Moose Hunting in Alaska

by David Harkness

A laska's giant bull moose are impressive animals during any month of the year. It is during early September, however, that their bodies reach maximum weight as they accumulate the fat which will maintain them during the upcoming rut. The protective velvet is shredded and rubbed from their recently hardened antlers, which take up the amberbrown color from the surrounding trees and soil. Their hair thickens and lengthens and their huge neck, shoulders, and hips ripple with muscle and fat. By mid-September large bulls may reach weights up to 1,600 pounds. Truly they are the undisputed king of the deer family and a majestic representative of Alaska's wilderness. It is during September that many of Alaska's moose hunting seasons occur.

WHERE THEY ARE

Moose occupy most of mainland Alaska below 3,500 ft. Not surprisingly, the highest numbers of moose live in the same part of the state where most of the people live, mainly because wolf and/or bear densities in such areas are below natural levels and because moose are an early successional species that thrives in forest regrowth or other disturbed areas. Densities of up to three moose per square mile occur within 200 miles of Anchorage, and within 100 miles of Fairbanks up to two moose





per square mile are found. They are also relatively abundant along portions of the Kuskokwim River, the Koyukuk River, the Noatak River, and in portions of the Seward Peninsula and the Alaska Peninsula.

In these areas they are found at densities from 0.8 to 1.3 moose per square mile. Throughout the remainder of the state, density estimates typically range from one moose per 5-10 square miles of suitable habitat. Biologists estimate there are about 155,000 moose in Alaska, and the population is generally healthy throughout the state.

For management purposes ADF&G has divided the state into 26 Game Management Units (GMUs). Fifteen of these are further separated into lettered subunits. The numbering system starts in southeast Alaska with Units 1-4 and works north and west to Unit 26, which comprises the north slope of the Brooks Range to the Arctic Ocean. Moose are found in all units except 2 and 4 (Southeast Panhandle Islands), 8 (Kodiak), and 10 (Aleutian Islands).

Approximately two-thirds of the statewide moose harvest is taken from just six units, namely 13, 14, and 16 near Anchorage, 20 near Fairbanks, and 19 and 21 in the westcentral portion of the state. Units 9 (the Alaska Peninsula), 15 (the western Kenai Peninsula), 17 (southwestern Alaska), and 22 and 23 (northwestern Alaska) account for an additional 20 percent of the harvest. Hunters from outside Alaska most frequently hunt in Units 9, 13, 16, 17, 19, 20, 21, and 23.

In 1987, 26,000 hunters took 7,000 moose, a success rate of 27 percent. Of these, 6,500 were bulls and 500 were cows. The vast majority of the successful hunters lived in Alaska (86 percent). But the success rate for nonresidents (52 percent) was about twice the rate for residents. The higher success by nonresident hunters is, to a large part, attributable to their use of guide-

outfitters and air charters. The number of nonresident hunters has been increasing steadily over the past several years.

Condensing all of the information about hunting moose in a state the size of Alaska is a difficult task. You can get an idea of how big Alaska is when you realize that the average size of each of the 26 GMUs is about one-half the size of Pennsylvania.

TIME AND COST

A hunter should plan on spending from 7 to 10 days in the field in pursuit of a moose. Before hunting, a nonresident must purchase a \$60 license and a \$300 moose tag. A resident must have the standard \$12 license. In addition, all hunters must acquire a free moose harvest ticket, which has a stub to "notch" out the kill date, and a hunt report form. The report must be com-

pleted and mailed to ADF&G so the department can keep track of the annual harvest.

Guide-outfitters and aircraft charters provide service to moose hunters throughout the state. Guide information is available through the Alaska Professional Hunters Association and the Alaska Department of Commerce and Economic Development. Many hunters select a guide on the recommendation of another hunter. Ask the guide for references of past clients. Hunts vary and you should seek the type that will provide you with the most satisfaction.

Registered guide-outfitters usually provide all aspects of a hunt except personal gear and accompany the hunter in the field. Costs for a 7-to-10 day trophy guided hunt range from \$4,500-\$5,500. This usually includes air fare from a major Alaska city to the field.

Aircraft charter information is available through the Federal Aviation Administration, the Alaska Air Carriers Association, a local telephone directory, or on the recommendation of another hunter.

Aircraft charter costs range from \$120 to \$300 per hour depending on the size, type, and location of aircraft. These rates apply also to "dead-head" time after hunters are placed in the field. Larger planes can accommodate two to five hunters so charter fees can be shared. Typical air-charter costs for two hunters to get into good moose hunting areas west of Anchorage will be \$250 to \$800 per hunter. Should a hunter choose to fly with a charter service located off the state's primary road system, then additional commercial flight expenses may also be necessary. As an example, a round-trip commercial flight between Anchorage and Nome costs approximately \$400.

