How indigenous hunting in the North-East of the Russian Arctic influence migratory waterbirds populations?

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Federal law «On hunt and conservation of hunting resources...» № 209, 24/06/2009 Basic concepts

- Hunting grounds
 - assigned hunting grounds
 - hunting grounds of common use (>=20%)
- Hunter person included in hunting register (and having hunting card and permission for fire-arms)
- Hunting permission permission to harvest hunting animals
 - according a quota (for species with limited harvesting)
 - according seasonal or daily norms
- User of hunting resources legal person concluded hunting agreement for an assigned hunting ground
- Hunting Economy Agreement between users and regional administration
- Special status for indigenous hunting

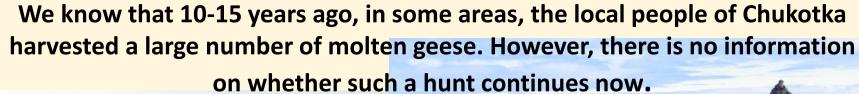
Federal Law «On hunt ...»

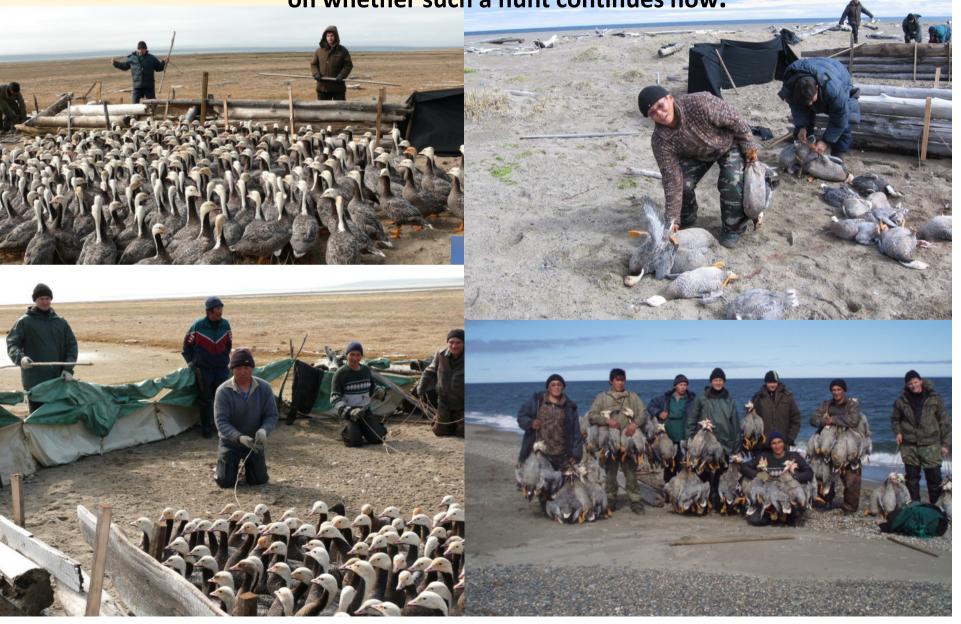
- introduced a legal principle "to take into consideration interests of indigenous peoples" (point 4, clause 2)
- introduced a special type of the hunt "hunt for sustain the traditional way of life" (point 7, part 1, clause 12)
- stats that non-indigenous local population also can "hunt for sustain the traditional way of life" (together with indigenous)
- stats, that traditional hunt does not require hunting permission (part 2, clause 19)
- introduced a list of additional hunting bird species to "hunt for sustain the traditional way of life" (incl. loons, gulls and seabirds (part 2, clause 11)

Points 23, 29, 33, 37 of "Hunt Regulation" says that "hunt for sustain the traditional way of life" for indigenous hunters is allowed throughout the year.

