

Kent Botany 2011

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compiled by Geoffrey Kitchener web version 1 (Feb 2012)

Front cover: Anagallis tenella (Bog Pimpernel) at Sandwich, photo © Lliam Rooney, June 2011.

Introduction

This is the second annual report of botanical developments in Kent, published under the title of Kent Botany. It is issued primarily as a web version, maintained on the Kent page of the Botanical Society of the British Isles (BSBI) website, http://www.bsbi.org.uk/ and this should be regarded as the definitive version. However, a hard copy version is also being published by the Kent Field Club, as part of its Bulletin (2012), with slight differences in text and layout.

Co-ordination of Kent recording through the Kent Botanical Recording Group (KBRG) has continued. Group membership rose from 61 to 73 during 2011, the group being open to all with an interest in botanical recording in Kent. Newsletters were issued in February and August, and eight field meetings were held, at which plants new to East and West Kent were discovered.



Oare Marshes meeting. Photo: © Geoffrey Kitchener, October 2011.

One of the meeting highlights was a *Salicornia* (Glassworts) study session at Oare Marshes, led by the KBRG president, Eric Philp.

Extent of recording

By the end of January 2012, over 37,700 records for the period 2010-2011 had been entered onto the vice county recorder's Kent database (held on MapMate). About 24,000 represent input from January 2011 to January 2012, so approximately twice as many

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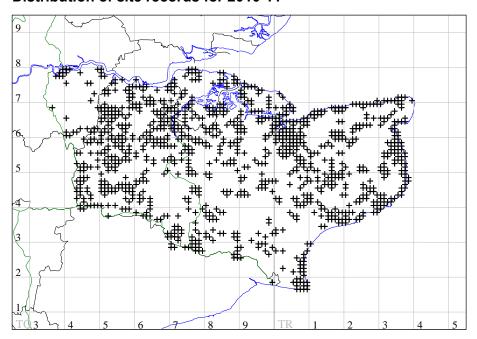
records have been entered in 2011 than in 2010. Records are forwarded to the Botanical Society of the British Isles, so that they contribute to their national database and can be viewed on-line as dots on a map.

By way of (random) example, here is shown the BSBI national map (accessed on 18 January 2011) for *Helminthotheca echiodes* (formerly known as *Picris echiodes*, Bristly Oxtongue) which ought to be fairly widespread (in Philp, 2010, it is recorded in 926 out of 1043 whole or part tetrads). Blue dots represent hectad records from 2010 onwards and in Kent we have some areas where only older records are present, but on the whole we are getting fairly well up to date (at least in comparison with many other counties, who should be able to

update purple dots to blue, unless there has been some change in distribution over time). Records have also been forwarded to Kent & Medway Biological Records Centre – over 37,700 for 2010-11 and a few earlier.

Many recorders have contributed records, more than can be acknowledged individually in relation to those findings which are published in this report, and thanks are due to them all. The expansion of general recording coverage may be illustrated by the sites (i.e. 1km squares) from which records have been received. The following map may be compared with the 2010 equivalent in Kent Botany 2010: there are many more sites, although mostly representing accretions to existing clusters of recording activity.

Distribution of site records for 2010-11



Areas showing comparatively little recording activity are metropolitan West Kent (although this corresponds with the priorities of KBRG and does not reflect some activity relating to the projected Flora of Greater London which has not reached the Kent database); the Weald running through to inland Romney Marsh; and some parts of north east Kent, albeit that these now have more records than in 2010. The existence of a recorded site is not, of course, a measure of how much may have been recorded at that site.

Rare plant register

General recording is a longer term priority, given that it is best aligned with the BSBI's date classes. The current date class is 2010-2019, and the recording of plants within that period enables comparisons to be made with earlier date classes (e.g. 1987-1999, 2000-2009) so as to recognise trends in plant distribution. This still gives reasonable time before 2020 to gather general records.

A higher priority is the gathering of data for a rare plant register (RPR), so that up-to-date data are available to assist conservation and research for the native plants and ancient introductions which may be under threat, whether nationally or locally. The draft list of rare plants on the Kent page of the BSBI website was updated several times in 2011 (so as to include also a version with English names added); and preparation of the individual species accounts has started. Drafts of the accounts of the first 22 plants (beginning with "A" or "B") were circulated to KBRG members in 2011 and have been revised, with the benefit of feedback, ready for uploading to the web by way of interim publication. The publication of drafts should encourage the further production of Kentish photographs and records, particularly as details of old sites will enable these to be re-investigated.

The number of RPR records, after two seasons recording, is 1762, of which 840 were 2011 records notified before the end of January 2012. The two years are broadly comparable, although with nearly 6% more records in the first year. The years may end up equating more closely, if further 2011 records are submitted; but in any event, it is to be expected that the "easier" records will be produced first, and the more elusive plants will take more time and effort. The plants with the most records for the years 2010-11 are much the same as for 2010 alone, although not in the same order. They reflect Kent's exceptional orchid flora: the county holds the greatest number of current sites in Britain for *Orchis anthropophora* (= *Aceras anthropophorum*, Man Orchid) and *Orchis purpurea*, Lady Orchid. They also reflect some of the special interest of north Kent coastal species, such as *Inula crithmoides* (Golden-samphire).

The most RPR records are held for *Poa infirma* (Early Meadow-grass: 68), *Orchis anthropophora* (Man Orchid: 65), *Cephalanthera damasonium* (White Helleborine: 63), *Orchis purpurea* (Lady Orchid: 58), *Inula crithmoides* (Golden-samphire: 52), *Cynoglossum officinale* (Hound's-tongue: 48) and *Ophrys insectifera* (Fly Orchid: 44).

Version 5 of the RPR list (coming into effect in 2012, after making the changes mentioned in this report) covers 263 taxa. Of these, 214 have at least one 2010-11 record, i.e. 81%. This is good progress, given the rarity or obscurity of many listed species.

Threatened Plant Project recording

One of the recording activities undertaken was the survey of sites nominated by the BSBI for monitoring the status of certain species. This activity was divided between various botanists

and three KBRG meetings were arranged so as to include surveys. The very dry spring affected the earlier species, and the meeting which covered *Silene conica* (Sand catchfly) at Littlestone found the populations of this annual diminished from the year before. This may also have been the cause of the absence of flowering *Neotinea* (=Orchis) ustulata (Burnt orchid), as all likely sites were considered without result: it seems not to have flowered at all in Kent in 2011, and the question arises as to whether it has gone. *Torilis arvensis* (Spreading Hedge-parsley) could also not be located, but it is a long time since this has been seen in the county.

Highlights of the 2011 plant records are:

- the probable return of *Crepis foetida* (Stinking Hawk's-beard) from national extinction
- the recognition of 24 new plants for East Kent and 6 for West Kent, including Fumaria reuteri (Martin's Ramping-fumitory), the second British record of Guizotia scabra, the alien subsp. intermedia of Lapsana communis (Nipplewort), Rhinanthus angustifolius (Greater Yellow-rattle), Salicornia emerici (Shiny Glasswort), Viola x scabra (hybrid between Hairy and Sweet Violets)
- the discovery in East Kent of Ranunculus arvensis (Corn Buttercup), two colonies
 of Scandix pecten-veneris (Shepherd's-needle) and a large population of
 Orobanche hederae (Ivy Broomrape)
- the appearance of *Orchis purpurea* (Lady Orchid) on the West Kent Greensand Ridge
- the "return" to Kent of *Juncus compressus* (Round-fruited Rush) and *Lythrum hyssopifolia* (= *L. hyssopifolium*, Grass-poly).



Viola x scabra at Queendown. Photo: © Lliam Rooney, March 2011.

Plant records: selection criteria and recorders

Plant records are those for 2011, or earlier finds notified since Kent Botany 2010 was prepared. The criteria for selection of records are flexible, but in general they focus on plants which are unusual in Kent, or where the plant's location, habitat or population characteristics are unusual. Preference is given to new finds, particularly those which do not correspond with a tetrad recorded in Philp (2010). Finds which are new to East Kent (vice county 15) or West Kent (vice county 16) are given in **bold**. Records of known populations of rare plant register species will in general be carried through for publication in the draft rare plant register, and not necessarily in these records. In West Kent, preference is generally given to records in the non-metropolitan area, given that an annual report is already published in The London Naturalist for discoveries within the area of coverage by the London Natural History Society.

Nomenclature follows the 3rd edition (first reprint) of Clive Stace's New Flora of the British Isles (Stace, 2011). Changes from Stace (2010) are set out in BSBI News **118**: 8-9. Plant names commonly in use but replaced by that edition are given in italics with an "equals" symbol (=).

Recorders and other persons mentioned in reports

AF Alan Ford AG Alfred Gay AP A. Parker	FR Dr. Fred Rumsey FS Francis Solly GH Georgina Hopkins	JPe John Pearce JR Julian Russell L&DH Lorna & Derek Holland	RM Richard Moyse RMB Rodney Burton RMw Roger Maskew
BB Brian Banks	GJ Dr Geoff Joyce	LM Dr Lesley Mason	RP Rosemary Pavis
BL Brian Laney	GK Geoffrey Kitchener	LR Lliam Rooney	RR Rosemary Roberts
BS Bob Smith	GT Gill Tysoe	LS Leonie Seymour	RW Roger Wright
CC Chris Cook	HS Heather Silk	MG Margot Godfrey	SB Sue Buckingham
CJC C. James Cadbury	JA Jan Armishaw	ML Mel Lloyd	SC Steve Coates
DG Doug Grant	JB John Badmin	MP Mike Porter	SL Stephen Lemon
DJ David Johnson	JC Juliet Cairns	MS Mary Clare Sheahan	TM Tim Rich
DJM David McCosh	JD John Dicker	OL Owen Leyshon	VE Val Eames
EGP Eric Philp	JF Jeanette Fryer	PR Paul Ripley	
EJC Eric Clement	JL Jacky Langton	RG Bob Gomes	
FB Fred Booth	JP Joyce Pitt	RJM Rose Murphy	

Thanks are due to all these; and to Charmian Clay for comments on the report presentation. Apologies to anyone whose name was accidentally omitted in the initial web version of Kent Botany 2010, since replaced (this replacement also corrected the compiler's mis-statement of a grid reference for *Galium pumilum* as TQ821621, rather than TQ812621).

