

Ken Whitten

Moose Hunting in Alaska

by David Harkness

Alaska's giant bull moose reach their maximum weight in early September as they accumulate the fat which will maintain them during the upcoming rut. At this time, the protective velvet is rubbed from their recently hardened antlers, their hair thickens and lengthens and their huge necks, shoulders, and hips ripple with muscle. They are the undisputed king of the deer family and a majestic representative of Alaska's wilderness.

Where They Are

Moose occupy most of mainland Alaska below 3,500 feet elevation. The highest numbers of moose live in the same part of the state where most of the people live, mainly because there are fewer wolves and bears near urban areas and because moose thrive on the small willows, birch, and aspen characteristic of recently disturbed habitat. 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, Koyukuk, and Noatak rivers, and in parts of the Seward and Alaska peninsulas, occurring at densities from 0.8 to 1.3 moose per square mile. The remainder of the state has about 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.

The state is divided into 26 Game Management Units (GMUs). Moose are found in all GMUs except 2 and 4 (Southeast Panhandle Islands), 8 (Kodiak), and 10 (Aleutian Islands).

Approximately two-thirds of the statewide moose harvest comes from just seven units, namely 13, 14, and 16 near Anchorage, 15 on the Kenai Peninsula, 20 near Fairbanks, and 19 and 21 in the westcentral portion of the state. Units 9 (the Alaska Peninsula), 17 (southwestern Alaska), and 22 and 23 (northwestern Alaska) account for an additional 18 percent of the harvest.

Hunters from outside Alaska most frequently hunt in Units 9, 16, 17, 19, 20, 21, and 23. In 1990, moose hunting by nonresidents was prohibited in Unit 13, formerly a popular unit for nonresidents, and most of Unit 16. Unit 16 will reopen to them in 1991, but Unit 13 will remain closed.

During the 1990 season, 21,000 hunters took 5,800 moose, a success rate of 28 percent. Of these, 5,500 were bulls and 300 were cows. Most of the successful hunters lived in Alaska (85 percent). But the success rate for nonresidents (47 percent) was



about twice the rate for residents. The higher success by non-resident hunters is primarily attributable to their use of guide-outfitters and transporters.

The 1990 statewide moose harvest was substantially reduced from the 1989 take of 7,200 because of shortened or canceled seasons following the severe winter of 1989-90. Studies have since shown that fewer moose died than anticipated, so 1991 seasons have been lengthened and the statewide harvest should increase by 600-800 over 1990.

Time and Cost

A nonresident must purchase an \$85 license and a \$400 moose tag. Nonresident alien fees for a license and tag are \$300 and \$500 respectively. 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 completed and mailed to the Alaska Department of Fish and Game (ADF&G) for monitoring of the annual harvest.

Guide-outfitters and transporters, who utilize mainly aircraft and boats, provide service to moose hunters throughout the state. Guide-outfitter information is available through the Alaska Professional Hunter's Association, Alaska Professional Sportsmen's Association, and the Alaska Department of Commerce and Economic Development. Many hunters select a guide on the recommendation of another hunter. If you are considering a guide, ask him for references from past clients. Hunts vary and you should seek the type that will provide you with the most satisfaction.

Registered guide-outfitters usually provide everything except personal gear. The guide or assistant accompanies the hunter in the field. Costs for a 7-10 day guided hunt range from \$4,000-\$6,000. This usually includes transportation from a major Alaska city to the field camp.

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,

additional commercial flight expenses may also be necessary. As an example, a round-trip commercial flight between Anchorage and Nome costs approximately \$550.

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 32 cents 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 cents 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 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 to 50 degrees (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, 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 chilly morning temperatures 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 using a fly, tarp, or plastic cover. Insulated sleeping pads and bags (small, folding cots are nice if space allows), a reliable stove and a good supply of nutritional food are essential. Other key items include waterproof match containers and numerous matches, a cigarette lighter, plenty of fuel for cooking, a first aid kit, rope,

knives and sharpening tools, insect repellent, a compass, plastic bags, water containers, a flashlight, a sturdy backpack, game bags, a meat saw, and well maintained firearms (and/or bows and arrows) with a good supply of ammunition. A small 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; otherwise you may find yourself confronted with a task likely to cause considerable physical pain and even possible serious injury.

Care of 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 interested mainly 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.

In 1991, a 50-inch antler restriction applies to nonresidents hunting moose in many units. Hunters should check the 1991 hunting regulations for specific requirements.



