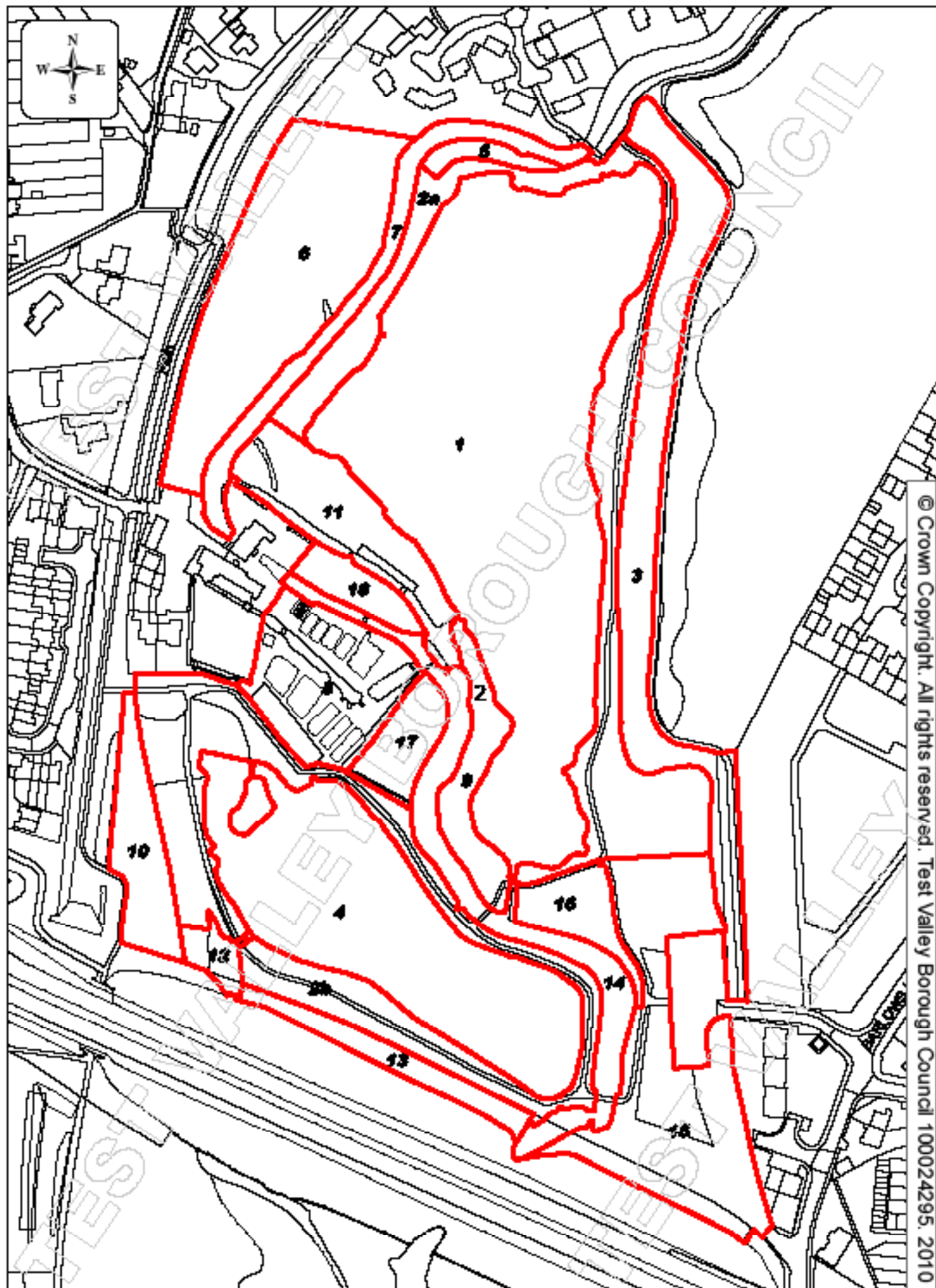


APPENDIX I

Compartment Map
Descriptions
Work Schedule
Task based Risk Assessment
Site Inspection Form





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Scale: NTS @ A4 P
Date: 24th December 2010
Drawn: Ian Mould
Dept: GIS
Doc:

**Map Showing Rooksbury Mri Local
Nature Reserve Compartment Boundaries**

Test Valley
Borough Council




Compartment 1	<i>Mill Lake</i>	<ul style="list-style-type: none"> • Cut banks yearly to end of the season and remove arisings. Cut on circular rotation - 1 third of bank per year (in accordance to EA regulations on flood prevention) • Areas between lakes become 'quiet' areas with no public access • Where possible, soften edges of lakes by decreasing gradient. • Cut aquatic weed three times yearly in April, June, August or as required and remove from site.
Compartment 2a	<i>Improved pasture</i>	<ul style="list-style-type: none"> • Leave gap between paths and lakes • Cut grass to different swards heights. Mow and remove arisings. Where no formal path, cut grass as needed to maintain public access. Divide area into 3 parallel zones. Cut central area adjacent to paths twice yearly (first cut in March, second in October). Cut second zone (2-3 metres) every two years. Cut third zone on a four-year rotation • Control spread of Japanese knotweed using Roundup Biactive in compliance with EA regulations • Control ragwort through hand pulling and removal from site
Compartment 2b	<i>Improved pasture</i>	<ul style="list-style-type: none"> • Manage as in compartment 2a
Compartment 3	<i>Scrub boundary</i>	<ul style="list-style-type: none"> • Dependant on desire lines and entrances for pedestrians. • Coppice/pollard species when necessary • Gap up where possible using native species of local province
Compartment 4	<i>Barlows Lake</i>	<ul style="list-style-type: none"> • Manage banks as in compartment 1. • Increase light into wetland by promotory in Barlows Lake
Compartment 5	<i>Riparian planting</i>	<ul style="list-style-type: none"> • Coppice planted willow 1 in 3 annually from 2018 to maintain low level screening • Coppice planted alder from 2019 2 times annually to maintain low level screening
Compartment 6	<i>Riparian woodland</i>	<ul style="list-style-type: none"> • Remove trees if seen as a danger to the public • Leave as much dead wood as possible • Maintain and enhance emergent vegetation along bank • Remove trees from riverbank to increase light to river system, though leave a small number as bird perches
Compartment 7	<i>River Anton</i>	<ul style="list-style-type: none"> • Coppice overhanging trees • Encourage emergent vegetation by leaving a 2 meter buffer zone adjacent to the banks of the river • Refer to River Anton Enhancement Strategy

Compartment 8	<i>Meadows and stew ponds</i>	<ul style="list-style-type: none"> • Maintain meadow as in compartment 2 • Non-intervention to allow natural succession
Compartment 9	<i>Scrub</i>	<ul style="list-style-type: none"> • Non intervention • Restrict public and maintain no public access • Control breach in lake bank (overflow)
Compartment 10	<i>Poplar plantation</i>	<ul style="list-style-type: none"> • Phase out poplar following establishment of understory planting • Remove tree guards on planting when necessary • Coppice hazel on rotation from 2019
Compartment 11	<i>Rank fen</i>	<ul style="list-style-type: none"> • Maintain as fen. Cut on rotation one side each year • Thin trees as necessary to favour field layer
Compartment 12	<i>Rank fen</i>	<ul style="list-style-type: none"> • Thin trees around pond to increase light
Compartment 13	<i>Hedgerow</i>	<ul style="list-style-type: none"> • Maintain as hedgerow • Gap up where necessary using native trees of local province • Coppice to improve quality to allow for hedge to be laid in future
Compartment 14	<i>River Anton</i>	<ul style="list-style-type: none"> • Manage as in compartment 7 • Cut grass to different swards heights. Mow and remove arisings. Where no formal path, cut grass as needed to maintain public access. Divide area into 3 parallel zones. Cut central area adjacent to paths twice yearly (first cut in March, second in October). Cut second zone (2-3 metres) every two years. Cut third zone on a four-year rotation
Compartment 15	<i>Unimproved pasture</i>	<ul style="list-style-type: none"> • Cut grass twice yearly and remove arisings as in compartment 2 • Continue to remove scrub to favour nationally important ground flora.
Compartment 16	<i>Orchard</i>	<ul style="list-style-type: none"> • Practice regulated pruning on a 2 year rotation to maintain healthy trees and enhance the area for wildlife. Pruning should be conducted between November and the end of March, after the leaves have dropped and fruit has been produced. • Cut grass twice yearly removing arisings
Compartment 17	<i>Scrubland</i>	<ul style="list-style-type: none"> • Non-intervention to allow natural succession
Compartment 18	<i>Rough grassland</i>	<ul style="list-style-type: none"> • Control ragwort through hand pulling and removal from site • Cut and rake grass by hand and remove arising where possible • Control extent of bramble to avoid encroachment

Work Schedule 2014 - 2024									
Objective	Prescription	Compartment	Year						
Maintain and increase habitat for watervoles	Cut one third of the bank once per year (in accordance with EA regulations on flood prevention)	1,4,7,9,14	*2014	*2015	*2016	*2017	*2018	*2019	*2020
Control Invasive ragwort	Pull by hand and remove from site	Whole Site	*	*	*	*	*	*	*
Make safe any dangerous trees	Remove unsafe trees from site. Leave deadwood on site if possible	Whole Site	*	*	*	*	*	*	*
Conduct surveys where necessary	Undertake surveys at appropriate time of year e.g. water vole, otter, bat, birds, terrestrial and aquatic invertebrates, higher and lower plant and reptile.								
	Bats	Whole Site	*				*	*	
	water vole/otter		*		*				*
	Birds	Whole Site		*	*				
	Terrestrial invertebrates	Whole Site		*	*			*	
	Aquatic invertebrates		*	*	*	*	*	*	*
	higher and lower plants	Whole Site	*	*	*			*	*
	visitor	Whole Site			*			*	
	Butterflies	Whole Site	*	*	*	*	*	*	*
Install new interpretation boards	Boards to be installed on all entrances to site and remove unnecessary signage	Whole site				*			

[illegible]

[illegible]

RISK ASSESSMENT - TEST VALLEY BOROUGH COUNCIL																																																														
SERVICE: Community and Leisure		LOCATION: Test Valley Borough Council Land																																																												
<table border="1"> <thead> <tr> <th colspan="2">People Affected*:</th> <th>Completed by:</th> <th>Date:</th> </tr> <tr> <th>Name</th> <th>Name</th> <th></th> <th></th> </tr> </thead> <tbody> <tr> <td rowspan="10">Volunteers Staff Members of the Public Students</td> <td></td> <td>Charlotte Warwick</td> <td>23/10/2012</td> </tr> <tr> <td></td> <td>Charlotte Warwick</td> <td>As required or 22/10/2014</td> </tr> <tr> <td></td> <td>Charlotte Warwick</td> <td>As required or 22/10/2015</td> </tr> <tr> <td></td> <td>Charlotte Warwick</td> <td>As required or 05/10/16</td> </tr> <tr> <td></td> <td>Charlotte Rimmer</td> <td>As required or 05/10/2017</td> </tr> <tr> <td></td> <td>Charlotte Rimmer</td> <td>As required or 27/10/2018</td> </tr> <tr> <td></td> <td>Charlotte Rimmer</td> <td>As required or 01/11/2019</td> </tr> <tr> <td></td> <td>Daisy Kennard</td> <td>As required or 04/12/2020</td> </tr> <tr> <td></td> <td>Daisy Kennard</td> <td>As required or 16/04/2021</td> </tr> <tr> <td></td> <td>Daisy Cameron</td> <td>As required or 15/11/2021</td> </tr> <tr> <td colspan="4"></td> </tr> <tr> <td colspan="2">Assessment Seen By:</td> <td colspan="2"></td> </tr> <tr> <td colspan="2">Line Manager:</td> <td colspan="2"></td> </tr> <tr> <td>Name:</td> <td>Boyce Jeffery</td> <td>Signed:</td> <td></td> </tr> <tr> <td></td> <td></td> <td>Date:</td> <td>01.02.2022</td> </tr> </tbody> </table>				People Affected*:		Completed by:	Date:	Name	Name			Volunteers Staff Members of the Public Students		Charlotte Warwick	23/10/2012		Charlotte Warwick	As required or 22/10/2014		Charlotte Warwick	As required or 22/10/2015		Charlotte Warwick	As required or 05/10/16		Charlotte Rimmer	As required or 05/10/2017		Charlotte Rimmer	As required or 27/10/2018		Charlotte Rimmer	As required or 01/11/2019		Daisy Kennard	As required or 04/12/2020		Daisy Kennard	As required or 16/04/2021		Daisy Cameron	As required or 15/11/2021					Assessment Seen By:				Line Manager:				Name:	Boyce Jeffery	Signed:				Date:	01.02.2022
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<p>All volunteers/staff to sign to confirm that they have read, fully understand and will abide by control measures. Group leader will be responsible for ensuring this is the case for anyone where English is not their first language.</p> <p>The practical tasks that we carry out in our Nature Reserves can be strenuous, tiring and involve the use of hand tools that some people may find challenging. Please inform the co-ordinator leading the event if you have any medical conditions or concerns that could be a danger to yourself or other volunteers working around you. We reserve the right to restrict your level of participation in certain circumstances.</p> <p>All children under the age of 16 MUST be accompanied by a responsible adult.</p>					
<p>Workplace Representative:</p>		<p>Signed: <i>Charlotte Rimmer</i></p>			
<p>Name:</p>	<p>Charlotte Rimmer</p>	<p>Date:</p>		<p>18.01.2022</p>	

+Attach copies of previous risk assessments carried out during the previous 12 months(retain previous risk assessments for 6 years)

Task or Area Description: Tree felling using hand tools


Hazards Identified and how harm may occur	Control measures in place	Risk Rating H/M/L	Further Action required?	Action by who?	Action by when?	Date Done
Biological –Lymes disease, Hep B & C, Tetanus	Keep arms and legs covered. Check for ticks regularly when you are outside and when you get home. Light coloured cloths make ticks easier to see. If you find a tick attached remove immediately using the correct technique. If symptoms occur see doctor. Cover any wounds. Wash hands with antibacterial hand wash or wipes before consuming food or smoking.	M	Advise volunteers of risk and symptoms. Hand out leaflet on Lymes disease. Up to date Tetanus. Use insect repellent if desired (follow manufacturers guidelines).	Group leader/ Countryside Officer	Before task	