Other abbreviations or notation

- BSBI = Botanical Society of the British Isles
- comm. = communicated by, or communication
- conf. = confirmed by
- det. = determined by
- KBRG= Kent Botanical Recording Group
- KFC = Kent Field Club
- KWT = Kent Wildlife Trust
- LWT = London Wildlife Trust
- MNE = Maidstone Museum herbarium
- NNR = National Nature Reserve
- OFC = Orpington Field Club
- pers. comm. = personal communication
- RNR = roadside nature reserve
- s.s. = sensu stricto, in the strict sense
- WFS = Wild Flower Society
- Plant records which are marked ^R represent plants on the draft Kent rare plant register list applicable at the end of 2011 (version 4). The marking [^R] indicates that the plant is being withdrawn from the register list.

Plant records for East Kent (vice county 15)

Agrimonia procera (Fragrant Agrimony). This species is very infrequent in East Kent and fell just short of qualifying for the rare plant register. A small group of plants was found on 21 July 2011 by SB near Littlebourne, TR20311 59055, additional to the records in Philp, 1982 and 2010.

Amaranthus hybridus (Green Amaranth). A large plant by a railway bank at Littlestone, TR072 241, was found on 20 September 2011 by OL, det. GK.

Ammi majus (Bullwort). A plant was found on 19 July 2011 by LR at a raised area next to next to a pond at Riverside Country Park, TQ80678 68441; it may have come from bird seed.

Anacamptis morio R (Green-winged Orchid).

- (1) Twenty flowering plants were seen in the middle of the Pond Field, Queendown, TQ8309 6285 (14 May 2011, DJ). The field has been under cultivation until recently, so such colonisation would have been out of character for a species regarded as an indicator of old unimproved grassland. However, hay from Marden Meadow has been spread there by KWT for a couple of years previously, so there is a degree of artificiality involved in this appearance, although revealing in the relatively short timescale in which the species has been established to flowering status.
- (2) Many plants recorded in a coastal cottage private garden between St Margaret's at Cliffe and Kingsdown, TR3785 4656 (5 May 2011, DJ) no public access, visible with binoculars.

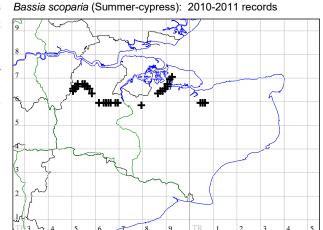
Anisantha madritensis (Compact Brome). A KBRG meeting on 11 June 2011 found this grass to be plentiful at the north end of Greatstone dunes, TR0823.

Artemisia absinthium (Wormwood). At Littlestone,TR086 252, by Madeira Road between the water tower and sea wall, where workers put down road kerbs in early 2010 and may have introduced the species, which is otherwise unknown in south east Kent (24 August 2011, OL, conf. GK).

Artemisia verlotiorum (Chinese Mugwort). A large patch was recorded by SB on 18 October 2011 on a bank in Pegwell Bay Country Park TR34184 63383, so that the disappearance of north east Kent records between the mapping in the two Kent Atlases (Philp, 1982 and 2010) may not actually represent a decline.

Astragalus glycyphyllos (Wild Liquorice). Recorded at Aldington, TR0537, by JP on 12 October 2011.

Bassia scoparia (Summer-cypress). Several more records have been added in 2011, and the current position for 2010+ records across both East and West Kent is shown by the map, where the species follows the M25, M20, A249 and A2. Further recording could no doubt increase the linkage between these sites, although there is some evidence that the species may come and go in relation to roadside locations. It is also susceptible to late season highway management activities.



Berberis x stenophylla (B. darwinii x empetrifolia). A well-established bush was found by LR on 21 April 2011 at TR00058 65574 on the Uplees Marshes, by a farm gate on waste ground behind the sea wall, quite remote and far from houses. Its presence here is not readily accounted for, and as the hybrid's seed is supposed seldom to come true, but to revert to one of the parents (Bean, 1970), a typical plant in the wild is likely to be an outcast or an old planting. This is a **first vice county 15 record**, if its established status is treated as sufficient.

Bidens cernua (Nodding Bur-marigold). Recorded by a marsh dyke, near Wittersham, TQ8872 2657, on 15 September 2011 by SB.

Bidens tripartita (Trifid Bur-marigold). Up to six plants were seen by OL on 21 September 2011 near Greatstone, TR0780 2177, on the north side of the causeway connecting the lake east shore to the Sound Mirrors bridge. The species is rare in East Kent, although the recorder notes that up to 15 plants were here 15 years before.

Buddleja globosa (Orange-ball-tree). One very large shrub reported by OL for 19 September 2011 at Greatstone Dunes, opposite Seaview Road, TR0822 2222, where it has been established on a dune ridge for at least 18 years. This appears to be a **first record for vice county 15**.

Cardamine bulbifera (Coralroot). An easterly extension of the populations which run to the north of the Sussex border, with four plants seen near the stream in Winser Gill, Rolvenden, TQ84986 32284, under oak, beech and hornbeam and two more in a similar habitat at TQ85004 32298, all recorded on 9 May 2011 by SB.

Carex canescens (=curta) ^R (White Sedge). The only record given by Philp (2010) for Kent (TQ93X) was close to a tetrad boundary, and further investigation by JA, LR and SB on 24 May 2011 revealed c. 40 plants across the boundary in Orlestone Forest at TQ98230 36005. These were on the margins of a shaded woodland pool and also on islands made of peat-covered tree roots, and were in addition to 10 plants found within monad TQ9835 of TQ93X.



Carex canescens at Orlestone Forest. Photo: © Lliam Rooney, May 2011.

Carex strigosa (Thin-spiked Wood-sedge). This sedge of damp woodlands was recorded by JP on 19 May 2011 in Nine Acre Wood, Benenden, TQ8233, and on 9 June 2011 in Comb Wood, Wittersham, TQ8928.

Catabrosa aquatica ^R (Whorl-grass). Plants were seen on 21 July 2011 by SB forming rafts on margins and in centre of North Stream near Northbourne from the foot bridge at TR34474 53248 to TR34532 53000, the stream having been dredged in last two or three years.

Ceratochloa carinata (California Brome). This grass, sometimes grown as a sileage crop, was found by a KBRG meeting on 22 June 2011 scattered along arable field margins above the Lydden-Temple Ewell NNR, TR2845.

Chenopodium hybridum (Maple-leaved Goosefoot). Several observations have been made of this species in 2011, all characterised by recent ground disturbance. It was noted on 30 June 2011 by GK near Manston airport, where ground had been disturbed for a realignment of the A299 at TR31243 65740 (and also by SB on disturbed ground nearby, at Laundry Road, TR31253 65622, on 24 October 2011), and on an earthbank at TR31638 65596. LR encountered the species on recently disturbed soil at a former chicken farm at Perry Wood, TR0456, on 21 August 2011; and on disturbed soil on waste ground behind School Farm near Faversham, TQ0361 on 15 September 2011.

Chenopodium quinoa (Quinoa). Numerous plants were recorded over a 50 metre stretch of disturbed, apparently dumped soil on the south side of the A20, east of New Shelve Farm, Lenham, TQ91903 51595, by SB and LR on 9 September 2011. The likely origin appears to be seed for game birds associated with wherever the soil came from.

Conyza floribunda (= C. bilbaoana) (Bilbao's Fleabane). First noted as abundant by a path alongside colliery spoil slopes at Fowlmead Country Park, TR3595 5371, by GK on 18 August 2011, and may well be more widespread there, given the extent of open terrain offering scope for colonization. **First vice county 15 record.**

Cotoneaster bullatus (Hollyberry Cotoneaster). Recorded by GK on 22 March 2011 as a presumed bird-sown escape at Berengrave nature reserve, TQ82108 67075, a small tree 3 metres high in woodland on chalk.

Cotoneaster franchetii (Franchet's Cotoneaster). Young plants on wall tops in Conyngham Rd and (Minster Abbey) Church Street, Minster, TR3164, were seen on 30 June 2011 by GK.

Cotoneaster lacteus (Late Cotoneaster). Occasional bushes scattered up the steep chalk grassland hill slope of Oldpark Hill, Dover, TR2943, an area with a remarkable abundance of Cotoneasters and other naturalized shrubs and trees which may well disappear with KWT's proposed management plans (10 March 2011, GK).

Cotoneaster salicifolius (Willow-leaved Cotoneaster). A medium sized shrub on the scrubby chalk slope of Oldpark Hill, Dover, TR29885 43418, noted on 10 March 2011 by GK.

Cotoneaster x suecicus (Swedish Cotoneaster). A large patch with seedlings on the chalk slope above the road at Oldpark Hill, Dover, TR29838 43402, seen on 10 March 2011 by GK.

Cotoneaster vilmorinianus (Vilmorin's Cotoneaster). A single bush was found in August 2010 by TI in grassland on shingle on the lower edge of raised soil imported some years previously to provide a stable foundation for the road to the lifeboat station at Dungeness, TR0918. Material was sent to JF (BSBI referee for *Cotoneaster*), who stated that it had features of *C. vilmorinianus* or dwarfed *C. mairei* and that anther colour



would distinguish. TI's previous observations confirmed anther colour as violet, which would discount *C. mairei* (anther colour: white). This Chinese shrub has been in cultivation under various names since around 1920, but is by no means common; there are very few records of it as an escape in Britain. **First vice county 15 record.**

Cotoneaster vilmorinianus at Dungeness. Photo: © Tim Inskipp, May 2011.

Crepis foetida, seed heads at Lyddon-Sea. Photo: © Brian Banks, July 2011.

Crepis foetida (Stinking Hawk"s-beard). This was regarded as extinct in Britain from 1980, last recorded at Dungeness, and has since been the subject of reintroduction programmes. In consequence of this artificial intervention, it is not possible to be absolutely certain of the status of any appearances away from introduction sites.

However, a site at Lydd-on-Sea, TR0819, was discovered in July 2010 (although plants have apparently been present for



some years without having been recognized) which is much closer to any location at which native plants have been previously recorded (the nearest being some 440 metres away), than to any reintroduction site. There was also a report in 1989 of a finding within 50 metres of this site which, however, could not be traced by EGP at the time.

These are persuasive pointers towards continuity of existence of *C. foetida* despite its supposed extinction.

There were estimated to be over 2000 plants in 2010, although partly in an area which it was not considered politic to survey closely. Most plants were growing on grassland on heavily modified shingle, incorporating much fine material, and subject to some disturbance, including scarifying or mowing. It appears likely that the plants are responding positively to this level of intervention.

Its associates include *Echium vulgare* (Viper's-bugloss) and *Papaver rhoeas* (Common Poppy), also plants appreciative of disturbance. This account is based on information kindly supplied by BB and the discovery will be considered in more detail in the rare plant register, to which the species is being transferred, from the "probably extinct" list.

Cynodon dactylon (Bermuda-grass). A street weed for about 1 metre along the north edge of Southwall Road, Deal, TR3696 5270 (18 August 2011, GK). This grass has not been seen in vc15 for many years before.

