (Fig. 1). Unit 5A extends from Cape Fairweather to Yakutat Bay. The Yakutat Forelands and foreland habitat south to Dry Bay within Unit 5A is split roughly in half east and west by the Dangerous River. The area west of the Dangerous River is close to Yakutat with more road and river access compared to the area east of the Dangerous River which is more remote and accessed primarily by aircraft or boat. Unit 5B, from Yakutat Bay to Icy Bay, is also remote and accessed primarily by aircraft or boat.

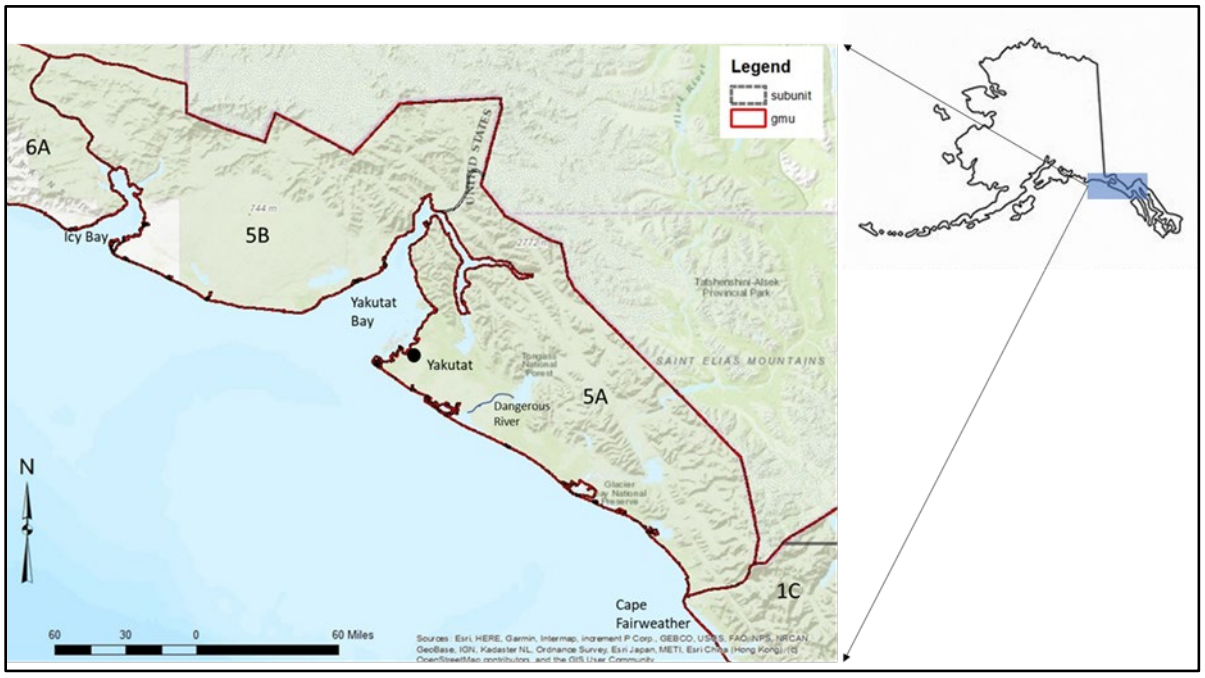

Figure 1. Map of Game Management Unit 5, Yakutat area, Southeast Alaska.

Yakutat is the only municipality in Unit 5 (population 579; U.S. Census Bureau 2020), and the major economic drivers are fishing, logging, and government employment (Native, municipal, state, and federal government). Nearly all of Unit 5A lies within the Tongass National Forest, Glacier Bay National Park, or Glacier Bay National Preserve. The Park was established in 1925 (U.S. Department of the Interior 2020a). Almost all of Unit 5B lies within Wrangell-St. Elias National Park and Wrangell-St. Elias National Preserve, which was designated as a provision of the Alaska National Interest Lands Conservation Act (ANILCA) legislation in 1980 (U.S. Department of Interior 2020b).