Slips, trips and falls	Be aware of potential uneven ground, rabbit holes etc. Avoid potentially dangerous areas. Wear appropriate footwear.	M	Remind volunteers of control measures. If conditions particularly slippery due to adverse weather conditions. Group leader to decide whether task continues based on conditions/task and site characteristics.	Group leader/ Countryside Officer	On the day	
Tools/Equipment to include: Bow saws/Loppers/Litter pickers/Secateurs/Rakes/Wheel barrows	Wear appropriate PPE (gloves/eye protection) to protect from injury from inappropriate usage.	M	Correct use of tools to be demonstrated.	Group leader/ Countryside Officer	On the day	
Billhooks (Hedgelaying)	Ensure tools are sharp. No glove to be worn on the hand use to hold the billhook.	M	Correct use of tools to be demonstrated.	Group leader/ Countryside Officer	On the day	
Working near water	If working in or near to water please see risk assessment for working near water.	M		Group leader/ Countryside Officer	Prior to & on day	
Sharpening tools	Wear gloves and appropriate eye protection.	L	Correct use of tools to be demonstrated	Group leader/ Countryside Officer	On the day	
Insect bites/stings	Wear appropriate PPE. Work wearing long sleeves and trousers. Treat if necessary.	L	Remind volunteers of control measures. Alert group leader to any relevant allergies.	Group leader/ Countryside Officer	On the day	
Lifting heavy objects	Do not move or lift objects that are too heavy. Two handed lifts may be appropriate. Break down load into smaller manageable loads or seek assistance. Use good lifting technique. Ensure volunteers are comfortable carrying out the task and have taken regular breaks.	M	Demonstrate correct lifting/manual handling technique.	Group Leader/ Countryside Officer	On the day	

Lone working	Do not work alone – Work in pairs. Carry a working mobile phone at all times (use a waterproof pocket to protect against water damage). Always inform group leader of your location. Report back at regular intervals.	L	Remind volunteers of control measures. Contact details of volunteers. Use Life 360 app to check in on arrival to site. See Lone Working Risk Assessment	Group leader/ Countryside Officer	On the day	
Refuse, litter broken glass – general injury.	Pick up only general litter. Volunteers must NOT collect medical waste or syringes	L	Remind volunteers of control measures. Refer medical waste/syringes to group leader. Sharps box and PPE to be used by group leader only.	Group leader/ Countryside Officer	On the day	
Falling trees/dead wood	Maintain safe working distance of 2 ½ times the distance of the product being felled. No tree bigger than 4 inches in diameter should be felled. Close off area to members of the public using tape and appropriate signage. Wear appropriate PPE (as in tools and equipment). Inspect trees for deadwood prior to commencing task.	M	Remind volunteers of control measures.	Group leader/ Countryside Officer	On the day	
Trees, shrubs and irritant/dangerous plants – allergic reaction etc.	Awareness of risk. Site inspection before commencement of work. Identify hazardous plants and avoid. Use gloves/long sleeves/trousers at all times and wash hands after contact and before eating, drinking or smoking.	L	Remind volunteers of control measures. NB. Take particular care when working with Holly. Arms and legs should be covered and eye protection worn.	Group leader/ Countryside Officer	On the day	
Fire	If burning material, advise local fire service of	M	Burning should not be carried out during particularly dry	Group leader/ Countryside		

	activities and ensure fire is completely extinguished before leaving the site.			conditions. Water should be stored on site during burning. Fire should not be left unattended.	Officer		
Accidents/incidents	Eye wash and fully stocked first aid box available.	L		Remind volunteers of control measures and location. Identify trained first aider and location of first aid kit. All accidents must be recorded in accident book, on site forms can be located in the vehicle glove compartment. Be aware of suitable access and location for emergency services in advance of commencement of works (Site details can be found in vehicle glove compartment).	Group leader/ Countryside Officer	On the day	
Working near roads	Extra care should be taken when working near roads. Always fell away from the road and ensure footpaths are correctly supervised or closed off. Volunteers should wear hi vis jackets (with sleeves).	M		Felling of trees over 4 inches should be left for felling by a chainsaw by a trained and experienced operative or a tree surgeon.	Group leader/ Countryside Officer		
Animals	Avoid contact with loose dogs. Seek medical attention if bitten or scratched and report to police/dog warden and task organiser	L		Up to date Tetanus vaccination. Remind volunteers of control measures.	Group leader/ Countryside Officer	On the day	
Violence and aggression	Awareness of potential for aggressive or difficult members of the public. Withdraw rather than face conflict. Work in pairs.	L		Remind volunteers of control measures. Report incident to group leader.	Group leader/ Countryside Officer	On the day	
Dog faeces (Toxocara)	Inspect work area prior to commencement of task. Wash hands and other areas	L		Remind volunteers of control measures. Hand out leaflet on Toxocara.	Group leader/ Countryside Officer	On the day	

	of contact.			Remind volunteers of control measures.	Group leader/ Countryside Officer	On the day
Adverse weather conditions	Adjust programme to avoid extremes. Stop work if conditions warrant. Wear appropriate clothing, sun screen etc. Take regular breaks and refreshments.	L				
Overhead power cables (All)	Carry out site visit prior to commencement of task. Do not carry out work on trees within 10m of any overhead power lines or any tree likely to fall within the exclusion zone.	M		Secure work area prior to commencement of work. Refer to electricity at work: Forestry guidelines or contact the network operator.	Group leader/ Countryside Officer	Prior to event
Covid-19	Follow government guidance for social distancing. If any team member shows symptoms of Covid-19, they should test. If they are positive, team members that were in close proximity should also test. Wash hands with warm water and soap, before and after eating, drinking and smoking. Where this is not possible, the use of hand sanitizer of at least 60% alcohol is required.	M		Check regularly for updated guidance on the government website and follow accordingly	Countryside Officer	On the Day

Control Measures in Place		Yes
Business Unit Manager	Kevin Harrington	Signed: 
		Date: 01.02.2022

* Staff, Contractors, Visitors., Public, Disabled

APPENDIX II

Species Records

A Fresh Water Invertebrates

B Floral Records

C Bird Records

D Bioblitz

E Moths

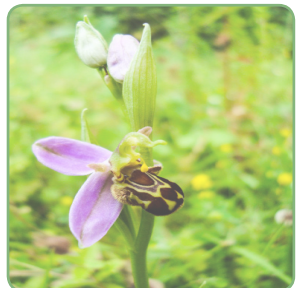
F Butterfly

G Watervoles

H Fish Population Survey

I Invertebrate Survey

H Water Assessment and Management



A - Fresh Water Invertebrates

The data below has been gathered during school visits. A typical collecting day consists of four sessions. Six groups of children in each session collect from the water using nets with 1 mm mesh. These are sorted through in white trays and a selection of animals taken from the trays and put into smaller pots. Animals from all trays are used to compile a list for the day. Towards the end of the session, each group estimates the numbers of particular animal types in their tray. The list below shows the recorded species list for each year from 2014 - 2019.

Although there is considerable variation in the collecting effort and accuracy of each group, the number of repetitions does provide a degree of validity to the data, at least with respect to observing trends, and this is the main reason for gathering the data.

Animals recorded during the school visits

2020 - 2021 ALL SCHOOL VISITS CANCELLED DUE TO COVID

	2014	2015	2016	2017	2018	2019
Hydra						
Flatworm	*	*	*	*	*	*
Lumbriculus	*	*	*	*		
Fish Leech – Piscicola	*	*		*	*	*
Leech – Theromyzon	*	*				
Leech - Erpobdella	*	*		*		
Amber Snail	*	*		*		*
Snail - Bythinia	*	*	*	*	*	*
Bladder Snail	*		*			
Great Pond Snail	*	*	*	*	*	*
Ramshorn Snail	*	*	*	*	*	*
Orb Shell	*	*	*	*	*	*
Waterflea - Daphnia		*	*	*	*	*
Waterflea - Cyclops	*	*	*	*	*	*
Freshwater Shrimp	*	*	*	*	*	*
Hog-louse	*	*	*	*	*	*
Mayfly	*	*	*	*	*	
Hawker Dragonfly			*	*		*
Darter Dragonfly		*	*		*	
Damselfly	*	*	*	*	*	*
Water Measurer	*	*	*	*		

	2014	2015	2016	2017	2018	2019
Pond Skater	*	*	*	*	*	*
Water Cricket				*		
Water Scorpion	*	*	*	*	*	*
Water Stick insect	*	*	*	*	*	
Saucer Bug	*					*
Greater Water Boatman	*	*	*	*	*	*
Lesser Water Boatman	*	*	*	*	*	*
Caddis - stick case	*	*	*	*	*	*
Caddis - stone case	*	*	*	*	*	*
Caddis - green leaf case	*	*	*	*	*	*
Alderfly	*	*				
Giant Cranefly	*	*				
Phantom midge				*	*	
Bloodworm	*	*	*	*	*	*
Biting midge		*	*	*	*	
Non-biting midge	*	*	*	*	*	*
Scavenger Beetle		*				
Diving Beetle - Dytiscidae	*	*	*	*	*	*
Beetle Halipus	*	*	*	*	*	*
Diving Beetle - Platambus			*	*		
Diving Beetle - Hyphydrus	*	*		*		
Fish Fry		*	*	*	*	*
Pike		*			*	
Common Toad	*	*	*	*		*
Common Frog	*	*	*		*	*
Newt Tadpole		*	*	*	*	*
Smooth Newt Adult	*	*	*		*	
Palmate Newt Adult						

B - Floral Records

Agrimony
Amphibious bistort
Annual Meadow Grass
Apple
Ash
Autumn hawkbit
Barren brome
Bee orchid
Bittersweet
Black horehound
Blackthorn rowan
Blade Medic
Blunt fruited water starwort
Bracken
Bramble
Branched bur reed
Broad leaved bamboo
Broad leaved dock
Brooklime
Buckthorn
Buddleia
Bugle
Bull rush
Butterbur
Buttercup
Cat's ear
Charlock
Chickweed
Cleavers
Cocksfoot
Columbine coltsfoot cowslip
Common bent
Common birdsfoot trefoil
Common broom rape
Common centaury
Common chickweed
Common club rush
Common comfrey
Common couch
Common duck weed
Common figwort
Common horsetail
Common ivy
Common knapweed
Common mallow
Common mouse-ear
Common nettle
Common ragwort
Common sorrel
Common spotted orchard
Common vetch
Compact rush
Cow parsley
Crack willow
Crane's bill

Creeping bent
Creeping buttercup
Creeping cinquefoil
Creeping soft grass
Creeping thistle
Crested dogstail
Cut leaved crane's bill
Cypress spurge
Daffodil
Daisy
Dandelion
Dark mullein
Devil's bit scabious
Dogrose
Dogwood
Elder
Enchanters nightshade
English Elm
Forget me knot
Field horse tail
Fleabane
Floating sweet grass
Flote / pilicate grass
Foxglove
Goosegrass
Greater bird's foot trefoil
Greater plantain
Great horse tail
Great mullein pot
Great willow herb
Grey poplar
Grey willow
Ground elder
Ground ivy
Groundsel
Gypsy wort
Hairy sedge
Hairy St John's wort
Hairy tare
Hard rush
Hart's tongue
Hawthorn
Hazel
Hedge bedstraw
Hedgerow
Hedge woundwort
Hemlock hedge mustard
Hemlock water dropwort
Hemp agrimony
Herb Robert
Himalayan cotoneaster
Himalayan giant bramble
Hogweed
Honeysuckle
Hyp radic

Floral Records

Ivy
Kidney vetch
Knotgrass
Japanese knotweed
Lady fern
Lady's bedstraw
Large bindweed
Lesser burdock
Lesser spearwort
Lesser stitchwort
Lesser trefoil
Lombardy poplar
Manes tail
Marjoram
Marsh bedstraw
Marsh foxtail
Marsh horsetail
Marsh marigold
Marsh ragwort
Marsh thistle
Meadow buttercup
Meadow foxtail
Meadow sweet
Monkey flower
Mugwort
Nipplewort
Oval sedge
Parsnip
Peach leaved bellflower
Perforate St John's wort
Pedunculate oak
Perennial ox eye daisy
Perennial rye grass
Pignut
Pineapple weed
Prickly sow thistle
Pyramidal orchid
Ragged robin
Ratstail plantain
Red bartsia
Red campion
Red clover
Red fescus
Red-veined dock
Reed sweet grass
Remote sedge
Redshank
Reed canary grass
Ribwort plantain
Rough hawkbit
Rough meadow grass
Russian comfrey
Selfheal
Sharp flowered rush

Sheeps sorrel
Shepherd's purse
Silver weed
Smaller cat's tail
Smoothhawk's beard
Smooth sow-thistle
Smooth-stalked meadow grass
Snowberry
Soft rush
Southern marsh orchid
Spear thistle
Spiked sedge
Spindle
St John's wort (square stalked)
Stream water crowfoot
Sweet vernal grass
Tall fescue
Tall oat
Tormentil
Traveller's joy
Tufted hairgrass
Upright hedge parley
Wall barley
Walnut
Water betony
Water cress
Water figwort
Water forget me knot
Water mint
Water pepper
Wavy bittercress
Weid
Wetted thistle
White bryony
White clover
White dead nettle
White water lily
Wild angelica
Wild carrot
Wild cherry
Wild marjoram
Wild privet
Wild raspberry
Wild teasel
Willow herb species
Winter cress
Wood avens
Wood dock
Wood sedge
Wych elm
Yarrow
Yellow iris
Yellow rattle
Yorkshire fog