Cyrtomium falcatum (House Holly-fern). One plant of this hortal fern was seen in the sheltered habitat of a drain in front of former Swan public house in the High Street, Appledore TQ956 295, by PR on 25 October 2011.

Datura ferox (Angel's-trumpets). A small plant was found on 13 September 2011 by GK in Sheppey, on a weedy verge at the junction of Sheppey Way and Ferry Road, TQ 9259 7050. This is a **first vice county 15 record**.

Descurainia sophia (Flixweed). This declining archaeophyte is still present at Sandwich, as in Philp (1982) but not Philp (2010), seven plants having been seen by SB on 23 May 2011 on a sandy trackside in TR3559 and 300 to 400 more on the golf course in TR3560. It also appeared as a backstreet weed in Whitstable, TR108 668 (15 May 2011, JB).

Echinops bannaticus (Blue Globe-thistle). Recorded by a KBRG meeting on 16 July 2011 as an escape at Walmer, TR37888 49702.

Echium plantagineum (Purple Viper's-bugloss). Discovered by a KBRG meeting on 11 June 2011 as present on the shingle of Littlestone Green, TR0824, with *E. vulgare*.



Elytrigia x drucei (= E. x oliveri, the hybrid between Common and Sea Couch). A hybrid which may well be overlooked along sea walls and similar habitats, recorded on 22 August 2011 by LR at Shellness, TR0567 (conf. SB & GK).

Elytrigia x drucei at Shellness. Photo: © Lliam Rooney, August 2011.

Epilobium hybrids. Good data now exist for these hybrids in Kent, with 55 records having been made in 2010-2011. In contrast, the newly published enormous Flora of Bedfordshire (2011) carries only three post-1975 records, although that county has the same willowherbs. The following willowherb records were made by GK unless mentioned otherwise:

Epilobium lanceolatum x ciliatum (hybrid between Speared-leaved and American Willowherbs). Present on 28 August 2011 at Fowlmead Country Park, TR3613 5387, where there is the most extensive population of *E. lanceolatum* that the recorder has seen in Kent. The former colliery spoil here provides an open habitat favourable to colonization. **First vice county 15 record.**

Epilobium x mentiens (hybrid between Square-stalked and American Willowherbs). This cross was also at Fowlmead Country Park, where there were several plants scattered along the scrubby edge to the cycle track at

TR3653 and two plants at TR3583 5376, on 18 August 2011. At Winterbourne near Boughton was a further plant in a damp open sandy area, TR0657 5749, noted by GK and LR on 27 July 2011.

Epilobium x palatinum, hybrid between Hoary and Square-stalked Willowherbs). Also present in Fowlmead Country Park, TR3554, on 18 August 2011.

Epilobium roseum [^R] (Pale Willowherb). This species was placed on the draft rare plant register, on the basis that only three Kentish tetrad records were published in Philp (2010), exhibiting a dramatic decline from the 54 records given in Philp (1982). It appears that this decline has been over-estimated, and the records added in 2011 are sufficient for the species to be removed from the register. Most of these additional records were in urban habitats, particularly at pavement edges and the junction of pavements and walls where there is water runoff. These habitats are susceptible to local authority street-cleaning and weedkiller application, but the species seems fairly resilient. It is possible to recognise the species in leaf, due to the impressed veins on the upper surface coupled with a cuneate base and long pedicel, but the flowers, being white in bud and maturing pink, are also distinctive, so that it ought not to be overlooked. Most 2011 records were for West Kent. However, it was seen in East Kent in two places:

- (1) Numerous plants for c. 20 metres along the retaining wall on the south side of Station Road, Maidstone East Station (TQ7596 5619) together with occasional plants at the foot of neighbouring walls, seen on 21 June 2011.
- (2) One plant as a street weed in Southwall Road, Deal, TR3652 (18 August 2011).

Epipactis purpurata (Violet Helleborine). Nine plants at Crockham Woods near Dargate, TR077609, were recorded by LR on 20 August 2011.

Eranthis hyemalis (Winter Aconite). A series of sightings by SB: naturalized on the edge of a field at Court Lodge Farm, West Farleigh, TQ7153, on 5 February 2011; TQ89762 55430, naturalized as a patch about 12 x 15 metres in woodland grown up from an old abandoned garden at Wrinsted Court on 8 February 2011; and (seen with LR) a well-established colony by Hillside Road, Stalisfield Green, TQ96410 52839 on 9 February 2011.

Erodium moschatum (Musk Stork's-bill). Following the listing of new sites in Kent Botany 2010, this taxon is being removed from the draft rare plant register list. A further vc15 site has been identified: several patches

along the grass road-verge by garden walls at Taylor Road, Lade, from junction with Toby Road westwards, TR0820, seen on 14 April 2011 by GK and LR.

Erophila glabrescens from Hockley. Photo: © Lliam Rooney, March 2011.

Erophila glabrescens (Glabrous Whitlowgrass). There are only three tetrad records listed in Philp (2010), and recorders have generally found this taxon quite challenging, given the difficulty of finding plants matching its description when Erophila verna s.s. (Common Whitlow-grass) is present and so widespread. There are also areas of potential overlap of characters, in that both species may have



petals bifid halfway or sparsely hairy stems (and hairs can be lost with age, anyway). In addition, although *E. glabresecens* usually has longer petioles in relation to the lamina, it is not always easy to see where lamina ends and the petiole begins; and the lamina:petiole length ratio can overlap. However, the following records were received:

- (1) Dungeness, TR0818 and TR0917, 2011, TI.
- (2) Abundant minute plants all over the dunes at Littlestone, TR08895 26770 and TR08774 26368, on 9 March 2011, L&DH.
- (3) By large stones on imported gravel/shingle by the roadside at TQ98074 55511, Hockley, near Throwley, on Stalisfield Road, just before it reaches Church Road and Kettle Hill Road (11 March 2011, LR).

Euphorbia characias subsp. veneta (= subsp. wulfenii) (Mediterranean Spurge). Seen on 31 March 2011 by LR at Graveney, TR05019 62157, on the railway embankment to the west of Head Hill Road bridge just before it turns into Seasalter Road. It has been established for quite a few years and has spread considerably.

Euphorbia oblongata (Balkan Spurge). An occasional escape which had been noted in Kent Botany 2010 as appearing to be a first vice county 15 record when found by a KBRG meeting at Romney Warren in 2010. However, when EGP was preparing material for inclusion in MNE in 2011 an earlier specimen came to light, collected on 22 July 2008 by EGP from a neglected area by the site of an old mill in the River Len valley at Maidstone, TQ766 556.

Euphorbia x pseudovirgata (Twiggy Spurge). Another introduced spurge, this having been recorded by DG at Borstal, TQ7266, on 19 May 2011.

Filago minima (Small Cudweed). Recorded as widespread by JP on 21 July 2011 at Fowlmead Country Park, TR3453, TR3553 and TR3653, where the former colliery spoil provides an open, sharply drained habitat as a substitute for the sandy substrates on which it is usually found in Kent. Filago vulgaris R (Common Cudweed) is also common throughout the Park (GK, 18 August 2011).

Frankenia laevis R (Sea-heath). Many matted plants on low chalk cliffs above the promenade at Westgate-on-Sea, TR329 705, probably at least for 30 metres, were seen by SB on 2 January and 23 June 2011, the latter visit revealing that this is a rampant escape from a cliff top flower bed, rather than a recurrence of historic records on the Kent north coast.

Fumaria capreolata (White Ramping-fumitory). Recorded at Dungeness, TR0818, by TI on 31 July 2011.

Fumaria reuteri at the A299. Photo: © Brian Laney, June 2011.

Fumaria reuteri (Martin's Ramping-fumitory). associated with roadworks in relation to the improvement of the A299 near Manston airport were discovered by BL in June 2011 for this taxon, new to vice county 15 and to Kent generally and conf. by RJM (BSBI referee).

On 11 June 2011 it was recorded by BL at TR31173 65723, growing at the base of a south facing bank on the south side of the A299 by Mount Pleasant roundabout. When seen by GK on 30 June 2011 it was on semi-bare ground, with the recently graded slope carrying its first germination of a weeds such as Chenopodium album, Fumaria officinalis, Galium aparine, Mercurialis annua, Polygonum aviculare agg and Sonchus oleraceus. Also on 11 June 2011, BL recorded the species at on a south facing road slope of the A299 at TR32577 65513. When seen by GK on 30 June 2011, the grass sown on the embankment had scarcely germinated, but there was an associated weed flora of Chenopodium album, Galium aparine, Mercurialis annua, Papaver rhoeas, Polygonum aviculare agg, and Sinapis arvensis. On 19 June 2011, the fumitory was also recorded by BL as at TR31986 65627, on a wide disturbed strip between airport and the north side of the A299.

The evidence points to *F. reuteri* being amongst the first plants to germinate once the reconstructed road had been laid out and seeded. RJM refers to sightings in other counties where there is a probable association with foreign seed. There is also a pattern of recent expansion, with (from 2008 to mid-2011) three new sites having appeared in the Isle of Wight, two in Hampshire, one in Surrey and

demonstrated or ruled out, it is proposed to place the species on the draft county rare plant register.

three in Scotland. Given that F. reuteri is a native taxon and that foreign introduction to Kent, albeit very likely, cannot be definitely Galium pumilum R (Slender Bedstraw). For the second year running, investigation of sites with records from

1986 has shown that G. pumilum still survives as a Kentish plant. It was seen on a KBRG meeting on 22 June 2011, assisted by SB who had found it in flower shortly before, and was present on the Lydden NNR at TR27721 45252, spread over about 2 square metres of west-facing grazed downland slope, in an area dominated by tor-



grass. Surprisingly, it was in fruit only, whereas on the next day the Purple Hill population (see Kent Botany 2010) was both in bud and in flower.

Galium uliginosum ^R (Fen Bedstraw). This scarce Kentish plant was the subject of several sightings in 2011. First, it was recorded by JP on 19 May 2011 at Nine Acre Wood near Benenden, TQ8233. Then, on 17 July 2011, a KFC meeting at Gibbin's Brook found plants along the edge of a large drying-out pond at TR11683 38732 and scattered over the fen part of a fenced area between TR11590 38611 and TR11584 38555. The final location was between Egerton and Stonebridge Green, at TQ917 489, where on 13 September 2011 JL recorded 25 clumps in an area of c. 1.5 square metre of a boggy grazing meadow by the River Stour. This location, first found by JL in 2008, bore an interesting flora, notable also for the presence of *Carex disticha* (Brown Sedge) and *Oenanthe fistulosa* ^R (Tubular Water-dropwort).