For the successful hunter, costs of shipping, cutting, and wrapping meat add to the price of the hunt. Shipping meat by air to Anchorage from remote towns or villages costs about 25¢ per pound. Since Alaska's game regulations require that all the edible meat be salvaged, shipment of up to 600 pounds may be necessary. Although many resident hunters do their own cutting and wrapping, numerous companies provide this service for approximately 35¢ per pound. In many cases nonresident hunters choose to take only a portion of the meat home with them. The remainder is given to people in rural communities, assistant guides, or to friends in Alaska.

CLOTHES AND EQUIPMENT

As with any excursion in Alaska where considerable time will be spent in the outdoors, it is imperative that a person be well prepared for a variety of weather when hunting moose. Inadequate clothing or camping equipment can quickly turn an enjoyable trip into a life threatening situation. Every year in Alaska, hunters fall victim to hypothermia and occasionally they die. Relatively cool, often rainy weather is more the rule than the exception throughout much of Alaska during September. Depending on the hunt location and on the whims of nature, temperatures can range from near 0° F to 50° F.

The coldest temperatures should be expected within the Interior and Arctic units (18-26), most frequently after the middle of September. In the more southerly units, particularly those along the coast such as 1, 5, 6, 9, and 17, plan for rain and wind.

A list of essential clothing includes good rain gear, hip boots, long or insulated underwear, warm shirts and pants (preferably wool), sturdy leather boots, heavy socks, a warm coat, gloves, and a wool hat. Lighter clothing for warmer, dry days should also be included. Layers of clothing are essential so that outer layers can be removed during heavy exertion or when the chilly temperatures of morning rise.

The most important element of an enjoyable, safe hunt is a reliable shelter. If no cabin is available, this means a fairly large, sturdy, rainproof tent. Protection from the rain and wind can be achieved by placing the tent in a well drained, protected spot and by utilizing a fly, tarp, or plastic cover. Good quality camping equipment including insulated sleeping pads and bags (small, folding cots are also nice if space allows), a reliable stove, several cooking pots, utensils, a small axe or wood saw, and a good supply of nutritional food. Other essential items include waterproof match containers and numerous matches, a cigarette lighter, plenty of fuel for cooking, a first aid kit, cotton rope, knives and sharpening tools, insect repellent, a compass, plastic bags, water containers, a flashlight, a sturdy backpack, game bags, a meat saw, and of course well maintained firearms (and/or bows and arrows) with a good supply of ammunition. A smaller spare tent or tarp can be used for food storage and should be positioned some distance from the campsite.

Most experienced hunters realize the importance of being in good physical condition prior to going afield. Moose hunters in particular should be aware of how much work is required to pack a moose several miles back to camp. Keep these facts in mind prior to pulling the trigger, or you may find yourself confronted with a task likely to cause considerable physical pain and possible serious injury.

CARE OF MEAT

One aspect of moose hunting common to virtually every hunt is the care of the meat once an animal is down. It is imperative that the hide and internal organs be removed as quickly as possible. Even if the weather is relatively cool, heat from the rumen (large stomach), insulated by the thick hide, can result in meat spoilage in a matter of hours. Once the meat has been cooled, there may remain one other potential problem before the steaks make it to your dinner plate—a bear. Hunters must make every effort to keep meat from the reach of bears. Leaving meat in the field overnight or failing to hang it high from a tree or meat rack often results in the loss of fine table fare for which you have paid a good deal of money and worked very hard. It is legal to kill a bear to defend your life, but not to defend your meat. That's the law!

CHOOSING AN AREA

Choosing a hunt area is often difficult for both nonresidents and residents of urban communities. The choice sometimes depends on whether you are mainly interested in a freezer full of meat or trophy antlers. Reviewing the harvest statistics from the most productive units is helpful in choosing a place to hunt.

For sheer numbers of moose you can't beat Units 13-16. These four units produced a reported harvest of over 3,000 moose in 1987 (150 to nonresidents). These units are popular with residents of southcentral Alaska and provided hunting opportunity to over half of all persons hunting moose in Alaska in 1987. Despite substantial hunting pressure and a large harvest. some hunters travel to more remote areas and find trophy size animals. In 1987, hunters took 355 moose with antlers 50-59 inches wide and 91 that were 60 inches or greater. Over 70 percent of these large bulls came from Units 13 and 16 in heavily hunted areas. To provide for larger bulls and to maintain adequate sex ratios for breeding, regulations have been established requiring that hunters take only certain sized bulls. For instance, in some areas bulls with either spike-fork or 50 inch or greater antlers are allowed, while in most of Unit 13 bulls must have at least a 36 inch antler spread.