Grant Klotz

For sheer numbers of moose you can't beat GMUs 13-16. These four units produced a reported harvest of more than 3,200 moose in 1989 (210 to nonresidents). The 1990 take in Units 13, 14, and 16 declined by more than 50 percent from 1989, accounting for the entire statewide decline. The harvest in these three units should increase by 50 percent in 1991. These units are popular with residents of southcentral Alaska and provided hunting opportunity to nearly 40 percent of all persons hunting moose in Alaska in 1990. Despite substantial hunting pressure and large harvest, hunters still manage to find trophy animals. In 1990, hunters took 222 moose with antlers 50 inches or wider in this area. In 1991, the take of large antlered moose should increase, particularly in Unit 16. To provide for larger bulls and

(Continued on page 34)



Moose Hunting in Alaska *(Continued from page 11)*

to maintain adequate sex ratios for breeding, regulations have been established requiring that hunters take only certain size bulls. 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.

Access to 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 floatplanes and numerous "bush strips" (some of these "strips" are nothing more than gravel bars along large rivers) for wheeled aircraft. Well used ORV trails extend into all parts of Unit 13, and therefore the harvest is relatively well distributed throughout this unit. Most of the take and most of the large bulls come from Subunits 13B and 13E in the northwest part of the unit.

In 1990, 434 moose were taken from Unit 14 (Anchorage/Palmer). Unit 14 has a high hunter density. The extensive road system allows easy access to much of the unit. Subunit 14A, near Palmer, produced 60 percent of the moose taken in Unit 14. Subunit 14B, near Talkeetna, was closed to moose hunting in 1990 but will have a 10-day season in 1991.

Subunit 14C, in which Anchorage is located, has nearly half the state's human population and a healthy population of 2,000 moose. In addition to a general bull season and several permit drawing hunts, 14C is host to several special archery-only drawing permit hunts and a muzzle-loading rifle hunt. Regulations in 14C are 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 floatplanes 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 spike-fork or 50-inch or greater antlers. Approximately one-third of the large bulls taken in this unit came from a special trophy 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 floatplanes on accessible lakes. About half of the 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 1990, it accommodated more than 5,000 hunters, with a reported harvest of 1,133 bulls. Hunting pressure in Unit 20 likely increased in

1990 because of reduced hunting opportunities near Anchorage. South of Fairbanks, between the Tanana River and the Alaska Range, Subunit 20A supports about 9,500 moose and an annual harvest of 300-400. Access is mainly by 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, Subunit 20B supports nearly 7,000 moose and a 1990 harvest of 430. The subunit contains numerous roads and, consequently, nearly 40 percent of the harvest was taken by people using only highway vehicles for access. Another 30 percent used boats and 15 percent used ORV's or 3-wheelers. The area received more than twice as much hunting pressure as Subunit 20A.

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 two decades. As a result, the season lasts just 10 days with the harvest in the central peninsula restricted to bulls with 50-inch antler spreads or greater. Nearly 70 percent of the harvest comes from Subunits 9B and 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. Over 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.

Unit 19, along the Kuskokwim River, provides excellent moose hunting opportunities. Generally, Subunits 19A and 19D are heavily hunted by local residents with boats, particularly along the Kuskokwim River and within the lower reaches of several major tributaries including the Holitna, Stony, Big, and South Fork rivers. Subunits 19B and 19C are reached mainly by aircraft and accommodate many nonresident hunters on both guided and nonguided hunts.

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 20 percent of the total Unit 21 harvest in 1990. This subunit can be reached by floatplane and is hunted primarily by non-local 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, a 100-150 mile trip. In 1990, nearly 80 percent of the 279 successful Subunit

1990 Alaska Moose Harvest by Game Management Unit

Unit	Number Hunters	Harvest by Residents	Harvest by Nonresidents	Bull Harvest	Cow Harvest	÷ Bulls 50-59 inches	÷ Bulls 60 inches or more
1	643	127	0	125	2	0	0
5	214	68	3	71	0	no report	no report
6	343	129	32	107	54	20	37
7	495	95	6	81	20	29	1
9	636	119	133	246	6	87	67
11	147	30	2	32	0	9	2
12	429	78	20	98	0	25	4
13	2,665	515	0	515	0	41	8
14	2,481	421	13	356	78	26	2
15	2,353	381	8	380	9	102	17
16	1,032	134	3	132	5	20	6
17	489	117	108	225	0	63	43
18	171	43	3	46	0	6	0
19	1,087	290	117	387	20	116	42
20	5,213	1,053	80	1,133	0	208	54
21	981	597	115	687	25	193	104
22	700	310	39	279	70	59	24
23	332	108	91	185	14	71	53
24	267	120	24	142	2	54	23
25	499	171	33	204	0	66	20
26	154	38	55	89	4	56	12
Unknown	318	15	8	23	0	6	2
Totals	21,649	4,959	893	5,543	309	1,257	521

21D hunters used boats. 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. In Subunit 21E, the vast majority of the harvest is by hunters with boats. A controlled use area prohibits the use of aircraft in a large portion of the subunit 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 of 249, taken mainly from Subunits 22B and 22D. Portions of these subunits are accessible via the local road system. Hunters used various types of 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 an annual harvest of 200. Most 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.

