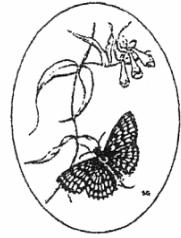


*South Essex
Natural History
Society*



Registered Charity No 231981



Photo by Jake Hayes, aged 10 years.

Jake took this photo on his mobile phone and is hoping that it will go towards his Scout's Photographer Badge.

Forest Schools

Taking a wildlife photograph today is possible to most people. It can capture a moment of exciting discovery like Toby's picture on our front cover here. A photograph is valuable in identifying a find. The Field Studies Council has published a superb series of educational leaflets on illustrating wildlife species. The one on the different kinds of UK species is excellent. Different types of ladybirds can be found on their own host plant species.

Nature walks, pressing wild flowers, collecting "things" are well remembered by some of us from our youth. But children today have been spending a lot of their time indoors. However, recently, emphasis is being placed on teaching children outdoors. Inspiration for this has come from Forest Schools which originated in Scandinavia. They were very successful in providing the way to explore and learn about the natural world. In the UK the take-up of this method is growing apace.

In the summer of 2010 Essex Wildlife Trust ran a Forest School Programme for Melbourne Park Primary School in Chelmsford, sponsored by M&G, one of their members. This took place in a park belonging to Chelmsford Borough Council. While woodland crafts figured in the sessions, together with, for example, creative weaves, shelter building and mud sculptures, the way is open to learn about the natural environment. They can develop a connection with and respect for it. Forest School Officers deliver Forest Schools across the County of Essex to children of all ages.

Jeanette Butler, at the school above believes that the children become much more willing to co-operate with each other in this child-led learning experience. Research has shown that there is a huge benefit in its effect on an individual's confidence, self-esteem, social skills and independence. It can also influence those with challenging behaviour to become more positive in their approach.

Most recently the staff EWT Forest School has linked up with the Southend Education Trust to deliver 'Awareness Raising Training' within local schools. This informs teachers about the opportunities for outdoor learning. It also encourages them to take the National Curriculum outside the classroom. These training courses pass on a range of activity ideas (all risk assessed) to use in the outdoors so that they can qualify to run their own Forest Schools.

The British Naturalists' Association was involved in 2009 with John Ball Primary School in Blackheath, in the London Borough of Lewisham. There,

an inspirational teacher, Beth Budden, secured a Royal Society Partnership Grant for equipment and travel expenses to bring scientists into school to work with children. Dr June Chatfield and Mr Tom Thomas, both of whom we have had the pleasure of welcoming as speakers at our indoor programme, led field investigations in a small wood within the school's grounds. All children in classes for Key Stages 1 and 2 of the National Curriculum (age ranges 7-11) had a chance to participate.

The Blake Shield Trust runs an award Scheme established by The British Naturalists' Association to encourage children and young people to take an active part in projects concerning natural history, conservation and the environment. This year Certificates of Merit were awarded to two Essex schools: Billericay School, for a project about "Mill Meadows" and Stewards School Science Specialists, Harlow for a project on "Stewards Ancient Meadow". Both schools are to be congratulated.

These examples show how the move to teaching in the outdoors is gaining serious support from The Royal Society, EWT, BNA, Southend Educational Trust and local government..

Report from Stuart Bailey, our Bird Recorder

A Night Heron, *Nycticorax nycticorax*, was seen on Two Tree Island and a Hoopoe, *Upupa ipops*, was seen on the RSPB site on Canvey



Hoopoe

Notes for Your Diary

Special Meeting of the Society at the Southend Central Museum on 16th June 2011 at 7.30 To decide the future of the Society.

A coffee morning 13/14 July with Don Down to discover what his moth trap has attracted overnight. Arrive around 10.30 am.

Roger Payne's Champion Tree

Roger Payne has grown a tree in his garden that occurs nowhere else in Britain or Ireland and it has consequently been registered as a Champion Tree by The Tree Register of the British Isles.

This remarkable tree, now almost the same height as the house and with a girth of 58cm at half a metre, is a Carob Tree, *Ceratonia siliqua*. Its natural home is the Mediterranean region, but also Iran, the Middle East, Portugal and probably the Canary Islands. It prefers dry, hot regions and is very drought and salt tolerant. Because of its edible pods it was planted throughout this region in ancient times but its true home may have been closer to Arabia where its only close relative grows. Seeds and charred wood have been discovered in Israel dated from before 4000BC and beans were found in a Roman house buried by ash in Pompeii.

