

Symposium
„Source areas and stepping stones
in Aquatic Warbler conservation”

Jarosław Krogulec
OTOP

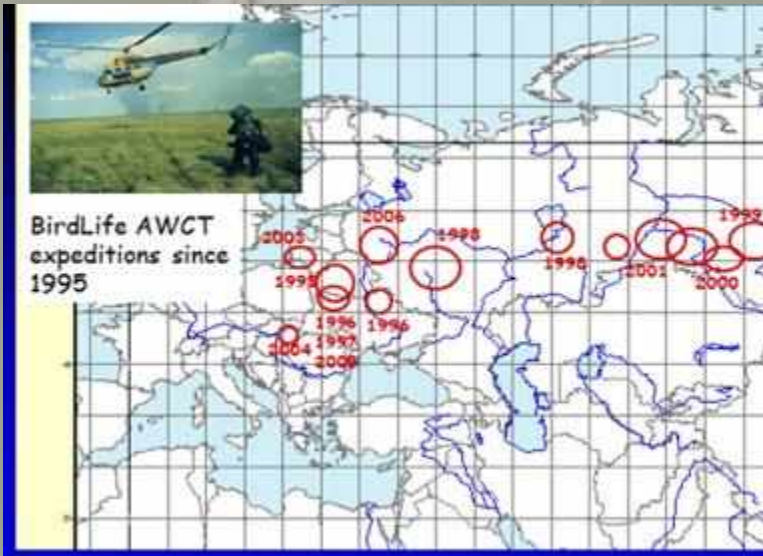
fol. Cezary Korkosz

Symposium Source areas and stepping stones in Aquatic Warbler conservation 16 i 17 marca 2021 on line

- Organizowane w ramach projektu „Wzmocnienie południowo-wschodniej metapopulacji wodniczki *Acrocephalus paludicola* w Polsce” nr POIS.02.04.00-00-0186/16, a także 30lecia OTOP
- Podsumowanie aktualnej wiedzy na temat rozmieszczenia, liczebności i ochrony wodniczki na świecie
- ponad 50 osób z 10 krajów
- 2 dni, 14 prezentacji, spotkanie Aquatic Warbler Conservation Team
- Sprawozdanie, prezentacje i nagranie na kanale OTOP w YouTube:
<https://otop.org.pl/2021/04/source-areas-and-stepping-stones-in-aquatic-warbler-conservation-relacja-z-symposium/>

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Aquatic Warbler Conservation Team (BirdLife AWCT)

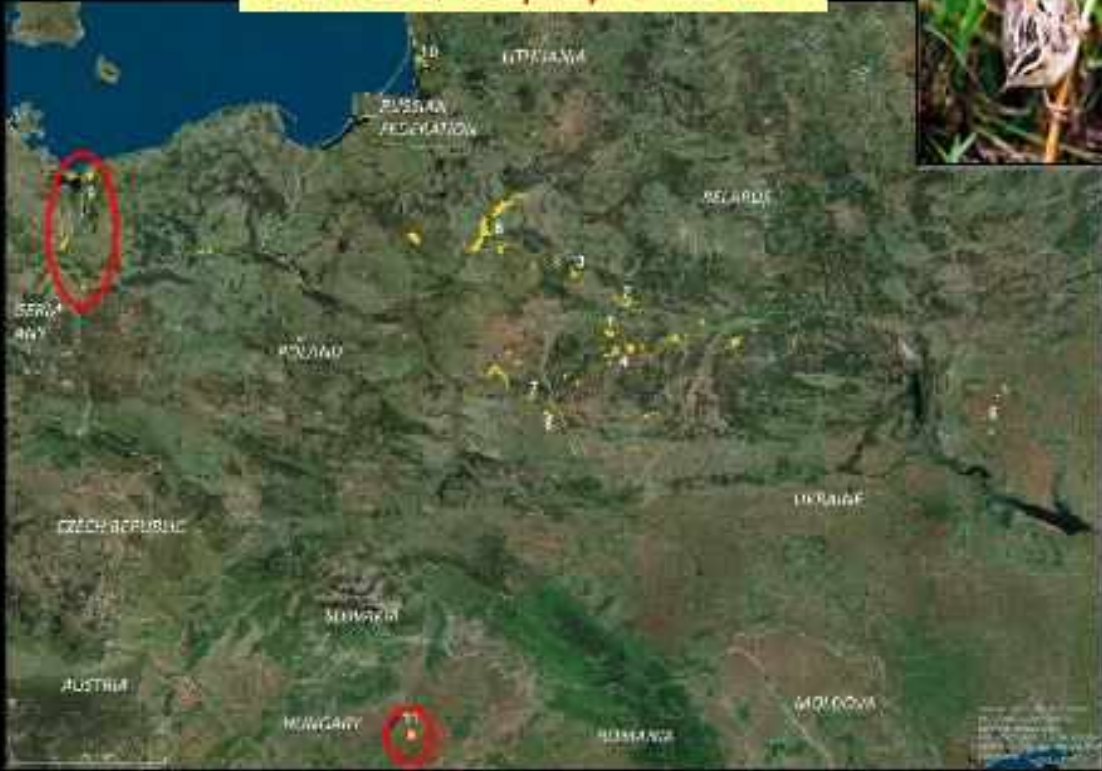


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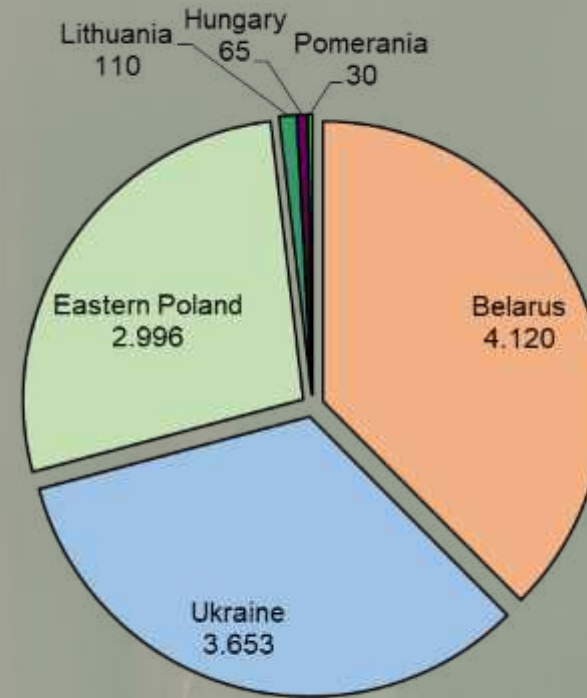
Stan populacji światowej – ok. 11 000 śpiewających samców

Breeding sites of Aquatic Warbler (Flade et al. 2018)

Total area of occupancy: < 400 km² !

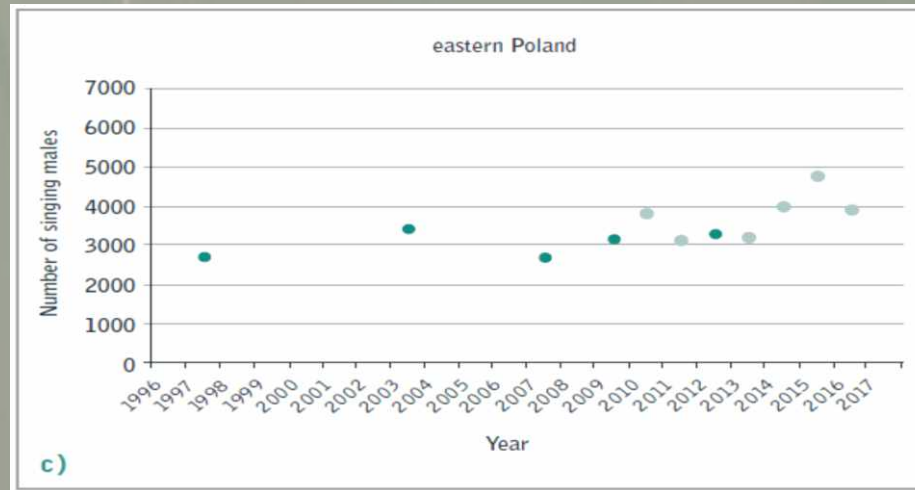
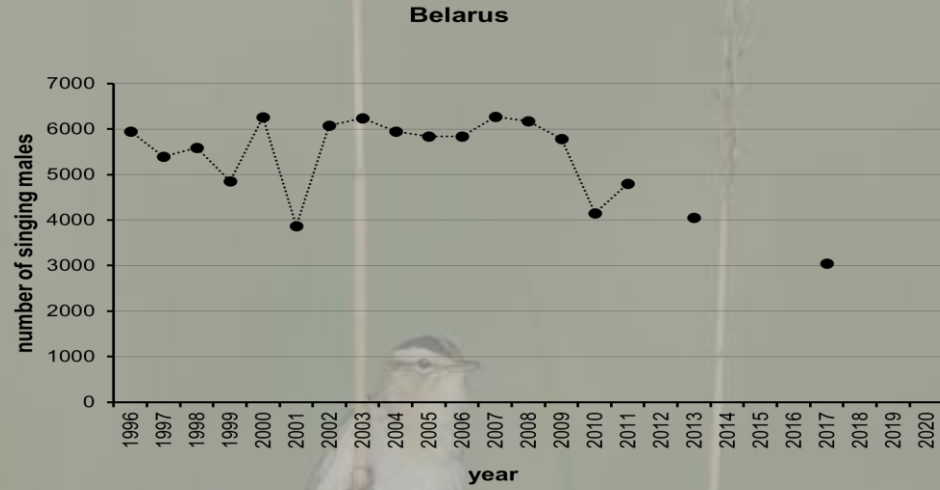


average global estimates of Aquatic Warbler population (singing males) 2007-2016



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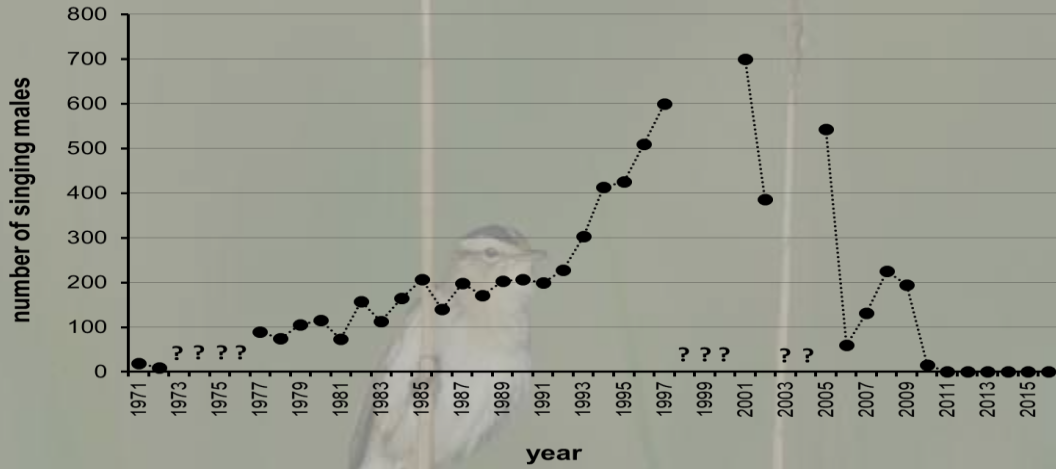
Stan populacji światowej – ok. 11 000 śpiewających samców