However:

- Instead of hunting permission indigenous hunter must have proof that he does not need permission (hunting card with special stamp).
- Besides hunting card, hunter must have special permissions for fire arms (including authorization to purchase and possession license), that is relly complicated bureaucratic procedure.
- To keep a shot-gun or a rifle hunter must have a lockbox. It is especially unrealistic for nomadic reindeer herders who live in conic tent and migrate using reindeer sledges.
- Indigenous hunter do not have free access to assigned hunting grounds.





In some places, waterfowl were harvested in very large quantities. However, there is no accurate data about this. We know that in recent years, the police has withdrown a large number of illegal firearms from the population. However, it is not known whether this led to a reduction in bird catch.





Only a few sources of information on water bird hunting in North-East of Russia are available:

- Data of the special survey made by Evgeniy
 Syroechkovskiy and Konstantin Klokov in 1999-2005
 with the assessment of subsistence hunting in 22
 settlements of Northern and Southern Chukotka and
 Northern Yakutia.
- Data of the small scale survey in Kamchatka in 2011 with special emphasis to the potential effect of spring hunting on Spoon-billed Sandpiper (only 65 hunters filled the questioners).
- The data on the rings return of the Russian Ring Center.
- Information from a few published papers.

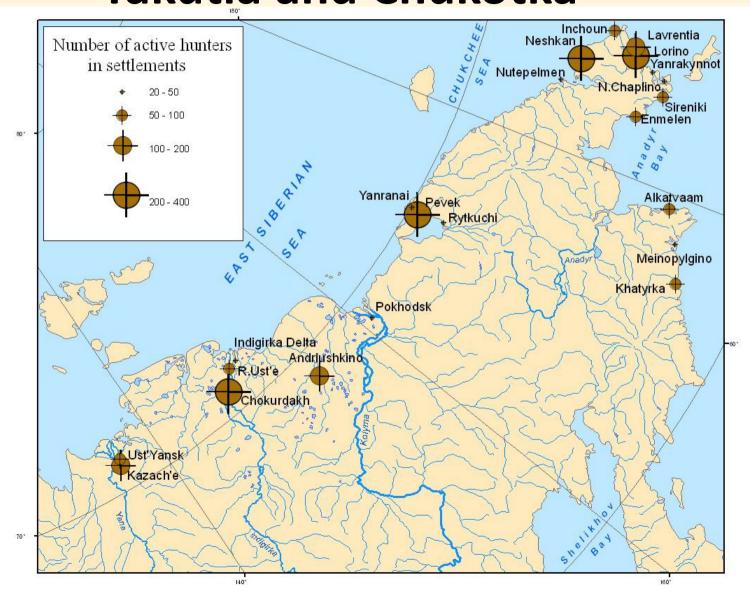
Syroechkovski E. and Klokov K.

bird subsistence harvesting survey

since 1999



Bird subsistence hunting in Northern Yakutia and Chukotka



What is already known:

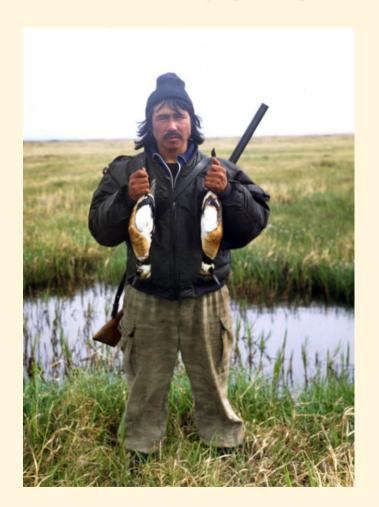
- Birds, especially, geese, ducks and eiders still remain an important source of food for indigenous families in hundreds of villages on the Arctic Sea. In several indigenous villages situated on the migratory ways average hunting bag is about 100 birds for year. Shorebirds (waders) are harvested significantly less.
- Waterfowl is harvested mainly in the spring time.
- The amount of harvested birds depends mainly on the geographical location of villages with regard to migratory ways of the species.
- Eggs gathering is important only for a few indigenous communities.
- Birds are perceived by indigenous families first of all as foodstuff.

