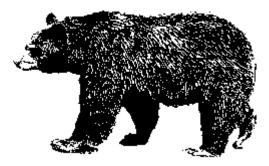
ARKANSAS GAME AND FISH COMMISSION

WILDLIFE MANAGEMENT DIVISION

2018 BLACK BEAR HARVEST REPORT



Prepared by: Myron L. Means Large Carnivore Program Coordinator Wildlife Management Division

Pat Fitts - Director Brad Carner, Chief - Wildlife Management Division

January 9, 2018

This is a progress report that contains preliminary findings. It may be subject to future modifications and/or revisions.

Introduction

Arkansas' black bear population, historically distributed statewide, was nearly extirpated by the early 1900's because of over exploitation from unregulated hunting and habitat loss caused by human population expansion. In 1915, the Arkansas Game and Fish Commission (AGFC) was created and in 1927 bear hunting was closed because of declining bear numbers. In 1951, the AGFC reported that only 40-50 bears remained in the state. Most or all of the remaining bears resided in the lower White River drainage, in the vicinity of Scrubgrass Bayou.

Between 1958 and 1968 approximately 254 bears from Minnesota and Manitoba were released into Arkansas' Interior Highlands. In 1980, after a 52-year prohibition, bear hunting resumed in the Interior Highlands of Arkansas. The objectives of the hunt were to provide recreational opportunity to hunters and to collect biological data that would help manage the black bear as a renewable resource and a game species. Today, AGFC estimates there to be 5,000+ bears in the Interior Highlands. Harvest quotas and season dates have been liberalized in recent years to increase harvest rates closer to 15% rather than 10% to help stabilize the interior highlands population.

The protection that was afforded to the native Arkansas bears of the lower White River drainage promoted population increase and range expansion. Bear sightings have become somewhat common place throughout much of the Gulf Coastal Plain and Lower Mississippi Alluvial Plain. The Delta zones (5 and 5A) still maintain a fairly limited season and quota to allow expansion of the White River population into the Gulf Coastal Plain and Lower Mississippi Alluvial Plain. The objectives for these physiographic regions (Bear Zones 3 and 4) are to collect biological data, reduce bear-human conflicts, and eventually provide recreational hunting opportunities. Current population estimates suggest that 500+ bears reside in the Delta region and an annual harvest of up to 8% might be sustainable.

2018 Season Framework

The 2018 black bear seasons in Arkansas were: **Archery/Crossbow** Bear Zones 1 and 2: September 22-November 30 Bear Zones 3, 4, 5, 5A 6 and 7: Closed **Muzzleloader** Bear Zones 1 and 2: October 20-28 Bear Zones 3, 4, 5, 5A, 6 and 7: Closed **Modern Gun Youth** Bear Zone 1 and 2: November 3-4 Bear Zones 3, 4, 5, 5A, 6 and 7: Closed Modern Gun Bear Zones 1 and 2: November 10-30 Bear Zone 5: November 24 - December 2 Bear Zone 5A: November 17 - December 2

Arkansas' bear hunting zones can be seen in Figure 1. As in all previous seasons, the use of dogs to hunt bears was prohibited. Baiting was allowed on private lands in zones 1, 2, 5, and 5A from 30 days prior to the opening of bear season until the end of bear season. Bear hunting permits were not required. The season bag limit was 1 bear by any method. The bear harvest quota for archery season in bear zone 1 was increased from 205 to 250 bears. The muzzleloader and modern gun quotas for zone 1 were 45 for each method. The zone 5 and 5A quotas were 10 and 5 bears, respectively. Bear harvest quotas were established in bear zones 1, 5 or 5A prior to the end of the scheduled season if the harvest quota was reached. Bear harvest in bear zone 2 is more or less self-regulating due to the land ownership dynamic within and adjacent to the Ouachita National Forest. A zone quota for bear zone 2 has never been necessary. Bear hunters in zones 1, 5 and 5A were required to call a toll-free AGFC phone number (1-800-440-1477) prior to going afield to determine if the season remained open in those zones. The harvest information for Zones 1, 5 and 5A was updated daily during each season.

Tagging and Checking Requirements

Option 1: Immediately upon taking a bear, hunters must check their harvested bear online, via AGFC website.

Option 2: Fill out the game tag provided in the guidebook in ink. After tagging the bear, hunters must call game check hotline within 24 hours to check the bear.

After checking their bear, hunters will be sent a premolar package for a premolar tooth from their bear. Successful hunters must submit a premolar from their harvested bear within seven days after they receive their premolar package to fulfill their game check requirements.