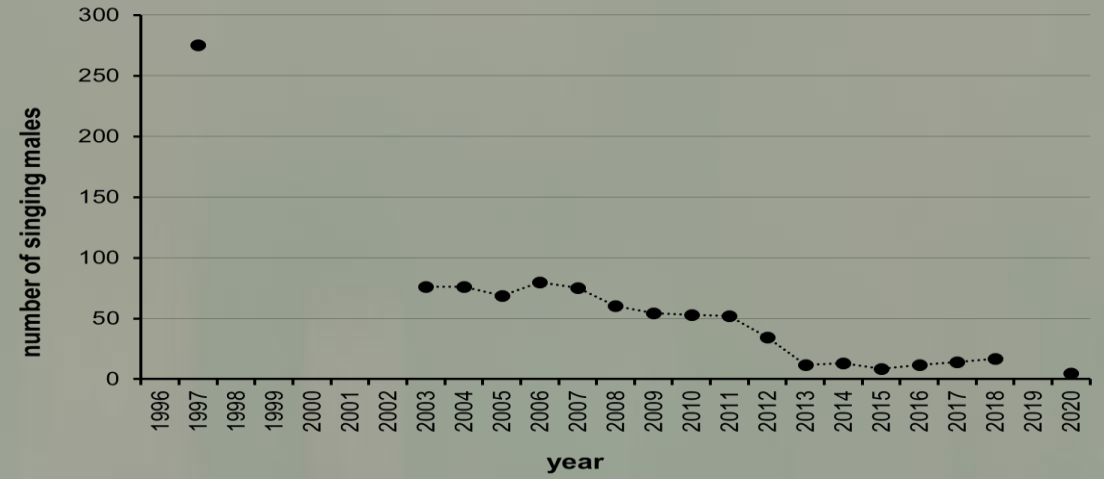
fot. Cezary Korkosz

Aquatic Warbler population dynamics 2

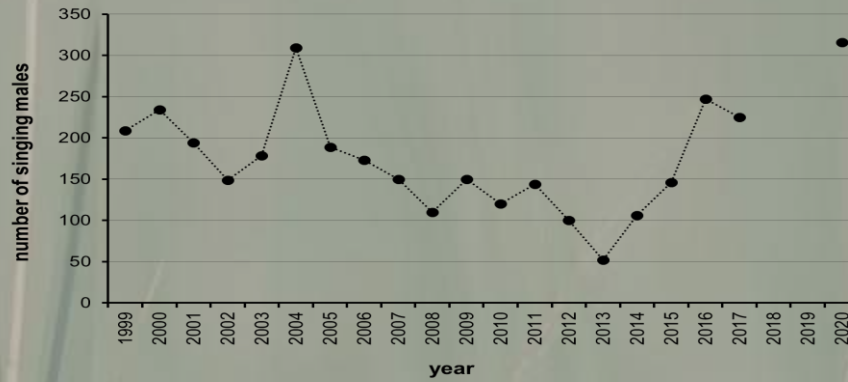
Hungary



Pomerania

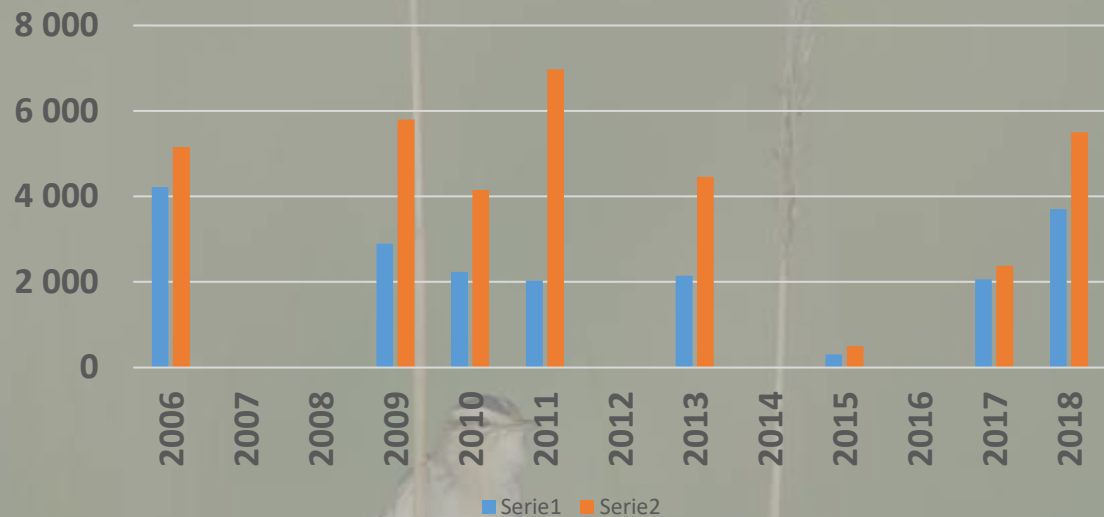


Lithuania



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Number of AW on Zvanets



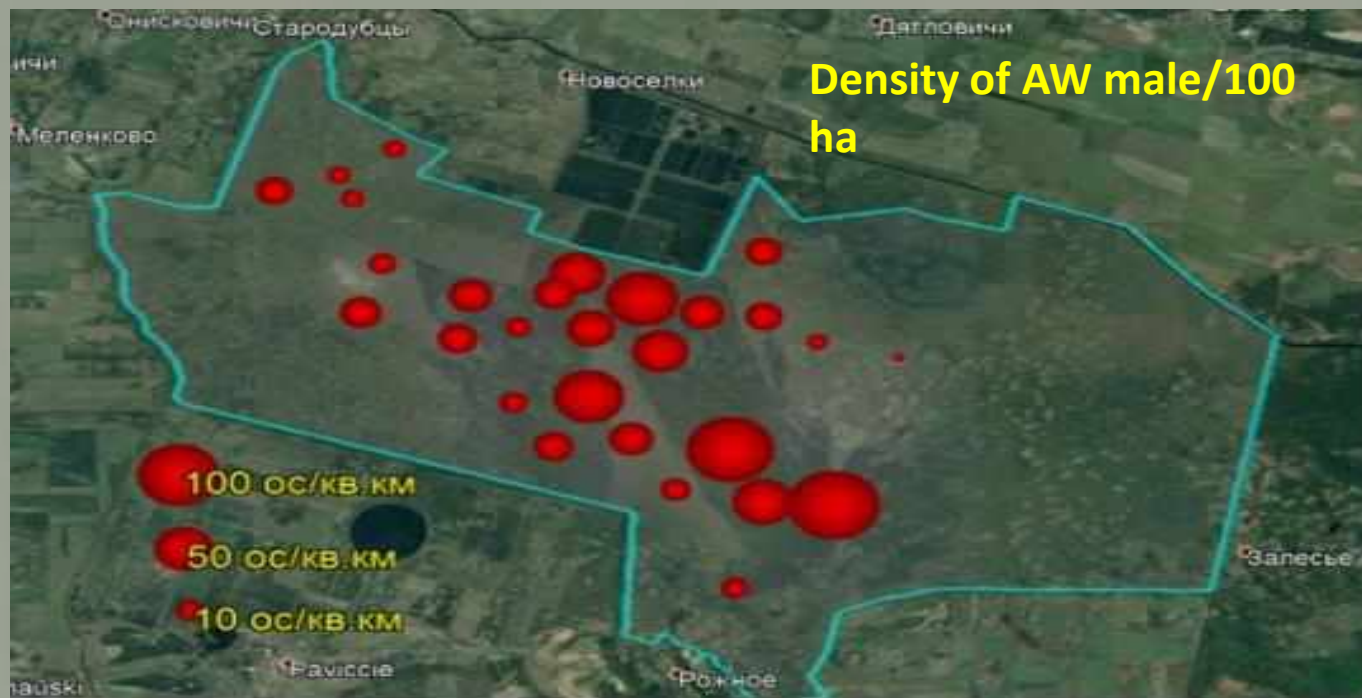
Dynamic of AW number at Zvanets

Great Snipe – 9 males

Curlew – 1 pair

Great spotted eagle -2

Główne stanowiska wodniczki na Białorusi





Long-term changes in abundance of AW are explained by the reduction of open sedge fens due to their overgrowth with shrubs and reeds.

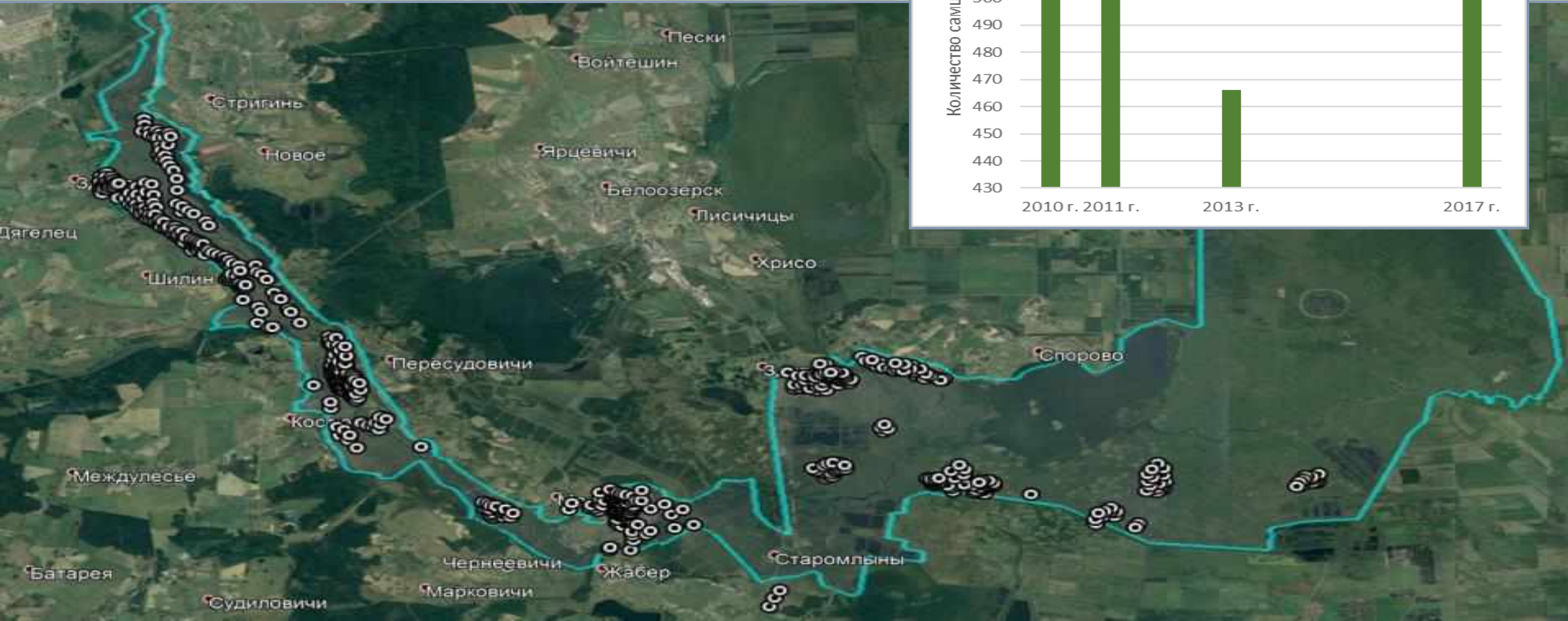
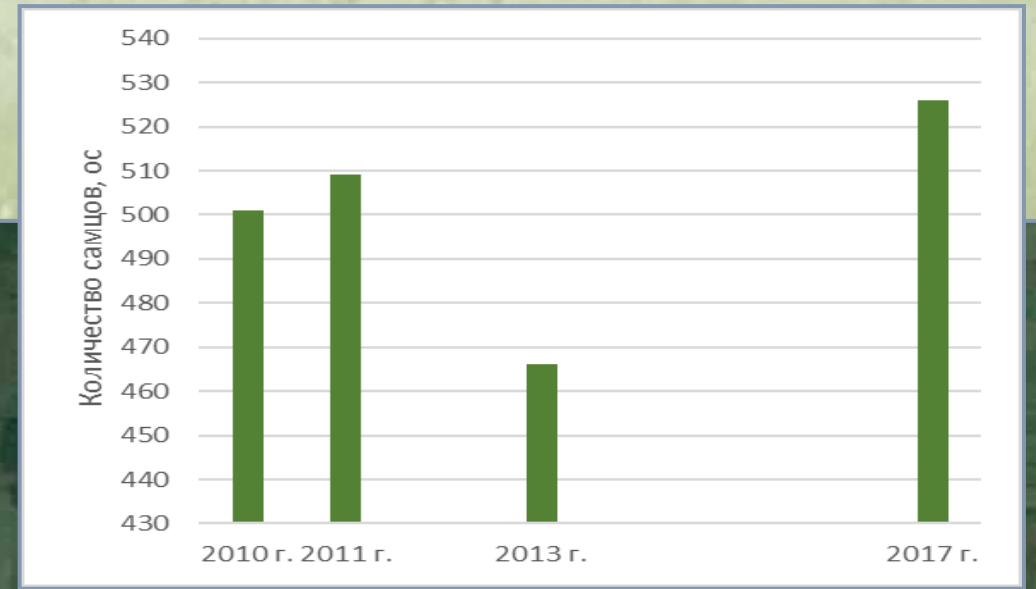


Changes in the abundance of the Aquatic Warbler over the years are due to fluctuations in the water level.