So how come a Carob Tree is growing in our much cooler and sometimes, downright cold climate? Its seed was collected in southern Turkey sometime in the early 1900s and germinated in a pot. During cold winter snaps it was brought indoors, but mostly it was left outside to fend for



itself. Eventually, more than 10 years ago, it was planted outside in the south facing garden of Roger's terraced house in the middle of Westcliff-on-Sea. Here it was protected by the rear wall of the house and from the east by a wall of the adjoining property.

It has been thriving ever since, unaffected by diseases or pests, and is still growing, although it did suffer some leaf browning and a subsequently minor leaf fall after the winter of 2009/10 and a more severe browning of leaves and leaf fall in the winter of 2010/11 which has left the tree very badly damaged at the top but as most of the lower leaves are still green Roger says he is keeping his fingers crossed in the hope of future survival. However, considering this tree should not be growing at all this far north it is still amazing.

Carob trees are evergreen with dark green leathery leaves which cast deep shade. They belong to the Pea Family and produce, low down on the trunk, insignificant flowers which take almost a year to develop. They eventually

produce pods which are 12 inches long. However, so far, Roger's tree has shown no signs of flowering.

Carob pods (not seeds) are also known as 'St John's bread' because of the tradition that John the Baptist subsisted on them whilst he was in the wilderness. They are sweet and are still eaten, often as a substitute for chocolate.

One peculiar property of Carob seeds is that they are of equal size. Since they are of equal weight, the ancient Greeks used them to weigh gold and gem stones. Their name for the fruit of the Carob was 'keration' and it is from this name that we get the word 'carat', a measure of weight used for gold and diamonds. It has been standardised at 0.2g.

Adapted from an article which appeared in the Southend Museum Newsletter

Note from Don Down, Butterflies & Moths Recorder

Adela viridella, scop

During the warm sunshine over the week, 21st – 27th April, tiny moths, looking like small flies, have frequently been observed in our local woods. The species is a member of the family *Adelidea*, a small micro moth. The moth is named *Adela viridella*, scop. 14-15mm with Black head, rough-haired. Females also black with sparse yellowish hairs, very long antennae, bronzy green forewings.

Lava probably feed at fist on the flowers of oak, birch and afterwards on the ground in a flat case of leaf fragments fallen leaves.

The moth is very common throughout England. Males often dance in small, sometimes large, swarms after the manner of gnats, over the extremities of tree branches and the tops of small trees of birch and hornbeam probably in the presence of a fresh female.

Nematopogon swammerdamella, L

Small moths 17-21 mm; head tufted; with ochreous yellow hairs; antennae rather long; forewings pale straw; hind wings whitish with a slight purple tinge. Larva feed in leaf litter on the woodland floor. The moth is fairly common in late April and May.

Gunners Park walk *Sunday, 20th March 2011*

We had a very interesting walk surveying the flora and fauna of Gunners Park. The weather was kind to us and the following were identified:

PLANTS

Montia fontana, Blinks – this was the tiny plant with white flowers in a gorse clearing on the reserve that puzzled us. It has been recorded here before.

Stellaria neglecta, Lesser Chickweed.

Roger identified one other flower that was in bloom in the reserve from a photograph he took. This was Little Mouse-ear or *Cerastium semidecandrum*, a very early flowerer.

INSECTS

A possible Red Admiral flying over Gunners Park.

2 beetles swept from gorse flowers were *Exapion ulicis*, a weevil that feeds on gorse flowers and a few beetles about 2mm long which turned out to be *Micrambe ulicis* (Family Cryptophagidae) which also eats gorse flowers. *Exapion ulicis* has not been recorded from the reserve before.

Several Seven spot Ladybirds.

A few solitary bees including, *Andrena flavipes* on gorse, a *Nomada* sp. and a male *Andrena* sp. A few queen Buff-tailed Bumblebees were also seen.

After people left, Jim and I walked round to the old pond in Gunners Park. This had several clumps of frogspawn. On Coltsfoot flowers on the bank of the new course of the Shoe Brook I caught a Parasitic or Tachinid fly about the size of a bluebottle which turned out to be *Gonia picea*. The larvae of this fly mainly parasitizes caterpillars of the Antler Moth but has also been recorded as parasitizing Square-spot Rustic, Shoulder-striped Wainscot and Cabbage Moth.

Near the car park were several large poplars. On the bark I took some photographs of a Velvet Mite (Family

Trombididae). These are large quite conspicuous, bright red, velvety mites



which are predators.

Finally, whilst getting into my car I noticed a medium-sized weevil crawling on my jacket which was *Dorytomus longimanus* and which is found on poplar trees, so it must have dropped onto me from the tree.