Results

Five hundred seventy seven bears were legally harvested during the 2018 season. The 2018 bear harvest was the highest harvest on record since 1980 (Figures 2 and 3). Three hundred seven males (53%), 270 females (47%) were harvested statewide. The majority of the bears were harvested with archery/crossbow equipment (408 bears; 71%) followed by muzzleloader (100 bears; 17%), and modern gun (69 bears; 12%) (Table 1).

Bear zone 1 produced the majority of the harvested bear with 375 (65%) (Table 1). Two hundred seventy four bears (73%) in zone 1 were harvested with archery equipment. Muzzleloader and modern gun accounted for 20% and 7%, respectively. Zone 2 harvest

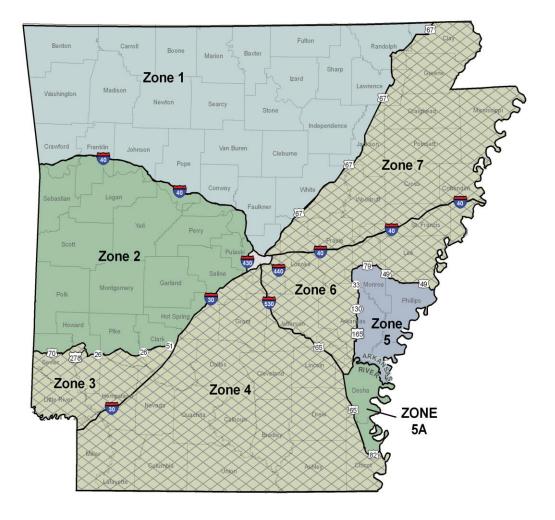
breakdown was similar with 71%, 15% and 14% coming from archery, muzzleloader and modern Gun. One hundred eighty nine (33%) were harvested in bear zone 2. Bear zones 5 and 5A produced 9 (1.5%) and 4 (0.5%) bears, respectively. Harvest sex ratios for zones 1, 2, 5 and 5A were 190m: 185 f, 109 m: 80 f, 5 m: 4 f, and 3 m: 1 f, respectively (Figure 4).

Bears were harvested in 37 counties (Table 3). The top 5 counties for bear harvest included Madison with 57 bears, followed by Newton with 47 bears, Searcy (44 bears) Van Buren (42 bears) and Polk with 36 bears (Table 3). The top 3 counties for bear harvest in Zone 1 included Madison with 57 bears, followed by Newton (47 bears), and Searcy (44 bears). The top 3 counties for bear harvest in Zone 2 included Polk with 36 bears, followed by Yell (34 bears), and Scott (31 bears). Three hundred fifty five (62%) bears were reportedly harvested over bait.

Discussion

The 2018 statewide bear harvest (577 bears) is the highest harvest year since modern-day bear hunting began in 1980. Harvest was very high most likely due to the low availability of hard mast which makes bears much more susceptible to bait. Reported harvest over bait was only 62% but I suspect harvest over bait is closer to 75% or more. Information on Public land harvest vs. Private Land harvest has been absent for the last 2 years. More than likely, the number of bears harvested on private land is a more accurate representation of the number of bears harvested over bait. When mast availability is low the success rate over bait increases greatly. The Zone 1 archery harvest quota was met in only 3 days, despite a 45 bear increase in the quota. This is very typically of what happens when mast availability is very low; bears go to bait. It has been well documented that bears visit man-made baits more readily during years when natural foods are scarce. The land ownership component of bear zone 1 continues to necessitate the need for a quota. I do think the bear population in Zone 1, and to some extent in Zone 2, continues to increase and expand. Further liberalization of harvest strategies for Zone 1 is still warranted. Being that 73% of the bears harvested in Zone 1 were taken with archery equipment, an increase in the archery quota for Zone 1 will be the most effective means to increase harvest rates.

Figure 1. Arkansas black bear management zones, 2018. Bear hunting was allowed in Zones 1, 2, 5, and 5A.



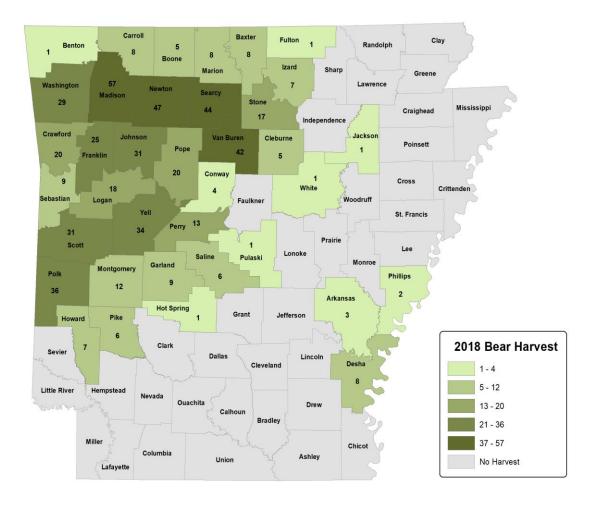


Figure 2. Arkansas black bear harvest by county, 2018.

