



First South Asian Regional SURE Conference

University of Karachi
18.-20.01.2017



University of Debrecen

Faculty of Agricultural and Food Sciences and Environmental Management
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Method for reducing the urban population of Corvids – A trapping experiment

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Introduction

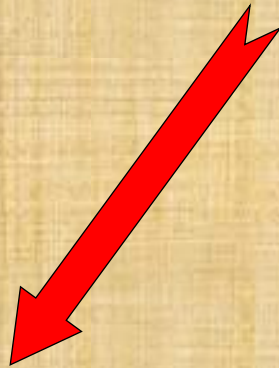
- City = independent ecosystem (urban ecology)
- Since 60' appearance of the Hooded Crow has been observed in many European countries
- Reasons: diverse sources of food, nesting possibilities, no predators, wildlife management, habituation ability, ecological flexibility
- At present: HC is a permanent, common breeding species in Debrecen
- We have lack of information about the biology of this species in urban environment



Corvus cornix



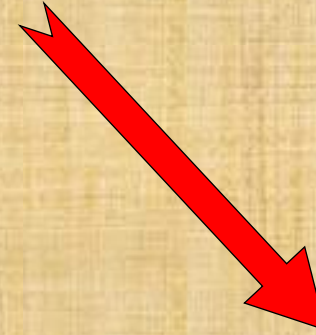
Research interests related to HC



**Colonization and
nest site selection**



**Study the territory size and motion
pattern → colour ring program**



Trapping experiment



Why we are trapping?



Local issue

Nagyerdő Stadium, 2014.05.01.

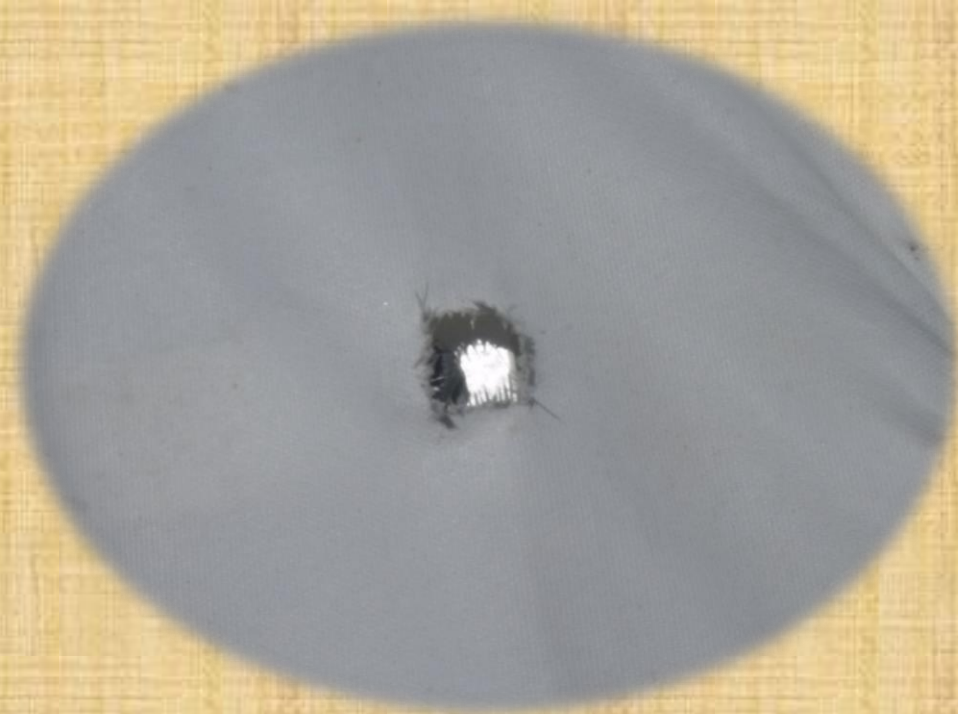
capacity: 20,000 seats; budget: 12,5 million euro



**16.000 m² really thin
but extremely strong foil roof**

2014-08-13 19:46:16





DAMAGES!

(198 holes)



Aim of the research

Conceivably the control/management of crows will be needed

→ Urban wildlife management

Testing different trap types for crows

Material and Methods

- Oct. 2014 – Jan. 2015
- Böszörményi Street Campus, UD
- tested five types of traps
- set 50 m apart from each other
- bait & live decoy bird were used
- bait & food: bread, kitchen leftovers
- traps were checked after sunset
- caught birds were banded & release

Legal background



Bern Convention, 4th Appendix

Hunting Act 1996/LV

Nature Conservation Act 1996/LIII

KÖM regulation, 2001/13 (V.9.)

FMV regulation, 2004/79 (V. 4.)