BIRDS

A Kestrel was seen in a tree at the entrance. Other birds seen or heard were: Wrens, Robins, Blackbird, Common gull, Herring gull, Black headed Gull, Egret, Chaffinch, Greenfinch, Green woodpecker, Long-tailed tits, Dunnock

Roger Payne

Inter-Society Quiz 2011

On Wednesday 9th March at the Roman Catholic Church hall in Wickford, we engaged in battle with the other Natural History Societies of the area. Our Society was represented by Pat Wortley, Don Down, Clive Dunmow and Beryl Murfin. The questions were set by Roger Payne and posed by John Skinner as Question Master – and his decision was FINAL.

It was a most enjoyable contest with several rounds of mixed questions, a couple of beautifully photographed rounds of varied wildlife and mercifully, no fish.

The battle heated up as the cores of 3 Societies drew even closer. Finally the result was announced:

Basildon	56 points
Great Wakering	55½ points
Wickford	55 points
South Essex	41 points

Pat congratulated the winning team and thanked Wickford, our hosts, who put on a splendid feast for us all to enjoy. She literally threw down the gauntlet for next year, when South Essex will host the 2012 Quiz.

You might like to try your hand at the following selection from the questions which were posed:

- 1 What do Ransoms smell of?
- 2 What is the food plant of the Swallowtail butterfly in the fens?
- 3 When did the Little Egret first nest in Essex?
- 4 What is an operculum?
- 5 What is ringworm?

Winter Visitors

27th December 2010

As my wife and I walked back down Scrub Lane from shopping my wife spotted a Waxwing eating Hawthorn berries. We immediately stopped and counted 25 of them perched on an Oak tree opposite. They stayed for a while and eventually flew off.

15th January 2011

This Saturday morning was grey and blustery. I ventured into the garden and immediately heard a Tcheep, Tcheep sound. To my amazement when I looked up I counted 38 Waxwings perched on the telephone lines outside my house. My wife and I watched for about an hour from the comfort of our home. I have noted that Waxwings also feed on privet berries which are in abundance on the bush right along my back garden.

Clive Dunmow



21st February 2011

This Monday we had quite some excitement in the close. Returning from a shopping expedition we were amazed to see 40 plus waxwings on the telegraph wires attached to the single pole at the end of the road. They were swooping to and from a neighbour's cotoneaster bush. She is a member of the

Wildlife Trust and was just as thrilled as we were. Within about a quarter of an hour they had stripped the bush and flown away en masse. Unfortunately the day was very cloudy and any colour was difficult to see but luckily the tell-tale crest was unmistakable. It was certainly a sight for sore eyes!!

Olive & John Pickard.

Peregrine Update

I expect many of you have seen Southend's peregrine falcons on the roof or window ledges of Alexandra House opposite the library, and as I live nearby I keep a eye on them whenever I go past. They have perched there since at least 2007, and several casual observers have suggested they breed on the roof, although I have never seen that sort of behaviour myself, and assumed they were young birds not yet sufficiently mature. If breeding, I



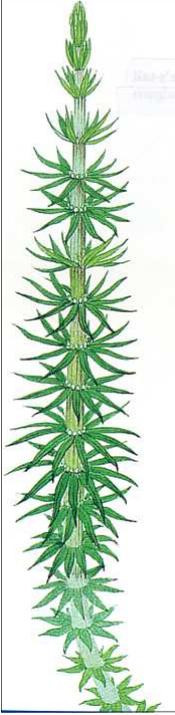
would have expected to see food items being brought in and young ones calling to parents at the appropriate times, or even hanky panky, but they have always ignored each other at opposite ends of the building. Last summer they both disappeared for several months which may have indicated a breeding site elsewhere. Now they are back, and at last showing interest in each other. On 12th February 2011 the smaller bird (Male) slowly flew round and buzzed the female, calling (kee kee kee kee). She took no obvious notice, but a few minutes later they left separately but in the same general direction (south west) which is towards a tall block of flats on the cliffs where they have been seen before. Perhaps that is the nest site.

Prey items have included woodpigeons (scavenged by magpies after a very cautious approach when the falcons aren't there). And the other day I found a carcass of golden plover in the museum garden, which I think could only have come from them, as although it smelled of fox I don't believe a fox could catch one on the mudflats, the nearest likely source, and carry it all that way.

All in all I think breeding this year is well on the cards.

Jim Bishop

Local Ponds



Jim Bishop gave us an inspiring talk based on his many years of experience studying ponds in the area. He provided interesting specimens under the microscope and photographs.