Galium uliginosum near the River Stour. Photo: © Jacky Langton, September 2011.

Galium x pomeranicum (hybrid between Lady's and Hedge Bedstraws). Two plants of this cross were seen in cliff top chalk grassland at St Margaret's at Cliffe, TR37602 45551, on 4 July 2011 by SB.

Genista monspessulana (Montpellier Broom). One bush in an alleyway between the Street and St. Paul's Road at Boughton, TR06422 59093, was found on 17 May 2011 by LR. There is evidence of garden throw-outs and rubbish in the vicinity, which may point to the origin of this plant. Subject to status, this appears to be a **first vice county 15 record.**

Geranium x oxonianum (Druce's Crane's-bill). An escape found near Borstal, TQ7266, on 19 May 2011 by DG and in rough vegetation at Mount Pleasant, Minster, TR3127 6556, on 30 June 2011 by GK.

Gladiolus communis subsp. byzantinus (Eastern Gladiolus). Recorded near Borstal, TQ7266, on 19 May 2011 by DG.

Glaucium flavum (Yellow Horned-poppy). A remarkable red flowered form at TR36482 57410 on the foreshore at Sandwich Bay, seen by ML on 5 June 2011. Subsequently examined critically by SC, confirming that this was indeed a variant, and not the Red Horned-poppy (Glaucium corniculatum). There were five plants within about ten yards of each other, in an area otherwise populated by the normal yellow-flowered form.



Glaucium flavum at Sandwich. Photo: © Mel Lloyd, June 2011.

Gnaphalium sylvaticum ^R (Heath Cudweed). Two colonies recorded by JP on 13 September 2011 in Wichling Wood, TQ914 558 and TQ912 555, in a recently cleared open ride on acid soil on plateau terrain, with associates Agrostis capillaris, Aphanes sp., Cerastium fontanum, Galium saxatile, Mentha arvensis.

Guizotia scabra (Vis.) Chiov, A single plant of this African species appeared in a garden at Sandhurst, TQ812 282, in July 2011, apparently from bird-seed, although *Guizotia abyssinica* (Niger) is the usual bird-seed alien. This is a **first vice county 15 record**, tentatively det. from a specimen by SB and later conf. by EJC, who states "2nd British record (1st one N. Hants, 2010)".

Helichrysum italicum (Curry-plant). Dungeness, TR0816, seen by TI on 3 July 2011 as an escape near the new lighthouse in a tetrad other than that given in Philp (2010). The species grows in several gardens along the coast road and copes with a shingle substrate.

Himantoglossum hircinum ^R (Lizard Orchid). Three rosettes were reported by GT as present in March 2011 on the central reservation RNR at Lydden Hill, TR25379 46127, within two metres of the carriageway. Whilst they appeared unlikely to come to flower, the species has flowered in a similar location in 2007, although not recorded since until now.

Hippuris vulgaris ^R (Mare's-tail). A patch about 3 x 4 metres in a wet marshland meadow near Deadmill Bridge, Wickhambreaux, TR23306 59938, recorded on 26 April 2011 by LR. Also reported by OL, several plants being present in a ditch near Brack Pump Station between Fairfield and Snargate, TQ97027, where they were understood to have been seen by BB in 1989 and 1993, perhaps the only location for Romney Marsh.

Hypericum hircinum (Stinking Tutsan). Abundant in varying sizes over cleared development site at West Minster, Sheerness, TQ9073 (3 March 2011, GK) – the plant's goatish odour was very evident when a sample was grown on for identification.

Hypochaeris glabra ^R (Smooth Cat's-ear). Twenty plants were discovered by EGP and DG on 12 May 2011 at the Dungeness ARC pits, TR064 198, thus extending southwards the known county distribution of this rare species.

Isolepis cernua ^R (Slender Club-rush). Further confirmation of the presence of this species in the county (originally found by CJC, as mentioned in Philp, 2010): a tussock recorded by RG on 30 June 2011 in a shallow, senescent ditch crossing a grazing marsh field west of the Great Wood at Worth Minnis, TR3426 5579. The bottom of the ditch held some shallow water and was in places poached by cattle that were grazing the field at the time. Conf. EGP.

Jasminum officinale (Summer Jasmine). Established over 30 metres of scrub on a south east facing chalk slope at Dover Western Heights, TR31191 40505; recorded on 24 September 2011 by SB - this garden shrub does not seem to have been remarked as having got away on its own account so thoroughly before in East Kent, and appears to be a **first vice county 15 record**.

Juncus compressus (Round-fruited Rush). Treated in Philp (2010) as a taxon which could be extinct in the county, happily it has been found, in some quantity, at the Seasalter Levels in several marshy (but not brackish) hay meadows by CJC and AP on 6 July 2011. Two fields, at TR0850 6413 and TR0809 6416, held 1-10 plants; another, at TR0842 6429. held 101-300 plants; and a third, at TR0878 6421, held 11-100. All four fields also held Carex divisa (Divided Sedge); and the three last mentioned contained some Oenanthe silaifolia (Narrow-leaved Water-dropwort). With this record, the rush transfers from Kent's "probably extinct" list to the draft rare plant register.

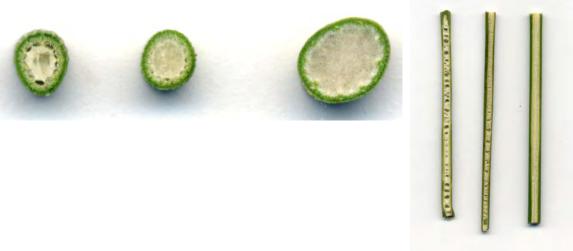
Juncus x diffusus at Hernhill. Photo: © Lliam Rooney, October 2011.

Juncus x diffusus (hybrid between Soft and Hard Rush). A couple of vc15 records are given in Philp (1982), but otherwise this hybrid appears not to have been recorded in East Kent for some time. Two clumps were discovered by LR on 25 October 2011 at Mount Ephraim Farm, Hernhill,



TR06873 59893 – more may have been present, but a more extensive examination was not undertaken. The hybrid plants resembled the *Juncus inflexus* parent in general habit, but the stem colour was the grass-green hue of *Juncus effusus*. The stems bore 27 fine longitudinal ridges, intermediate between *J. inflexus* (12-18) and *J. effusus* (40-90), and their pith was variably continuous or slightly interrupted (cf. *J. inflexus*, interrupted; *J. effusus*, continuous).

Juncus x diffusus from Hernhill. Photos: © Lliam Rooney, October 2011. Transverse and longitudinal sections of stems of (left to right) *J. inflexus*, *J. x diffusus* and *J. effusus*.



Lavandula angustifolia (Garden Lavender).

Recorded at Boughton, TR06255 59007, on 30 June 2011 by LR, with many self-sown seedlings growing through pavement cracks and along the kerbside, mostly outside the garden containing the parent plant(s), but some further away. LR also recorded this plant on 26 September 2011, looking quite established on the kerbside of Preston Lane, Faversham, TR01456 60849, with no other lavender plants in view. Special attention was given to distinguishing the finds from the hortal hybrid, *L. x intermedia*, even though the latter is now considered to be usually sterile and so normally likely only to be found as planted or as a throw-out. The position regarding older lavender records is complicated by the first two editions of Stace's New Flora of the British Isles having regarded the hybrid as the usual garden lavender, as fertile and as the usual source of naturalized plants. With that qualification, it appears appropriate to treat the June 2011 sighting as **the first vice county 15 record**.

Lilium martagon (Martagon Lily). One flowering lily with one rosette (another present earlier) was seen on a woodland ride just outside the KWT reserve Joan Beech Wood, Rhode Common, TR06201 56571, on 4 June 2011 by LR. The probable origin was waste from a garden opposite the ride.

Linaria maroccana (Annual Toadflax). This garden escape, native to Morocco, was recorded in hundreds on the shingle opposite (seawards) 123-124 Coast Drive, Lade, TR085 204, in 2009 by OL, det. EGP. This was the first vice county 15 record.

Luzula x borreri (hybrid between Southern and Hairy Wood-rushes). This cross was found with its parents in Blean Wood near Dargate, TR0860, on 27 April 2011 by JP.

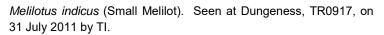
Lythrum hyssopifolia (= L. hyssopifolium, Grass-poly). This rare (nationally, Endangered) and inconspicuous native annual has long been absent from Kent. The last record is given in Philp (1982) as 1913, although a single plant by the Medway near Aylesford was recorded by Cyril West in 1941 (Botanical Society & Exchange Club of the British Isles Report for 1941-42, 12:489). The species has now returned to the county, to Fowlmead Country Park, TR35287 54067,where JP found it in 2010, although its identity was not then confirmed (there is a look-alike, the Mediterranean species Lythrum junceum, False Grass-poly).

The site was visited by SC on 6 August 2011, and confirmation obtained following subsequent visits (ditch flooding presented difficulties). There were 83 plants of around 8 cm high, mostly with spent flowers, and about another 30 smaller ones in a congested clump, some of which were developing flowers. The plants were in a ditch, in an area of mud and stones submerged from time to time, beside an inlet pipe which brings water from the car park and consequently keeps this part free of larger vegetation. When viewed by GK (18 August 2011) associates were *Agrostis stolonifera*, *Apium nodiflorum*, *Atriplex prostrata*, *Epilobium hirsutum*, *Juncus*

articulatus, Persicaria maculosa, Plantago major, Potentilla reptans, Pulicaria dysenterica, Rumex conglomeratus and Tripleurospermum inodorum.

The origin of this occurrence is obscure. There are no historic records here which might suggest a seed bank; Stace (2010) refers to casual records from birdseed, but use of such seed here has not been identified. In the absence of any clear non-native origin, it is proposed to add this species to the rare plant register.

Lythrum hyssopifolia at Fowlmead. Photo: © Steve Coates, August 2011.



Mentha x verticillata (Whorled Mint). A colony by a forest ride near Sissinghurst, TQ81855 37004, was recorded on 7 September 2011 by SB.



Mirabilis jalapa (Marvel-of-Peru). One yellow-flowered plant, recorded by OL on 19 September 2011 as having appeared for at least the last six years alongside the fence and railway track at the junction of Queens Road and the railway line at Littlestone, TR0736 2470. In Stace (2010) the species is said rarely to persist for a few years. First vice county 15 record for this garden escape.

Moenchia erecta (Upright Chickweed). This was recorded on 14 April 2011 by GK and LR as growing on a tussock between Lydd Road and Lydd Ranges, TQ9918, where vc15 projects into the administrative county of East Sussex.