C - Bird Records 2013 - 2019

Barn Owl (2015)	Lapwing
Black Cap	Lesser Black Backed Gull
Blackbird	Lesser Redpoll
Black-headed Gull	Lesser Whitethroat
Blue Tit	Linnet
Brambling (2013)	Little Egret
Bullfinch	Little Grebe
Buzzard	Little Owl
Canada Goose	Long tailed Tit
Carrion Crow	Magpie
Cetti's Warbler (2014)	Mallard
Chaffinch	Mallard (domestic)
Chiffchaff	Marsh Tit
Coal Tit	Meadow Pipit
Collard Dove	Mistle Thrush
Common Crossbill (2016)	Moorhen
Common Gull	Mute swan
Common sandpiper (2013)	Nuthatch
Common Turn	Pheasant
Coot	Pied Wagtail (yarrellii)
Cormorant	Pied/White Wagtail
Cormorant (Continental) (2017)	Pochard
Cuckoo (2013)	Radd's Warbler (2013)
Dunnoek	Raven
Ferel Pigeon	Red Kite (2016)
Fieldfare	Red-legged Partridge
Firecrest (2016)	Redshank
Gadwall	Redwing
Garden Warbler (2014)	Reed Bunting
Goldcrest	Reed Warbler
Golden Plover	Ring-necked Duck
Goldfinch	Ring Ouzel
Great Black Backed Gull	Robin
Great Crested Grebe	Rook
Great Spotted Woodpecker	Sand Martin
Great Tit	Sedge Warbler
Great White Egret	Shoveler
Green Woodpecker	Siskin
Greenfinch	Skylark
Grey Heron	Song Thrush
Grey Wagtail	Sparrow Hawk
Greylag Goose	Spotted Flycatcher (2014)
Herring Gull	Starling
House Martin	Stock Dove
House Sparrow	Stonechat
Hybrid Aythya (2013)	Swallow
Hybrid Black x Mute Swan	Swift
Hybrid Duck	Tawny Owl
Jackdaw	Teal
Jay	Treecreeper
Kestrel	Tufted Duck
Kingfisher	Water Rail

Bird Records 2013 - 2019

Waxwing (2013)
Whitethroat (2013)
Wigeon
Willow Warbler (2014)
Woodcock
Wood Pigeon
Wren
Yellow browned warbler (2013)
Yellowhammer

Unidentified gull
Unidentified small gull

D - BIOBLITZ - Recorded Species

BEEES

Common Carder Bee
Buff-tailed Bumblebee
Early Bumblebee
Red-tailed Bumblebee
Tree Bumblebee
Cuckoo Bumblebee
Honey Bee

BUGS

Tortoise Shield Bug
A Squash Bug
Green Shield Bug
Woundwort Shield Bug

BEETLES

Swollen thigh Beetle
Green Dock Beetle
A Leaf (Reed) Beetle
Harlequin Ladybird (larvae)
A common Weevil
Two spot Ladybird (larvae)

Crab Spider
Nursery Web Spider
Velvet mite
Woodlice

E - Moths identified at Rooksbury Mill LNR

These moths were attracted to two light sources set up just north of the car park by Alison Cross and Mike Wall of Butterfly Conservation (Hampshire). The light sources were run from 21.45 to 23.30. Weather was calm, warm but overcast. There was significant bat activity. The moths were shown to a large group of local residents who enjoyed this event that had been programmed by Hampshire and Isle of Wight Wildlife Trust (NW District) and advertised locally.

English name	Scientific name	Comment
	* <i>Pyrausta aurata</i>	Also seen in daylight
Shuttle-shaped Dart	<i>Agrotis puta</i> ssp. <i>puta</i>	
	<i>Lathronympha strigana</i>	
Mother of Pearl	* <i>Pleuroptya ruralis</i>	Also seen in daylight
	<i>Agapeta hamana</i>	
Brimstone	<i>Opisthrograptis luteolata</i>	
Dwarf Cream Wave	<i>Idaea fuscovenosa</i>	
	<i>Dipleurina lacustrata</i>	
Pebble Hook-tip	<i>Drepana falcatoria falcatoria</i>	
Dun-bar	<i>Cosmia trapazina</i>	
Single-dotted Wave	<i>Idaea dimidiata</i>	
	<i>Paraswammerdamia nebulella</i>	
Yellow Shell	<i>Camptogramma bilineata bilineata</i>	Also seen in daylight
Flame Shoulder	<i>Ochropleura plecta</i>	
	<i>Trachycera advenella</i>	
Dingy Footman	<i>Eilema griseola</i>	
Round-winged Muslin	<i>Thumatha senex</i>	
Red Twin-spot Carpet	<i>Xanthorhoe spadicearia</i>	
	<i>Phyllonorycter emberizaepenella</i>	
The Flame	<i>Axylia putris</i>	
Dark-barred Twin-spot Carpet	<i>Xanthorhoe ferrugata</i>	
Common Carpet	<i>Epirrhoe alternata alternata</i>	Also seen in daylight
Small Magpie	* <i>Eurrhpara hortulata</i>	
	<i>Chrysoteuchia culmella</i>	
Early thorn	<i>Selenia dentaria</i>	
Ruby Tiger	<i>Phragmatobia fuliginosa</i>	
Cloaked minor	<i>Mesoligia furuncula</i>	
Large Yellow Underwing	<i>Noctua pronuba</i>	

English name	Scientific name	Comment
White satin	Leucoma salicis	
	Batia unitella	
Buff Ermine	Spilosoma luteum	
Setaceous Hebrew Character	Xestia c-nigrum	
	Yponomeuta evonymella	
Common Wave	Cabera exanthemata	
	Bryotropha terella	
	Agonopterix heracliata	
	Borkhausenia fuscescens	
Sallow Kitten	Ypsolopha scabrella	
	Furcula furcula	
Riband Wave	Idaea aversa	
Ringed China-mark	*Parapoynx stratiotata	
	Blastobasis adustella	
	Euzophera pinguis	
Smoky Wainscot	Mythimna impura	
	Yponomeuta padella	
	Acleris aspersana	
Yellow-tail	Euproctis similis	Also seen in daylight
	Cnephasia sp.	
Willow Beauty	Peribatodes rhomvodia	
V-Pug	Chloroclystis v-ata	
Clouded Border	Lomaspilis marginata	
Elephant Hawkmoth	Deilephila elpenor	Larvae found 22/10/2010

English Name	Scientific Name	Comment
Anticlea derivata	Streamer	
Ectropis bistortata	Engrailed	
Gymnoscelis rufifasciata	Double-striped pug	
Orthosia gothica	Hebrew character	
Anthophila fabriciana	Nettle-tap	
Caloptilia syringella		
Micropterix calthella		
Acronicta rumicis	Knot grass	
Depressaria heraclei	Parsnip moth	
Parapoynx stratiotata	Ringed china-mark	
Callimorpha dominula	Scarlet tiger moth	
Cameraria ohridella	Horse-chestnut leaf-miner	
Celypha lacunana		
Chrysoteuchia culmella		
Dichrorampha sequana		
Timandra comae	Blood-vein	
Ennomos fuscantaria	Dusky thorn	
Hypena proboscidalis	Snout	
Morma maura	Old lady	
Noctua fimbriata	Broad-bordered yellow underwing	
Orgyia antiqua	Vapourer	
Xestia c-nigrum	Setaceous hebrew character	
Xestia xanthographa	Square-spot rustic	

*marked species are Pyralid Moths

This list will be submitted for the National and Hampshire records by the moth experts mentioned above.

List provided by Alison Cross. Elephant Hawkmoth larvae note added by Mervyn Grist.

On this date some additional species of moths were recorded from the footpath underpass (of A303) just west of Rooksbury Mill. These were:

Black Arches	<i>Lymantria monacha</i>
Large twin-spot carpet	<i>Xanthorhoe quadrifasciata</i>

Rooksbury Mill Local Nature Reserve Butterfly Survey

Annual Report 2021

A Big Thank You

First off, I would like to thank everybody who participated in this years' butterfly surveys. This has been a confusing year with lots of challenges to overcome and so I am sincerely grateful to you all for helping Test Valley Borough Council collect this valuable data.

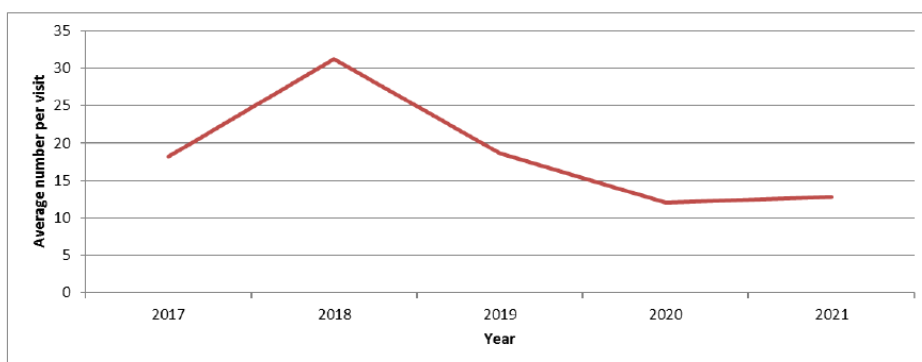
Introduction

The Rooksbury Mill Local nature Reserve Butterfly transect was set up in 2010 and during this time has had 27 species of butterfly recorded on site. This site has a variety of different habitat which benefit a wide range of species.

Results

We had a total of 18 surveys completed this year compared to the 24 of last year. This means that the data, although useful to us at Test Valley, will not be classed as statistically important in the national scheme.

Due to the lowered number of completed surveys, we did see a decrease in total individuals counted this year. However, on average there was an increase of individuals seen each survey. This average gives us an idea that if we had had a higher number of surveys we likely would have seen an increase in species and numbers.



We had a total of 20 species counted this year, and increase on last year. We had some exciting finds this year with the return of the Small Heath from 2018, a Dark-Green Fritillary spotted again after not being seen on site since 2010 and a new addition to the site, a Brown Hairstreak!

A Full list of species from 2021 can be seen below with the six most common highlighted in bold:

Small Skipper	Brimstone	Large White
Small White	Green-veined White	Orange Tip
Brown Hairstreak	Common Blue	Holly Blue
Red Admiral	Small Tortoiseshell	Peacock
Comma	Dark Green Fritillary	Speckled Wood
Marbled White	Meadow Brown	Small Heath
Ringlet	Gatekeeper/hedge brown	

Conclusion

In general we can guess that the numbers were showing an increase this year. Nationally, we have seen a decrease in butterfly numbers and although the increase at Rooksbury is small, it still gives hope that populations are stabilising locally.

The 2020 UKBMS Annual Report is now available online from their website.

G - Watervole Survey - Map



Scale:
Date:
Drawn:
Dept:
Doc:

Test Valley Borough
Council Mapping

Test Valley
Borough Council

National Water Vole Monitoring Programme
recording forms



Please ensure you have read the survey guidelines before doing your survey. Please complete the *Site information form* when you do your preliminary visit of your site. You will then need to complete the *NWVMP survey form* when you do your survey in May.

Site information form

1. Site number: Rooksbury Mill LNR

2. Habitat:

Upland ☐ Lowland ☒ Coastal ☐

3. Waterway type:

river ☒ stream/burn ☐ lake/loch ☐ reed bed ☐ marsh ☐ bog ☐
pond ☐ canal ☐ reservoir ☐ ditch/dyke ☐ other ☐

If other please specify:

4. Have water voles been reintroduced at this site?

Yes ☐ No ☒ Don't know ☐

If yes, please specify when the reintroduction happened:

5. Total number of transects at site (usually one):1.....

6. Does mink control occur on this site?

Yes ☒ No ☐ Don't know ☐

Mink surveys undertaken.

Your Transect details

7. Start grid reference (8 figure grid reference e.g. XX74736789) ...SU356447.....

8. End grid reference (8 figure grid reference e.g. XX74736789) ...SU360448.....

9. Grid references of each 100m mark along your transect (complete as many as is applicable to the length of your transect – you will not be asked to enter this data online):

100m	200m	300m	400m	500m	600m
SU357447	SU358448	SU358449	SU359449	SU360448	

National Water Vole Monitoring Programme survey form

Site Number:	Transect No. (if applicable): 2	Bank surveyed (N/S/E/W): Both
Start grid ref: SU356447	End grid ref: SU360448	Transect length: 500m
Survey date: 30/07/2017	Surveyor: Ron Davis and Kate Savage	

Water vole signs in each 100m section of the transect (complete as many as is applicable to the length of your transect)						
Field sign	0-100m	100-200m	200-300m	300-400m	400-500m	500-600m
Number of trampled latrines (trodden flat on top)		4		1		
Number of untrampled latrines		3		4		
Please note the location of the first latrine that you encounter (Grid Reference or GPS)		SU359449		SU358449		
Please note the location of the last latrine that you encounter (Grid Reference or GPS)		SU358449		SU360447		
Water vole feeding signs						
Burrows/nests (approximate no.)	<input checked="" type="checkbox"/> None <input type="checkbox"/> 1-5 <input type="checkbox"/> 6-10 <input type="checkbox"/> More than 10	<input type="checkbox"/> None <input type="checkbox"/> 1-5 <input checked="" type="checkbox"/> 6-10 <input type="checkbox"/> More than 10	<input type="checkbox"/> None <input checked="" type="checkbox"/> 1-5 <input type="checkbox"/> 6-10 <input type="checkbox"/> More than 10	<input type="checkbox"/> None <input type="checkbox"/> 1-5 <input type="checkbox"/> 6-10 <input type="checkbox"/> More than 10	<input checked="" type="checkbox"/> None <input type="checkbox"/> 1-5 <input type="checkbox"/> 6-10 <input type="checkbox"/> More than 10	
Sighting:	<input type="checkbox"/> No <input type="checkbox"/> Yes, if so how many:	<input type="checkbox"/> No <input type="checkbox"/> Yes, if so how many:	<input checked="" type="checkbox"/> No <input type="checkbox"/> Yes, if so how many:	<input type="checkbox"/> No <input type="checkbox"/> Yes, if so how many:	<input type="checkbox"/> No <input type="checkbox"/> Yes, if so how many:	

Mink/otter signs along the whole transect (only record if you are <i>certain</i> of your identification and please take a photo including an object to indicate scale)	
Mink	Otter
<input type="checkbox"/> Scat	<input type="checkbox"/> Spraint
<input type="checkbox"/> Footprints	<input type="checkbox"/> Footprints
<input type="checkbox"/> Sighting	<input type="checkbox"/> Sighting
Mink raft present <input type="checkbox"/> Yes <input type="checkbox"/> No	
Any comments on mink control at the site/transect	

***Data should be submitted by the 31st October each year
Please enter all data online at www.ptes.org/watervoles***

Field sign record form (optional)

Please record the field sign detected (trampled/untrampled latrine, feeding station, burrow, sighting) and its GPS location			
Field sign	Location (Grid Reference or GPS)	Transect section: e.g. 1 st 100m, 3 rd 100m	Comments
e.g. trampled latrine	SN6447725383 or Lat: 51.910444 Long: -3.9716113	1 st 100m section	Fresh droppings

Fish population survey summary:

Rooksbury Mill, River Anton

Background

A fish population survey was carried out on the River Anton at Rooksbury Mill, Andover on the 8th September, 2016. The survey was part of the six-yearly Salmon Action Plan survey programme, aimed at assessing the spatial distribution of juvenile salmon throughout the Test catchment.