Number of harvested species in North-East Arctic (by groups)

Waterfowl

- **GEESE (7)**
- DUCKS (11)
- EIDERS (4)
- SWAN (1)

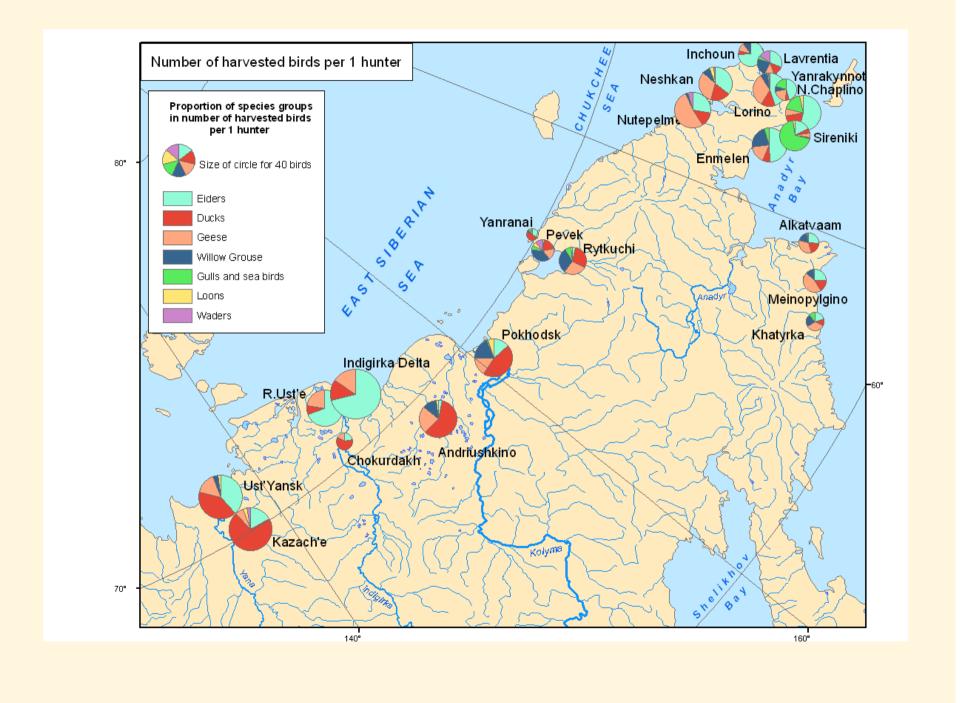
IN TOTAL 22