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Aquatic Warbler monitoring on Sporovo fen mire

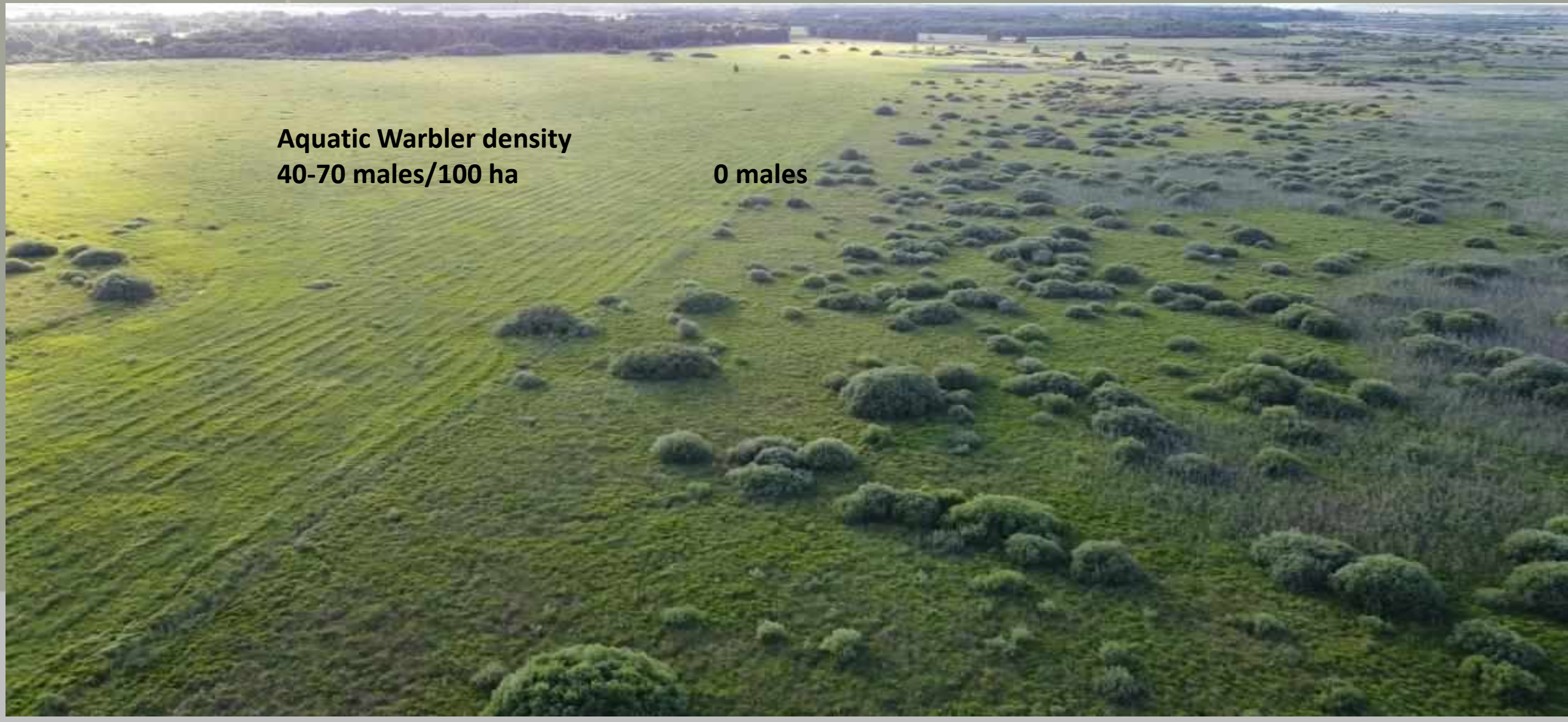
The abundance of the Aquatic Warbler in the Sporovskoe fen mire varies from 465 to 592 males from year to year.



Monitoring plot "Koztyuki" Sporovo

Aquatic Warbler density
40-70 males/100 ha

0 males



Prypiat population group

**AW number
(males)**

3470-4125 (2009)

3630-4280 (2010)

**Distribution of
the Aquatic Warbler in Ukraine after
1995**

Desna-Dnipro population group

AW number (males):

562-622 (2009)

552-612 (2010)

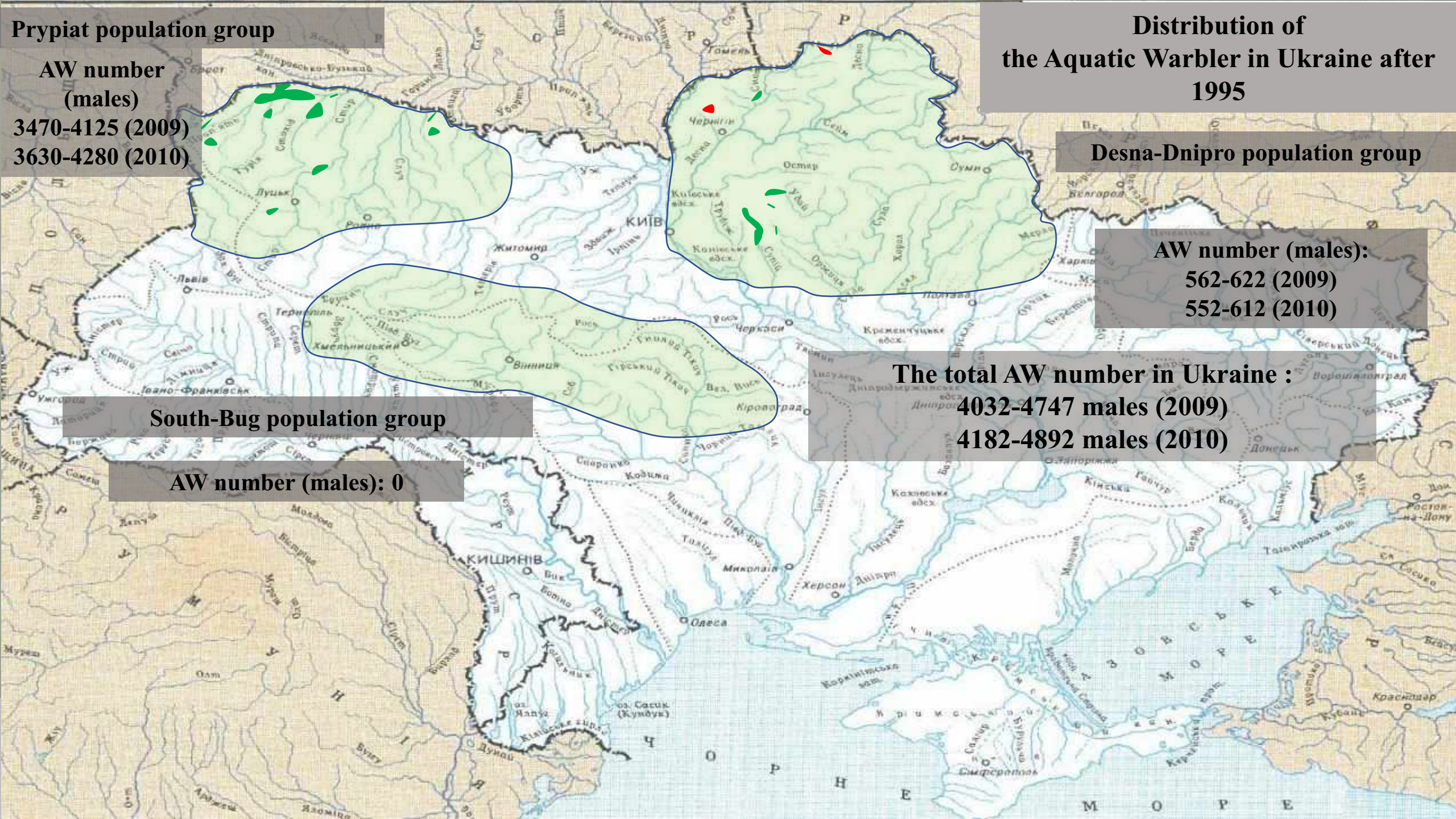
South-Bug population group

AW number (males): 0

The total AW number in Ukraine :

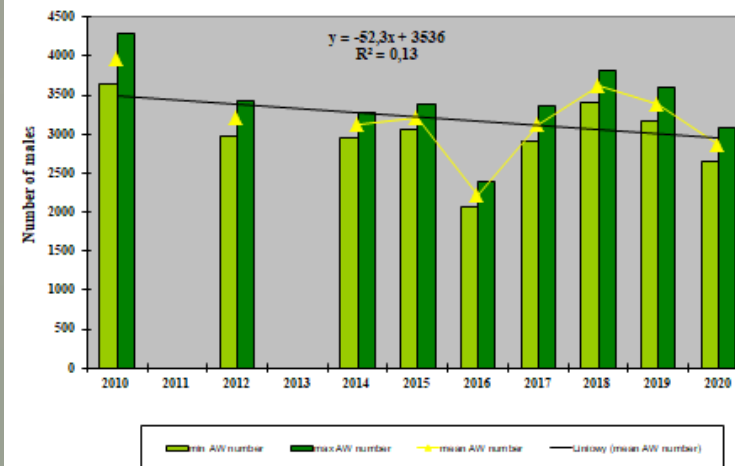
4032-4747 males (2009)

4182-4892 males (2010)