The entire Yakutat Forelands between the coast and the ice fields is potential wolf habitat. The forelands contain a variety of habitats, including open sedge meadows, willow flats, mixed stands of spruce and cottonwood, thick stands of spruce and hemlock, riparian stream corridors, beach fringes, and mountainous regions. Moose and mountain goat are the primary ungulate prey species available to wolves in Unit 5, and wolf abundance within the unit appears generally tied to moose abundance. Geographic features divide Unit 5 moose into 3 discrete populations: the Unit 5A Yakutat Forelands, Unit 5A Nunatak Bench, and the Unit 5B Malaspina Forelands, with moose occurring in greatest abundance on the Yakutat Forelands, which is estimated to have a population of around 600–800 moose (Scott 2014).

The Unit 5 area has a subarctic climate with temperate rainforests. The average January high temperate is 36°F and the average August high temperature is 57°F (NOAA 2018). Yakutat is considered one of the wettest towns in the state with a recorded average annual precipitation of 130 inches including 150 inches of snow that typically falls between November and April (NOAA 2018).

Summary of Status, Trend, Management Activities, and History of Wolves in Unit 5

There has not been an ADF&G scientific study of wolves in Unit 5. Wolf harvest data, along with anecdotal information, suggest that wolf numbers and distribution have been consistent for the last 3 decades. Wolf harvest throughout a large portion of Unit 5 is limited by difficult access. Wolf numbers may fluctuate with increasing and decreasing moose numbers; however, wolves probably subsisted mostly on mountain goats and salmon before the arrival of moose in the area (circa 1920s and 1930s, ADF&G 1990). Salmon are considered a seasonally important component of wolf diet, especially as a late summer and early fall food source. The abundance and availability of salmon may sustain wolves in Unit 5 during declines in moose numbers. Evidence from discussions with local hunters and trappers, hunting guides, pilots, and local ADF&G personnel suggests that wolves remain common throughout Unit 5. ADF&G personnel routinely see wolves during aerial moose surveys in both Units 5A and 5B.

Management Direction

Wolves in Unit 5 are sustainably managed to provide for human uses and to ensure wolves remain an integral part of Southeast Alaska's ecosystems. Compatible human uses include hunting and trapping, photography, viewing, listening, and scientific and educational uses. The

aesthetic value of observing wolves in natural interactions with their environment is recognized as an important human use of wolves.

EXISTING WILDLIFE MANAGEMENT PLANS

Alaska Wolf Management Plan in 1976 Alaska Wildlife Management Plans (ADF&G 1976).

GOALS

No specific formal written wolf management goals have been established for this unit. Seasons and bag limits are managed to maintain a healthy population of wolves on a unitwide basis for sustainable harvest and viewing.

CODIFIED OBJECTIVES

Amounts Reasonably Necessary for Subsistence Uses

HUNTING

There is a positive customary and traditional use determination finding for wolf in Unit 5 listed in 5 AAC 99.025 (Board of Game decision 2009).

TRAPPING

There is a positive customary and traditional use determination for wolves in Unit 1C set at 90% of the harvestable portion (5AAC 99.025 (13)(L); Board of Game decision 2012).

Intensive Management

None.

MANAGEMENT OBJECTIVES

The general management objective is to regulate seasons and bag limits to maintain a healthy population of wolves on a unitwide basis for viewing and harvest.

MANAGEMENT ACTIVITIES

1. Population Status and Trend

ACTIVITY 1.1. Monitor wolf abundance and activity using harvest information and public information.

Data Needs

Monitoring abundance helps evaluate whether harvest is sustainable which is important in meeting amounts necessary for subsistence uses (ANS) objectives.

Methods

Wolf populations in Unit 5 were monitored using harvest data, anecdotal reports, aerial sightings incidental to surveys of other species, discussions with hunters and trappers, and information collected from the annual statewide trapper surveys.

Results and Discussion

In conversations with ADF&G biologists, trappers indicated that wolf numbers were high during this period with a large pack near town (Yakutat). In the trapper survey wolves were recorded as common in Region I and ectoparasites including fleas and others were scarce on wolves during this reporting period (Spivey 2020).

Recommendations for Activity 1.1

Continue with this activity to monitor wolf populations.

2. Mortality-Harvest Monitoring and Regulations

ACTIVITY 2.1. Monitor harvest through sealing records.

Data Needs

The distribution and abundance of wolves in Unit 5 cannot be reliably monitored from aircraft. Instead, harvest data along with anecdotal reports and observations are used to ensure wolves are sustainably managed and continue to occupy their historic range.