For hunters, a significant bill passed the Alaska State Legislature in 1989. HB 112 creates the Big Game Commercial Services Board, which oversees licensing and regulation of commercial services to big game hunters. It designates licensing criteria for guide-outfitters (formerly, guides and outfitters were separate entities). Further, it stipulates that nonresident hunters (unless accompanied by a relative who is a resident, over 19, and within the second degree of kindred) must be accompanied by a guideoutfitter if hunting bear, Dall sheep, or mountain goat. (Previously, mountain goat was not a species requiring a guide.)



Access into Unit 13, near the Upper Susitna River, is primarily by aircraft and off-road vehicles (ORV). Road hunting is also popular. The unit contains many lakes suitable for float planes and numerous "bush strips" (some nothing more than gravel bars along large rivers) for wheeled aircraft. Well used ORV trails extend into all subunits. Although the harvest is relatively well distributed throughout Unit 13, most of the take and most of the large bulls come from Subunits 13B and 13E. Unit 13 competes annually with Unit 20 for the largest harvest of bulls in the state.

In 1987, 1,050 moose were taken from Unit 14 (Anchorage/ Palmer), the largest total harvest of any unit in the state. Of these, 750 were bulls and 300 cows. Unit 14 also has the highest hunter density. Hunters using aircraft, boats, ORV's and 3-wheelers combined took approximately the same number of moose as those using only highway vehicles and hunting on foot. The extensive road system allows nearly half of the 5,000 plus hunters easy access to much of the unit. Subunit 14A, near Palmer, produced over half the moose taken in Unit 14. In Subunit 14B, near Talkeetna, hunters using ORV's and 3-wheelers accounted for half of that area's harvest. Trails off the Hatcher Pass Road, near Caswell Lakes and along the South Fork of Montana Creek provided access routes for many.

Subunit 14C, in which Anchorage is located, has nearly half the state's human population and a healthy population of nearly 2,000 moose. In addition to a general bull season and several permit drawing hunts, 14C (in particular the Fort Richardson Military Reservation) is host to a special bow and arrow only drawing permit hunt. Regulations in 14C are quite complex and require thorough review before going afield. Much of Unit 15 on the western Kenai Peninsula is within the Kenai National Wildlife Refuge, and access is restricted primarily to float planes and highway vehicles on a limited road system. Some ORV and 3-wheeler use occurs off refuge lands near Homer. All bulls taken from Unit 15 must have either spikefork or 50 inch or greater antlers. More than half of the large bulls taken in this unit came from a special permit hunt area in Subunit 15B.

In Subunit 16B, along the eastern slope of the Alaska Range, hunters typically use boats along the Susitna, Yentna, Skwentna, and Kahiltna Rivers or float planes on accessible lakes. About 54 percent of moose harvested in that subunit were taken by hunters using aircraft. River boats were used by 15 percent of the successful hunters. In subunit 16A between the Kahiltna and Susitna Rivers, ORV's, 3-wheelers, and highway vehicles are the most popular method of transportation for successful hunters.

Unit 20 near Fairbanks is another productive area. In 1987, it accommodated over 4,500 hunters, with a reported harvest of 940 bulls. South of Fairbanks, between the Tanana River and the Alaska Range, stretches Subunit 20A, which supports about 9,500 moose and an annual harvest of 300-400. Access is mainly aircraft and river boat via the Tanana, although some ORV use occurs. The area provides a moderately high harvest of large moose. Generally north of Fairbanks and the Alaska Highway lies Subunit 20B, another productive area that supports nearly 7,000 moose and in 1987 a harvest of 375. The subunit contains numerous roads and, consequently, nearly half of the harvest was taken by people using only highway vehicles for access. Another 25 percent used boats and an equal number

ORV's or 3-wheelers. The area received twice as much hunting pressure as Subunit 20A.

Unit 1, consisting primarily of the mainland portions of southeast Alaska, supports widely scattered populations of moose from which hunters took 120 animals in 1987. The vast majority were harvested by local residents using boats for access. These southern moose are somewhat smaller than their northern counterparts and are most abundant along the Stikine River in Subunit 1B.

In 1987, 117 moose were taken from Unit 6 near Cordova in Prince William Sound. Nearly one-third of the harvest was cows. Local hunters took the majority of the moose, using mainly boats and aircraft for access. Despite a relatively small moose population, the area is known for its large antlered animals.