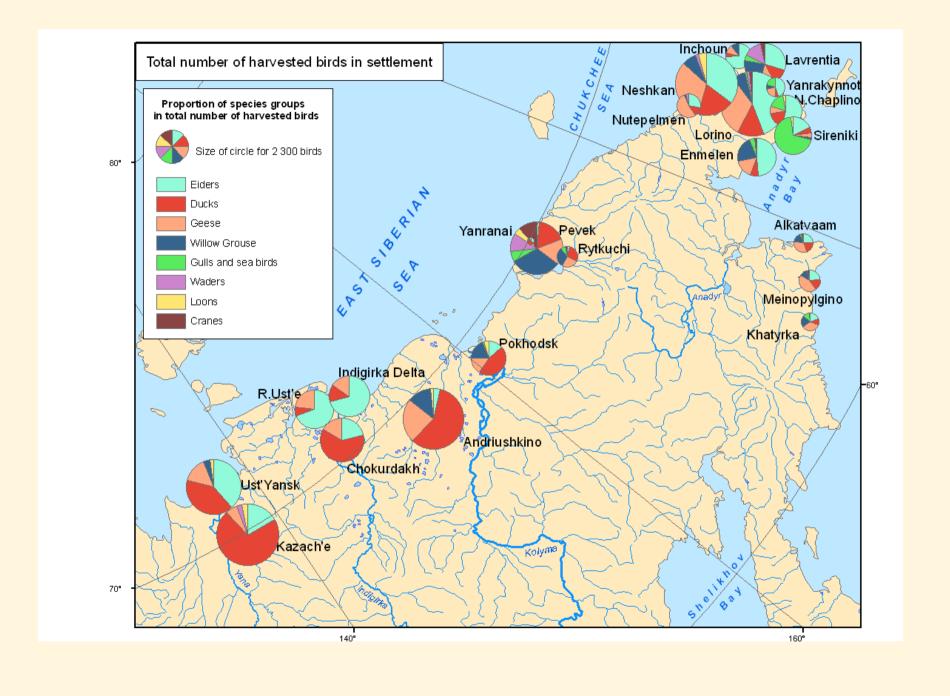


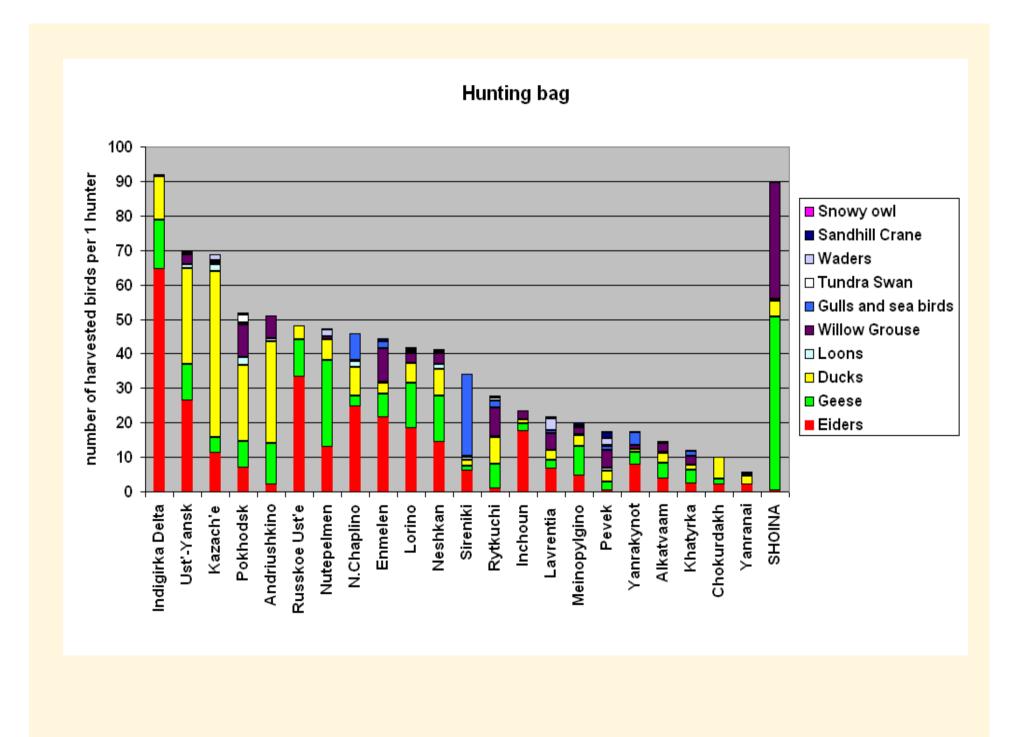
Other groups

- LOONS (3)
- SEABIRDS & GULLS (> 6)
- WILLOW GROUSE (2)
- SANDHIL CRANE (1)
- SNOWY OWL (1)
- WADERS (?)