Methods

A single electric fishing run was completed over an 85m reach between SU3564844305 and SU3561144378 (Map 1, below). A battery-powered, backpack electric fishing unit was used, with one anode. Two team members captured fish in dip nets and another carried an aerated holding tank. The average width of the survey reach was 5.27m. Captured fish were identified, measured and returned to the river.



Map 1: Survey location

Results

The survey catch consisted of 68 brown trout *Salmo trutta*, 92 bullhead *Cottus gobio* and 4 European eels *Anguilla anguilla*, as shown in the pie-chart below:

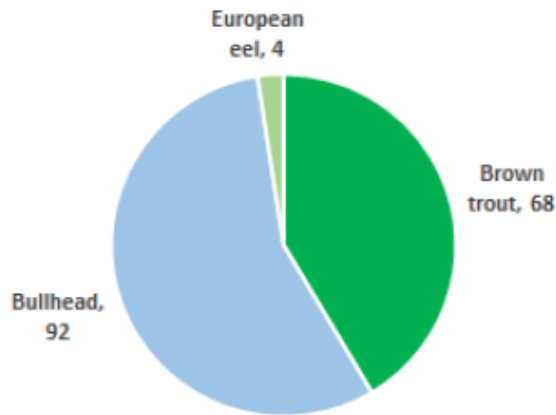


Figure 1: Survey catch

The lengths of the eels captured are given in figure 2, below:

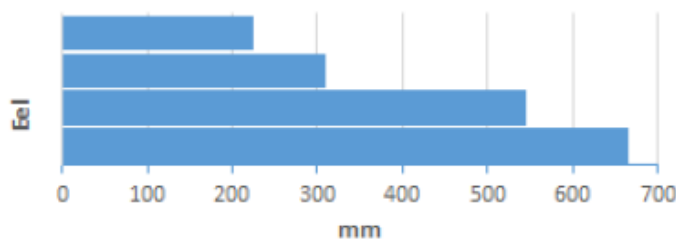


Figure 2: Eel lengths

Figure 3 is a length frequency histogram showing the numbers of trout in each size category.

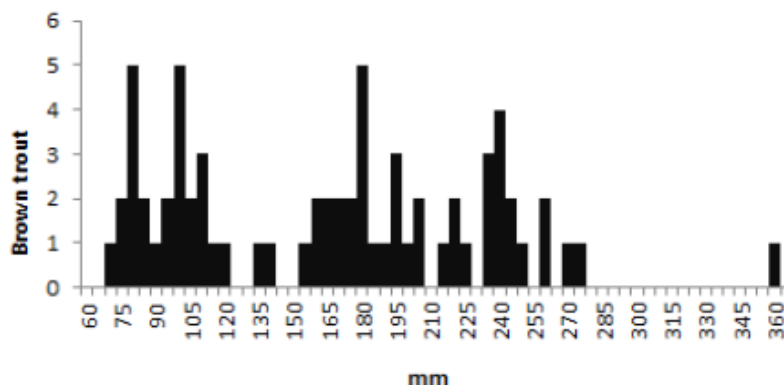


Figure 3: Brown trout length frequency (n=68)

Discussion

The total catch of brown trout in 2016 was lower (68) than when the survey was conducted in 2010 (129). However, the average width of the site was 9.6m in 2010 and a 100m reach was fished, whereas in 2016 the average width was 5.27m and an 85m reach was fished. The reduction in width was probably due to a combination of lower flow and development marginal vegetation. The reach length was reduced in order to align with a suitable upstream stop net position. This means that brown trout density in 2016 was 15.2 per 100m², slightly higher than in 2010 when it was 13.5 per 100m².

Figure 3 indicates fairly even numbers of juvenile, mid-aged and mature brown trout, which is a reflection of good habitat quality and complexity - in order for a reach to support these different life stages, it must meet their varied habitat requirements (i.e. pools, riffles, variable depth & substrate).

The capture of 92 bullhead indicates both good water quality and good substrate (riverbed) habitat. Bullhead are less affected by larger scale habitat features but require complex, stony substrate, ideally with woody debris and vegetated margins.

The eel catch was similar to 2010, when three eels were caught (of similar lengths to 2016). The European eel is critically endangered and abundance, especially in headwaters, has declined substantially in recent decades. The Rooksbury catches demonstrate that the site is accessible to eels migrating upstream from the sea and that it provides suitable habitat quality and food availability to support resident adult eels.

The 2010 survey also recorded nine grayling, one three-spined stickleback, one brook lamprey, one stone loach and three juvenile pike. The absence of grayling from the 2016 catch may reflect the general decline in this species that has been noted in recent years, probably as a result of high temperatures and low flows. The absence of the other species is probably a random feature of the results and not a cause for concern.

INVERTEBRATE SURVEY OF

ROOKSBURY MILL,

ANDOVER

NORTH HAMPSHIRE

NOVEMBER 2019

Dr. Jonty Denton FRES FLS CEcol MCIEEM

31 Thorn lane, Four Marks, Hants, GU34 5BX

Summary

A survey of terrestrial and aquatic invertebrates was carried out across the site in April-September 2019.

Survey date/s: 23rd May, 27th June, 1st, 11th July & 15th August & 10th September 2019

Species total: A total of 364 invertebrate taxa were identified of which 9 had conservation statuses. These are listed below:-

Species	Family	Order		Conservation status
<i>Theridiosoma gemmosum</i>	Theridiosomatidae	Araneae	Ray spider	NS
<i>Paracorymbia fulva</i>	Cerambycidae	Coleoptera	A longhorn beetle	RDB 3
<i>Agelastica alni</i>	Chrysomelidae	Coleoptera	Alder leaf beetle	DD;NR
<i>Plateumaris rustica</i>	Chrysomelidae	Coleoptera	A reed beetle	NS
<i>Drupenatus nasturtii</i>	Curculionidae	Coleoptera	A weevil	[Nb]
<i>Gymnetron veronicae</i>	Curculionidae	Coleoptera	A weevil	Nb
<i>Gymnetron villosulum</i>	Curculionidae	Coleoptera	A weevil	[Nb]
<i>Elodes elongata</i>	Scirtidae	Coleoptera	A marsh beetle	NS
<i>Aquarius paludum</i>	Gerridae	Hemiptera	Large Pondskater	NS

INTRODUCTION

The project brief was to provide baseline records for invertebrates across the site.

METHODOLOGY AND SITE VISITS

The main emphasis of the survey was to find as many rare and notable species as possible within the reviewed groups.

The site was visited specifically for invertebrate surveying on the following dates;- 23rd May, 1st, 11th & 31st July & 18th August 10th & 21st September 2019

Standard field techniques were employed to sample the invertebrate fauna across the site. These included sweeping vegetation with a wide mouthed sweep net, beating trees and bushes over a beating tray, and grubbing amongst tussocks and key host plant rosettes etc.

Because it is impracticable to survey all the potential invertebrates within any given site, only specific groups of species were examined during fieldwork. These groups are sufficiently well known as to allow meaningful comparisons to be made with other sites, both locally and nationally. They are also important as indicators of the quality of a site and the habitats present (see Brooks 1993).

Groups covered during the survey were:

- Mollusca (slugs and snails)
- Arachnida (spiders, harvestmen & pseudoscorpions)
- Isopoda (woodlice)
- Thysanura (bristletails)
- Ephemeroptera (mayflies)
- Odonata (dragonflies & damselflies)
- Plecoptera (stoneflies)
- Orthoptera (grasshoppers & crickets)
- Dictyoptera (cockroaches)
- Dermaptera (earwigs)
- Hemiptera-Heteroptera (true-bugs)
- Hemiptera-Homoptera (hoppers)
- Neuroptera (lace-wings)
- Mecoptera (scorpion-flies)
- Lepidoptera (butterflies & moths)
- Trichoptera (caddis flies)
- Diptera (true flies)
- Aculeate Hymenoptera (ants, bees & wasps)
- Coleoptera (beetles)

Measuring the quality of other invertebrate fauna

The invertebrate assemblages present at the site during the survey are assessed using Natural England's Invertebrate Species-habitat Information System (ISIS – 2010 version), as defined in Webb & Lott (2006) and Drake *et al.* (2007). Further developments for the programme are discussed in Lott (2008).

The system was developed for Common Standards Monitoring (CSM) on Sites of Special Scientific Interest (SSSI) but other applications are possible at a range of geographic scales. Lott (2008) describes the essence of ISIS as a database that can be used to recognise invertebrate assemblage types in species lists and evaluate their value for nature conservation.

RESULTS

A total of 364 species of invertebrate were recorded. A full species list with UK statuses is given in Appendix 1. Of these, twenty species have a conservation designation: These are summarised in Table 1. IUCN re-evaluated species have their IUCN criteria given followed by their current UK rarity status in brackets. Those species that have not yet been IUCN re-evaluated have their current statuses in square brackets. The definitions for these criteria are given in appendix 2.

Table 1. list of species with a conservation designation.

Species	Family	Order		Conservation status
<i>Theridiosoma gemmosum</i>	Theridiosomatidae	Araneae	Ray spider	NS
<i>Paracorymbia fulva</i>	Cerambycidae	Coleoptera	A longhorn beetle	RDB 3
<i>Agelastica alni</i>	Chrysomelidae	Coleoptera	Alder leaf beetle	DD;NR
<i>Plateumaris rustica</i>	Chrysomelidae	Coleoptera	A reed beetle	NS
<i>Drupenatus nasturtii</i>	Curculionidae	Coleoptera	A weevil	[Nb]
<i>Elodes elongata</i>	Scirtidae	Coleoptera	A marsh beetle	NS
<i>Aquarius paludum</i>	Gerridae	Hemiptera	Large Pondskater	NS

UKBAP / SPI (NERC S41) species:

Tyria jacobaeae - Cinnabar

SURVEY LIMITATIONS

The moth fauna is always under-represented when only diurnal surveys are employed. Light trapping surveys with 2-3 MV and actinic Robinson type traps would add hundreds of species of moth and additional night flying species (Ichneumonidae, Coleoptera etc.)

ECOLOGICAL ASSESSMENT

Rooksbury Mill continues to support a rich assemblage with excellent river margin habitats.

The excessive algal development in the main lake continues to be a blight on the reserve

REFERENCES

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Harvey, P.R., Nellist, D.R. & Telfer, M.G. (eds) 2002. *Provisional Atlas of British Spiders (Arachnida, Araneae) Volumes 1 & 2*. Huntingdon: BRC.

Hyman, P.S & Parsons, M.S. 1992. *A review of the scarce and threatened Coleoptera of Great Britain. Part 1*. JNCC, Peterborough.

Kirby, P. 1992. *A review of the scarce and threatened Hemiptera of Great Britain*. Peterborough, JNCC.

Merritt, P. 1990. *A review of the Nationally Notable Spiders of Great Britain*. Peterborough, NCC.