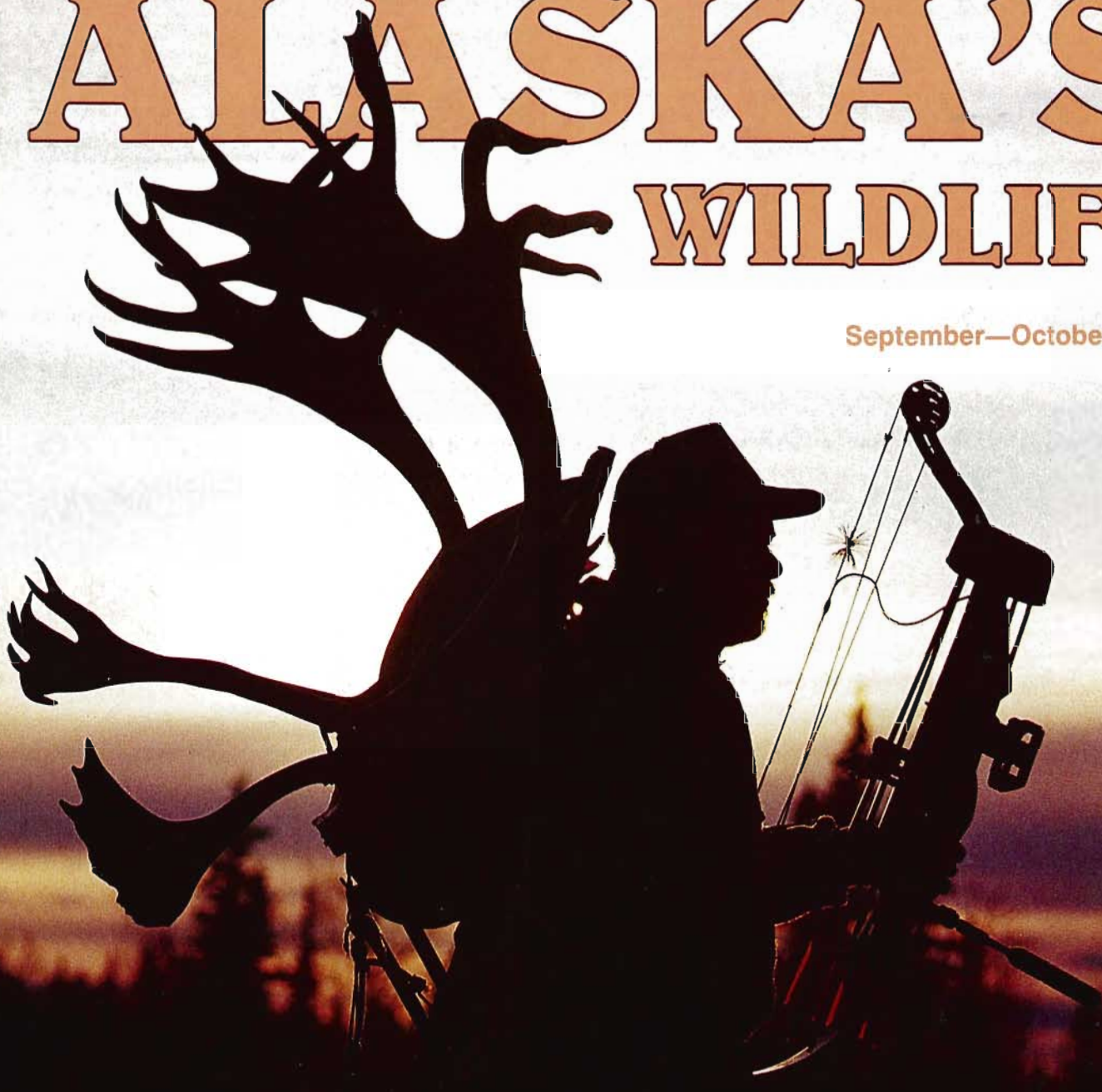
Regulations governing moose hunting in Alaska are relatively complex compared to those for other big game animals in the state. It is important, therefore, to check carefully those regulations which apply to your particular hunting area and regulations which apply statewide to big game hunting. If, after a thorough review, you still have questions, call a local ADF&G office 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 an enjoyable and rewarding experience.

David Harkness serves as area wildlife biologist, Division of Wildlife Conservation, ADF&G, Anchorage.

The Magazine of the Alaska Department of Fish and Game

ALASKA'S WILDLIFE

September—October 1991
\$3.00



**BIG
GAME
HUNTING**

