# Success driven by data: how volunteers are making a difference

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Norfolk Non-native Species Initiative

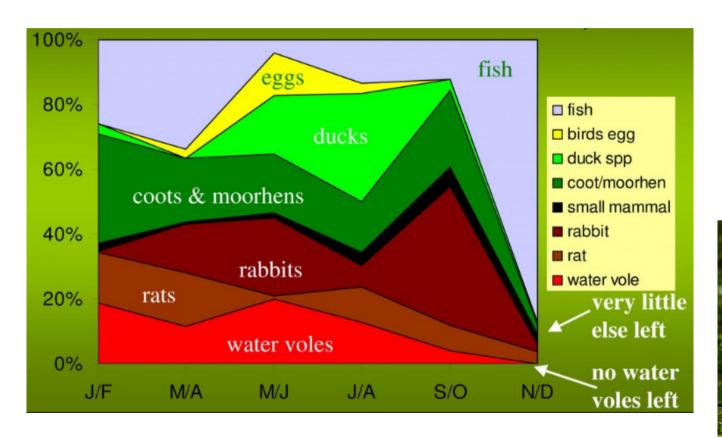




- 1980s: water vole (*Arvicola amphibious*) most catastrophic species declines in the UK
- Lost from 94% of sites by 1990s.
- Predation by American mink (*Neovison vison*) + habitat fragmentation and population isolation.
- Habitat protection and management but no co-ordinated control of mink.











 Ad hoc trapping by gamekeepers, but previously no county wide strategy = Norfolk Mink Project est. 2003

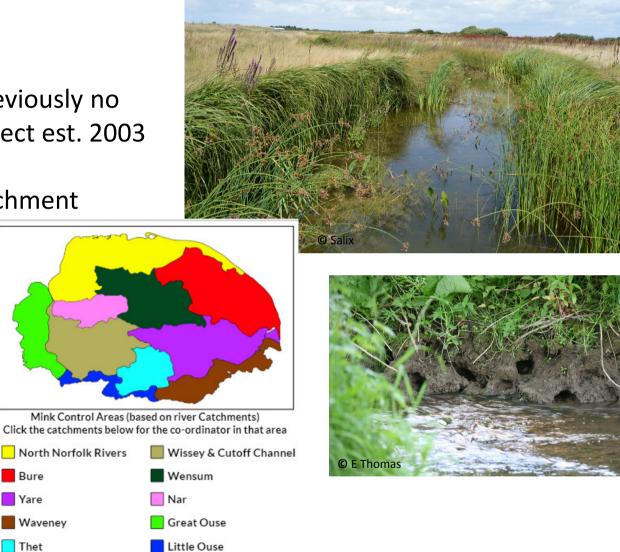
Bure

Yare Waveney

Thet

• Started small, covering just one river catchment

- In 2012, expanded to cover the entire county (10 catchments)
- Uses a network of volunteers organised by catchment.
- Part time catchment coordinators: ID new volunteers, provide training, distribute equipment, collate records.



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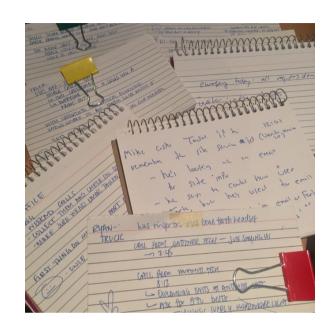
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- 288 volunteers (2017/18), 3 part-time coordinators
- = 'Cloud' database (EU funding)
- Remote data entry, easier mapping / analysis



Figure 1 Raft & trap positions current in 2017











- 14 years of data now online
- How we can we use this to improve practices and better target project objectives?



- 1. Establish monetary value of volunteer effort (secure future funding by demonstrating value for money)
- 2. Determine extent that the project is impacting Norfolk mink population.
- 3. Support the targeting of project through assessment of potential mink habitat and trapping coverage.



## 1. Volunteer effort



- 288 current volunteers surveyed to find out how much time they spend on the project
- Monetary value calculated on HLF rates for volunteer time (semi-skilled) = £150 / day

#### = 115,000 p/a

• Project funding = £20,000 p/a

BUT = what are they doing? Are they working efficiently?