Muscari neglectum (Grape-hyacinth). The usual garden Grape-hyacinth (and hence the usual garden escape) is *M. armeniacum*. However, British Floras were long unhelpful as regards identification and even Clapham, Tutin & Moore (1987) referred only to *M. neglectum* and *M. comosum*. Hence Philp (2010) states that "Past records of *M. neglectum* almost certainly belong here" [under *M. armeniacum*].

It should not be taken, however, that *M. neglectum* (native in East Anglia) is absent in Kent: it is obtainable from bulb suppliers as a garden plant, and as a garden plant it can escape. Having noted naturalised plants at Greatstone in 2010 with flowers turning blackish-blue as they faded and the curious smell of *M. neglectum*, GK encouraged investigation of these and similar plants in 2011, from which it appears that this species is not uncommon. The records listed below vary in status between established plantings to flourishing escapes and outcasts. However, whatever the position regarding any historic sightings, it is clear that this species should be treated as being the subject of a **first vice county 15 record**.

- (1) Noted as well established on the roadside bank that divides the main street and the access road to the on street houses, Boughton, TR06010 59336 to TR06114 59296 by LR on 30 March 2011. Understood not to be a formal council planting, and so derived either from throw-outs or informal planting.
- (2) Recorded by LR on 5 April 2011 at Staple Street, TR05799 60191, on a grassy bank, naturalising, although probably originally planted.
- (3) Present at the junction of Whitstable Road (B2040) and Graveney Road, Faversham, TR02644 61030. Faversham, on the grass verge looking established (5 April 2011, LR).
- (4) One plant seen at Church Road, Oare, TR00737 63348, by LR on 6 April 2011 growing on the grass road-verge opposite a garden where in cultivation, so assumed to be an escape.



- (5) Scattered plants on the roadside verge of Hatch Lane as it joins the Ashford Road (A28), Chartham, TR10638 55337. On the opposite side of the road is a garden with countless *M. neglectum* plants and so the roadside plants appear to be garden escapes (12 April 2011, LR).
- (6) A patch 5 x 4 metres recorded by GK and LR on 14 April 2011 (also seen by GK in 2010) in a grassy/shingly area west of Derville Road, Greatstone, TR080 213, with much *M. armeniacum* naturalised as well. A resident informed the recorders that Natural England had indicated an intention to have all aliens in this vicinity cleared up.

Muscari neglectum at Greatstone. Photo: © Geoffrey Kitchener, April 2011.

Neottia nidus-avis ^R ((Bird's.nest Orchid). The assessment of Philp (2010) was that this (nationally) Near Threatened species appeared to have declined quite seriously in recent years. The following records (all by AG) help to clarify how far this may be the case in East Kent, although numbers of orchids flowering generally in 2011 seem to have been adversely affected by the dry spring:

- (1) Three spikes seen at Covet Wood, TR185 487 on 5 May 2011; AG reports that it was more abundant in the past according to some people who know the site well.
- (2) Four spikes found on 10 May 2011 at Knowle Wood, Kingston, TR195 505, where a small colony under birch and hornbeam coppice usually numbers about 20 spikes in a privately owned wood with a permissive path.
- (3) Four spikes recorded on 24 May 2011 in Long Wood in Denge Woods, TR086 531, near a track under hornbeam and hazel, quite near to the entrance to the reserve at Broadham Down.
- (4) Five spikes seen on 25 May 2011 at Down Wood in Denge Woods, TR086 524, on either side of the footpath also close to the KWT reserve. This colony lies under hornbeam in an area with a not particularly chalky substrate, with sparse ground flora and little leaf litter accumulation.

Nepeta x faassenii (Garden Cat-mint). Recorded on 23 June 2011 by OL on the south side of Lade car park, TR086 208, at the edge of a concrete base where it has been established at least since 2009.

Oenanthe silaifolia ^R (Narrow-leaved Water-dropwort). Mentioned in Philp (2010) as present in damp grazing marshes at Seasalter in TR06X, but it is more extensive than this, since recorded by LR on 31 May 2011 as present in hundreds through a wet grazing meadow located from TR09024 63861 to TR08814 63928 as well as scattered in straight wet gullies across a nearby meadow off Seasalter Lane at TR0964 and TR0864. This last sighting probably overlapped that by CJC and AP given under *Juncus compressus* (above).

Orobanche hederae ^R (Ivy Broomrape). The couple of tetrad records given in Philp (2010) were doubled in 2011 by two further reports. Two spikes were found on 30 June 2011 by JP at the edge of secondary woodland at Betteshanger, TR3152. At Kingsgate Castle, TR396 704, however, there is a large and well established population of about 600 spikes, reported by SC, as at 4 August 2011. This latter colony is in a small area of woodland by a road junction, and along the nearby roadside and on the cliff top across the road, all publicly accessible areas. It was apparently first seen by FS in 1986 with seven spikes; the population remained fairly constant until around 2001, when it began to expand.

Paeonia officinalis (Garden Peony). Reported by TI as seen in 2010 as one long-established plant growing in long grass and scrub at the north end of the Long Pits, Dungeness, TR0718, far from any existing habitation. There are no other garden escapes nearby but there are big slabs of building material broken up and dumped on the edge of the pit - perhaps remains of a building related to excavations in the 1920s. It flowered in 2006, but not in 2010. **First vice county 15 record** for this garden escape.

Papaver pseudoorientale (Oriental Poppy). A plant found by LR with GK on 2 June 2011 on a soil heap in a field above Lydden NNR, TR2745, remote from housing.

Petasites hybridus (Butterbur). Seen by LR on 31 March 2011 near Waterham on a roadside at TR07035 62041 and in the adjoining waterlogged field, scattered to the end of the field at TR07020 62110.

Petasites japonicus (Giant Butterbur). This vigorous butterbur was seen well naturalized with some 150



inflorescences on the banks of the Nailbourne at Nargate Street by Wickhambreaux water mill on 6 March 2011, TR21431 58101, by JA. **First vice county 15 record.**

Petasites japonicus at Wickhambreaux. Photo: © Lliam Rooney, March 2011.

Pinus nigra (Austrian or Corsican Pine). One young tree was seen in scrub developing on a steep chalk slope, Oldpark Hill, Dover, TR2943, on 10 March 2011 by GK.

Plantago major subsp. *intermedia* (Greater Plantain). This coastal subspecies was recorded by GK on 9 June 2011 in a damp, saline area towards ditches landward of the sea wall at Elmley Marshes, TQ9467 and on 18 August 2011 in damp bare patches, on an apparently acidic substrate at Fowlmead Country Park, TR3568 5397.

Poa infirma ^R (Early Meadow-grass). Twenty-nine further Kentish records were made in 2011, a good result for an inconspicuous early grass. The 2010 recorded distribution (as given in Kent Botany 2010) was extended, in particular by finds at Birchington, Dover, Grain (vc16), Ramsgate, Sheppey and Whitstable (vc15). The two most surprising records were well inland: SB's discovery on 24 February 2011 of the grass on a gravelly footpath leading onto Stodmarsh NNR from Grove Ferry car park, TR23415 62902; and GK's record on 31 March 2011 of plants scattered along c.8 metres of the hedge side of the A20 footway near the junction of Ashford Road and Goddington Lane, Harrietsham, TQ8594 5270, growing with *P. annua*.

Polygonum oxyspermum subsp. *raii* ^R (Ray's Knotgrass). About 20 plants by the inner slipway area at Herne Bay, TR176 684, were reported by JR for 30 July 2011. The recorder raises the possibility of introduced sand at this location; however, the species has a reputation for being erratic in its appearances.

Polypogon monspeliensis ^R (Annual Beard-grass). Somewhat surprisingly, a large plant present near a bridge over the Stour at Canterbury, TR136 571, was found by JB on 27 June 2011 (det. GK). Perhaps more to have been expected would have been *Polypogon viridis* (Water Bent), still spreading, and in East Kent recorded by DG on 24 October 2011 near Eccles, TQ7360; by SB on 31 October 2011 on wet mud at the margin of the Great Stour near Chartham; and recorded by GK on 18 August 2011 as a Deal street weed, near the station (TR374 525) and at South Wall and Southwall Road (both TR3652).

Potamogeton polygonifolius (Bog Pondweed). A KFC meeting recorded this taxon at Gibbin's Brook, TR1138, on 17 July 2011 (comm. JP).

Potentilla argentea ^R (Hoary Cinquefoil). A "Near Threatened" taxon with only four tetrad records in Philp (2010), including TR15Y near Littlebourne. The Littlebourne area carries more than this, as SB on 21 July 2011 found it abundant on a dry sandy bank from TR20311 59055 to TR20370 59085, as well as 12 plants on sandy grassland at TR20330 59019.

Potentilla recta (Sulphur Cinquefoil). Three plants of this garden escape were recorded on 29 June 2011 by LR as growing on a grassy bank just off the Medway Bridge (M2) along a cycle path just before the crossing, TQ72664 66658.

Puccinellia fasciculata ^R (Borrer's Saltmarsh-grass). Seen on 16 August 2011 by SB at Samphire Hoe, TR28595 38703 – it was growing on top of a concrete sea defence, away from its main north Kent distribution areas.

Ranunculus aquatilis (Common Water-crowfoot). This water-crowfoot (by no means "Common" in the county) was present on mud around the margin of a shallow pool near Sandway, TQ89146 50756 on 26 July 2011 (SB).

Ranunculus arvensis ^R (Corn Buttercup). Listed in Philp (2010) as reduced to one site in the county, this Critically Endangered taxon was found on 13 May 2011 by HS in a further locality, near Broad Oak, Mersham, TR040 386. There were at least 5 plants on a public footpath through a hayfield, mown shortly afterwards (and so preventing further observation that year).

Ranunculus arvensis at Mersham. Photo: © Heather Silk, May 2011.

Raphanus sativus (Garden Radish). Recorded on disturbed, apparently dumped soil on the south side of the A20, east of New Shelve Farm, Lenham, TQ919 515, by SB and LR on 9 September 2011, associated with plants used in seed for game birds.



Rosa agrestis ^R (Small-leaved Sweet-briar). The only record of this rare rose listed in Philp (2010) is estuarial, by the Swale, but on 19 July 2011 two further small bushes were discovered by LR in a comparable locality at Horrid Hill, TQ81086 68884 and TQ81096 68890 (an apt location, given the latin *horridus*, prickly). Both were close to sea level, one in coastal rocks and the other nearby, in rough vegetation by a coastal path. Identity was confirmed by RMw (BSBI referee).



(cf.) Rosa mollis at Kingsdown. Photo: © Steve Coates, August 2011.