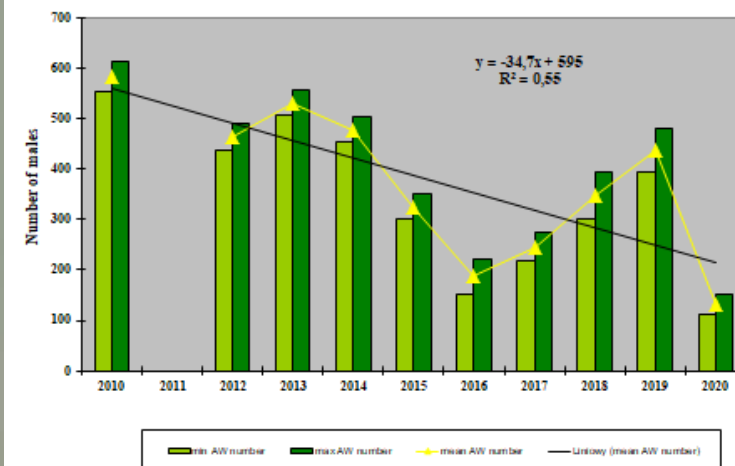




Dynamic of AW number of the Prypiat population group in 2010-2020



Dynamic of AW number of the Desna-Dnipro population group in 2010-2020





1998

2012

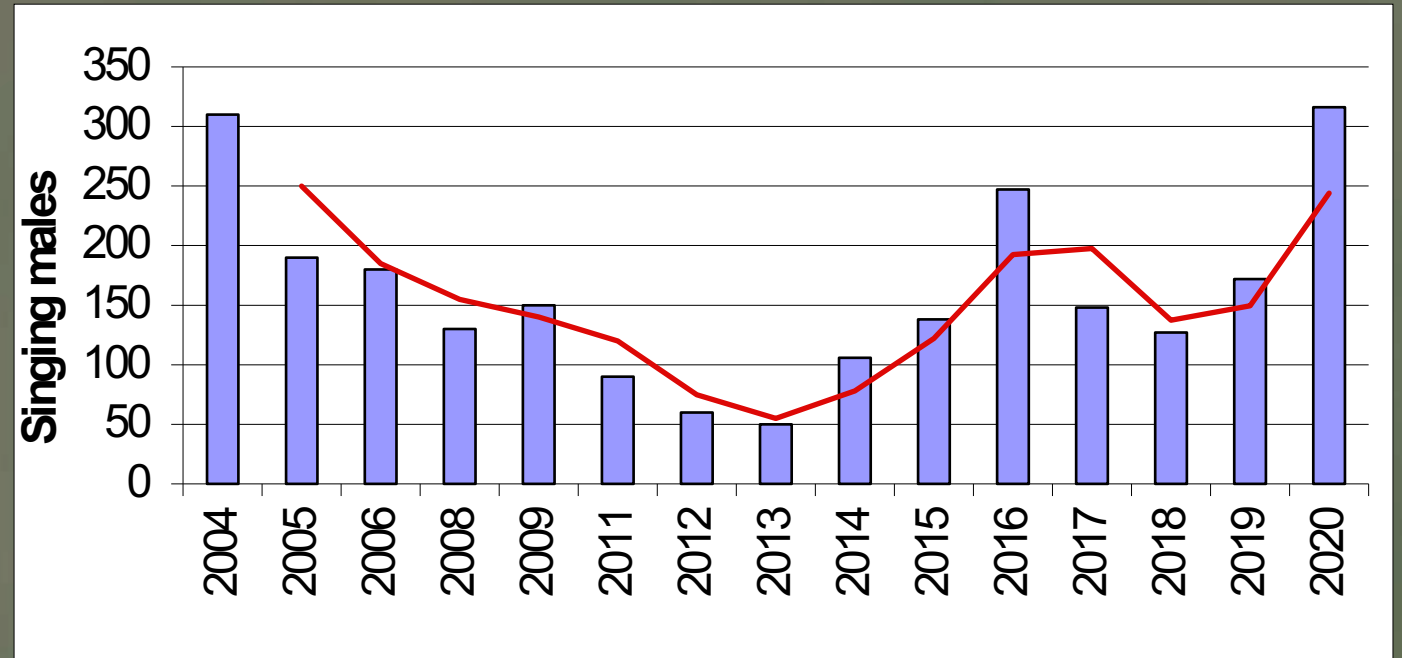
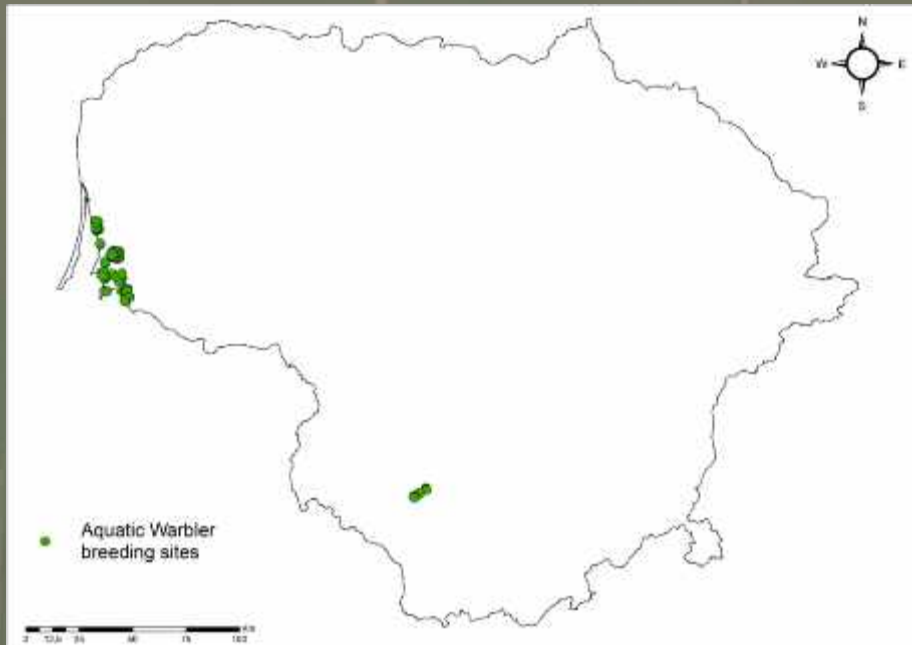
2020

**Transformation of
monitoring plot in the
breeding site UA-01
Supii valley
"Vilne-Berezanka"**

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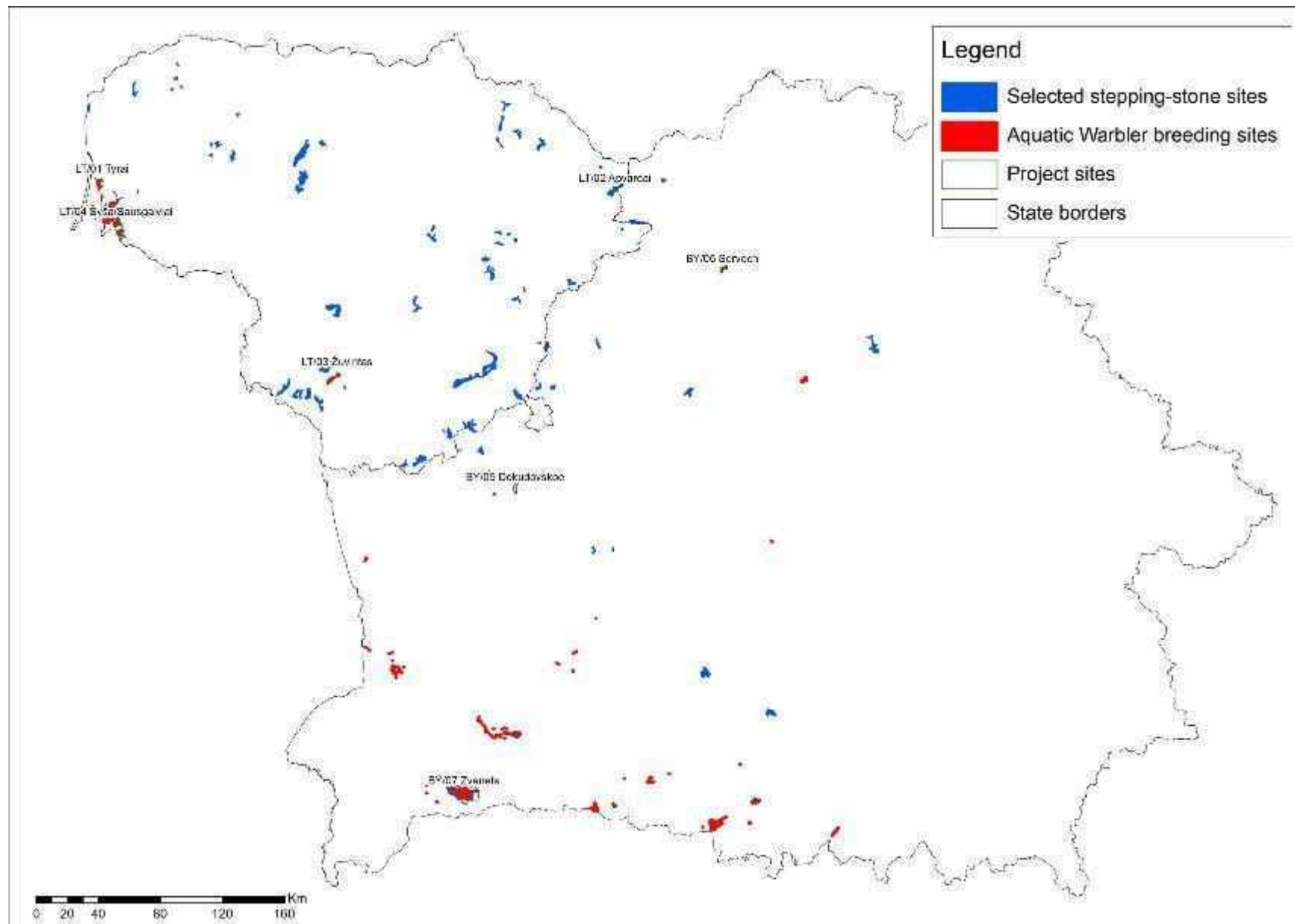


Aquatic warbler population dynamics in Lithuania and the current state



Active conservatio projects by BEF based on LIFE funding

Stepping stone habitat potential for Lithuania and Belarus



Pilot conservation translocation initiative



- 2015 endorsed by signatory parties of Memorandum of Understanding for aquatic warbler conservation;
- Implemented in 2018 and 2019 by translocating 100 birds (50 birds each year);
- Main goal – develop and test a method and support AW population recovery in Zuvintas biosphere reserve;
- Translocation program developed based on IUCN guidelines for conservation translocations;
- Source area - Zvanec (Belarus), Release area: Zuvintas (Lithuania)



(download [here](#))

Defined success criteria and achieved results

Success criteria:

- Until the time of release chicks survival rate has to be no less than 74 %;
- At least one translocated bird has to come back after wintering to Žuvintas Biosphere Reserve area.

Results

Criteria	2018 (2019)	2019 (2020)
Survival rate	98%	100 %
Returned birds	11	10 (7 first year, 3 – second year)



Badanie wędrówek i miejsc zimowania za pomocą geolokatorów



fol. Ce...

Table 3: Recovery ratios of AW fitted with geolocators

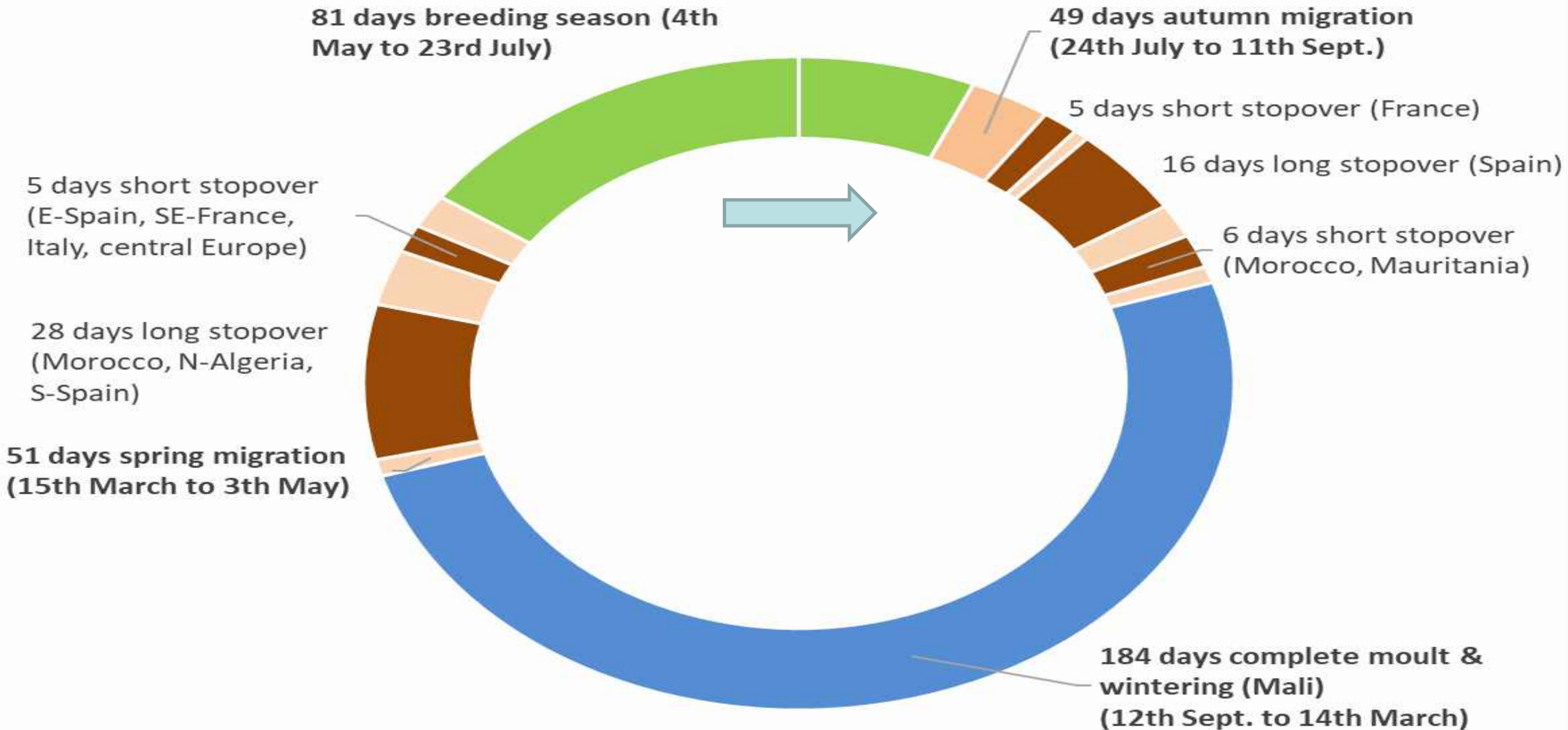
Study site	AW fitted with geolocators in 2018	AW recaptured in 2019 and 2020 (=retrieved geolocators)	recoveries in %
Servech, Belarus	29	7	24 %
<i>Alka polder, Lithuania</i>	24	12	50 %
<i>Tyrai mire, Lithuania</i>	7	0	0 %
total for Lithuania	31	12	39 %
total all sites	60	19	32 %

Table 5: Durance of successful data logging: Dates (in 2019) until the geolocators stored data.