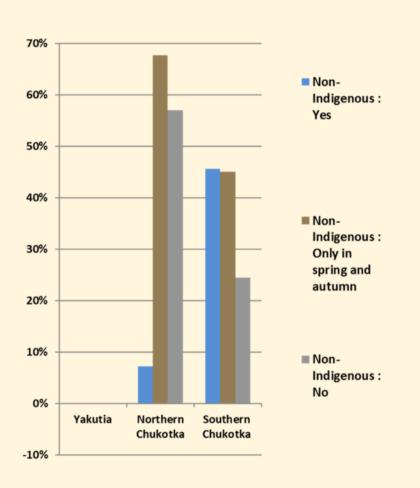
IN TOTAL > 13

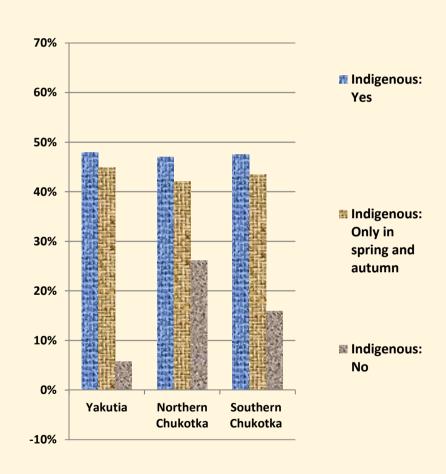






Are birds an important food source for your family? Non-indigenous hunters Indigenous hunters

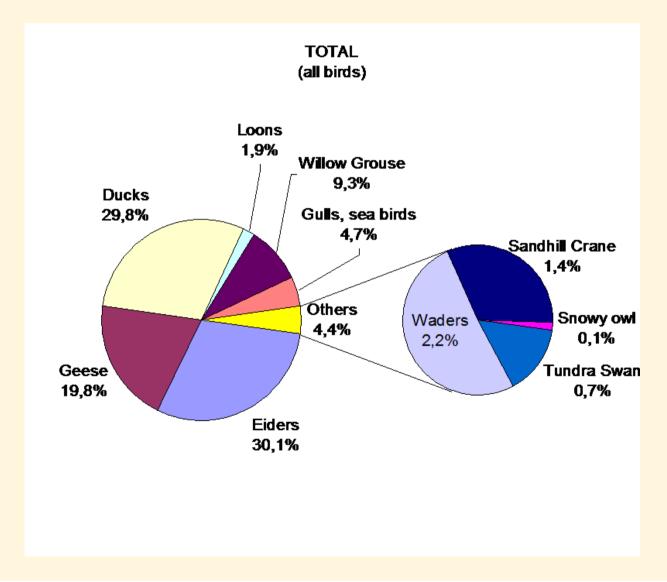






Bird subsistence hunting in Northern Yakutia and Chukotka





AN ASSESSMENT OF ILLEGAL AND LEGAL HARVEST OF WADERS OF THE EAST ASIAN FLYWAY IS NEEDED

- About 1500 of wader per year were harvested in 22 surveyed settlements in Chukotka. Most probably, the harvesting of waders in Kamchatka is even more intensive.
- The total number of harvested wader in the Russian part of EAF can be several thousands of birds.
- The relation between big and small harvested waders was about 50%: 50% in Chukotka. Kamchatka hunters shoot more big waders and less small waders.