(cf.) Rosa mollis (Soft Downy-rose). In August 2011 SC found two fruiting roses by Kingsdown golf course, which he tentatively determined as *R. mollis*, a species which in Kent is very far south of its native range. However, Philp (2010) refers to 19th century specimens in the Natural History Museum collected from this area; and with this in mind SB collected samples on 31 August 2011 from TR37628 47189 and TR37672 46362 for determination by

RMw's view was that the specimens, very robust and with large hips and leaflets, appeared to be a form of *R. mollis*, which could never be native here and appeared to be similar to a form found on the north coast of Scotland!

This was not a final determination on his part, however. The continental species *R. villosa*, although specifically ruled out in that determination, also might require consideration.

Following research by SB, it transpires that there is not only a Natural History Museum specimen collected by G.C. Druce in 1919 from St Margaret's, but also three others at the Oxford University Herbaria – one collected by Druce with Mrs Davy in 1903 from the same location and the others collected by the Rev. H.E. Fox in 1916 on the undercliff between Kingsdown and St Margaret's Bay. They were all originally named *Rosa pomifera* (the name, "apple-bearing rose" reflects the dark red and very large fruits). In Flora Europaea, this name is treated as a synonym of *R. villosa* (not a British species). To complicate matters further, *R. villosa* has itself sometimes been treated as a synonym of *R. mollis*.

The Rev. A.L. Primavesi examined the Oxford material in 1993 and, with reservations as to its adequacy, and querying the possibility of a garden rose, concluded that if it was *R. mollis*, then it was an escape. Similarly, in 1990 he considered the Natural History Museum specimen to be "R. cf. mollis – specimen inadequate".

So we now have quite a long history of roses in this area very much like *Rosa mollis*, but not native where found, and with the possibility that the current plants are bird-sown descendants of those which were discovered by Druce in the neighbourhood a century ago (or perhaps the source has been a local nursery or garden). RMw states that he is not aware of any cultivars of this species having been planted anywhere for landscaping, although nothing would surprise him. It may be that it was regarded as garden-worthy long ago; but Bean (1980) refers to *R. mollis* as a poor substitute in cultivation for *R. villosa* (in that work not treated as synonymous with *R. mollis*) which latter taxon has long been cultivated in the British Isles.

Rosa x pseudorusticana (hybrid between Field-rose and Short-styled field-rose). Found by LR, material was collected on 27 July 2011 for identification from a hedgerow bush by Dawes Road between Boughton-under-Blean and Dargate, at TR07690 60001. Both putative parent species, *Rosa arvensis* and *R. stylosa*, were present within 2 metres, and this plant had a hybrid appearance, with abortive hips present. Styles had partly dropped - earlier than nearby R.stylosa which still held them, but not as early as nearby R.arvensis which had dropped them. The bush had the trailing habit of R.arvensis, but the domed hip discs of R.stylosa. RMw confirmed this material as hybrid, probably not an F_1 hybrid as a lot of backcrossing had apparently taken place in this locality. **First Kentish, and vice county 15, record.**

Rosa x pseudorusticana at Dargate. Photo: © Lliam Rooney, August 2011.



Rumex x dufftii (hybrid between Broad-leaved and Wood Docks). One plant was recorded on 2 June 2011 by GK on a roadside wood margin near Stockbury, TQ8330 6046.

Rumex maritimus ^R (Golden Dock). This was confirmed for the first time on Sheppey, by a sighting by GK on 9 June 2011, by the road between Straymarsh Farm and Elmley Nature Reserve, TQ93383 69031, of one plant at a cattle-trampled depression in the grazing marshes. A search was made near the road on 13 Sept 2011, from which it appears that the dock is quite widespread in this habitat, including dyke margins. Three fruiting plants were present at the original location; four plants were recorded at TQ93316 69525, two at TQ9292 7027, two at TQ93300 69490, two more at TQ93296 69905, c.80 plants (mostly rosettes) at TQ93316 69800 and more at TQ93297 69883.

Rumex x pseudopulcher (hybrid between Curled and Fiddle Docks). Two plants were seen by a KBRG meeting (det. GK) on 11 June 2011 in sandy coastal grassland near Grand Parade, Littlestone, TR08313 23978, with parents present.

Rumex x sagorskii (hybrid between Curled and Wood Docks). One plant was noted on 27 July 2011 by GK and LR with the parents in rough grassland near Boughton-under-Blean, TR0759.

Rumex x schreberi at Oare Marshes. Photo: © Lliam Rooney, October 2011.

Rumex x schreberi (hybrid between Water and Curled Docks). A plant was seen at a KBRG meeting (det. GK) on 5 October 2011 at Oare Marshes, TR013 642, in a damp area alongside a path. *R. hydrolapathum* was growing next to it, and was still bearing its full complement of developed fruits; whereas the hybrid had relatively few developed tepals and most had dropped early. The hybrid also had very crisped upper stem leaves (from the *R. crispus* parent). This is nationally a rare hybrid and the record is a first for Kent as well as vice county 15.

Rumex x schulzei (hybrid between Curled and Clustered Docks). The cross is particularly to be found in the North Kent grazing marshes, where the parents are often the only species present. There are three Sheppey records for 2011, made by GK: near a ditch on Elmley Marshes, TQ9467; by a pond margin at Kings Hill Farm, TQ9367, both on 9 June; and on Stray Marshes, TQ9369, on 13 September.





Salicornia emerici (= S. nitens, Shiny Glasswort). A KBRG meeting recorded this glasswort in small quantity in the upper saltmarsh at Oare Marshes, TR0164, on 5 October 2011, det. EGP. This appears to be the first confirmed record for this glasswort in Kent, as well as vice county 15. There are records in the BSBI's database for TR06 and TQ96, relating to unspecified dates between 1950 and 1999, but these are unaccompanied by any detail by which their validity may be assessed. The species now qualifies for inclusion in the draft rare plant register.

Salicornia emerici at Oare Marshes. Photo: © Lliam Rooney, October 2011.

Salicornia pusilla x ramosissima (hybrid between One-flowered and Purple Glassworts). This cross was found by LR during a KBRG meeting on 5

October 2011 at Oare Marshes, TR0167 6413, with both parents present, and with mature flowers varying between one, two and three per group. An even more interesting discovery of this cross was made by LR and SB at Sheppey on 17 November 2011. Despite the late date, there were Glassworts present in plenty at TR05230 68076 (along the path just west of Shellness hamlet) and nearby at TR05349 67767. *S. ramosissima* was not seen, and all plants which were not *S. pusilla* had flowers in a mixture of groups of threes, twos and solitary ones. In general, the glassworts were mostly those in which 3-flowered groups predominated over the other sized groups on the same plants. However, at TR05349 67767 the glassworts were predominantly 1-flowered, with a few 3s and 2s at the base of stems. Those different forms may be a reflection of the direction of crossing. The population in general was consistent with a position where, because of the lateness of the date, the parents had gone over, and hybrids had continued to develop, being not as fully fertile as the parents, in order to compensate for reduced fertility.

Salvia sclarea (Clary). One plant was seen by GK and LR on 27 July 2011 in an abandoned sandpit at Winterbourne, south of Boughton under Blean, TR0657, a casual escape.

Scandix pecten-veneris ^R (Shepherd's-needle). It is gratifying that two further populations of this Critically Endangered species have been discovered. On 3 May 2011, GH found it growing plentifully along about 2 metres of an arable field edge by the North Downs Way between Ashley and the Roman Road, TR3148. Then on 18 May 2011, JA encountered a patch of about 10 plants at the edge of a wheat-field at Street End near Lower Hardres, TR14385 53564, with a further plant nearby.

Securigera varia (Crown Vetch). Recorded by LR on 27 May 2011 on the Tankerton coastal slopes, TR11873 67292.

Senecio x albescens (hybrid between Silver and Common Ragworts). Recorded at a KBRG meeting on 16 July 2011 on the shingle beach at Walmer, TR37910 49611.

Senecio x baxteri (hybrid between Oxford Ragwort and Groundsel). Recorded at a KFC meeting on 7 August 2011 at Graveney Marshes, just below the seawall near a caravan site, TR0664.

Senecio inaequidens (Narrow-leaved Ragwort). We are now seeing even more extensive evidence of the spread of this species, with many records across the county. In vc15 it was recorded by LR near Faversham (TR0359) and East Lenham (TQ9151); by a KBRG meeting at Walmer (TR3750); by SB at Cliffsend (TR3463) and Burham (TQ7162); and by GK at Rainham (TQ8266) and numerous places on Sheppey (TQ9071, TQ9072, TQ9073, TQ9171, TQ9172 and TQ9270). The most impressive populations were around Queenborough, especially Rushenden, where the species was abundant and widespread in ruderal areas, and may be providing a focus for further spread.

Setaria viridis (Green Bristle-grass). Several clumps were noted on bare ground by a row of cherry trees at Hernhill, TR06628 59753, by LR on 24 October 2011.

 $Sium\ latifolium\ ^R$ (Greater Water-parsnip). Just two plants were observed in a very dry dyke at Ruckinge, TR02705 33284, by SB on 29 September 2011.

Solanum triflorum (Small Nightshade). A North American nightshade recorded at the RSPB reserve,



Dungeness, TR0518, by TI on 16 August 2004. There are very few recent British records outside East Anglia, and this is a **first Kentish**, **and vice county 15**, **record.** It appears not to have recurred at Dungeness since.

Solanum triflorum at Dungeness. Photo: © Tim Inskipp, August 2004.

Sorghum bicolor (Great Millet). This African grass was recorded on 10 October 2011 by LR as present along the A20 verge near East Lenham, with 200+ plants from TQ92041 51542 to TQ92085 51530 and 12 plants at TQ91946 51577. Other game bird seed plants were present, pointing to the likely origin.

Spartium junceum (Spanish Broom). Present near Borstal, TQ7266 (DG, 19 May 2011).

Spiranthes spiralis ^R (Autumn Lady's-tresses). Sites for this Near Threatened species additional to those in Philp (2010) were noted at Beltinge, TR198 682 where one spike appeared on a private back lawn (VE, 12 August 2011, conf. GK); and near Dover, TR3342, where a KFC meeting on 20 August 2011 saw three spikes.

Symphytum x hidcotense (= 'Hidcote Blue', Hidcote Comfrey). This probable triple hybrid hortal comfrey was seen by GK on 31 March 2011 as abundant in a copse at the junction of Holm Mill Lane and Ashford Road, Harrietsham, TQ85630 52883.

Tellima grandiflora (Fringecups). An escape recorded by SB on 10 May 2011 as well established in Silverden Lane, Sandhurst, TQ78916 28833; and on 15 May 2011 on a roadside, Covet Wood, TR17660 48762.