Start of logging: 16th July 2018; valid logging stopped between 8th April (after 267 days) and 30th May (319 days), median was 12th May (301 days).

Mean annual cycle of adult male Aquatic Warblers (n=19)



Badanie wędrówek i miejsc zimowania za pomocą geolokatorów

Autumn migration

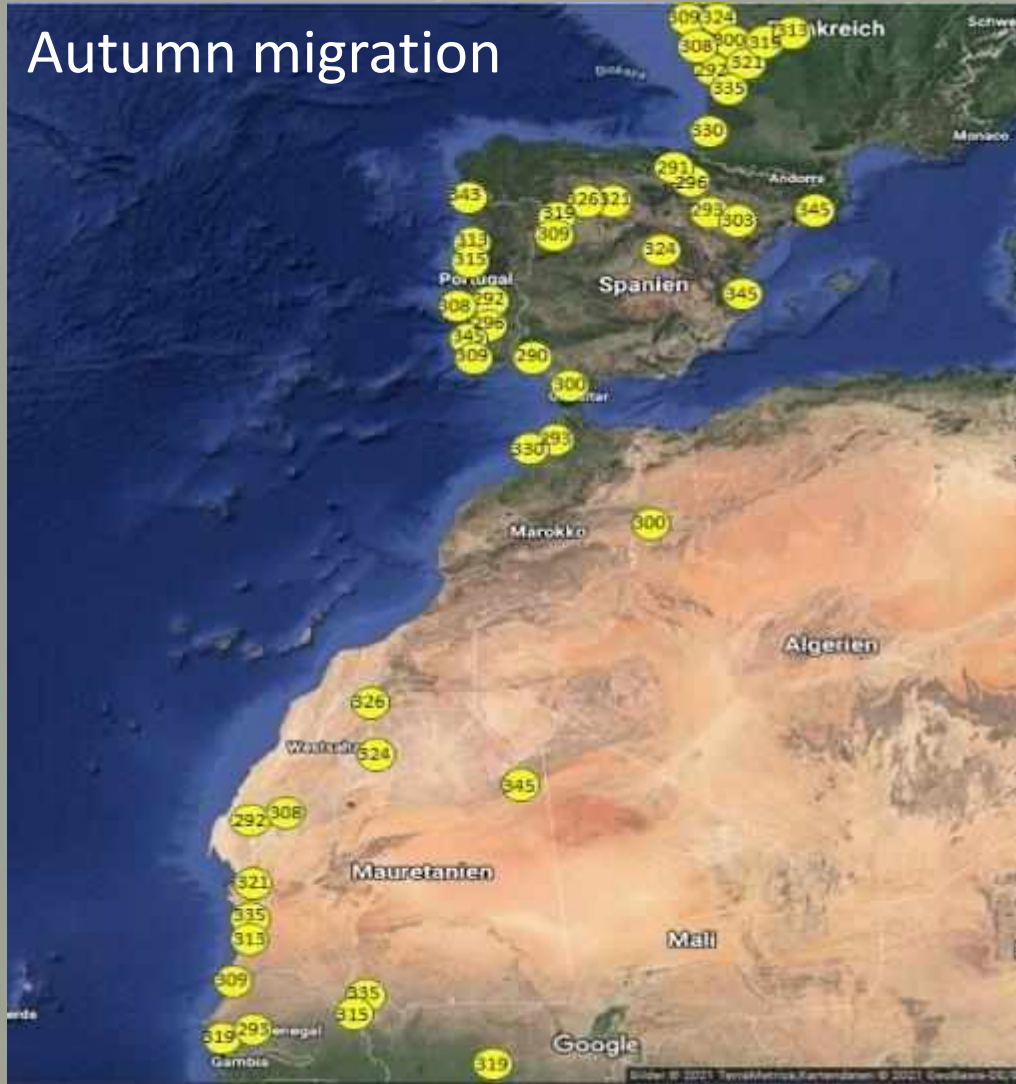


Fig. 32 ● Wintering locations of the Aquatic Warblers studied in this geolocator study (with geolocator number);
● wintering locations of the former geolocator study (Solewski et al. 2018);
● sites with confirmed winter records (mostly from ringing) (December to February) (Segetmeyer et al. 2018)

Overview on AW stopover (>2.5 days) and wintering sites (19 adult males)

migration period	Country	number of stopover sites	number of birds	durance of stay (days)		period of occurrence		median arrival	median departure
				mean	median	from	until		
autumn	Germany	1	1	3,0	3	15.08.	18.08.	15.08.	18.08.
	Luxembourg	1	1	4,0	4	14.08.	17.08.	14.08.	17.08.
	France	6	10	6,9	6	22.07.	31.08.	06.08.	12.08.
	Spain	10	12	15,8	13	26.07.	13.09.	10.08.	25.08.
	Portugal	4	8	8,5	8	06.08.	14.09.	21.08.	27.08.
	Morocco	4	6	10,6	8	10.08.	22.09.	09.09.	17.09.
	Mauritania	5	5	10,3	9	19.08.	23.09.	11.09.	19.09.
	Senegal	4	4	5,8	6	22.08.	09.09.	27.08.	31.08.
wintering	Senegal	1	1	202,0	202	25.08.	15.03.	25.08.	15.03.
	Mauritania	1	1	198,0	198	26.09.	11.04.	26.09.	11.04.
	Mali	15	14	196,4	187	27.08.	12.04.	11.09.	11.03.
	Burkina Faso	2	2	173,5	174	04.09.	03.03.	07.09.	27.02.
	Nigeria	1	1	157,0	157	26.09.	02.03.	26.09.	02.03.
spring	Mauritania	3	2	9,7	3	05.03.	06.04.	10.03.	12.03.
	Morocco	11	10	18,7	16	17.02.	12.04.	11.03.	07.04.
	Algeria	6	6	18,8	14	07.03.	24.04.	25.03.	16.04.
	Spain	6	6	18,2	5	16.02.	19.04.	13.04.	17.04.
	Spain/France	1	1	7,0	7	09.04.	16.04.	09.04.	16.04.
	Italy	2	2	6,0	6	06.04.	25.04.	14.04.	20.04.
	Croatia/Serbia	1	1	5,0	5	26.04.	01.05.	26.04.	01.05.
	Germany	1	1	3,0	3	21.04.	24.04.	21.04.	24.04.
	Poland	2	2	3,5	4	27.04.	04.05.	30.04.	03.05.
	Russia-Kalining	2	1	9,5	10	29.04.	19.05.	03.05.	12.05.
	Belarus	4	2	4,4	4	09.05.	24.05.	14.05.	16.05.

Aquatic Warbler in Poland

State of the population, source areas and small breeding sites

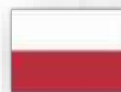
Krzysztof Stasiak

Polish Society for the Protection of Birds

BirdLife Poland



Fundusze Europejskie
Infrastruktura i Środowisko



Rzeczpospolita
Polska

Unia Europejska
Fundusz Spójności

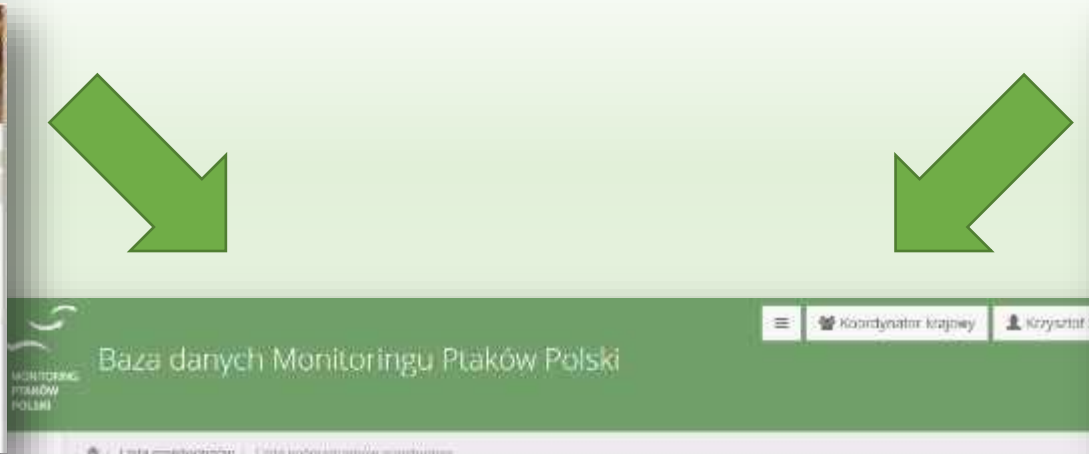


30
years





Citizen science



Aquatic Warbler data

Podprogram	Rok	Sezon	Status
Monitoring Wodniczki (liczenia na transektach)	2020	letni	Zakończona
Monitoring Wodniczki (liczenia na powierzchniach)	2020	letni	Zakończona