Methods

Wolves harvested by trappers and hunters are required to be sealed in order to monitor harvest levels. Harvest data are archived in ADF&G's WinfoNet database and are summarized and reported by regulatory year. Information recorded for each wolf includes date of kill, name of trapper or hunter, specific location of kill, method of take and transportation, sex of the wolf, color of the pelt, and the number of other wolves thought to be in the pack.

Season and Bag Limit

Units and bag limits	Resident open seasons	Nonresident open seasons
Hunting: 5 wolves	1 Aug–30 Apr	1 Aug–30 Apr
Trapping: No limit	1 Nov–30 Apr	1 Nov–30 Apr

Results and Discussion

Harvest by Hunters-Trappers

Wolf harvest in Unit 5 was low with less than 10 wolves harvested on a normal year (Table 1); however, in RY15 there were 17 wolves harvested which is much higher than any other year during this analysis period. The following year, RY16, had no wolf harvest, which was the lowest harvest observed during this analysis period. Other than the 2 outlier years (17 and 0 wolf harvest), 4–6 wolves were harvested annually.

Table 1. Unit 5 wolf harvest, regulatory years 2010–2020, Southeast Alaska.

Regulatory	Reported harvest				Method of take			
year	Male	Female	Unknown	Total	Shot	Trap	Snare	Other
2010	3	3	0	6	3	1	2	0
2011	2	1	1	4	4	0	0	0
2012	5	0	0	5	4	0	1	0
2013	2	2	0	4	1	2	1	0
2014	3	5	0	8	5	2	0	1[a]
2015	9	7	1	17	3	3	11	0
2016	0	0	0	0	0	0	0	0
2017	2	2	0	4	2	0	2	0
2018	2	4	0	6	3	1	2	0
2019	3	2	0	5	3	2	0	0

[a] Method of take was archery.

Harvest Chronology

The majority of harvest from August through October was by hunters (Table 2) while trappers harvested wolves throughout the rest of the season through April. There is no single month when more wolves were regularly trapped compared to other months.

Table 2. Unit 5 wolf harvest chronology by month, regulatory years 2010–2020, Southeast Alaska.

Regulatory	Harvest chronology						
year	Aug–Oct	November	December	January	February	March	April
2010	0	0	1	1	0	1	3
2011	4	0	0	0	0	0	0
2012	4	0	1	0	0	0	0
2013	0	0	4	0	0	0	0
2014	3	1	0	0	1	1	2
2015	3	0	0	1	4	0	9
2016	0	0	0	0	0	0	0
2017	1	1	0	0	2	0	0
2018	2	0	1	1	1	0	1
2019	2	2	0	0	0	0	1

Transport Methods

Transportation by airplane includes many of the hunters who harvest wolves (Table 3), while many of the other methods are used by trappers. Boats and highway vehicles are most commonly used, while the trapper who captured the large number of wolves in 2015 used a 3- or 4-wheeler. Transportation patterns have not changed between this analysis period and the previous period.

Table 3. Unit 5 wolf harvest by transport method, regulatory years 2010–2020, Southeast Alaska.

Regulatory year	Airplane	Boat	3- or 4-wheeler	Off-road vehicle	Highway vehicle	Ski, foot, or snowshoe
2010	2	2	1	0	1	0
2011	4	0	0	0	0	0
2012	3	1	0	0	1	0
2013	0	0	1	0	3	0
2014[a]	1	1	2	0	3	0
2015	2	0	14	0	1	0
2016	0	0	0	0	0	0
2017	0	1	1	1	0	1
2018	2	1	0	0	3	0
2019	0	1	0	0	4	0

[a] One record had no transport data.

Other Mortality

The partial carcass of a young female wolf was found by the Forest Service biologist near the Russel Fiord trailhead in late May 2020. The paws and head were removed. It looked like there was a trap location nearby, but there were no traps present at the time and no way to identify who captured the wolf. The information was turned in to the Alaska Wildlife Troopers.

Alaska Board of Game Actions and Emergency Orders

There were no Board of Game actions or emergency orders during this period.

Recommendations for Activity 2.1

Continue to monitor total harvest.

3. Habitat Assessment-Enhancement

No habitat assessment or enhancement activities were conducted.

NONREGULATORY MANAGEMENT PROBLEMS OR NEEDS

Data Recording and Archiving

When printed, hard copies of species wildlife management reports and plans for wolves in Unit 5 are stored in the Douglas Area Office Library. Electronic versions of these reports and plans are

made available via ADF&G's public website through the division's publications page: www.wildlifepublications.adfg.alaska.gov. Wolf sealing data are stored electronically in ADF&G's Wildlife Information Network (WinfoNet).