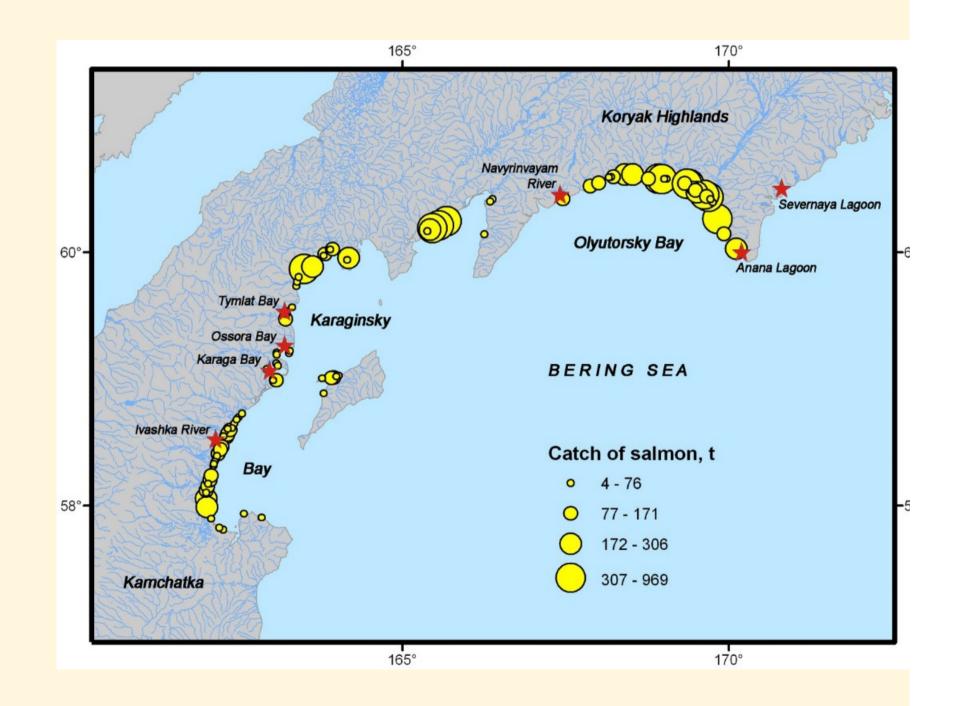
Hunting is one of two basic factors of decline of wader populations within the East Asian Flyway (EAF), along with the human transformation of their habitats in the intertidal zone. However, there is almost no data on the size of wader legal and illegal harvest in the Russian part of the EAF.

Hunting could pose a threat mainly to the following wader species:

- Special type of legal hunting "Yagodnik hunting" (means "berry birds"), which is focused on Whimbrels and other bigger waders using numerous crowberry spits along Russian Pacific coasts. Also hitting Godwits, bigger "shanks" and other large waders.
- The Far-Eastern Curlew (the biggest rid) harvested together with Whimbrels and anytime seen;
- The Spoon-billed Sandpiper. Spoon-billed Sandpipers are clearly not shot on purpose but among other small waders in concentrations. On the background of extremely small world population (about 150 nesting pairs), the loss of even a few individuals can cause dramatic decline of the population;
- Other medium-sized and smaller waders, which form dense flocks on migration (including of AMBI focal species Great Knot Calidris tenuirostris and Red Knot Calidris canutus) plus Turnstones etc.

New threats

- The use of modern all-terrain vehicles enables hunters to reach formerly inaccessible territories and there is no police and game inspectors in remote areas.
- A new group of potential hunters appeared on the Pacific coast: brigades of fishermen. Since the early 1990s, coastal salmon fishing with fixed gill nets became widely spread in the river mouths and lagoons (about 1,500 such "fishing sites" in Russian Far-East in July and August. It may be a serious factor that formerly had no negative effect on wader populations, especially in Kamchatka.



The data on the wader rings return from the Russian Ring Center indicates the most dangerous areas.

Rings from waders killed by hunters. Data of Russian Ring Center (Sergei Kharitonov)



- The data on the rings return from the Russian Ring Center indicate that the most dangerous areas for waders are the Kamchatka coast, the coast of Sakhalin Island and, to a lesser extent, three districts of the Khabarovsk Territory (Okhotsk, Tuguro-Chumikansky and Nikolaevsky).
- In addition, three out of nine satellite transmitters put on of spoon-billed sandpipers failed on the western and eastern coasts of North Kamchatka – exactly in the areas of intensive coastal salmon fishing by gill nets. 30% of sat tags lost in restricted part of flyway and this was not the Yellow Sea. So it might be critical for surviving of this endangered species.

Conclusions and proposals

- Hunting on water birds in the North-East of Russia probably has negative impact on the populations of several threatened species.
- Due to the lack of accurate information we cannot evaluate how important it is.
- A special survey is needed to assess the hunting press not only on waterfowl but as well on waders.
- A social survey is needed to determine user groups' interests and hunters' attitude towards different species of water birds.