Aquatic Warbler monitoring



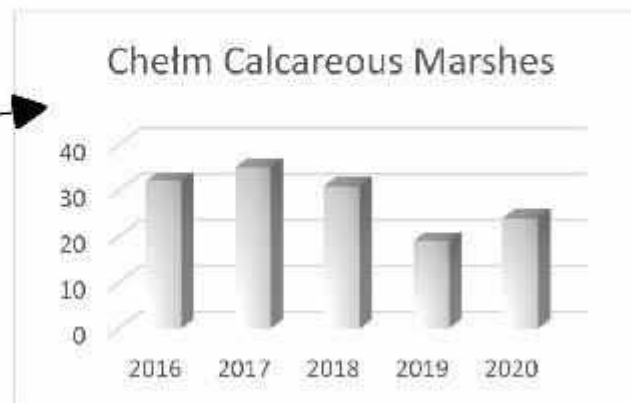
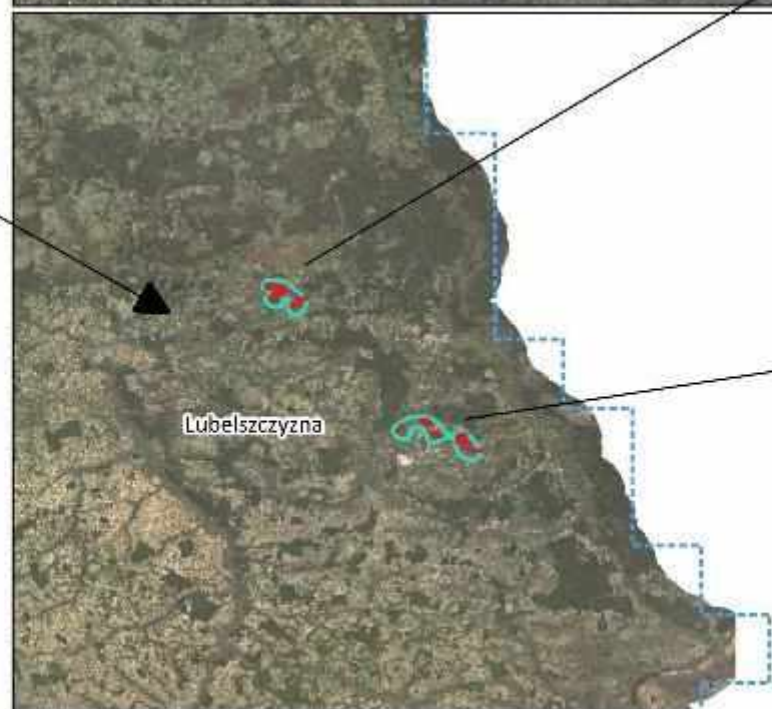
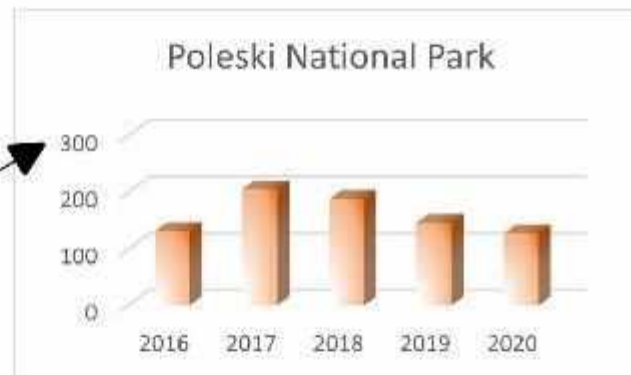
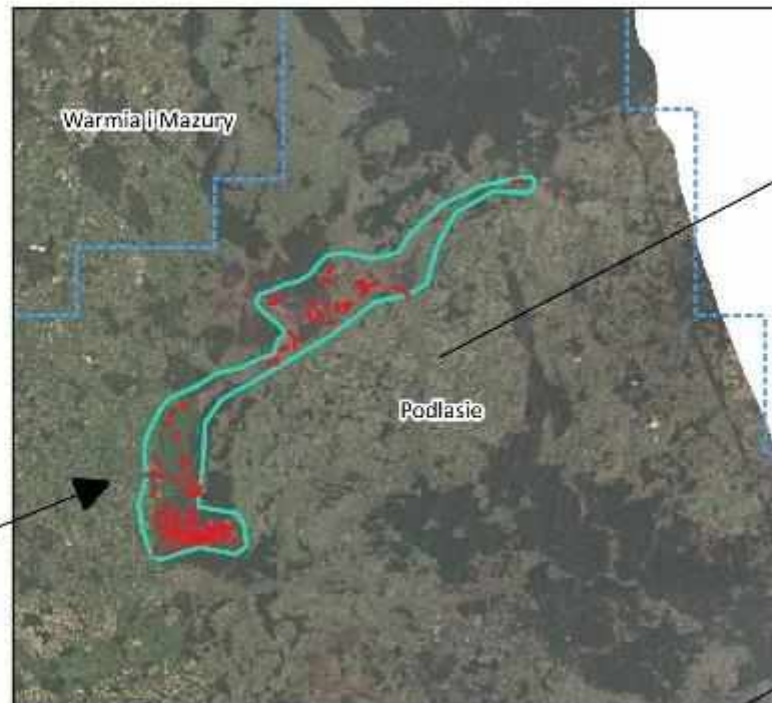
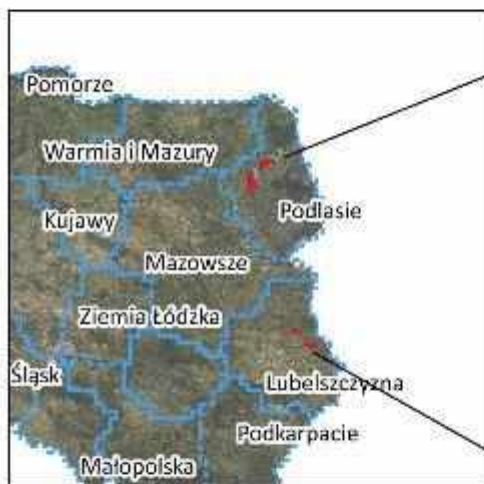
Direct information

OTOP projects and reserves

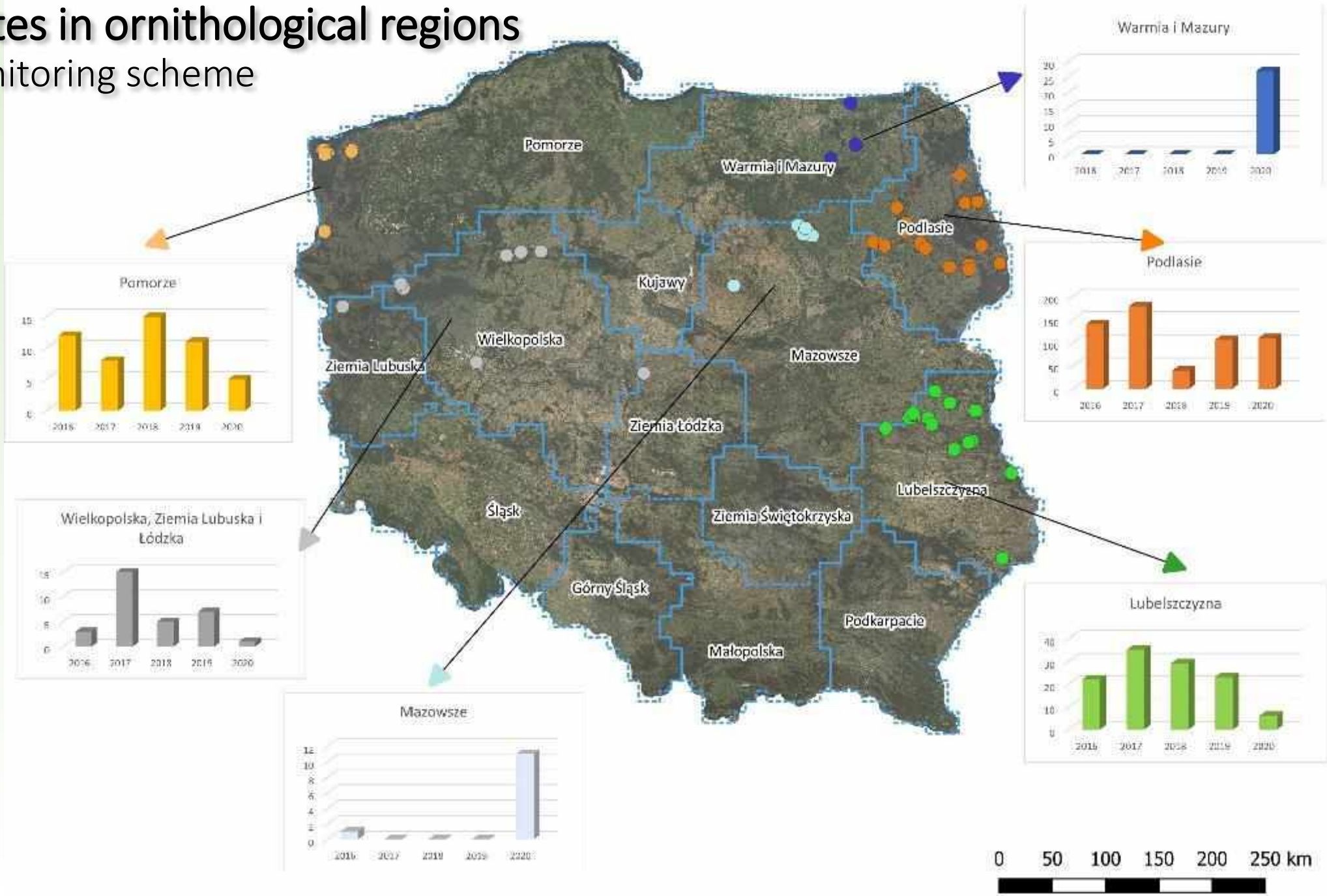


Main (source) populations transects monitoring scheme

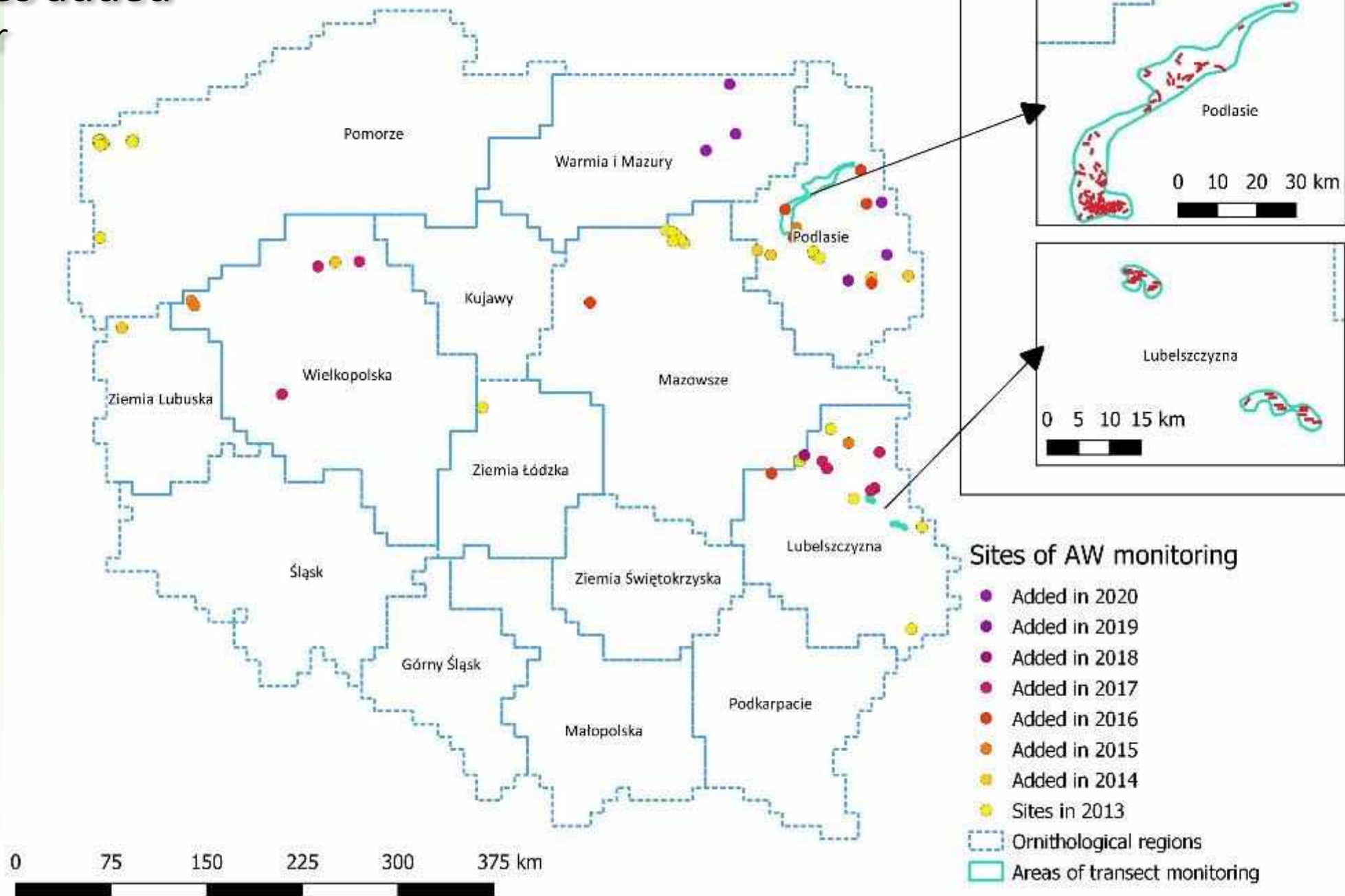
MWO 2013-2018: 3200 - 4500 ss.