APPENDICES

Table 1. Species list 2019

Species	Family	Order	Conservation status
<i>Aceria erinea</i>	Eriophyidae	Prostigmata	common
<i>Acilius sulcatus</i>	Dytiscidae	Coleoptera	common
<i>Adalia bipunctata</i>	Coccinellidae	Coleoptera	common
<i>Agabus bipustulatus</i>	Dytiscidae	Coleoptera	common
<i>Agabus didymus</i>	Dytiscidae	Coleoptera	common
<i>Agabus nebulosus</i>	Dytiscidae	Coleoptera	common
<i>Agabus paludosus</i>	Dytiscidae	Coleoptera	common
<i>Agelastica alni</i>	Chrysomelidae	Coleoptera	DD;NR
<i>Aglais io</i>	Nymphalidae	Lepidoptera	common
<i>Aglais urticae</i>	Nymphalidae	Lepidoptera	common
<i>Agonum fuliginosum</i>	Carabidae	Coleoptera	common
<i>Agriphila geniculea</i>	Crambidae	Lepidoptera	common
<i>Alboglossiphonia heteroclita</i>	Glossiphoniidae	Rhynchobdellida	common
<i>Alianta incana</i>	Staphylinidae	Coleoptera	common
<i>Alnetoidea alneti</i>	Cicadellidae	Hemiptera	common
<i>Altica lythri</i>	Chrysomelidae	Coleoptera	common
<i>Amalorrhynchus melanarius</i>	Curculionidae	Coleoptera	common
<i>Amaurobius fenestralis</i>	Amaurobiidae	Araneae	common
<i>Amblyteles armatorius</i>	Ichneumonidae	Hymenoptera	common
<i>Anacaena globulus</i>	Hydrophilidae	Coleoptera	common
<i>Anasimyia contracta</i>	Syrphidae	Diptera	common
<i>Anaspis fasciata</i>	Scraptiidae	Coleoptera	common
<i>Anaspis maculata</i>	Scraptiidae	Coleoptera	common
<i>Anaspis regimbarti</i>	Scraptiidae	Coleoptera	common
<i>Anax imperator</i>	Aeshnidae	Odonata	common
<i>Anisosticta novemdecimpunctata</i>	Coccinellidae	Coleoptera	common
<i>Anobium punctatum</i>	Anobiidae	Coleoptera	common
<i>Anthocharis cardamines</i>	Pieridae	Lepidoptera	common
<i>Anthocoris confusus</i>	Anthocoridae	Hemiptera	common
<i>Anthocoris limbatus</i>	Anthocoridae	Hemiptera	common
<i>Anthocoris nemoralis</i>	Anthocoridae	Hemiptera	common
<i>Anthonomus pedicularius</i>	Curculionidae	Coleoptera	common
<i>Anyphaena accentuata</i>	Anyphaenidae	Araneae	common
<i>Aphthona euphorbiae</i>	Chrysomelidae	Coleoptera	common
<i>Aphthona nonstriata</i>	Chrysomelidae	Coleoptera	common
<i>Apis mellifera</i>	Apidae	Hymenoptera	common
<i>Aquarius paludum</i>	Gerridae	Hemiptera	NS
<i>Araneus diadematus</i>	Araneidae	Araneae	common
<i>Araneus marmoreus</i> var. <i>pyramidatus</i>	Araneidae	Araneae	local

<i>Archarius salicivorus</i>	Curculionidae	Coleoptera	common
<i>Arge cyanocrocea</i>	Argidae	Hymenoptera	common
<i>Argyresthia pygmaeella</i>	Argyresthiidae	Lepidoptera	common
<i>Asellus (Asellus) aquaticus</i>	Asellidae	Isopoda	common
<i>Athalia rosae</i>	Tenthredinidae	Hymenoptera	common
<i>Atracus affinis</i>	Staphylinidae	Coleoptera	common
<i>Bibio marci</i>	Bibionidae	Diptera	common
<i>Bithynia tentaculata</i>	Bithyniidae	Littorinimorpha	common
<i>Blepharidopterus angulatus</i>	Miridae	Hemiptera	common
<i>Bombus hypnorum</i>	Apidae	Hymenoptera	common
<i>Bombus lapidarius</i>	Apidae	Hymenoptera	common
<i>Bombus lucorum</i>	Apidae	Hymenoptera	common
<i>Bombus pascuorum</i>	Apidae	Hymenoptera	common
<i>Bombus pratorum</i>	Apidae	Hymenoptera	common
<i>Byturus tomentosus</i>	Byturidae	Coleoptera	common
<i>Calameuta filiformis</i>	Cephidae	Hymenoptera	common
<i>Calameuta pallipes</i>	Cephidae	Hymenoptera	common
<i>Callimorpha dominula</i>	Erebidae	Lepidoptera	local
<i>Calopteryx splendens</i>	Calopterygidae	Odonata	common
<i>Calvia quattuordecimguttata</i>	Coccinellidae	Coleoptera	common
<i>Cantharis cryptica</i>	Cantharidae	Coleoptera	common
<i>Cantharis decipiens</i>	Cantharidae	Coleoptera	common
<i>Cantharis lateralis</i>	Cantharidae	Coleoptera	common
<i>Cantharis nigricans</i>	Cantharidae	Coleoptera	common
<i>Cantharis rustica</i>	Cantharidae	Coleoptera	common
<i>Capsus ater</i>	Miridae	Hemiptera	common
<i>Cartodere nodifer</i>	Latridiidae	Coleoptera	common
<i>Cassida vibex</i>	Chrysomelidae	Coleoptera	common
<i>Celastrina argiolus</i>	Lycaenidae	Lepidoptera	common
<i>Cepaea (Cepaea) hortensis</i>	Helicidae	Pulmonata	common
<i>Cepaea (Cepaea) nemoralis</i>	Helicidae	Pulmonata	common
<i>Ceutorhynchus pallidactylus</i>	Curculionidae	Coleoptera	common
<i>Ceutorhynchus pyrrhorhynchus</i>	Curculionidae	Coleoptera	common
<i>Cheilosia albitarsis</i>	Syrphidae	Diptera	common
<i>Cheilosia illustrata</i>	Syrphidae	Diptera	common
<i>Chloromyia formosa</i>	Stratiomyidae	Diptera	common
<i>Chorisops tibialis</i>	Stratiomyidae	Diptera	common
<i>Chorthippus brunneus</i>	Acrididae	Orthoptera	common
<i>Chrysolina herbacea</i>	Chrysomelidae	Coleoptera	common
<i>Cicadula quadrinotata</i>	Cicadellidae	Hemiptera	common
<i>Cionus alauda</i>	Curculionidae	Coleoptera	common
<i>Cionus scrophulariae</i>	Curculionidae	Coleoptera	common
<i>Cionus tuberculosus</i>	Curculionidae	Coleoptera	common
<i>Cixius nervosus</i>	Cixiidae	Hemiptera	common
<i>Clausilia (Clausilia) bidentata</i>	Clausiliidae	Pulmonata	common

<i>Closterotomus fulvomaculatus</i>	Miridae	Hemiptera	common
<i>Clubiona pallidula</i>	Clubionidae	Araneae	common
<i>Clubiona phragmitis</i>	Clubionidae	Araneae	common
<i>Clubiona stagnatilis</i>	Clubionidae	Araneae	common
<i>Clusiodes albimanus</i>	Clusiidae	Diptera	common
<i>Coccidula rufa</i>	Coccinellidae	Coleoptera	common
<i>Coccinella septempunctata</i>	Coccinellidae	Coleoptera	common
<i>Coenagrion puella</i>	Coenagrionidae	Odonata	common
<i>Colletes hederæ</i>	Colletidae	Hymenoptera	common
<i>Conocephalus fuscus</i>	Conocephalidae	Orthoptera	common
<i>Coreus marginatus</i>	Coreidae	Hemiptera	common
<i>Corixa punctata</i>	Corixidae	Hemiptera	common
<i>Corizus hyoscyami</i>	Rhopalidae	Hemiptera	common
<i>Cornu aspersum</i>	Helicidae	Pulmonata	common
<i>Corticaria gibbosa</i>	Latridiidae	Coleoptera	common
<i>Crepidodera aurata</i>	Chrysomelidae	Coleoptera	common
<i>Crepidodera aurea</i>	Chrysomelidae	Coleoptera	common
<i>Crepidodera fulvicornis</i>	Chrysomelidae	Coleoptera	common
<i>Crudosilis ruficollis</i>	Cantharidae	Coleoptera	common
<i>Cryptocephalus pusillus</i>	Chrysomelidae	Coleoptera	common
<i>Cymus glandicolor</i>	Lygaeidae	Hemiptera	common
<i>Cyphon coarctatus</i>	Scirtidae	Coleoptera	common
<i>Dasineura pustulans</i>	Cecidomyiidae	Diptera	common
<i>Demetrias atricapillus</i>	Carabidae	Coleoptera	common
<i>Deporaus betulae</i>	Rhynchitidae	Coleoptera	common
<i>Deroceras (Deroceras) reticulatum</i>	Agriolimacidae	Pulmonata	common
<i>Dicranopalpus ramosus</i>	Phalangidae	Opiliones	common
<i>Dictyla convergens</i>	Tingidae	Hemiptera	local
<i>Dictyna arundinacea</i>	Dictynidae	Araneae	common
<i>Dictyna uncinata</i>	Dictynidae	Araneae	common
<i>Dicyphus (Dicyphus) epilobii</i>	Miridae	Hemiptera	common
<i>Dicyphus (Dicyphus) stachydis</i>	Miridae	Hemiptera	common
<i>Discus (Gonyodiscus) rotundatus</i>	Patulidae	Pulmonata	common
<i>Donacia marginata</i>	Chrysomelidae	Coleoptera	common
<i>Donacia semicuprea</i>	Chrysomelidae	Coleoptera	common
<i>Donacia simplex</i>	Chrysomelidae	Coleoptera	common
<i>Donacia vulgaris</i>	Chrysomelidae	Coleoptera	common
<i>Drupenatus nasturtii</i>	Curculionidae	Coleoptera	[Nb]
<i>Drymus (Sylvadrymus) sylvaticus</i>	Lygaeidae	Hemiptera	common
<i>Dytiscus marginalis</i>	Dytiscidae	Coleoptera	common
<i>Elaphrus cupreus</i>	Carabidae	Coleoptera	common
<i>Eledona agricola</i>	Tenebrionidae	Coleoptera	common
<i>Elmis aenea</i>	Elmidae	Coleoptera	common
<i>Elodes elongata</i>	Scirtidae	Coleoptera	NS
<i>Empis livida</i>	Empididae	Diptera	common

<i>Enallagma cyathigerum</i>	Coenagrionidae	Odonata	common
<i>Enochrus melanocephalus</i>	Hydrophilidae	Coleoptera	common
<i>Enochrus testaceus</i>	Hydrophilidae	Coleoptera	common
<i>Ephemera danica</i>	Ephemeridae	Ephemeroptera	common
<i>Episinus angulatus</i>	Theridiidae	Araneae	common
<i>Epistrophe eligans</i>	Syrphidae	Diptera	common
<i>Episyrphus balteatus</i>	Syrphidae	Diptera	common
<i>Epuraea aestiva</i>	Nitidulidae	Coleoptera	common
<i>Epuraea melanocephala</i>	Nitidulidae	Coleoptera	common
<i>Eriothrix rufomaculata</i>	Tachinidae	Diptera	common
<i>Eristalinus sepulchralis</i>	Syrphidae	Diptera	common
<i>Ero cambridgei</i>	Mimetidae	Araneae	common
<i>Erysiphe cruciferarum</i>	Erysiphaceae	Erysiphales	common
<i>Erythromma najas</i>	Coenagrionidae	Odonata	local
<i>Euclidia mi</i>	Erebidae	Lepidoptera	common
<i>Eudonia angustea</i>	Crambidae	Lepidoptera	common
<i>Eupeodes corollae</i>	Syrphidae	Diptera	common
<i>Eurygaster testudinaria</i>	Scutelleridae	Hemiptera	common
<i>Eysarcoris venustissimus</i>	Pentatomidae	Hemiptera	common
<i>Forficula auricularia</i>	Forficulidae	Dermaptera	common
<i>Galba (Galba) truncatula</i>	Lymnaeidae	Hygrophila	common
<i>Galerucella californiensis</i>	Chrysomelidae	Coleoptera	common
<i>Galerucella nymphalaeae</i>	Chrysomelidae	Coleoptera	common
<i>Galerucella tenella</i>	Chrysomelidae	Coleoptera	common
<i>Gallinula chloropus</i>	Rallidae	Gruiformes	common
<i>Gammarus lacustris</i>	Gammaridae	Amphipoda	common
<i>Gastrophysa viridula</i>	Chrysomelidae	Coleoptera	common
<i>Gerris (Gerris) lacustris</i>	Gerridae	Hemiptera	common
<i>Gibbaranea gibbosa</i>	Araneidae	Araneae	common
<i>Gonepteryx rhamni</i>	Pieridae	Lepidoptera	common
<i>Gongylidium rufipes</i>	Linyphiidae	Araneae	common
<i>Grammoptera ruficornis</i>	Cerambycidae	Coleoptera	common
<i>Gymnetron veronicae</i>	Curculionidae	Coleoptera	Nb
<i>Gymnetron villosulum</i>	Curculionidae	Coleoptera	[Nb]
<i>Gymnocheta viridis</i>	Tachinidae	Diptera	common
<i>Gyrinus marinus</i>	Gyrinidae	Coleoptera	common
<i>Gyrinus substriatus</i>	Gyrinidae	Coleoptera	common
<i>Gyrinus urinator</i>	Gyrinidae	Coleoptera	common
<i>Haematopota pluvialis</i>	Tabanidae	Diptera	common
<i>Halesus digitatus</i>	Limnephilidae	Trichoptera	common
<i>Haliphus flavicollis</i>	Haliplidae	Coleoptera	common
<i>Haliphus fluviatilis</i>	Haliplidae	Coleoptera	common
<i>Haliphus lineatocollis</i>	Haliplidae	Coleoptera	common
<i>Harmonia axyridis</i>	Coccinellidae	Coleoptera	common
<i>Harpactea hombergi</i>	Dysderidae	Araneae	common

<i>Helobdella stagnalis</i>	Glossiphoniidae	Rhynchobdellida	common
<i>Helophilus pendulus</i>	Syrphidae	Diptera	common
<i>Helophorus aequalis</i>	Hydrophilidae	Coleoptera	common
<i>Helophorus brevipalpis</i>	Hydrophilidae	Coleoptera	common
<i>Heterogaster urticae</i>	Lygaeidae	Hemiptera	common
<i>Himacerus (Aptus) mirmicoides</i>	Nabidae	Hemiptera	common
<i>Hydrobius fuscipes</i>	Hydrophilidae	Coleoptera	common
<i>Hydroporus palustris</i>	Dytiscidae	Coleoptera	common
<i>Hydroporus planus</i>	Dytiscidae	Coleoptera	common
<i>Hydroporus tessellatus</i>	Dytiscidae	Coleoptera	common
<i>Hygromia (Hygromia) cinctella</i>	Hygromiidae	Pulmonata	common
<i>Hygromia dimidiata</i>	Staphylinidae	Coleoptera	common
<i>Hygrobia inaequalis</i>	Dytiscidae	Coleoptera	common
<i>Hylyphantes graminicola</i>	Linyphiidae	Araneae	common
<i>Hypomma bituberculatum</i>	Linyphiidae	Araneae	common
<i>Ilybius fenestratus</i>	Dytiscidae	Coleoptera	common
<i>Ilybius fuliginosus</i>	Dytiscidae	Coleoptera	common
<i>Ischnodemus sabuleti</i>	Lygaeidae	Hemiptera	common
<i>Ischnura elegans</i>	Coenagrionidae	Odonata	common
<i>Isoperla grammatica</i>	Perlodidae	Plecoptera	common
<i>Iteomyia major</i>	Cecidomyiidae	Diptera	common
<i>Javesella obscurella</i>	Delphacidae	Hemiptera	common
<i>Kaestneria pullata</i>	Linyphiidae	Araneae	common
<i>Kateretes pusillus</i>	Kateretidae	Coleoptera	common
<i>Laccobius bipunctatus</i>	Hydrophilidae	Coleoptera	common
<i>Laccobius minutus</i>	Hydrophilidae	Coleoptera	common
<i>Laccophilus minutus</i>	Dytiscidae	Coleoptera	common
<i>Laetiporus sulphureus</i>	Fomitopsidaceae	Polyporales	common
<i>Larinioides cornutus</i>	Araneidae	Araneae	common
<i>Lasius niger</i>	Formicidae	Hymenoptera	common
<i>Lasius platythorax</i>	Formicidae	Hymenoptera	common
<i>Lathys humilis</i>	Dictynidae	Araneae	common
<i>Leiobunum rotundum</i>	Phalangidae	Opiliones	common
<i>Lejogaster metallina</i>	Syrphidae	Diptera	local
<i>Leptopterna dolabrata</i>	Miridae	Hemiptera	common
<i>Libellula depressa</i>	Libellulidae	Odonata	common
<i>Limacus flavus</i>	Limacidae	Pulmonata	common
<i>Limax maximus</i>	Limacidae	Pulmonata	common
<i>Limnia paludicola</i>	Sciomyzidae	Diptera	common
<i>Linyphia triangularis</i>	Linyphiidae	Araneae	common
<i>Liocoris tripustulatus</i>	Miridae	Hemiptera	common
<i>Lochmaea caprea</i>	Chrysomelidae	Coleoptera	common
<i>Lochmaea crataegi</i>	Chrysomelidae	Coleoptera	common
<i>Longitarsus dorsalis</i>	Chrysomelidae	Coleoptera	common
<i>Longitarsus rubiginosus</i>	Chrysomelidae	Coleoptera	common