Unit 9 stretches from the southern tip of the Alaska Peninsula north to Lake Clark National Park. This area is most famous for its large brown bears and, in past years, for its numerous large moose. Because of poor calf recruitment likely due to predation by bears—the moose population has declined substantially over the past 15 years. As a result, the general resident and nonresident seasons last just 10 days with the harvest in the central peninsula restricted to only bulls with 50 inch antler spreads or greater. Currently over 75 percent of the harvest comes from either Subunits 9B or 9E.

Unit 17, lying north of Unit 9 and Bristol Bay, has low to moderate numbers of moose concentrated near rivers and other riparian habitat. Nearly three-quarters of the harvest occurs in Subunit 17B. Access is mainly by floatplane. Guide-outfitters and air transporters operating from either Anchorage or Dillingham bring nonresident and resident hunters into the area. The majority of the local residents hunt in Subunit 17C, which has considerably fewer moose than 17B.

Unit 19, along the Kuskokwim River, provides excellent moose hunting opportunities for both residents and nonresidents. Generally speaking, Subunits 19A and 19D are heavily hunted by local residents, particularly along the Kuskokwim River and within the lower reaches of several major tributaries including the Holitna, Stony, Big, and South Fork Rivers. Access is generally by river boat from numerous villages in both Unit 19 and adjacent Unit 18.

Unit 21 lies along the Yukon River from the village of Paimiut east almost to Tanana. Subunit 21A, which contains the Iditarod and the upper reaches of the Innoko and Nowitna Rivers, contributed 25 percent of the total Unit 21 harvest in 1987. This subunit can be accessed by float plane and is hunted primarily by nonlocal residents and nonresidents. Subunit 21B is hunted mainly from boats by both local and other residents. Many hunters travel down the Yukon River from the Dalton Highway bridge, 100-150 miles upriver. In 1987 over 85 percent of the 204 successful Subunit 21D hunters used boats for access. The area is hunted primarily by local and other residents with the vast majority of the harvest coming from the lower Koyukuk River and its tributaries. Resident hunters from Fairbanks and other communities travel hundreds of miles downstream from the Dalton Highway bridge to hunt in this subunit. In Subunit 21E, local and Unit 18 residents take the vast majority of the harvest by hunting from boats. A controlled use area prohibits the use of aircraft for hunting moose in a large portion of the subunit. The unit is known for its large moose.

Unit 22 on the Seward Peninsula near Nome supports a population of approximately 8,000 moose. Local residents accounted for 75 percent of the harvest, taken mainly from Subunits 22B and 22D. Portions of these subunits are accessible via the local road system. Hunters used a variety of mechanized transportation to gain access to preferred hunting spots. Aircraft access is primarily limited to wheeled planes. There are few trees in the western half of Unit 22, and most moose are concentrated along rivers and upland willow draws.

Unit 23, near Kotzebue, supports 10,000 moose and the largest harvest of the four most northerly units (23-26). The majority of the hunting pressure and harvest occurs in the Noatak, Kobuk, and Selawik river drainages. Local residents frequently use boats or snowmachines for access, while wheeled or float equipped aircraft are more popular with other residents and nonresidents. The unit supports substantial numbers of large antlered moose, although they are less common now than they were in the 1970s.

Unit 24, on the upper Koyukuk River, is a difficult area to access because of two large "controlled use areas" which prohibit the use of aircraft in any manner for moose hunting. The majority of the harvest is taken by local and other residents using boats for transportation. However, in recent years moose hunting from the Dalton Highway, on the extreme eastern edge of the unit, has become increasingly popular.

Unit 25, near Fort Yukon, supports a low density population of moose hunted mainly from boats by local and other residents along the Yukon River and its major tributaries. Aircraft are the primary method of access in the most northerly portion, Subunit 25A, which encompasses the foothills of the southeastern Brooks Range.

Unit 26, the entire north slope of Alaska, supports a low density moose population along the Colville River and several of its major tributaries. Aircraft access is good and, consequently, over 70 percent of all successful hunters flew to their preferred hunting spots. Local residents of Unit 26 reported taking about one-third of the moose from the 1987 harvest of 117.

Regulations governing moose hunting in Alaska are relatively complex compared to those for other big game animals in the state. It is important, therefore, to check carefully those regulations which apply to your particular hunting area and regulations which apply statewide to big game hunting. If after a thorough review you still have questions, call the local ADF&G Area Biologist for assistance. Biologists are stationed in communities across the state. They can nearly always clear up a confusing regulation and, in most cases, provide information which will help make your moose hunt a more enjoyable and rewarding experience.

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