Tragopogon x mirabilis (hybrid between Goat's-beard and Salsify). Recorded by DG on 19 May 2011 near Borstal, TQ7266.

Trifolium resupinatum at Boughton, showing corollas reversed or upside-down, i.e. with the standard underneath. Photo: © Lliam Rooney, October 2010.

Trifolium resupinatum (Reversed Clover). Recorded by LR on 8 June 2011 at a hop garden between Bushy Close and the A2 bypass, Boughton, TR05884 59053, as having appeared in an area away from where it was sown in 2010 (with *T. hybridum* and *T. incarnatum*). The same recorder has also noted one plant at Perry Wood, TR04674 56025, on 16 October 2011, at a former chicken farm where an interesting flora arises on disturbance. **First record for vice county 15**.

Tsuga heterophylla (Western Hemlock-spruce). Self-sown seedlings by a ride in Hemsted Forest, TQ81955 36440, were noted by SB on 16 February 2011.





Tulipa clusiana var. *chrysantha* Sealy (Lady Tulip). One plant was found at Lade, Dungeness (TR08167 20791) on vegetated shingle ridges behind gardens on 23 April 2011 by GK and LR. It presumably arrived with thrown-out garden waste, as *Mentha spicata* (Spear Mint) was naturalized in close vicinity. The species, native to Iran, is normally white-flowered in the wild and var. *chrysantha* seems to be a common hortal form, although not commonly grown. First vice county 15 record, and may be a first record for the British Isles.

Tulipa clusiana var. chrysantha at Lade. Photo: © Geoffrey Kitchener, April 2011.

Valerianella dentata ^R (Narrow-fruited Cornsalad). The recording by SB on 2 July 2011 of this nationally Endangered plant as scattered on an arable field margin on chalk at Studdal, TR31372 49879, helps fill out a small cluster of records in the far east of Kent. Similarly, as regards a records cluster at the Medway Valley, to which SB on 13 July 2011 added scattered plants at the margin of arable field on chalk near Wouldham, TQ72133 63280, where the farmer had been participating in a Countryside Stewardship Scheme.

Verbascum blattaria (Moth Mullein). Five plants on the site of a demolished building at Rogley Wood, TQ82598 36791 were noted by SB on 15 July 2011.

Verbascum densiflorum (Dense-flowered Mullein). Two plants on a roadside at Sandwich Bay, TR361 571, were recorded by SB on 1 August 2011.

Vicia sylvatica ^R (Wood Vetch). Several records were made in 2011 within the general area to which this species is confined in Kent. At Covert Wood, five plants were recorded by JR on 10 June 2011 alongside the main track (TR190 482). Also at Covert Wood, TR187 483, a patch over 2 x 1 metres was recorded by AG on 15 June 2011 in a slight ditch to the side of a stony Forestry Commission track on not particularly chalky terrain; it is thought that this was not present in 2010. AG and LS also found it on 8 May 2011 at Parsonage Wood between Elham and Hawkinge, TR196 432, growing in the ruts of a track on the edge of a recently coppiced area; given that the woodland would have been unsuitable closed canopy woodland until very recently, this suggests an ability to survive as dormant seed for some time as well as germination receptivity to light.

Vinca major var. *oxyloba* (Greater Periwinkle). A variety with narrow, acute corolla-lobes, this was noted by LR on 30 July 2011 on a bank at Dunkirk Road, Oversland, from TR06185 57642 to TR06197 57698.

Viola odorata var. *sulfurea* (Sweet Violet). A variety with pale yellowish petals and purple spur, seen by LR on 7 March 2011 covering wooded waste ground next to the weigh-bridge between Canterbury Road and the A2 at the bottom of Stockers Hill, Boughton under Blean, TR05214 59567.

Viola palustris (Marsh Violet). Recorded at Foxearth Wood, Cranbrook, TQ7939, by JP on 5 July 2011.

Viola x scabra (hybrid between Hairy and Sweet Violets). The cross was discovered by LR on 4 March 2011 at Queendown KWT reserve, TQ82581 62750, at the far end of eastern part of the reserve, just before a kissing gate which gives access across a road to the western part. It was growing amongst *V. hirta* on one side of a path, with *V. odorata* on the other. The hybrid had a flower colour closer to *V. hirta* and was scentless, but possessed stolons, which *V. hirta* does not. First record for vice county 15.

Plant records for West Kent (vice county 16)

Adiantum capillus-veneris (Maidenhair Fern). Numerous plants on sheltered railway viaduct arch brickwork and neighbouring walls, Maidstone, TQ75637 56145 (21 June 2011, GK).

Aesculus indica (Indian Horse-chestnut). An abundance of seedlings near the footpath below One Tree Hill, Sevenoaks at TQ5615.5302, the leaflets having short stalks c. 1-2 cm long. Seen in the course of an OFC meeting on 23 April 2011, comm. GJ. First vice county 16 record.

Aethusa cynapium subsp. agrestis (Fool's Parsley). This was not the usual subspecies (subsp. cynapium), because of the length of the longest pedicels (about as long as the bracteoles and shorter than the fruits). The BSBI database holds only two other records for West Kent. It was recorded in a field on the west side of the Darent Valley at Eynsford, TQ5366, on 24 June 2011 by RMB, who named the subspecies as following the nomenclature of the current British list. He would, however, prefer to treat it as a forma, rather than a subspecies, on the same rationale as applied by J.-P. Reduron (2007-08) in referring to Weimarck (1945), who described the results of sowing seed of "subsp. agrestis" and typical plants of the species in a variety of matched conditions, and most of the differences between them disappeared in the progeny.

Alnus cordata (Italian Alder). Numerous trees and saplings in an abandoned orchard, seeded from planted boundary trees at Oldbury, TQ5856, recorded on 29 August 2011 by GK.

Anacamptis morio ^R (Green-winged Orchid). Forty-two old flower spikes were seen spread out in one field at Polebrook, TQ506 477 and TQ507 477, on 15 May 2011 by SL.

Astragalus glycyphyllos (Wild Liquorice). An enormous specimen in an abandoned front garden of the Ferrier Estate (a council estate being demolished) at Kidbrooke, TQ4075, presumably introduced but nonetheless surprising (29 July 2011, JC).

Bunias orientalis (Warty-cabbage). A couple of plants noted on 6 August 2011 by GK in a former chalk pit at Swanscombe, TQ6174.

Bupleurum fruticosum (Shrubby Hare's-ear). A 90cm bush was present as a casual on a bank at Sparepenny Lane, Eynsford, TQ54004 66114, its seed parent being in the recorder's garden nearby (10 July 2011, RMB).



Cardamine impatiens ^R (Narrow-leaved Bitter-cress). Several dozen plants were seen under *Prunus spinosa* by the west bank of the River Eden west of Penshurst, TQ51647 43254, near a footpath, with one outlier about 70m west. This find by GK on 16 August 2011 extends the known presence of the species in the Eden catchment, Philp (2010) referring to it in a different location, at TQ54C, within which tetrad SL found over 400 plants earlier, on 8 May 2011, in a small shaw by the river near Vexour Bridge, Chiddingstone, TQ5145.

Cardamine impatiens at Chiddingstone. Photo: © Stephen Lemon, May 2011.

Carex elongata ^R (Elongated Sedge). The discovery of one plant by a stream in wet woodland near Leigh, TQ56006 46189, extended knowledge of this small colony into a further tetrad (23 April 2011, SB).

Carex vulpina R (True Fox-sedge).

- (1) The discovery of a further plant (see Kent Botany 2010 for others) in the vicinity of the River Eden near Vexour Bridge, Chiddingstone, TQ51208 45823, points to the benefit of the sedge growing within hedge cover as preventing cattle from grazing off the inflorescences before the seed drops (2 April 2011, SL).
- (2) Three large healthy clumps in grassland damp tussocky amongst willow scrub at Wanshurst Green, TQ7611 4473, on the opposite side of the railway to the well-known Marden Meadow site, are a significant addition to the very limited Kentish occurrences of this species. Found on 10 May 2011 by LM, conf. MP (BSBI referee).
- (3) Present at Yalding, TQ6847 4968, next to a Carex acutiformis (Lesser Pondsedge) swamp, where previously known to JP (28 July 2011, LM).



Carex vulpina at Wanshurst Green. Photo: © Dr Lesley Mason 2011.

Cedrus deodara (Deodar). Seedlings were recorded under a tree within the old boundary of Joyce Green Hospital (demolished), Dartford, TQ5475, on 27 June 2011 by MG and CC. **Apparently a first record for vice county 16 and Kent.**

Centaurea cyanus ^R (Cornflower). A large plant was noted in flower at the edge of a cornfield at Pinesfield Lane, Trottiscliffe, TQ64871 60710, on 4 June 2011 by L&DH.

Ceratochloa cathartica (Rescue Brome). One tuft of this grass seen within the old boundary of Joyce Green Hospital (demolished), Dartford, TQ5476, on 28 September 2011 by MG, CC and RW.

Chamaecyparis lawsoniana (Lawson's Cypress). Pavement seedlings from garden tree in road north of Tunbridge Wells Common, TQ5739 (25 Jan 2011, GK).

Chamaecyparis pisifera (Sawara Cypress). A seedling was growing on the wooded chalk bank of the A225 near Lullingstone, TQ5364, on 29 May 2011, but no adult Cypress was seen in vicinity (GK).

Chenopodium murale R (Nettle-leaved Goosefoot). Recorded as present in flower beds at Danson Park, TQ4775, on 6 June 2011 by MG and MS.

Chenopodium probstii (Probst's Goosefoot). A plant, with other chenopods, was seen on 17 September 2011 by GK on newly landscaped ground by a path from Church Manorway to the Thames north of Erith, TQ507 796, not far from a vegetable oil factory which was the source of oil milling adventives in the 1980s.

Clinopodium calamintha ^R (Lesser Calamint). Present on chalky ground at edge of Bluewater eastern pit, TQ5972 (13 July 2011, GK).

Conyza floribunda (= C. bilbaoana) (Bilbao's Fleabane). At least 20 plants were found in a gravelly parking area, at Tunbridge Wells Common near the junction of Major York's Road and the A26, TQ58043 38759, on 8 October 2011 by GK. This is close to the vice county boundary, which departs from the administrative county boundary and runs through Tunbridge Wells. First recorded in West Kent in 2001 (Philp, 2010), but now with many records in Hampshire, Surrey and Sussex, and likely to be spreading in this direction.

