

Water Vole *Arvicola amphibious*



The water vole *Arvicola amphibious* is the largest of British voles, living in colonies along streams, brooks, ditches and ponds. They live along shade-free banks where vegetation provides cover and a food source. During summer the vole eats rushes and grasses and in winter it switches to tubers. Females produce up to three litters of three to seven young a year.

National surveys have demonstrated that there has been a steady decline in water vole populations since 1900, due to habitat loss and predation by American mink *Neovision vision*. They are also susceptible to poisoning by rodenticides, organochlorine pesticides, heavy metals, polychlorinated biphenyls (PCBs) and organic agricultural and domestic pollution.

In Herefordshire there is currently one known population of water voles which was reintroduced to the River Dore from captive-bred stock in 2006 and 2007, with following control of (non-native) mink. In other catchments habitat has been lost through bank protection works, containment and diversion of watercourses, land use change, grazing pressure and lack of riparian woodland management. It is likely that some populations remain undetected.

Threats

- Predation by American mink *Neovision vision*
- Loss and fragmentation of suitable bankside habitat
- Fragmentation and isolation of populations
- Habitat modification and inappropriate management of waterbodies
- Habitat loss due to invasive non-native weeds
- Pollution, particularly rodenticides, pesticides and sewage
- Habitat loss through development

Current Action

- Mink monitoring and raft training (MRA, GWCT GWT)
- Herefordshire Water Vole Project, awareness and habitat creation (EA, NE)
- Riparian habitat improvements – WHIP, SOS, LLL, CS (HWT, WUF, NE, FH, MRA, EA)
- UK Water Vole Group (UKBAP)
- Legal Protection Sch5 WCA
- National water vole monitoring program (PTES)
- Research into potential re-introduction sites in Herefordshire LLL- (HWT)

	Objective	Action
A	Locate and map existing populations	1
B	Halt the decline in the water vole population in Herefordshire	2,7
C	Reduce or eliminate threats to water voles	5,6
D	Create refuge areas where known populations exist	2,5
E	Ensure habitat is not lost to development	4
F	Restore habitat to allow reintroduction and or re-colonisation	2,3

	Actions	Target
1	Map distribution	Annual
2	Maintain existing populations and increase numbers through Defra funded projects	Annual
3	Increase habitat around known sites and link to historic habitat and monitor	Annual
4	Ensure no further loss of habitat to development or inappropriate bankside management	2020
5	Inform land managers of pest control and habitat improvements on known sites	2020
6	Maintain and create safe zones by controlling mink around existing and potential release sites	2020
7	Reintroduce water voles to suitable sites and monitor	2020

Lead Partner	MRA, HWT
Key Partners	NE, EA, WUF, IDB, CFE, HMG, PTES