What could be the result

• 1. To advise decision-making bodies on how to take into account the interests of major user groups.

 2. Prepare draft regulations and model agreements on the use of hunting resources.

- 3. Develop a mechanism for coordinating the interests of indigenous people and biodiversity conservation.
- 4. Develop a concept for a system for monitoring the migration of migratory birds.

Number of waders harvested by subsistence hunters in several settlements of Chukotka and Yakutia (data of the special survey made by Evgeniy Syroechkovskiy and Konstantin Klokov in 1999-2005)

	Region	Name of settlement	Number of harvested waders	% of waders in total number of harvested birds
1	Southern Chukotka	Meinopylgino	16	2%
2	Southern Chukotka	Khatyrka	-	0%
3	Southern Chukotka	Alkatvaam	-	0%
4	Northern Chukotka	Neshkan	121	1%
5	Northern Chukotka	Pevek	640	11%
6	Northern Chukotka	Lavrentia	538	15%
7	Northern Chukotka	Enmelen	-	0%
8	Northern Chukotka	Sireniki	-	0%
9	Northern Chukotka	N.Chaplino	-	0%
10	Northern Chukotka	Inchoun	-	0%
11	Northern Chukotka	Nutepelmen	53	4%
12	Northern Chukotka	Rytkuchi	-	0%
13	Northern Chukotka	Yanranai	2	2%
14	Northern Chukotka	Yanrakynnot	5	1%
15	Northern Chukotka	Lorino	114	1%
16	Yakutia	Andriushkino	-	0%
17	Yakutia	Chokurdakh	-	0%
18	Yakutia	Indigirka Delta	-	0%
19	Yakutia	Russkoe Ust'e	-	0%
20	Yakutia	Pokhodsk	20	1%
21	Yakutia	Ust'Yansk	30	0%
22	Yakutia	Kazach'e	209	3%

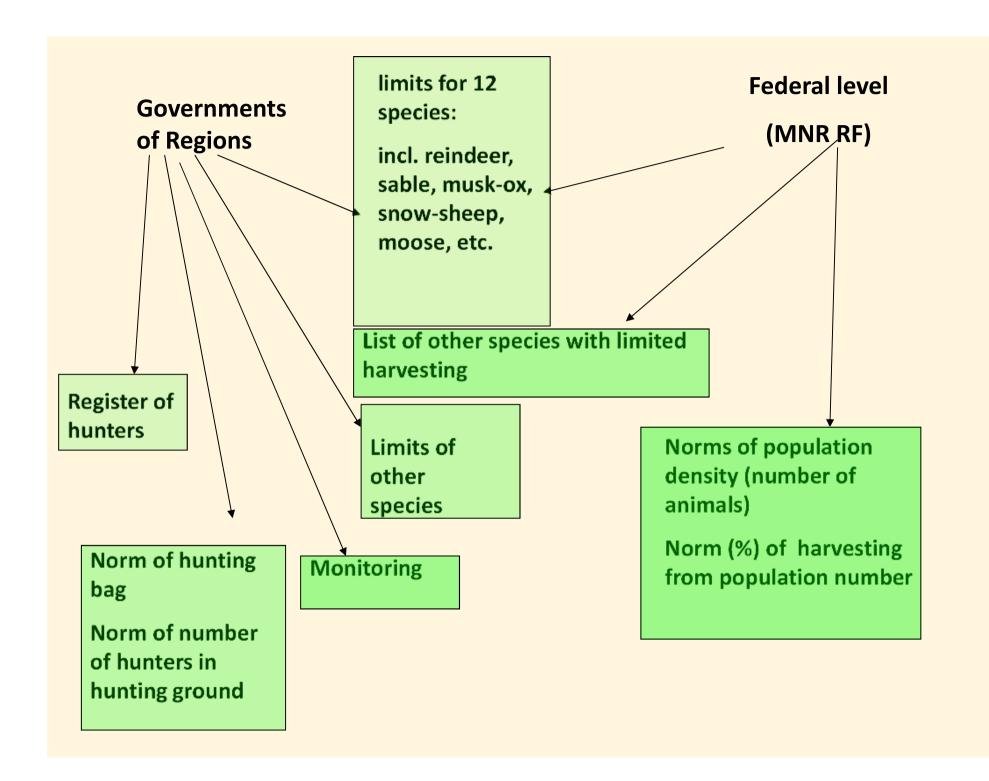
Kamchatka, 2011 Number of hunters in the villages and towns included in survey

