

2022 Sheep Permit Hunt Authorization rationale

Background

In 2020, the Government of Yukon placed five previously open thinhorn sheep Game Management Subzones (GMSs) under Permit Hunt Authorization (PHA) and increased the number of permits within Game Management Zone (GMZ) 7 East from 97 to 142.

The unit of distribution was also changed from the GMS to Sheep Management Units (SMU). These management units were developed following the completion of comprehensive sheep inventory surveys in GMZ 5 and 7 in 2015 and 2016.

The Government of Yukon, in collaboration with the Yukon Fish and Wildlife Management Board and the Yukon Fish and Game Association, surveyed sheep hunters who obtained a sheep PHA for GMZ 7 East in 2020 or in 2021. The goal of these surveys was to understand how the changes made to the distribution and allocation of permits in GM7 East in 2020 affected hunters' perspectives and experiences.

While SMUs provide an improved tool to monitor sheep populations, the results of the hunter survey suggested that the allocation of permits by SMU created hunter congestion in certain areas, which negatively impacted the hunters' experience. Nineteen per cent of survey respondents indicated that they did not hunt in GMZ 7 East in 2020 or 2021, even if they held a PHA, because they perceived a higher likelihood of crowding.

Increased hunting pressure may negatively affect sheep or increase the harvest rates locally, which could be detrimental to maintaining sheep populations. Allocating permits by GMS distributes hunting pressure across a SMU. However, in some areas, grouping GMS may be a good approach.

Based on the results of the hunter survey and analysis of the harvest data for GMZ 7 East, the PHA numbers and allocations were adjusted for the 2022 season. The 2022 PHA distribution has been allocated by GMS, with three of the permit areas being comprised of two GMS (see map and table). The number of permits offered this year is 116.

Determining the numbers and distribution of permits

To determine the number of permits assigned to each GMS (or group of GMS) in GMZ 7 East, we examined the following variables: the non-lamb population estimate, historical licensed harvest, outfitter quotas, the PHA success rate, the *Science-based Guidelines for the Management of Thinhorn Sheep in Yukon*, the results of the sheep hunter surveys, and information regarding geographical features and access points in each SMU.

The goal was to identify the number of permits that could be allocated to a GMS while maintaining a sustainable harvest rate within the GMS and the SMU (see table and map) and reducing the possibility of overcrowding. For example, in areas with limited access points and medium-high success rates, fewer permits were allocated.

FOR MORE INFORMATION, PLEASE CONTACT:

Meghan Larivee, Ungulate Biologist (Sheep and Goat): 867-393-6250

Catherine Pinard, Wildlife Harvest Biologist: 867-667-8407



Summary of permits numbers by area, including variables used to estimate anticipated harvest