#### = 475% increase

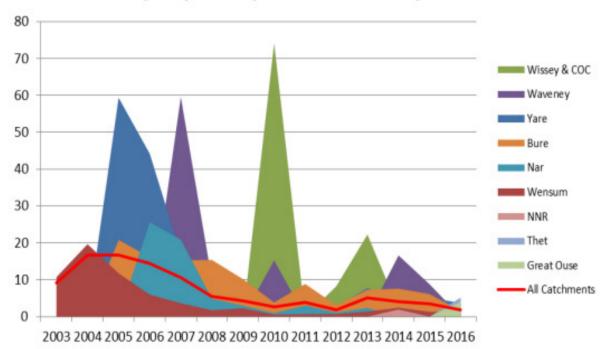
= strong evidence of sustainability/operational model for funding bodies

## 2. Impact on mink populations

- Mink kills alone don't tell you much about the population
- Mink captured per unit effort needed to quantify impact
- created index 'kill per unit effort

   number of mink killed for each unit of control effort (for every 1000 raft/trap checks)

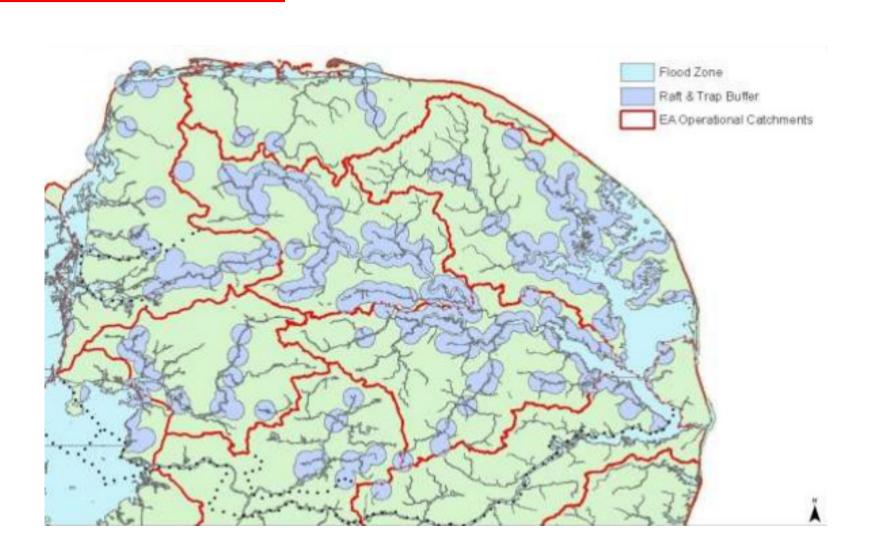
#### Trap captures per 1000 raft/trap checks



## 3. Target effort

Catchment	Total mink habitat (Ha)	Covered area (Ha)	% coverage
Bure	14704	9409	64
Grt Ouse	1948	17.3	0.9
Ltl Ouse & Thet	7273	534.8	7.4
N Norfolk NW Rivers	12580	2836	22.5
Waveney	9779	3054	31.2
Wensum	6298	4183	66.4
Wissey & Cut-Off	6780	2246	33.1
Yare	6020	3336	55.4

- Potential mink habitat across
   Norfolk identified from EA flood
   map (zone 3, frequently flooded)
   and NE priority habitat inventory
   dataset layers.
- Locations of rafts and traps plotted with 1.5 km buffer (territory size) around each point.



Home American Mink v Control Methods Norfolk Statistics Volunteer Report a Sighting Reports & Guidance v Our Partners



2017 STATISTICS			
Total Mink Caught	72		
Rafts Deployed	422		
Traps on Loan	430		
Volunteers Involved	288		

Some records can be late coming in and the Suffolk Wildlife Trusts numbers for the Waveney and Little Ouse will not be put in until they have their full numbers at the end of the year, these will be in our yearly updates.

https://thenorfolkminkproject.org.uk/norfolk-statistics/

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