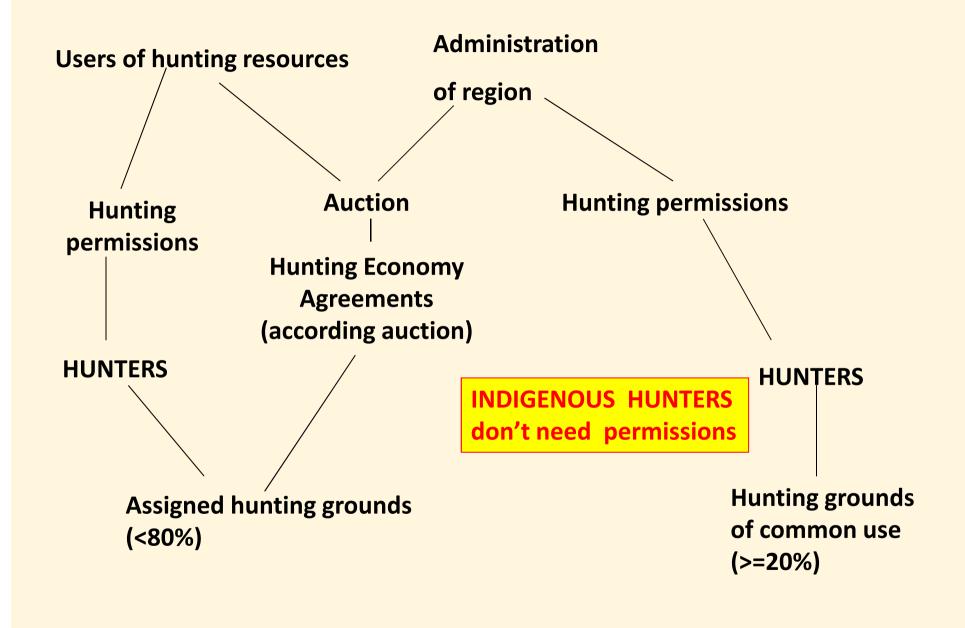




Questionnaires received from officers of Kamchatka Service of Wildlife Conservation and State Nature Refuges and Kamchatka Agency of Forestry and Wildlife Conservation

	Tilich ki	Khaili no	Vyven ka	Ust'- Khari uzovo	Sobole vo	Nikol' skoe	Ozern ovskii	Total
Population number	1650	860	450	1700	2272	650	2444	10026
Number of officially registered hunters	213	45	45	0	214	119	280	916
Number of non- registered hunters (expert assessment)	50	43	13	20	20	0	4	150
Number of hunters-tourists	0	0	0	10	20	0	13	43
Total number of hunters	262	88	58	30	254	119	297	1108
Number of hunters, who shoot birds (assessment)	131	62	41	21	178	30	150	613
Number of hunters, who shoot geese (assessment)	39	25	20	3	53	4-5	150	295
Number of hunters, who shoot waders (assessment)	0	0	0	30	37	5-6	140	213
Number of hunters, who shoot small waders, in case if there are not other game (assessment)	0	0	0	12	0	1-2	15	28
Number of hunters, who shoot small waders on purpose (assessment)	0	0	0	1-2	0	0	0	1-2
Do children often shoot birds by catapults?	no	no	no	often	no	no	no	
Ratio hunters/all population, %	16%	10%	13%	2%	11%	18%	12%	11%





Do you consider that birds are?