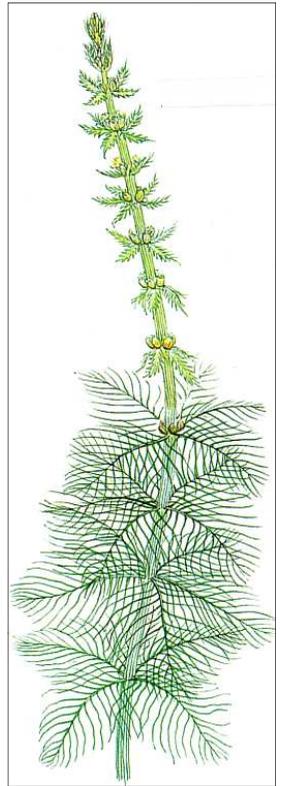
He cited examples such as those built by monks to breed fish for food; farm ponds to water the animals; village ponds to put out fires when houses were built of wood and thatch, and garden pond. He pointed out that one can also find ponds in expired gravel workings; old sawpits in woods; old bomb craters and even in the forks of trees. Some of these have now disappeared and he encouraged members to dig one in their garden.

The first things you see at a pond site will be willow and alder tree around the edge, water plants such as water lilies, various pond weeds, and water crowfoot and birds such as ducks, swans, geese, coots, moorhens and dabchicks and occasionally kingfishers as well as insects like damsel flies,

water boatmen, pond skaters, water scorpions and water beetles. In the spring you will find newts and frogs frantically breeding. The eggs of frogs are food for many predators such as ducks, magpies, newts, grass snakes and herons. There are also several kinds of molluscs, as well as crustaceans, worms and leeches.

Jim's special interest is the variety of pond life when viewed under a microscope. The classic one is the amoeba and he has also seen another classic, Hydra, but only in two ponds. Single celled animals are very common, and he mentioned *Vorticella*, *Stentor*, *Chlamydomonas*, *Peridium* and *Gymnodinium*.

There are single celled plants such as *Closterium*, and



Scenedesmus as well as *rotifers*, many celled transparent animals of three basic shapes. These have a common way of drawing in food by an array of beating hairs at the head end. His final group were the bacteria, which can only just be seen as spirals, rods or tiny dots.

Editors note:

A fuller version of Jim's talk will appear in the Journal. Those with web access or able to visit the local library it is well worth looking at www.microscope-uk.org.uk for scenes under the microscope.

Translocation of wildlife

We are all aware that professional ecologists regularly move wildlife from building sites etc to new locations, but perhaps are not aware of the scale.

Figures from the Thames Gateway Dubai Port Project show that last year the ecologists moved:

3,326 greater crested newts,	468 adders,
276 water voles,	353 grass snakes and
12,754 common lizards,	216,565 smooth newts.
4,041 slow worms,	

The original destination site was an airfield in Wiltshire but this became full and now the destination is the RSPB West Canvey Marshes site. However it is realised that with breeding it is possible that this site could also become full. Incidentally the dredging operations for Dubai Port are now about half completed.

Jack Tring

Olive and John Pickard with to say Thank you for the Editor, and all contributors to the Newsletters for making them such a pleasure to read.

Frederick William Frohawk (16 July 1861-10 December 1946)

F W Frohawk was an entomologist, zoological artist and lepidopterist who lived in the area for some years, so the talk by Dr June Chatfield, author of "F. W. Frohawk: His life and work" was particularly relevant.

He was born in 1861 at Brisley Hall, East Dereham, Norfolk, the son of a gentleman farmer, where his mother nurtured his interest in drawing and natural history which governed his later life.

The family moved to Great Yarmouth, then Ipswich, where after his father's death the family moved to Croydon. After attending school at Norwood College the family finances collapsed and he took up art as a profession, obtaining his first commission for illustrating the "Field". He made frequent visits to London Zoo to draw the animals.

He was elected Fellow of the Royal Entomological Society in 1891 and married Margaret Grant in June 1895, but she died in 1907, leaving him with two daughters. He married Mabel Jane Hart Bowman in 1909 and had a third daughter, Valezina; named after a form of the Silver Washed Fritillary Butterfly. Frohawk died on 10 December 1946 and was buried at Headley, Surrey.

There were several moves, typical of the period, including one year at Rose Cottage, Hockley in 1903, then Ashmount (now renamed), Crown Hill, Rayleigh until 1911 followed by Wallington, Surrey and then in 1917 to Thundersley. His home at Uplands in Goldfinch Lane, Thundersley has been demolished but locals remember its location, and he probably chose Thundersley because of the range of butterflies in the area.

He moved to Putney and was made a Special Life Fellow of The Royal Entomological Society in 1926. In 1927 financial problems forced him to sell his butterfly collection to Lord Rothschild for £1000 and this is now in the Rothschild collection at The Natural History Museum.