<i>Lucilia sericata</i>	Calliphoridae	Diptera	common
<i>Lymnaea stagnalis</i>	Lymnaeidae	Hygrophila	common
<i>Macrophya annulata</i>	Tenthredinidae	Hymenoptera	common
<i>Macrophya ribis</i>	Tenthredinidae	Hymenoptera	common
<i>Malachius bipustulatus</i>	Malachiidae	Coleoptera	common
<i>Maniola jurtina</i>	Nymphalidae	Lepidoptera	common
<i>Megamelodes quadrimaculatus</i>	Delphacidae	Hemiptera	local
<i>Meligethes aeneus</i>	Nitidulidae	Coleoptera	common
<i>Merodon equestris</i>	Syrphidae	Diptera	common
<i>Metellina menzei</i>	Tetragnathidae	Araneae	common
<i>Metellina segmentata</i>	Tetragnathidae	Araneae	common
<i>Micaria pulicaria</i>	Gnaphosidae	Araneae	common
<i>Microlinyphia impigra</i>	Linyphiidae	Araneae	common
<i>Micromus variegatus</i>	Hemerobiidae	Neuroptera	common
<i>Microvelia (Microvelia) reticulata</i>	Veliidae	Hemiptera	common
<i>Misumena vatia</i>	Thomisidae	Araneae	common
<i>Monacha (Monacha) cantiana</i>	Hygromiidae	Pulmonata	common
<i>Myathropa florea</i>	Syrphidae	Diptera	common
<i>Myrmica ruginodis</i>	Formicidae	Hymenoptera	common
<i>Mystacides longicornis</i>	Leptoceridae	Trichoptera	common
<i>Nebrioporus elegans</i>	Dytiscidae	Coleoptera	common
<i>Nedys quadrimaculatus</i>	Curculionidae	Coleoptera	common
<i>Nemotelus pantherinus</i>	Stratiomyidae	Diptera	common
<i>Nemoura cinerea</i>	Nemouridae	Plecoptera	common
<i>Nemurella pictetii</i>	Nemouridae	Plecoptera	common
<i>Neosasia geniculata</i>	Syrphidae	Diptera	common
<i>Neosasia tenur</i>	Syrphidae	Diptera	common
<i>Neocoenorrhinus aequatus</i>	Rhynchitidae	Coleoptera	common
<i>Noterus clavicornis</i>	Noteridae	Coleoptera	common
<i>Notonecta glauca</i>	Notonectidae	Hemiptera	common
<i>Notonecta viridis</i>	Notonectidae	Hemiptera	common
<i>Nyctia halterata</i>	Sarcophagidae	Diptera	common
<i>Ochina ptnoides</i>	Anobiidae	Coleoptera	common
<i>Ochlodes sylvanus</i>	Hesperiidae	Lepidoptera	common
<i>Ochthebius minimus</i>	Hydraenidae	Coleoptera	common
<i>Oedemera lurida</i>	Oedemeridae	Coleoptera	common
<i>Oedemera nobilis</i>	Oedemeridae	Coleoptera	common
<i>Oligia fasciuncula</i>	Noctuidae	Lepidoptera	common
<i>Opilio parietinus</i>	Phalangidae	Opiliones	common
<i>Opilio parietinus</i>	Phalangidae	Opiliones	common
<i>Orchesella cincta</i>	Entomobryidae	Collembola	common
<i>Orius (Heteronius) laticollis</i>	Anthracoridae	Hemiptera	common
<i>Orthops (Orthops) campestris</i>	Miridae	Hemiptera	common
<i>Oxyloma (Oxyloma) elegans</i>	Succineidae	Pulmonata	common
<i>Pachygaster atra</i>	Stratiomyidae	Diptera	common

<i>Pachygnatha clercki</i>	Tetragnathidae	Araneae	common
<i>Paederus littoralis</i>	Staphylinidae	Coleoptera	common
<i>Paederus riparius</i>	Staphylinidae	Coleoptera	common
<i>Paidiscura pallens</i>	Theridiidae	Araneae	common
<i>Palomena prasina</i>	Pentatomidae	Hemiptera	common
<i>Panorpa germanica</i>	Panorpidae	Mecoptera	common
<i>Pantilius (Pantilius) tunicatus</i>	Miridae	Hemiptera	local
<i>Paracorymbia fulva</i>	Cerambycidae	Coleoptera	RDB 3
<i>Paradromius linearis</i>	Carabidae	Coleoptera	common
<i>Pararge aegeria</i>	Nymphalidae	Lepidoptera	common
<i>Pardosa amentata</i>	Lycosidae	Araneae	common
<i>Pardosa saltans</i>	Lycosidae	Araneae	common
<i>Pegomya solennis</i>	Anthomyiidae	Diptera	common
<i>Peponocranium ludicrum</i>	Linyphiidae	Araneae	common
<i>Phaedon armoraciae</i>	Chrysomelidae	Coleoptera	common
<i>Phaedon cochleariae</i>	Chrysomelidae	Coleoptera	common
<i>Pherbellia schoenherri</i>	Sciomyzidae	Diptera	common
<i>Philaenus spumarius</i>	Aphrophoridae	Hemiptera	common
<i>Philodromus dispar</i>	Philodromidae	Araneae	common
<i>Pholcomma gibbum</i>	Theridiidae	Araneae	common
<i>Pholidoptera griseoptera</i>	Tettigoniidae	Orthoptera	common
<i>Phratora vulgatissima</i>	Chrysomelidae	Coleoptera	common
<i>Phyllobius pyri</i>	Curculionidae	Coleoptera	common
<i>Phyllobius roboretanus</i>	Curculionidae	Coleoptera	common
<i>Phyllobius virideaeris</i>	Curculionidae	Coleoptera	common
<i>Phylloneta sisypbia</i>	Theridiidae	Araneae	common
<i>Phyllopertha horticola</i>	Rutelidae	Coleoptera	common
<i>Physa fontinalis</i>	Physidae	Hygrophila	common
<i>Phytomyza ilicis</i>	Agromyzidae	Diptera	common
<i>Pieris brassicae</i>	Pieridae	Lepidoptera	common
<i>Pieris rapae</i>	Pieridae	Lepidoptera	common
<i>Pinalitus cervinus</i>	Miridae	Hemiptera	common
<i>Pirata piraticus</i>	Lycosidae	Araneae	common
<i>Pisaura mirabilis</i>	Pisauridae	Araneae	common
<i>Piscicola geometra</i>	Piscicolidae	Rhynchobdellida	common
<i>Planorbis carinatus</i>	Planorbidae	Hygrophila	common
<i>Planorbis planorbis</i>	Planorbidae	Hygrophila	common
<i>Plateumaris rustica</i>	Chrysomelidae	Coleoptera	NS
<i>Platycheirus albimanus</i>	Syrphidae	Diptera	common
<i>Platycheirus rosarum</i>	Syrphidae	Diptera	common
<i>Platystethus arenarius</i>	Staphylinidae	Coleoptera	common
<i>Podops inuncta</i>	Pentatomidae	Hemiptera	common
<i>Pogonocherus hispidus</i>	Cerambycidae	Coleoptera	common
<i>Poophagus sisymbrii</i>	Curculionidae	Coleoptera	common
<i>Prasocuris junci</i>	Chrysomelidae	Coleoptera	common

<i>Propylea quattuordecimpunctata</i>	Coccinellidae	Coleoptera	common
<i>Psammoecus bipunctatus</i>	Silvanidae	Coleoptera	common
<i>Psyche casta</i>	Psychidae	Lepidoptera	common
<i>Psylla alni sensu stricto</i>	Psyllidae	Hemiptera	common
<i>Psylliodes affinis</i>	Chrysomelidae	Coleoptera	common
<i>Psylliodes chrysocephala</i>	Chrysomelidae	Coleoptera	common
<i>Psylliodes dulcamarae</i>	Chrysomelidae	Coleoptera	common
<i>Ptilinus pectinicornis</i>	Anobiidae	Coleoptera	common
<i>Ptychoptera contaminata</i>	Ptychopteridae	Diptera	common
<i>Pyrausta aurata</i>	Crambidae	Lepidoptera	common
<i>Pyrhosoma nymphula</i>	Coenagrionidae	Odonata	common
<i>Radix balthica</i>	Lymnaeidae	Hygrophila	common
<i>Rhagonycha fulva</i>	Cantharidae	Coleoptera	common
<i>Rhagonycha lignosa</i>	Cantharidae	Coleoptera	common
<i>Rhinoncus pericarpus</i>	Curculionidae	Coleoptera	common
<i>Rhizomnium punctatum</i>	Cinclidiaceae	Bryales	common
<i>Rhogogaster viridis</i>	Tenthredinidae	Hymenoptera	common
<i>Rhysobius litura</i>	Coccinellidae	Coleoptera	common
<i>Robertus lividus</i>	Theridiidae	Araneae	common
<i>Rutpela maculata</i>	Cerambycidae	Coleoptera	common
<i>Salpingus planirostris</i>	Salpingidae	Coleoptera	common
<i>Salticus scenicus</i>	Salticidae	Araneae	common
<i>Scathophaga stercoraria</i>	Scathophagidae	Diptera	common
<i>Scolopostethus thomsoni</i>	Lygaeidae	Hemiptera	common
<i>Sepedophilus littoreus</i>	Staphylinidae	Coleoptera	common
<i>Sesia bembeciformis</i>	Sesiidae	Lepidoptera	common
<i>Sialis lutaria</i>	Sialidae	Megaloptera	common
<i>Sicus ferrugineus</i>	Conopidae	Diptera	common
<i>Sigara (Subsigara) fossarum</i>	Corixidae	Hemiptera	common
<i>Sisyra nigra</i>	Sisyridae	Neuroptera	common
<i>Sitona lineatus</i>	Curculionidae	Coleoptera	common
<i>Sphaeridium scarabaeoides</i>	Hydrophilidae	Coleoptera	common
<i>Stenus canescens</i>	Staphylinidae	Coleoptera	Nb
<i>Stenus latifrons</i>	Staphylinidae	Coleoptera	common
<i>Stigmella aurella</i>	Nepticulidae	Lepidoptera	common
<i>Stratiomys potamida</i>	Stratiomyidae	Diptera	common
<i>Succinea putris</i>	Succineidae	Pulmonata	common
<i>Synanthedon bembeciformis</i>	Sesiidae	Lepidoptera	common
<i>Tachina fera</i>	Tachinidae	Diptera	common
<i>Tachyporus chrysomelinus</i>	Staphylinidae	Coleoptera	common
<i>Telmatophilus caricis</i>	Cryptophagidae	Coleoptera	common
<i>Telmatophilus typhae</i>	Cryptophagidae	Coleoptera	common
<i>Tetanocera arrogans</i>	Sciomyzidae	Diptera	common
<i>Tetanocera ferruginea</i>	Sciomyzidae	Diptera	common

<i>Tetragnatha extensa</i>	Tetragnathidae	Araneae	common
<i>Tetragnatha montana</i>	Tetragnathidae	Araneae	common
<i>Theridiosoma gemmosum</i>	Theridiosomatidae	Araneae	NS
<i>Thryogenes nereis</i>	Eirrhinidae	Coleoptera	common
<i>Tibellus oblongus</i>	Philodromidae	Araneae	common
<i>Triosa urticae</i>	Triozidae	Hemiptera	common
<i>Tytthaspis sedecimpunctata</i>	Coccinellidae	Coleoptera	common
<i>Valvata piscinalis</i>	Valvatidae	Pulmonata	common
<i>Velia caprai</i>	Veliidae	Hemiptera	common
<i>Vespula vulgaris</i>	Vespidae	Hymenoptera	common
<i>Volucella bombylans</i>	Syrphidae	Diptera	common

Appendix 2. Status categories for rare and Notable species

Red Data Book Category 1 (RDB 1) – Endangered

Definition.

Taxa in danger of extinction *in Great Britain* and whose survival is unlikely if the causal factors continue operating.

Included are those taxa whose numbers have been reduced to a critical level or whose habitats have been so dramatically reduced that they are deemed to be in immediate danger of extinction. Also included are *some* taxa that are *possibly* extinct.

Criteria.

Species which are known or believed to occur as only a single population within one 10 km square of the National Grid.

Species which only occur in habitats known to be especially vulnerable.

Species which have shown a rapid or continuous decline over the last twenty years and are now estimated to exist in five or fewer 10 km squares.