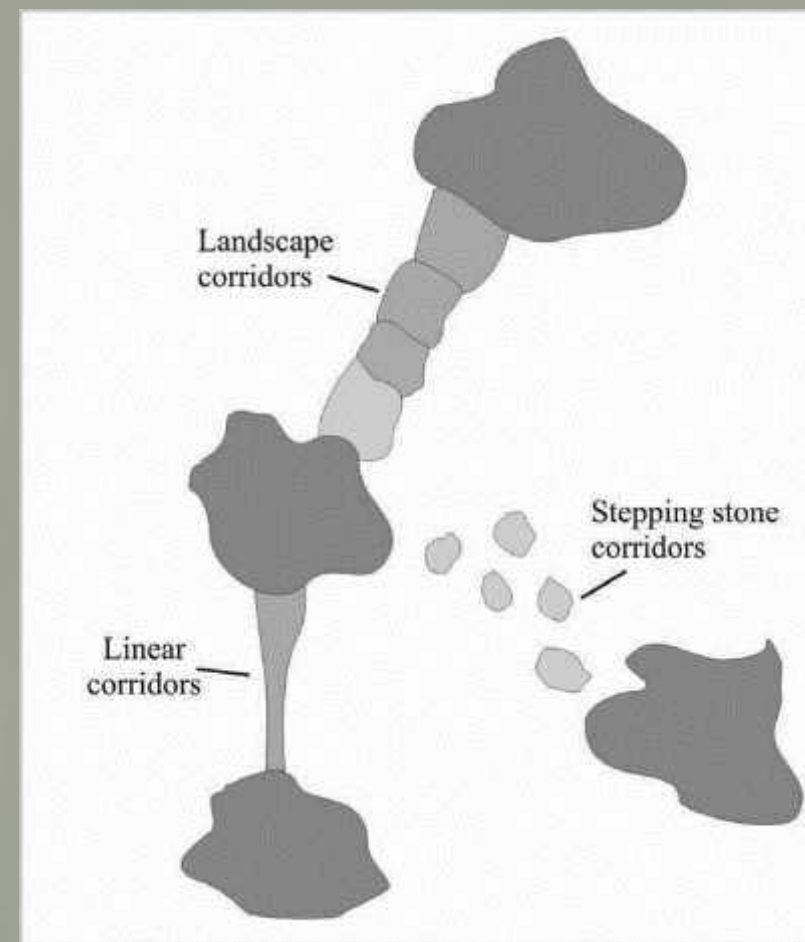
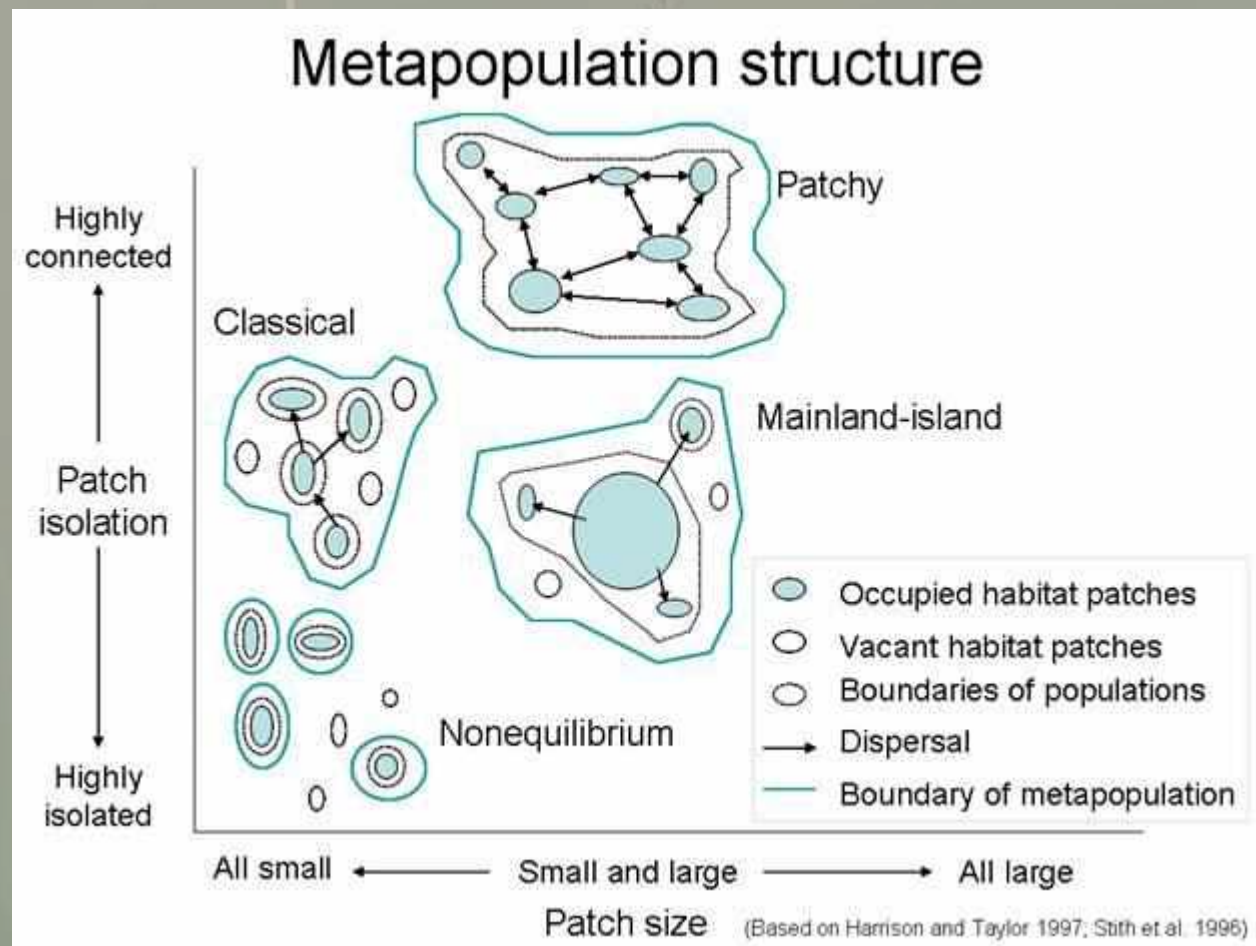
Small sites in ornithological regions sites monitoring scheme



New sites added each year



Metapopulations, ecological corridors and stepping stones



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Feasibility study of connection of eastern and western population of Aquatic Warbler in Poland (stepping stones concept) 2014

Ogólnopolskie Towarzystwo Ochrony Ptaków



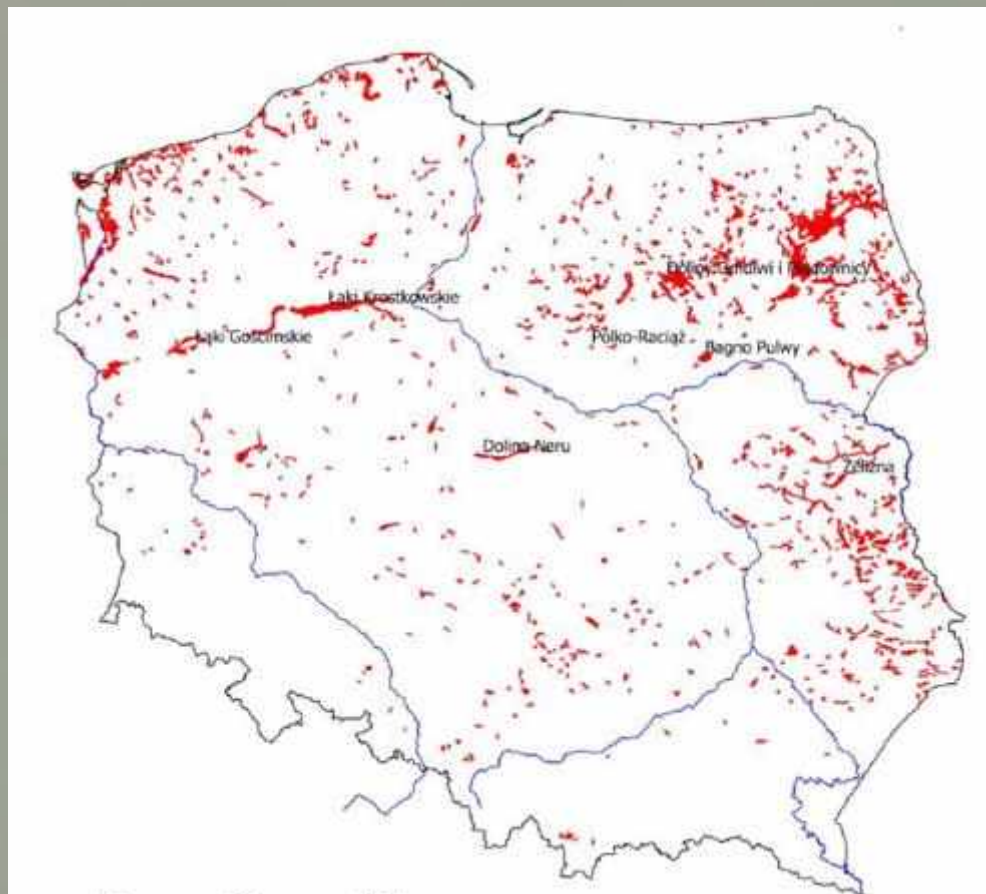
Jarosław Krogulec, Bernadetta Wolczuk

Analiza możliwości połączenia wschodniej i zachodniej populacji wodniczki *Acrocephalus paludicola* w Polsce poprzez odtworzenie zdegradowanych siedlisk wodniczki na obszarze rozgraniczającym te populacje

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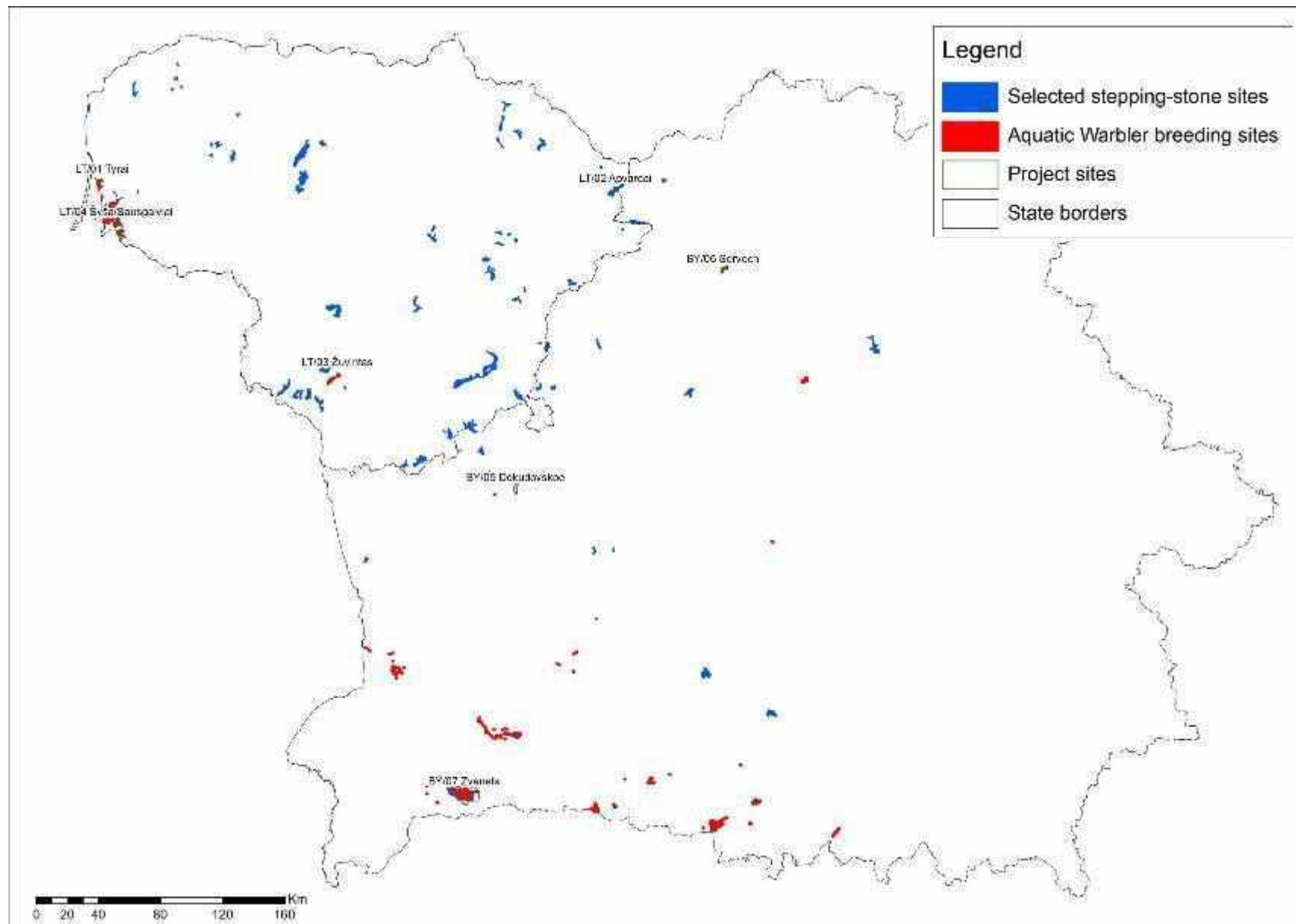
Raport z realizacji projektu