He published "Birds of the British Isles and their Eggs" with A G Butler, around 1898; a two-volume work "The Natural History of British Butterflies" in 1924; The Complete Book of British Butterflies

in 1934 and illustrated several other books.

His daughter, Valezina, later became Viscountess Bolingbroke and she wrote "I Remember" in 1988. However the unsuccessful marriage in 1950, ended in divorce two years later. The great passion of her husband Vernon was the study of entomology and his collection of butterflies and moths is now in the National Museum of Wales at Cardiff.

Editors note

The Bolingbroke family had a chequered past and possessed a debt-ridden, run down estate at Lydiard just outside Swindon. When the 5th Viscount died in 1899, it was revealed he had married late in life and had a 3-year old son, Vernon, who eventually became the 6th Viscount. He was also musically talented and played the organ, piano and violin. The estate was finally wound up and apparently he burnt unwanted antique furniture on the front lawn and donated two and a half tons of family archives to the wartime paper salvage campaign. The estate is now owned by Swindon Council and is open to the public. Vernon died at his home in Ringwood, Hampshire on 1 May 1974.

An Early Riser

Sunday 9th January 2011

The day started with frost all over everything and it was only 5°C indoors. Around midday the sun actually shone and if you could get out of the wind it was quite warm. When I finished watching my son's football match at the Burrows recreation ground the time was 2.30pm and you could feel it getting frosty again. As we



passed the WRVS hall I could not believe my eyes as I spotted a Red Admiral butterfly pass right in front of me! We watched for a few minutes as it tried to get under the eaves of the roof of the WRVS hall, but to no avail. You could tell it was trying to find another hibernation spot by the sense of urgency in its flight. **Red Admirals** cannot stand the cold and most are killed off, and we know how cold it has been. I immediately contacted Don Down and he said this was highly unusual considering the weather this winter. It probably was a lucky specimen in finding a good hibernation place. The tiny bit of warmth we had that afternoon brought it out of hibernation.

Clive Dunmow

Shield Bugs

Roger Payne gave us an excellent illustrated presentation on shield bugs, including slides of the Green, Hawthorn, Birch, Juniper, Tortoise, Gorse, Forest, Woundwort, Blue, Sloe, Dock leaf, and Bishop's Mitre shield bugs.

Adult shield bugs are attractive sap-sucking insects (not beetles), which also eat soft-bodied creatures like caterpillars and slugs. There are five different families, not necessarily related, and about 40 species in Britain. They show a wide variety of colours and patterns but the green shield bug is the most common one found in gardens. Many give off an unpleasant odour when disturbed, hence their common name of stinkbugs. Globally they can be found in such different habitats as Scottish heather moors, mangrove swamps and even deserts.



After mating, females lay their eggs in batches, often on a particular food plant and she sits over them for protection. When the nymphs hatch they huddle beneath the female and she protects them when they feed. Roger showed examples of how the nymphs may change colour several times before maturity.

They digest food using special bacteria inside their gut and the female smears a culture of these bacteria onto her eggs to pass it onto the nymphs when they hatch.



Answers to Inter-society Quiz

- | | |
|---|--|
| 6 | She doesn't – she gives birth to live young. |
| 5 | Fungus |
| 4 | Lid Snails use to close their shells |
| 3 | 2000 |
| 2 | Milk parsley |
| 1 | Garlic |



Special General Meeting 16th June 2011

Members are aware of our situation regarding the urgent need for more members, additional active Council Officers and Committee members.

We need your views by 5th June 2011 at the latest, especially if you are unable to attend the meeting on 16th June. So please post/email/telephone them to PAT with your offers of practical help. 3 Burlescoombe Leas, Southend-on-Sea, SS1 3QF: Email p.j.wortley@amservice.com Telephone: 01702 588115.

- (1) To facilitate the continuation of the Society we need to consider how we can recruit new Members, Officers and Committee members. Without sufficient Committee members we cannot achieve a quorum in order to make decisions on behalf of the Society. We have spent the last 3 years trying to recruit a General Secretary and an Outdoor Meetings Secretary without success. If sufficient help is not forthcoming by 16th June 2011 there is no way in which we continue to function as an independent society.
- (2) Regardless of whether we continue or not the Chairman, Pat Wortley, would like to seek approval to spend a proportion of the funds which have been donated in the Wills of previous members for the preparation and publication of a sequel to the book "Hadleigh Great Wood".
- (3) The Charities Commission is in ultimate control of our funds through the Trust Deed and the Trustees (ie the Council of SENHS). This means that if we the members were to dissolve the Society its remaining funds must be given to another charitable trust with similar aims/objects.