Species which are *possibly* extinct but *have been recorded this century* and if rediscovered would need protection.

Red Data Book Category 2 (RDB 2) - Vulnerable

Definition.

Taxa *believed* likely to move into the endangered category in the near future if the causal factors continue operating.

Included are taxa of which most or all of the populations are decreasing because of *over-exploitation*, *extensive destruction of habitat* or other *environmental disturbance*; taxa with populations that have been seriously depleted and whose ultimate security is not yet

assured; and taxa with populations that are still abundant but are under threat from serious adverse factors throughout their range.

Criteria.

Species declining throughout their range.

Species in vulnerable habitats.

Red Data Book Category 3 (RDB 3) – Rare

Definition.

Taxa with small populations in Great Britain that are not at present endangered or vulnerable, but are at risk.

These taxa are usually localised within restricted geographical areas or habitats or are thinly scattered over a more extensive range.

Criterion.

Species which are estimated to exist in only fifteen or fewer 10 km squares. *This criterion may be relaxed where populations are likely to exist in over fifteen 10 km squares but occupy small areas of especially vulnerable habitat*

Nationally Scarce Category A - Notable A (Na)

Definition.

Taxa which do not fall within RDB categories but which are none-the-less uncommon in Great Britain and are thought to occur in 30 or fewer 10 km squares of the National Grid or, for less well recorded groups, within seven or fewer vice-counties.

Nationally Scarce Category B - Notable B (Nb)

Definition.

Taxa which do not fall within RDB categories but which are none-the-less uncommon in Great Britain and are thought to occur in between 31 and 100 10 km squares of the National Grid or, for less well recorded groups, within eight and twenty vice-counties.

Nationally Scarce - Notable (N)

Definition.

Taxa which do not fall within RDB categories but which are none-the-less uncommon in Great Britain and are thought to occur in between 16 to 100 10 km squares of the National Grid. Species within this category are often too poorly known for their status to be more precisely estimated.

Summary of the IUCN categories and criteria.

GB Rarity Status categories and criteria

- **Nationally Rare (NR)**

Native species which have not been recorded from more than 15 British hectads since 31st December 1979 and where there is reasonable confidence that exhaustive recording would not find them in more than 15 hectads. This category includes species which are probably extinct.

- **Nationally Scarce (NS)**

Native species which are not regarded as Nationally Rare AND which have not been recorded from more than 100 British hectads since 31st December 1979 and where there is reasonable confidence that exhaustive recording would not find them in more than 100 hectads.

Other species status terminology.

- **Local.** Species that are restricted in distribution either geographically or by habitat. Also used for species that are widespread but infrequently encountered, e.g. encountered in no more than 300 10km squares of the national Ordnance Survey grid since 1970. Or those species listed as such, based upon modern geographical data, by ISIS (2010) and/or relevant recording schemes.
- **Common.** Generally widespread throughout the UK.

MILL LAKE, ANDOVER

Water Assessment and Management



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MILL LAKE

This report concerns Mill Lake, which forms part of the Rooksbury Mill, Local Nature Reserve, Andover, Grid Reference SU35599 44607. The lake is approximately 2.1ha (5acres), with an inlet on the north bank from the River Anton and outlet on the south west side of the lake. The lake has a mixed coarse fish population but is lightly stocked, with a limited amount of angling permitted. The lake is overwhelmed with fibrous blanket weed, some of which has been removed using a weed cutting boat, but the water surface has large areas of the nuisance algae. Barley straw has also been used to control the blanket weed growth, but the volume of weed has exceeded the capacity of the straw to affect it.

Water analysis

The water chemistry on the lake was assessed using electronic meters for dissolved oxygen, conductivity, total dissolved solids, pH and temperature, a Palintest 7100 photometer was used for chemical assay the results are given in Table 1.

Table 1. Water Analysis, Mill Lake

	Inlet	Outlet
Colour	Clear	Clear
pH	7.1	7.06
Total Ammonia (mg per litre as N)	0.01	0.05
Ammonia as NH^3 (mg per litre)	0.01	0.06
Ammonia as NH^4 (mg per litre)	0.01	0.06
Nitrite (mg per litre as N)	0.046	0.058
Nitrite as NO_2 (mg per litre)	0.151	0.191
Nitrate (mg per litre as N)	10.38	8.76
Nitrate as NO_3 (mg per litre)	45.98	38.8
Phosphate (mg per litre as P)	0.15	0.08
Phosphate as PO_4 (mg per litre)	0.44	0.24
Total Alkalinity (as calcium carbonate mg per litre)	277	286
Total Alkalinity HCO_3^-	338	349
Total Alkalinity CO_3^-	166	172
Redox (mV)	197	103
Total Dissolved Solids (g per litre)	0.26	0.26
Conductivity (mS)	0.52	0.52

Comments

The main area of concern is the nutrient content of the lake, comprising the nitrogen (nitrite and nitrate) and phosphate content which are causing the water to become eutrophic (nutrient enriched). Using a Trophic State Index, the water in Mill Lake falls

into the category of poor based on the nitrogen and phosphorous content. It is the concentration of these nutrients in the water which are promoting the growth of the nuisance *Cladophora* sp. (blanket weed).

In addition to the *Cladophora*, the dominant phytoplankton was the diatom *Synedra* sp., with small numbers of the Cyanobacteria (blue-green algae), *Lyngbya* sp. and some motile green algae, *Chlamydomonas* sp. The *Lyngbya* sp. was present in very low numbers, less than 10 per ml of water, which does not represent a health hazard, numbers in excess of 20,000 per ml are regarded as serious. I should also add that it is possible to find representative species of Cyanobacteria in most lakes in England.

Cladophora thrives in eutrophic waters, forming the extensive mats which are plaguing Mill Lake, which as they decay cause the water to become anoxic, affecting all freshwater life. This nuisance algae responds rapidly to changes in day length and as soon as the day length noticeably increases in late January, early February, it will start growing again. Although cutting the *Cladophora* is the best current means of control, the algae will grow from any fragments left in the water, which potentially causes the weed to proliferate.

Recommendations

1) Barley straw – In the presence of oxygen, the microbial decomposition of barley straw releases hydrogen peroxide, termed 'algae inhibiting factor', kills the algae. The application of barley straw is roughly 50g per square metre of water surface, ideally loosely packing the barley straw into Christmas tree netting or rafts (Figure 1). At temperatures of 10°C and below the barley straw will take about 6 – 8 weeks to release the algae inhibiting factor, at temperatures approaching 20°C the barley straw becomes effective within 2 – 3 weeks, with inhibition of algae lasting about 4 – 6 weeks depending on temperature. Ideally, the barley straw needs to be placed on the lake in late winter, January to February to inhibit the growth of the blanket weed. The best use of barley straw is to create a rolling programmes so that new batches of barley straw are added to the lake before the existing barley straw ceases production of the inhibiting factor. Always remove the expired barley straw as this also becomes subject to decomposition, becoming a further source of nitrogen in the water.

It may be worth creating a single line of barley straw sausages, crossing the lake from shore to shore rather than using circles and possibly rather than a line of sausages a couple of rafts at the inlet.

Rather than using plastic bottles, which are a little unsightly it may be better to using fishing net floats, which can be tied to the barley straw sausages or rafts. The following can supply the floats and the price to give you an idea, as you can see there is variation in price, associated with the weight of the float but worth an internet search:

www.collins.co.uk floats 0.36p each

www.advancednetting.co.uk 0.24p each

www.gaelforcemarine.co.uk 0.64p each

www.coastalnets.co.uk £6.50 per 10



Figure 1. Barley straw raft

2) Planting – Planting is the key to controlling nuisance algae as this is the best means of removing nutrients from the lake. It would be worth planting reeds, possibly common reed (*Phragmites australis*) on either side of the inlet of the River Anton into the lake. The reeds are extremely good at extracting nutrients and any potential pollutants from the water, as it enters the lake. Common reed can be very invasive and needs to be kept under control, I would certainly advocate cutting back the dead stems and flower

heads annually in the autumn. Planting the margins will also help to compete with the algae for available nutrients, fool's watercress *Apium nodiflorum* is a good marginal plant, grows early in the year, competing with the algae and produces white flowers for the insect life. There are already marginal plants on the lake and cuttings of these could be transplanted around the lake shores, this is best undertaken in the spring as the water is warming and allows the plants the summer months to become fully established.

3) Dead heading – All dead plant leaves, flowers and stems which drop into the water also add to the nitrogen and phosphate concentration, which dead heading can reduce but I'm not sure how much impact that might have on terrestrial insect life.

4) Siltex® - Siltex® is a champagne chalk and is excellent for controlling nuisance *Cladophora*, breaking down the organic deposits in the lake and effectively reducing the available nutrients. The use of Siltex® will often promote the growth of the macrophytes on the lake. The application rate is 1 tonne per 0.4ha (1acre), usually it is applied off a boat, to allow the propeller to mix it into the water, Kingcombe Aquacare would be able to undertake the work. The application of Siltex® may be piecemeal over a few years and it may be that treating just part of the lake adjacent to the inlet will have a significant impact on the growth of the *Cladophora*. Treatment is usually undertaken in the autumn or winter, as there is the possibility that as the Siltex® breaks down the organic material it can impact on the dissolved oxygen. The autumn winter are better as oxygen is more soluble in cold water. As a guide, one company charge £252 per tonne of Siltex® including delivery, however Kingcombe Aquacare may have a different source of champagne chalk other than the branded product.

5) Phoslock® - Phoslock® is an extremely effective product for stripping the water of phosphorous and controlling nuisance algae. The phosphorous is chemically locked into the sediment and therefore the algae are unable to grow, macrophytes are unaffected because the root system takes the nutrients from the sediment. It has been successfully used for natural swimming lakes and for treating the Serpentine in 2012 for the triathlon in the Olympic Games. While it sounds like the dream product, it is astronomically expensive.

5) Combination approach – although I have identified several methods of controlling the proliferation of *Cladophora* the best method is a combination. Even if you opt for

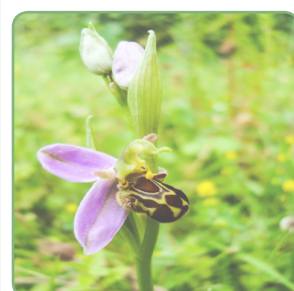
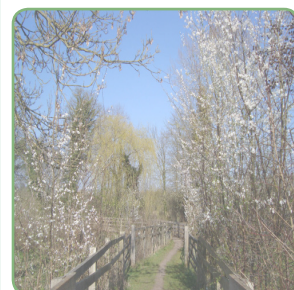
MILL LAKE

using Siltex®, it would be worth combining this with the use of barley straw, especially if the Siltex® is used to treat the lake piecemeal.

Finally, there is no such thing as a quick fix when it comes to the aquatic environment and whatever remedial action is undertaken, it may take several years before the best result is achieved, it may take a few years to finally achieve eradication of the *Cladophora*.

APPENDIX III

Parks & Countryside Event Guide 2022





Anton Lakes LNR, Andover

Grid reference: SU357466

Anton Lakes were formed as a result of gravel extraction. The lake outflow is the headwaters of the River Anton. The springs, lake, river and meadows around the edge of the site provide a mosaic of habitats, including chalk grassland, watercress beds and water meadows. Cattle now graze throughout the summer months and help to support the diverse range of wild flowers. Many birds can also be found on the lakes and streams including kingfishers and water rail.



Ladies Walk, Andover

Grid reference: SU369445

Located on the south eastern edge of Andover, Ladies Walk comprises of three moderately steep north facing meadows. The chalk grassland on site supports a diverse array of butterflies and other invertebrates, as well as vertebrates such as common lizards and slow worms. The meadows are grazed throughout the summer to improve their sward structure. The Ladies Walk which borders the site dates back to 1785.



Rooksbury Mill LNR, Andover

Grid reference: SU356443

Rooksbury Mill, also formed through gravel extraction and once a trout fishery, now plays host to a variety of wildlife including otters, water voles and kingfishers. Its mosaic of chalk grassland and riparian habitats provide a rich diversity of wildlife.

Harewood Common, Andover

Grid reference: SU357466

Comprising of nearly 10 hectares of chalk grassland, Harewood Common is rich in wildlife and provides a refreshing contrast to the nearby Urban Park. Originally an agricultural field, the common backs onto the ancient woodland of Harewood Forest and is managed through grazing during the summer months. This creates an ideal habitat for insects, birds and bats to thrive.

Ox Drove Meadow, Andover

Grid reference: SU357466

Comprising of just over three hectares of chalk grassland, Ox Drove Meadow is made up of a gently sloping path which encompasses the site. New trees planted around the site are helping to establish a robust hedgerow around its boundary which is important for the sites' inhabitants which include a wide variety of birds and insects as well as the Hazel Dormouse which makes the site its home.

Test Valley Parks and Countryside Team

The team work to maintain and develop the borough's green spaces which include countryside sites, Nature Reserves, parks and cemeteries.

Please contact the countryside officers in advance for more details.