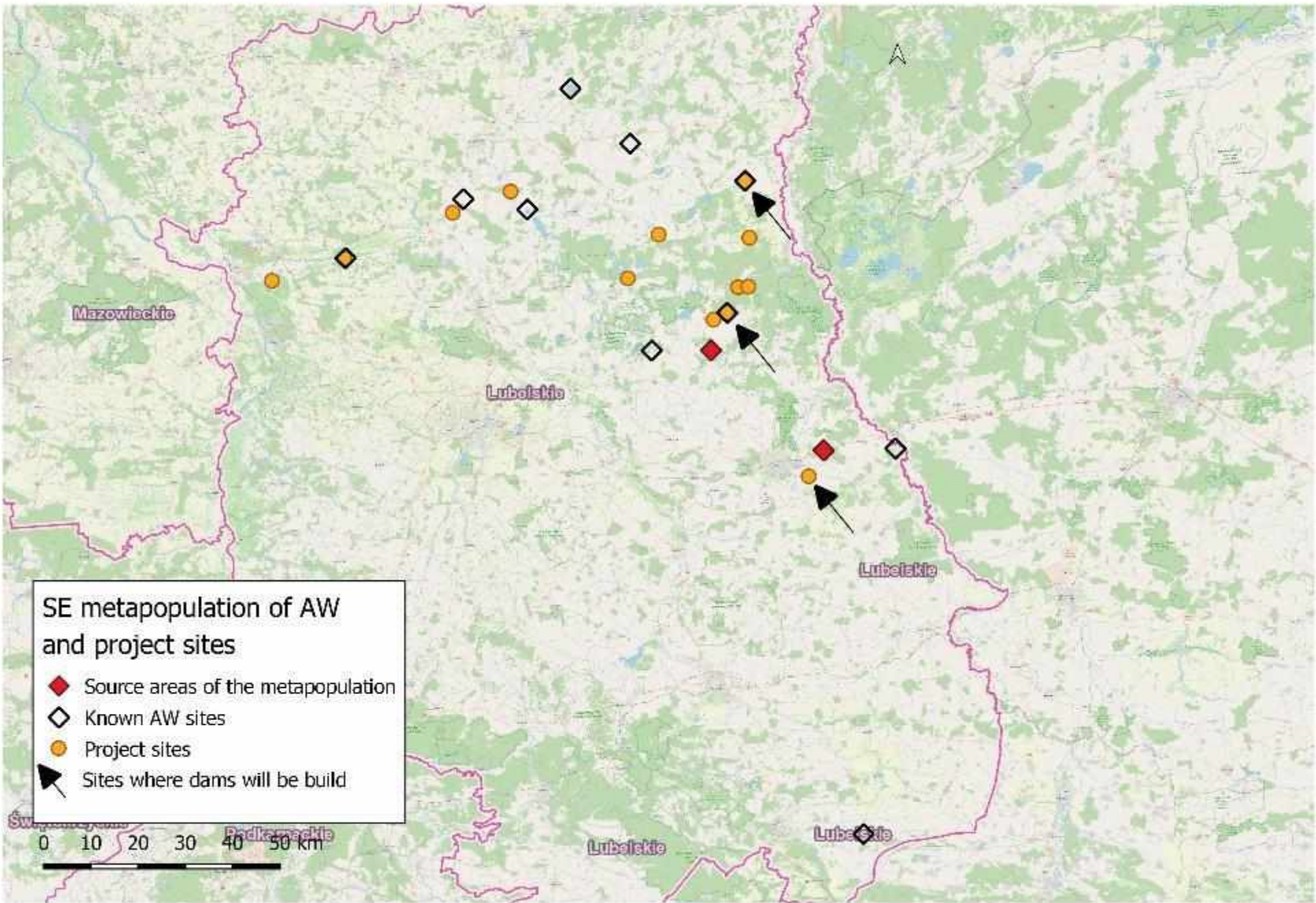
Marki k. Warszawy, listopad 2014

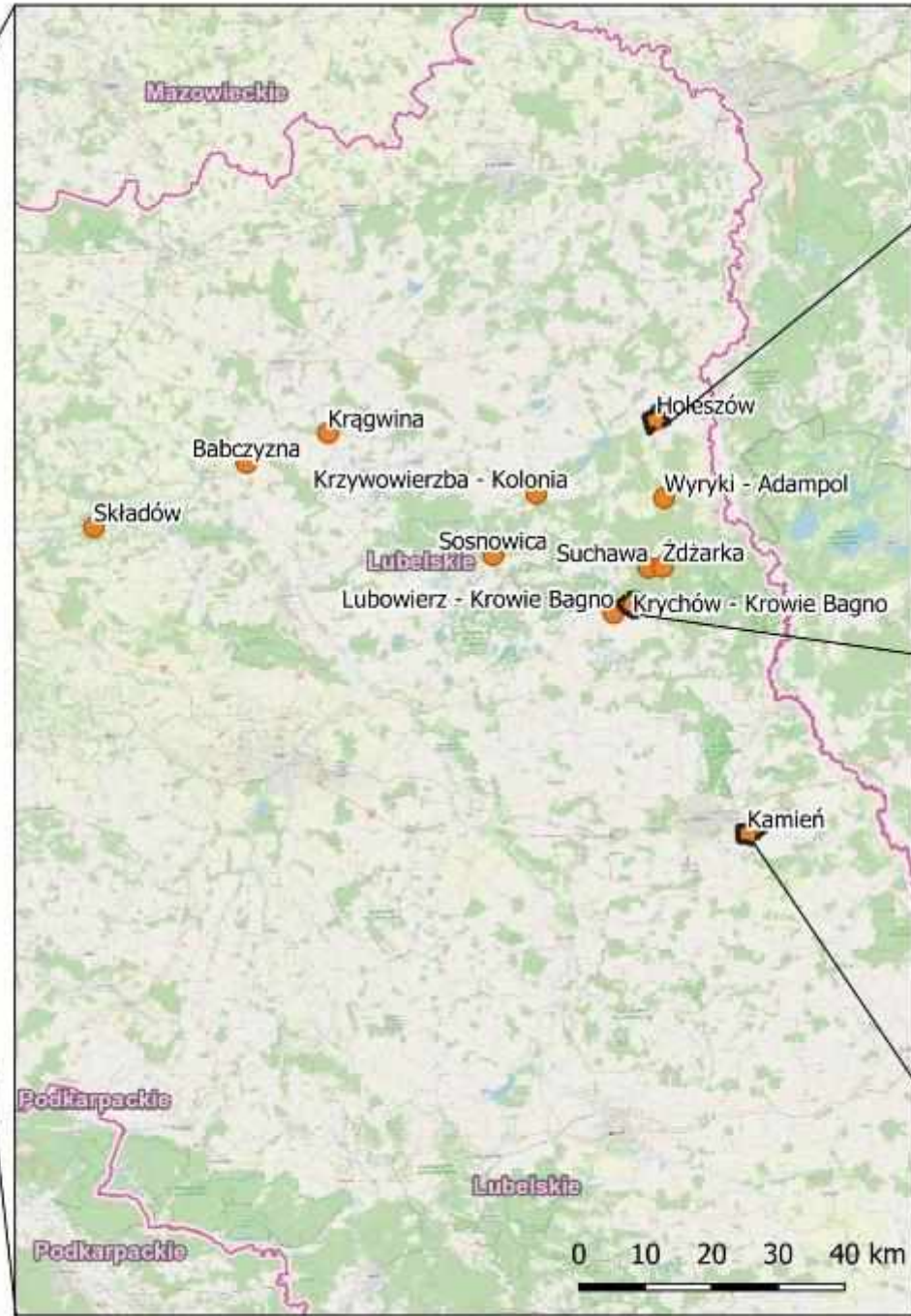
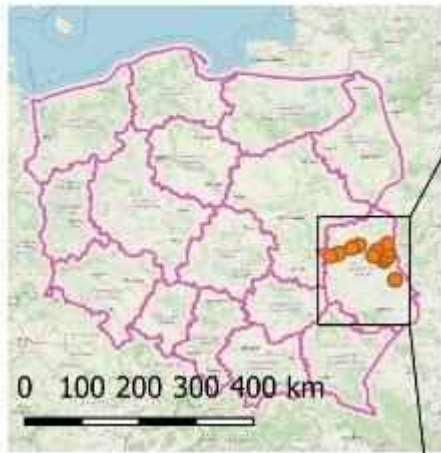


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Stepping stone habitat potential for Lithuania and Belarus







New Aquatic Warbler sites discovered – Hanna river valley

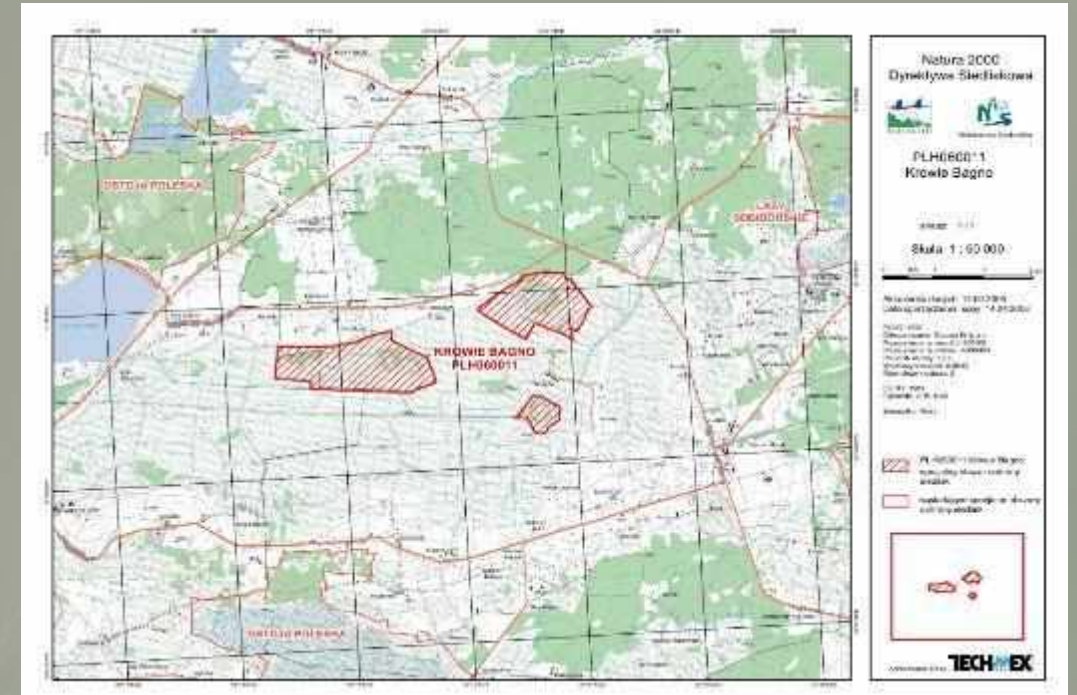


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New Aquatic Warbler sites discovered – Krowie Bagno



Krowie Bagno conservation story



fol. Cezary Korkosz



Bardzo dziękuję za uwagę!

Sprawozdanie, prezentacje i nagranie na kanale
OTOP w YouTube:

<https://otop.org.pl/2021/04/source-areas-and-stepping-stones-in-aquatic-warbler-conservation-relacja-z-symposium>

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