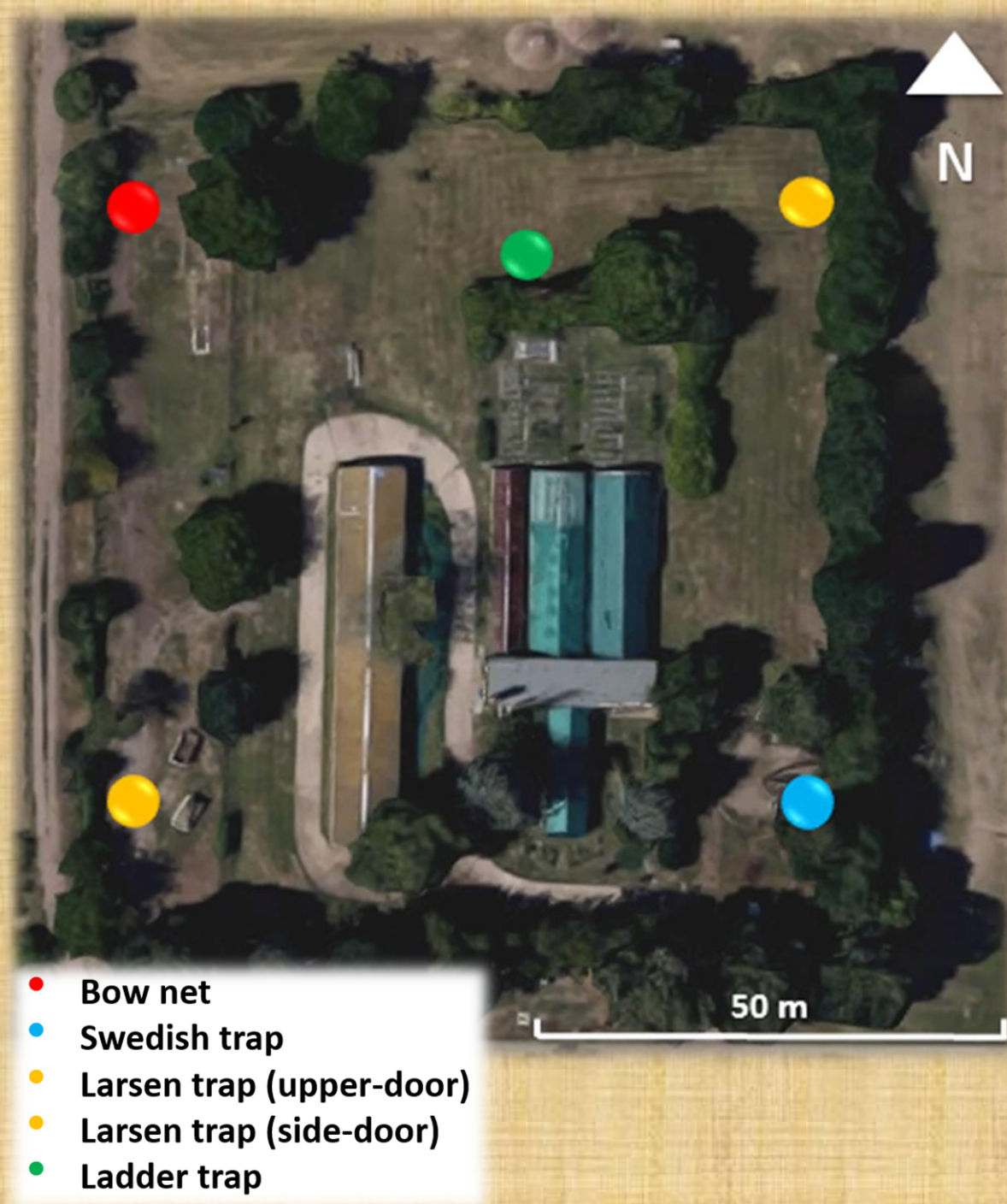
Animal Protection Act 1998/XXVIII

Used trap types



2x2x2.5 m
16x20 cm







The bow net was banned

Results



Number of captures in different trap types.
The number of recaptures is given in parentheses.

Trap type	No. trap-days	Hooded Crow	Rook	Magpie	Total	Mean
Ladder trap	103	19 (6)	18 (4)	1	38 (10)	<u>0.37</u> ± SD 0.950
Larsen (side-door)	62	13 (4)	16 (6)	0	29 (10)	<u>0.47</u> ± SD 0.783
Larsen (upper-door)	60	0	1	2	3	0.05 ± SD 0.287
Swedish	39	1	10 (1)	0	11 (1)	0.28 ± SD 0.605
Bow net	5	0	0	0	0	x
Total	269	33 (10)	45 (11)	3	81 (21)	

Age distribution of the Corvidae captured

Species	Juvenile	Adult	Unknown	Total
Hooded Crow	16	0	7	23
Rook	11	20	3	34
Magpie	2	0	1	3



Number of recaptures and trap type of first capture and recapture for individuals caught more than once

	ID	No. recaptures	First captured by	Recaptured by		
				Ladder	Larsen (side-door)	Swedish
Hooded Crow	#1	5	Larsen (side-door)	5	0	0
Hooded Crow	#5	2	Ladder entrance	1	1	0
Hooded Crow	#7	3	Ladder entrance	0	3	0
Rook	#3	1	Ladder entrance	0	1	0
Rook	#9	8	Larsen (side-door)	4	4	0
Rook	#15	2	Ladder entrance	0	1	1

Results

- **Lot of practical experiences were gathered**
 - **location selection (food source, safety)**
 - **vitality and behaviour of decoy birds**
 - **maintenance of traps**
 - **timing of trap checking → just in the darkness!**

Conclusion

Side-opening Larsen and the ladder entrance trap
were the most effective in urban environment

Useful to: urban management/planning, nature conservation, wildlife management

Pilot study → Continue is running

1 Title: Corvid control in urban environment: a comparison of trap types, especially
2 against Hooded Crow (*Corvus corone cornix* L.)

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