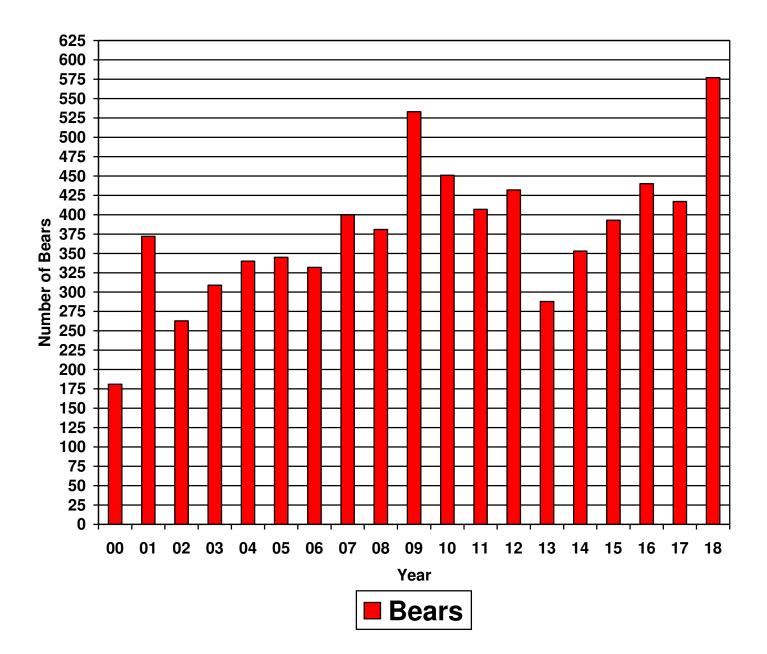
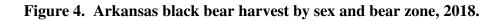
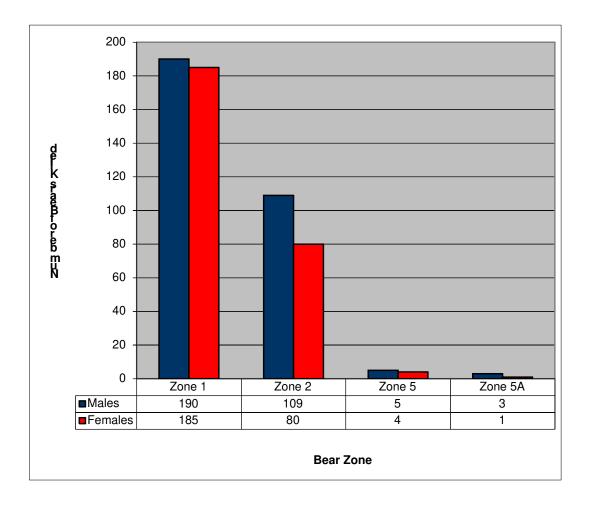


Figure 3. Arkansas black bear harvest, 2000-2018.

	Total Harvest	Male	Female	Archery	Muzzle- loader	Modern Gun	Bait Used
Zone 1	375	190	185	274	77	29	253
Zone 2	189	109	80	134	28	27	72
Zone 5	9	5	4	0	1	9	5
Zone 5A	4	3	1	0	0	4	4

 Table 1. Arkansas black bear harvest by bear zone, sex, and method, 2018.





County	Total Harvest	Archery	Muzzleloader	Modern Gun
Arkansas	3	0	0	3
Baxter	8	7	1	0
Benton	1	0	1	0
Boone	5	4	0	1
Carroll	8	6	1	1
Cleburne	5	3	2	0
Conway	4	4	0	0
Crawford	20	14	3	3
Desha	8	0	0	8
Franklin	25	21	3	1
Fulton	1	0	1	0
Garland	9	7	2	0
Hot Springs	1	0	1	0
Howard	7	2	3	2
Izard	7	3	3	1
Jackson	1	0	1	0
Johnson	31	22	5	4
Logan	18	12	4	2
Madison	57	44	10	3
Marion	8	6	1	1
Montgomery	12	6	3	3

 Table 3. Arkansas black bear harvest by county and method for 2018.

Newton	47	31	11	5
Perry	13	11	2	0
Phillips	2	0	0	2
Pike	6	5	1	0
Polk	36	27	2	7
Pope	20	10	7	3
Pulaski	1	1	0	0
Saline	6	3	2	1
Scott	31	21	3	7
Searcy	44	37	7	0
Sebastian	9	9	0	0
Stone	17	13	2	2
Van Buren	42	32	8	2
Washington	29	21	6	2
White	1	1	0	0
Yell	34	25	4	5
Totals	577	408	100	69