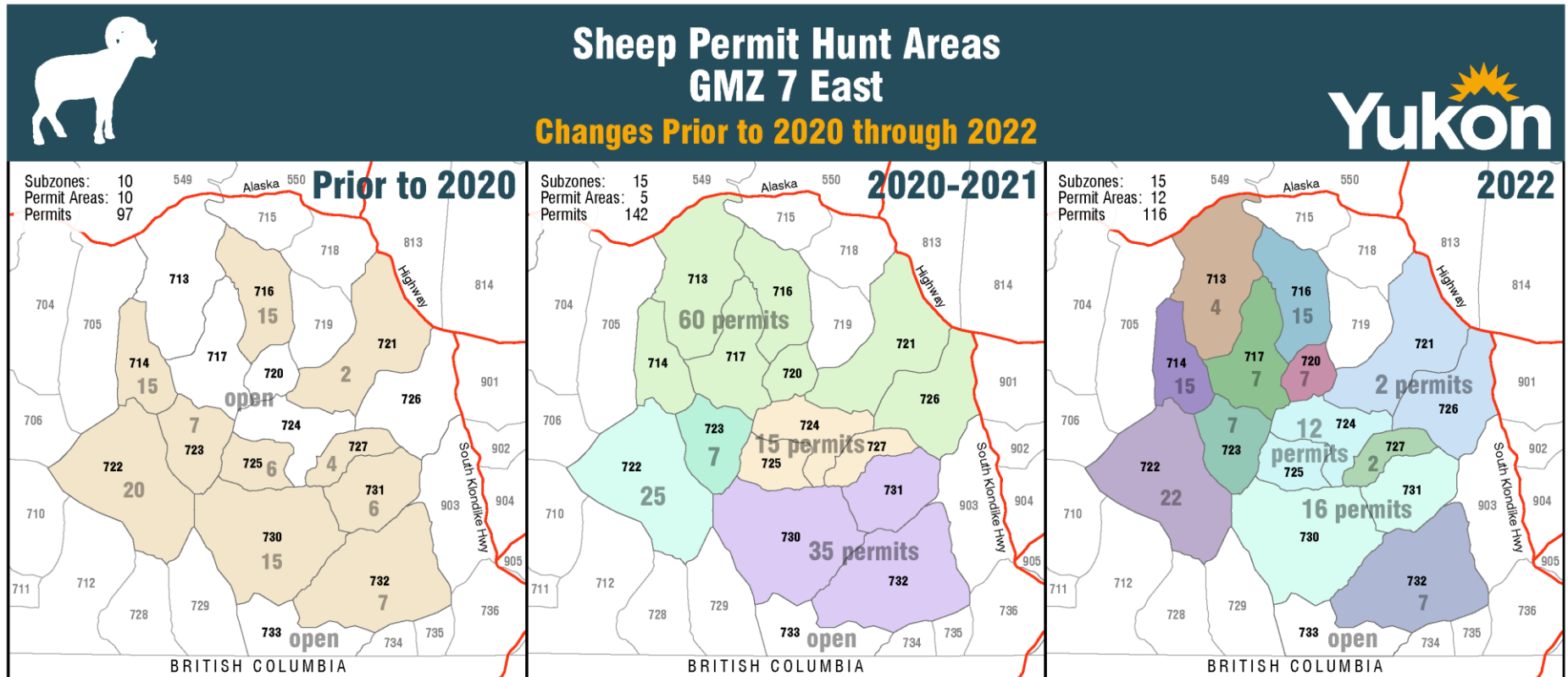
Sheep Management Unit	Game Management Subzone	Permit allocation before 2020	Permit allocation 2020-2021	Permit allocation 2022
Arkell	713	open	60	4
	714	15		15
	716	15		15
	717	open		7
	720	open		7
	721	2		2
	726	open		
Primrose	722	20	25	22
Rose Lake	723	7	7	7
Alligator Lake	724	open	15	12
	725	6		
	727	4		2
Skukum	730	15	35	16
	731	6		
	732	7		7
	733	open	open	open

Sheep Management Unit	GMS	Outfitter Quota 2022	Minimum population count (no lambs) GMS 2015	Sustainable harvest by GMS	Estimated 10 year success rate average by Resident hunters	Number of permits allocated	Anticipated harvest rate (by GMS)	Anticipated harvest rate (by SMU)			
Arkell	713	1	52	2.1	23%	4	3.7%	2.7%			
	714	2	153	6.1	24%	15	3.7%				
	716	2	158	6.3	14%	15	2.6%				
	717	1	76	3.0	30%	7	4.1%				
	720	1	72	2.9	22%	7	3.5%				
	721	0	60	2.4	39%	2	1.3%				
	726	0	0	0.0							
	Primrose	722	n/a	346	13.8	36%	22		2.3%	2.3%	
Rose Lake	723	1	100	4.0	19%	7	2.3%	2.3%			
Alligator Lake	724	2	123	4.9	24%	12	3.0%	2.7%			
	725		41	1.6							
	727		n/a	28					1.1	14%	2
Skukum	730	n/a	243	9.7	30%	16	1.2%	1.4%			
	731	n/a	143	5.7							
	732	n/a	69	2.8					21%	7	2.1%
	733	n/a	9	0.4					n/a	open	3.3%

FOR MORE INFORMATION, PLEASE CONTACT:
 Meghan Larivee, Ungulate Biologist (Sheep and Goat): 867-393-6250
 Catherine Pinard, Wildlife Harvest Biologist: 867-667-8407



Maps of Permit Hunt Area distribution and codes in GMZ 7 East in 2021 (same as 2020) and in 2022



Find the **Results of the 2020-2021 sheep hunter effort survey for Game Management Zone 7 East Permit Hunt Authorization Area** report and information sheet at Yukon.ca/thinhorn-sheep.

FOR MORE INFORMATION, PLEASE CONTACT:
 Meghan Larivee, Ungulate Biologist (Sheep and Goat): 867-393-6250
 Catherine Pinard, Wildlife Harvest Biologist: 867-667-8407