Further information is available on www.testvalley.gov.uk

Or contact the the Countryside Officers on 01264

368000, or email community&leisure@testvalley.gov.uk

Local Conservation Groups

The Anton River Conservation

Association (TARCA)

A local volunteer group working along the River Anton Catchment in Andover. Established as part of the River Anton Enhancement Scheme. For more information contact: antonriver@live.com or visit: www.antonriver-conservation.org.uk

Parks and Countryside

Events and Activities 2022



North Test Valley



TestValleyBC



TestValleyBC

www.testvalley.gov.uk



Parks and Countryside Events and Activities Guide 2022

North Test Valley

Date	Time	Task	Venue	Meeting Place
Sat 8 Jan	10am – 2pm	Sycamore coppicing/ Tree guard Removal	Ox Drove Meadow	Lockbridge road play area car park
Sun 23 Jan	10am – 2pm	Tree planting	Ox Drove Meadow	Lockbridge road play area car park
Sat 5 Feb	10am- 2pm	Watercress bed maintenance	Anton Lakes LNR	Car park
Sun 20 Feb	10am- 2pm	Ditch/pond clearance	Anton Lakes LNR	Car park
Sun 6 Mar	10am- 2pm	Tree Guard Removal	Harewood Common	Car park at SP11 6TH
Sat 19 Mar	10am- 2pm	Big Litter Pick	Anton Lakes LNR	Car park
Sun 3 Apr	10am- 2pm	River Clean and site maintenance	Rooksbury Mill LNR	Car park
Sat 23 Apr	10am- 2pm	Big litter pick	Wickes Meadow	Car park (behind Wickes)
Sun 8 May	10am- 2pm	River Clean and site maintenance	Anton lakes LNR	Car park
Sat 21 May	10am- 2pm	Big litter pick river Anton	ASDA area	Car park behind ASDA
Sat 25 Jun	10am- 2pm	Bioblitz	Rooksbury mill LNR	Car park
Sat 23 Jul	10am- 2pm	Ragwort pull	Swatton Field	Charlton sports, gravel car park
Sun 7 Aug	10am- 2pm	Non-native species removal	Rooksbury mill LNR	Car park
Sat 3 Sep	10am- 2pm	20th Anniversary Wood fair	Valley park	Knightwood leisure centre
Fri 9 Sep	7:45 pm- 9pm	Bat walk	Anton Lakes LNR	Car park
Sat 24 Sep	7:15 pm- 8:30pm	Bat walk	Ox Drove meadow	Lockbridge road play sea car park
Sun 9 Oct	10am- 2pm	Orchard day	Rooksbury mill LNR	Car park
Sat 22 Oct	10am- 2pm	River bank cutting	Behind Asda store	Car park behind ASDA
Sun 6 Nov	10am- 2pm	Woody debris mattress creation	Anton Lakes LNR	Car park
Sat 19 Nov	10am- 2pm	Winter tasks	Rooksbury Mill LNR	Car park
Sun 4 Dec	10am- 2pm	Winter tasks	Rooksbury Mill LNR	Car park

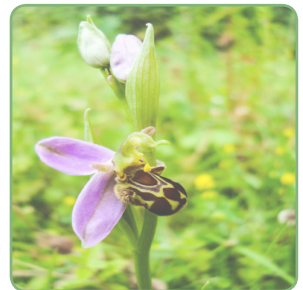
Important Note

The practical tasks that we carry out on our Green Spaces and Nature Reserves can be strenuous, tiring and involve the use of hand tools that some people may find challenging. Please inform the co-ordinator leading the event if you have any medical conditions or concerns that could be a danger to yourself or other volunteers working around you. We reserve the right to restrict your level of participation in certain circumstances. All children under the age of 16 must be accompanied by a responsible adult.

APPENDIX IV

**River Anton Enhancement Strategy
Action Plan**

2017 - 2027



River Anton Enhancement Strategy Action Plan 2017 – 2027

Strategic Priority – Ecological survey and monitoring along the Anton corridor / Information gathering						
Ref	Action	Justification	Lead Partner	Compartment / Zone	Measure	Deadline
1a	Continue annual bat survey from Charlton to Rooksbury Mill LNR	Support volunteers previously trained, provide training for new volunteers	TVBC/TARCA	Zone 1-6	Dataset updated annually 1 zone surveyed annually on rotation	2026
1b	Continue annual water vole survey from Charlton to Rooksbury Mill LNR	Support volunteers previously trained, provide training for new volunteers	TVBC/TARCA	Zone 1-6	Dataset updated annually. 1 zone surveyed annually on rotation	2026
1c	Expand use of Living record for data entry	Provide training for volunteers where necessary.	TVBC/TARCA		Establish dataset through living record	2017
1d	Continue annual mink survey for Charlton to Rooksbury Mill LNR	Support volunteers previously trained, provide training for new volunteers	TVBC/TARCA	Zone 1-6	Dataset updated annually. All zones surveyed annually.	2026

River Anton Enhancement Strategy Action Plan 2017 – 2027

Strategic Priority 2 – To identify ways in which the river and its biodiversity can be enhanced						
Ref	Action	Justification	Lead Partner	Compartment / Zone	Measure	Deadline
2a	Investigate land acquisition to improve habitat and access to the river corridor	To mitigate recent habitat loss in the catchment	TVBC	Zones 1-6	Land acquired at strategic locations	Ongoing but currently no sites identified
2b	Work with Anchor at Carters Meadow to improve management of river corridor	Improve linkage to habitat up stream involve volunteers and student groups	TVBC	Compartment 4	Complete work	2018
2c	Work with Lloyds to carry out river enhancements	Improvement to bankside and in channel habitats	All	Compartment 8	Complete work	2021
2d	Work with Andover College alongside redevelopment of Old Magistrates Court to enhance river habitat	Improvements to light levels and access to river	All	Compartment 9	Complete work	2021
2e	In channel works Andover Town Centre	Improve access to river and habitat linkage	TVBC/EA	Compartment 10	Complete work	2018
2f	Asist TARCA in creation of fish easement round Town Mill	Improve fish passage	TVBC/TARCA /EA	Compartment 10	Complete work	2018
2g	Removal of weir at Stannah and Pocket Park	Removal of water impoundment and free fish movement	EA	Compartment 9 and 12	Complete work	2026
2h	Marginal habitat enhancement at Charlton Lakes	Opportunities to improve water quality.	TVBC/EA	Compartment 3	Project completion	2021

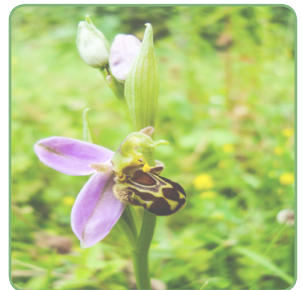
River Anton Enhancement Strategy Action Plan 2017 – 2027

Strategic Priority 3 – Education and awareness to public participation and develop public ownership of the scheme						
Ref	Action	Justification	Lead Partner	Compartment / Zone	Measure	Deadline
3a	Submit regular articles for publishing	Raise awareness of the importance of the river and the work of the partnership	All	All	1 release per 6 month	
3b	Use social media to promote works	To encourage greater awareness	ALL	All	Ongoing	
3c	Introduce trout in schools/mayfly in schools programme	Encourage awareness and tie in to ongoing site schools programmes	TVBC/TICP	All	Increased school participation annually	2026

Strategic Priority 4 – Coordinate improvements to existing access along the River Anton						
Ref	Action	Justification	Lead Partner	Compartment / Zone	Measure	Deadline
4a	Continue to promote the River Anton Way	Encourage awareness. Tie in with health walk scheme	TVBC	All	TBC	
4b	Bench installation	Increase opportunities to view or sit along the river	TVBC	All	3 Benches to be installed	2018

APPENDIX V

EDUCATIONAL VISITOR GUIDE



Rooksbury Mill Local Nature Reserve Educational Visitor Guide and Activity Sheets Habitats Landscapes Plant and Animal Lifecycles

Copies can be viewed at :

**[https://www.testvalley.gov.uk/communityandleisure/
naturereserves/free-activity-visit-schools-test-valley-nature-res](https://www.testvalley.gov.uk/communityandleisure/naturereserves/free-activity-visit-schools-test-valley-nature-res)**

Some comments from the Schools Nature Reserve Visit 2019

“The children really enjoyed the visit. Thank you for making it so enjoyable for them. We did some work on pond dipping and understanding of the journey of a river before our visit. We plan to follow up with work around habitats on our return to school.”

“Before our visit we did some work on animal classification and will continue this upon our return.”

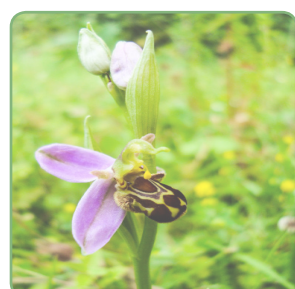
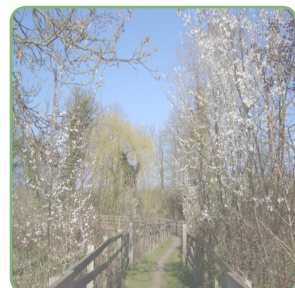
“A fantastic half day with patient and engaging leaders. It is great to visit sites in the local area that the children may visit with their family and give them a better insight into the nature and care need to support these places. Thank you for organising these events.”

APPENDIX VI

ANNUAL

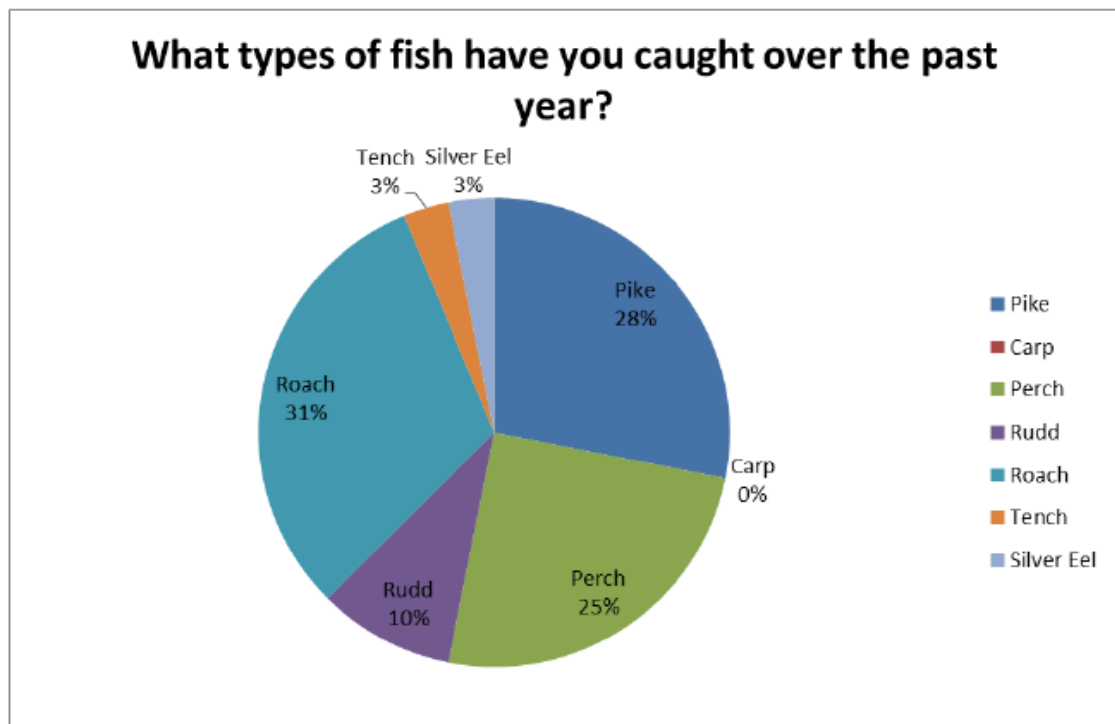
FISHING

QUESTIONNAIRE

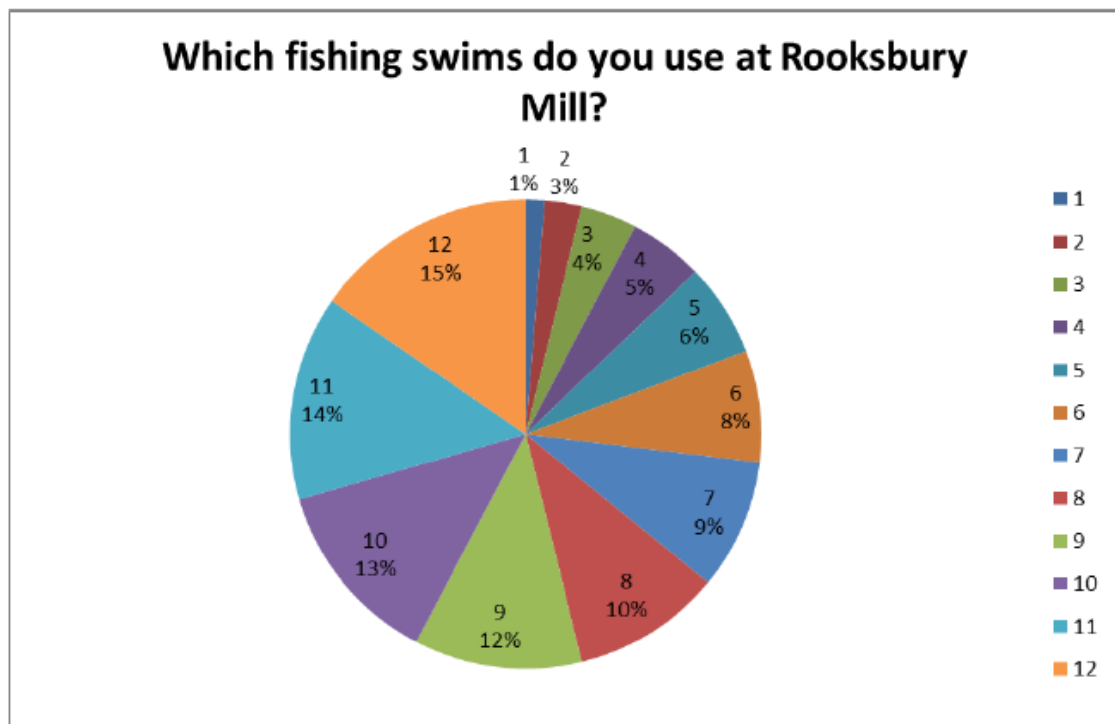


Rooksbury Mill Fishing Questionnaire Results 2018

Q1. What types of fish have you caught over the past year?



Q2. Which fishing swims do you use at Rooksbury Mill?



Comments

- Weed clearing boat needs to be used more often in the summer as lake can be unfishable due to surface weed. – Many fisherman commented on the weeds.
- 18 Cormorants on the lake! Eating lots of the fish can anything be done?
- Beautiful lake and wildlife.
- Fishing is good, lots of pike.
- Could a new rule be added – Anyone fishing for pike must be in possession of a large unhooking mat.
- There is a young guy who swims in the lake during the warmer weather around swim 3. He turned up and jumped in right next to me spoiling my fishing trip.