Agreements

None.

Permitting

None.

Conclusions and Management Recommendations

Our knowledge of the Unit 5 wolf population is limited to the results of harvest reporting, information provided by hunters, trappers, local pilots, trapper surveys, and incidental observations by department staff. Based on these sources we believe the Unit 5 wolf population remains stable, sustainably managed, and distributed throughout its historic range. Prey appear relatively abundant, enough to sustain the wolf population in Unit 5. Moose are doing well in all areas of the unit, except for the small Nunatak Bench population; mountain goats are available, and there is a small deer population on the islands and adjacent shoreline of southeastern Yakutat Bay, in the vicinity of Yakutat. Beaver are abundant, and salmon are seasonally plentiful throughout the forelands. Because few people live in Unit 5, access is difficult and weather is often inclement; hunting and trapping pressure on wolves will probably remain low. No changes in seasons or bag limits are recommended at this time.

II. Project Review and RY20–RY24 Plan

Review of Management Direction

Management Direction

Wolves in Unit 5 are sustainably managed to provide for human uses and to ensure wolves remain an integral part of Southeast Alaska's ecosystems (Fig. 1). Compatible human uses include hunting and trapping (both for personal use and commercial sale of furs), photography, viewing, listening, and scientific and educational uses. The aesthetic value of being aware of or observing wolves in natural interactions with their environment is also recognized as an important human use of wolves.

Goals

No specific formal written wolf management goals have been established for this unit. Seasons and bag limits will be managed to maintain a healthy population of wolves on a unitwide basis for sustainable harvest and viewing.

CODIFIED OBJECTIVES

Amounts Reasonably Necessary for Subsistence Uses

HUNTING

There is a positive customary and traditional use determination finding for wolf in Unit 5 listed in 5 AAC 99.025(a)(11) (Board of Game decision 2009).

TRAPPING

There is a positive customary and traditional use determination for wolves in Unit 5 set at 90% of the harvestable portion (5AAC 99.025 (a)(13)(L); Board of Game decision 2012).

Intensive Management

None.

MANAGEMENT OBJECTIVES

The general management objective is to regulate seasons and bag limits to maintain a healthy population of wolves on a unitwide basis for viewing and harvest.

REVIEW OF MANAGEMENT ACTIVITIES

1. Population Status and Trend

ACTIVITY 1.1. Monitor wolf abundance and activity using harvest information and public information.

Data Needs

Monitoring abundance helps evaluate whether harvest is sustainable which is important in meeting ANS objectives.

Methods

Wolf populations in Unit 5 will be monitored, in a general sense, by whatever means available, including harvest data, anecdotal reports, aerial sightings incidental to surveys of other species, discussions with hunters and trappers, and information collected from the annual statewide trapper surveys.

2. Mortality-Harvest Monitoring

ACTIVITY 2.1. Monitor harvest through sealing records.

Data Needs

The distribution and abundance of wolves in Unit 5 cannot be reliably monitored from aircraft. Instead, harvest data along with anecdotal reports and observations are used to ensure that wolves are sustainably managed and continue to occupy their historic range.

Methods

Wolves harvested by trappers and hunters are required to be sealed to monitor harvest levels. Harvest data are archived in ADF&G's WinfoNet database and reported by regulatory year. Information recorded for each wolf includes date of kill, name of trapper or hunter, specific location of kill, method of take and transportation, sex of the wolf, color of the pelt, and number of other wolves thought to be in the pack.

Additionally, wolf populations in Unit 5 are monitored by other means including anecdotal reports, aerial sightings incidental to surveys of other species, discussions with hunters and trappers, and information collected from the annual statewide trapper surveys.

3. Habitat Assessment-Enhancement

No habitat assessment or enhancement activities are planned.

NONREGULATORY MANAGEMENT PROBLEMS OR NEEDS

Data Recording and Archiving

When printed hard copies of species wildlife management reports for wolves in Unit 5 will be stored in the Douglas Area Office Library. Electronic versions of these reports are made available via ADF&G's public website through the division's publications page: www.wildlifepublications.adfg.alaska.gov. Wolf sealing data are stored electronically in ADF&G's Wildlife Information Network (WinfoNet).

Agreements

None.

Permitting

None.

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