Cornus alba (White Dogwood). An introduced dogwood, found on 23 September 2011 by GK at the foot of the downs west of Trottiscliffe, being occasional in a field hedge along Pilgrims Way trackway, TQ6260, with no houses near. There must be a suspicion of planting, intended as *Cornus sanguinea*. It was also present at

Polhill, TQ5059, with two plants on a bank west of the M25, alongside an embankment of tipped soil (1 November 2011, GK).

Cotoneaster franchetii (Franchet's Cotoneaster). Present at chalky margin of Bluewater eastern pit, TQ5972 (13 July 2011, GK).

Cotoneaster x suecicus (Swedish Cotoneaster). About 11 plants were seen on 23 September 2010 by GK at the top of a slightly scrubby chalk downland slope, west of Trottiscliffe, TQ6288 6057, and remote from housing; assumed bird-sown and spreading.

Crocus tommasinianus (Early Crocus). Three large established clumps were noted on 27 February 2011 by L&DH in woods at Teston, TQ70338 53786, recorded here for the previous five years.

Crocus vernus (Spring Crocus). Recorded by L&DH on 27 February 2011 in three places in woods at Teston, TQ70325 53564, and spreading.

Epilobium hybrids. Perhaps the most remarkable population encountered in 2011 was near Flimwell, in the administrative county of East Sussex, but in vice county 16, West Kent. This was visited by a KBRG meeting on 3 August 2011 and also by GK and LR on 30 August. In a gravelly former car park (through which runs the gridline between TQ7230 and TQ7231) grew *Epilobium hirsutum*, *parviflorum*, *tetragonum* and *ciliatum* together with all 6 possible hybrid combinations. It looks as though the inhospitable gravel has restricted colonization by other species, so that the pioneer willowherbs have had long enough for plenty of hybridization opportunities to arise. Other West Kent willowherb sightings (recorded by GK unless mentioned otherwise) are as follows.

Epilobium x aggregatum (hybrid between the Broad-leaved and Short-fruited Willowherbs). One plant was recorded in Oldbury Lane, Oldbury, TQ5856, on a bank outside a garden, with parents nearby, on 29 August 2011.

Epilobium x dacicum, (hybrid between Hoary and Short-fruited Willowherbs) was seen at Gilridge near Edenbridge, TQ456 425 in a ditch by unimproved pasture on 13 August 2011; and in a rough grassy field adjoining Bewl Water, TQ698 317, on 12 September 2011.

Epilobium x floridulum (hybrid between Hoary and American Willowherbs). As well as at Flimwell (above), several plants of this cross were seen in an uncultivated field and a field corner on the downs above St Clere, Kemsing, TQ5759, on 14 August 2011; also in rough vegetation in Cobham Hall grounds, TQ682 686, on 21 August 2011; and at the pavement edge in Holford Street, Tonbridge, TQ58669 46110 on 30 August 2011.

Epilobium x interjectum (hybrid between Broad-leaved and American Willowherb) is the commonest cross and was seen as a street weed at plant as street weed at Mount Pleasant Avenue, Tunbridge Wells, TQ5850 3929, on 14 July 2011; in a driveway at Flimwell, TQ7230, by a KBRG meeting on 3 August 2011; in a woodland clearing above the railway tunnel portal at Markbeech, TQ4742, on 9 August 2011; at a pavement edge in Holford Street, Tonbridge, TQ58669 46110 on 30 August 2011; and in a landscaped planter by the A26 in Tonbridge, TQ58685 45848, on the same date.

Epilobium x mentiens (hybrid between Square-stalked and American Willowherbs) can be quite similar to *E. x vicinum* (see below) and is best recorded where the parents are present. In addition to Flimwell (above), it was seen at Edenbridge, TQ44342 46945, on some disused steps with parents on 10 August 2011; at Oldbury, where six plants were sampled from a large mixed hybrid population in an overgrown field at TQ587573 and a further plant recorded in another field at TQ582 569, all on 29 August 2011; and at Cooling / Northward Hill, TQ767 760, where the cross was apparently frequent with parents in an orchard, with five sample plants identified on 13 September 2011.

Epilobium x palatinum (hybrid between Hoary and Square-stalked Willowherbs). As well as at Flimwell (above), this cross was observed on a chalky bank bounding arable on the downs above St. Clere, Kemsing, TQ57297 59469 on 14 August 2011; and as three plants sampled from a large mixed hybrid population in an overgrown field at Oldbury, TQ587 573, on 29 August 2011.

Epilobium roseum [^R] (Pale Willowherb). See account given above for vice county 15 as regards removal of this species from the draft rare plant register. In West Kent, it was recorded from:

- (1) Edenbridge, where five plants were growing in a driveway off the High Street, TQ44448 45855 (21 July 2011).
- (2) Halstead, where the transfer of garden materials in conjunction with a house move had accidently brought a seed bank of this species, with numerous plants having germinated at TQ48974 61028 (18 June 2011, GK at WFS meeting).
- (3) Maidstone, where present at the junction of pavement and wall in St Peters Street, TQ7553 5614 (21 June 2011).
- (4) Sevenoaks, Riverhead, TQ5156, where three plants were located at the pavement edge of the A224 (20 July 2011).
- (5) Sevenoaks town, TQ52803 54704, where scattered plants grew along about 15 metres of pavement edge at Lime Tree Walk (24 May 2011).
- (6) Sevenoaks town, TQ5354, where there were 14 plants at pavement edges, generally against walls, in St Nicholas Drive and Rectory Lane (24 June 2011).
- (7) Stone Street, where seven plants were scattered along the damp bottom of wooded former sandpit between TQ578 547 and TQ578 546; seen here also some years ago (23 September 2011).
- (8) Tonbridge, where present in the Co-op car park off River Walk, TQ589 463, and plentiful along pavement edges by walls in Waterloo Place, TQ586 457 (30 August 2011).
- (9) Tunbridge Wells, where at least five plants were growing at TQ58483 39205, in an alleyway off Mount Pleasant Road opposite the station (14 July 2011).



Epilobium roseum at Halstead. Photo: © Lliam Rooney June 2011.

Epilobium x vicinum (hybrid between Short-fruited and American Willowherbs). This common cross was seen near Flimwell in an arable field margin at TQ7132 on 1 August 2011 and by a KBRG meeting in a disturbed area at TQ7165 3138 on 3 August 2011. It was also on a pavement by a garden wall in Edenbridge, TQ444 458, on 21 July 2011; in rough vegetation in the grounds of Cobham Hall (6 plants at TQ682 686) on 21 August 2011; on the upper margin of Bewl Water and in an adjoining rough grassy field (TQ6931, in the administrative county of East Sussex, but part of vc16) on 12 September 2011; and in paving in front of Holy Trinity Church, Tunbridge Wells, TQ58366 39473, on 8 October 2011.

Epipactis purpurata (Violet Helleborine). One flowering spike seen on 13 August 2011 by SL with AF (Bough Beech warden), who discovered it under a mature beech in Winkhurst Wood, TQ5049.

Erodium moschatum (Musk Stork's-bill). Following the listing of new sites in Kent Botany 2010, this taxon is being removed from the draft rare plant register list. A further vc16 site has been identified: on 13 July 2011 five plants were located on the well-trodden grass verge of Stonebridge Road, Northfleet, TQ61443 74755, and on 6 August 2011 the colony was found to extend sporadically along the road verge to TQ61328 74903, at least 50 metres (GK).

Euphorbia characias (Mediterranean Spurge). Several plants at Grain, TQ8908 7611, on a site where a building had been demolished; some large plants may have been part of original garden, but smaller ones appeared self-sown (3 May 2011, GK).

Euphorbia ^R *cyparissias* (Cypress Spurge). A patch c.20 metres in length and c.1 metre in width was seen in flower beside the Wealdway footpath bordering an arable field near Camer Park, TQ658 671 on 29 July 2011, RR.

Filago pyramidata R (Broad-leaved Cudweed).



The well-known Ranscombe populations have received some attention in 2011, as RM reports that quadrats were put down in Longhoes Field (TQ715 673), with up to 299 plants per square metre being recorded. The population in this field was estimated at tens of thousands of plants, if not hundreds of thousands. The species accordingly has good representation in hectad TQ70, where it was recorded in Philp (1982), but not Philp (2010). In addition to TQ7167, it is also present in TQ7068, LR on 29 June 2011 having seen a few plants on the main woodland ride above Great Wood, TQ705 686. He comments that it seems to be spreading to all areas of Ranscombe Reserve and beyond, perhaps through seeds becoming attached to clothes and dogs. We also have records in 2010 for TQ7067.

Filago pyramidata (with Catapodium rigidum) at Ranscombe. Photo: © Richard Moyse / Plantlife, 2011.

Galium parisiense R (Wall Bedstraw). Fourteen plants were recorded at the margin of a tarmac footpath, Vauxhall Lane 'roundabout', Tonbridge, TQ59468 44689, on 24 August 2011 by SB, a remarkable occurrence without any readily explicable origin.

Hedera colchica (Persian Ivy). Seen on Rusthall Common on 31 January 2011 by GK, extensively spread in woodland, not by gardens, at TQ5691 3925, and a small plant by a woodland track, on the north side of the common, TQ568 395. Also in TQ5639, Hedera hibernica (Atlantic Ivy) was widespread.

Hypericum x desetangsii R (Des Etang's St. John's-wort). Seen (as usual, in Kent) in the absence of one parent,

H. maculatum, on 3 August 2011 during a KBRG meeting at the edge of a former car park near Flimwell where vice county 16 projects into the administrative county of East Sussex, TQ7216 3100. Refound here by SB, who discovered it some years before.

Also several patches found on 16 August 2011 by GK south west of The Warren, Penshurst, TQ51805 43311, along a hedgerow bordering arable in the Eden catchment.

In the Medway catchment two patches were found on 7 August 2011 by SB, growing in grassland along a riverside footpath east of Hartlake Road, Golden Green, TQ63092 47335.

Hypericum x desetangsii at Flimwell. Photo: © Sue

Buckingham, August 2011.

Hypopitys R monotropa (= Monotropa hypopites, Yellow

Bird's-nest). Three spikes of this declining, nationally Endangered plant were recorded beside one of the paths in Moorlands Wood, Offham, TQ655 578 on 15 June 2011 by FB. The same month, it was further sighted by JD at Holly Hill, TQ66663 62719 (conf. SB from photograph). On 5 November 2011 it was also recorded in fruit by JP in a beech / pine plantation at High Elms, TQ4462.



Lapsana communis subsp. intermedia (Nipplewort). About 20 plants were found around planted trees at the edge of South Park Car Park, Sevenoaks, from TQ52965 54543 to TQ52955 54544, on 24 May 2011 by GK. This is a subspecies from south east Europe, seldom seen in the British Isles, where the usual plant is subsp. communis, and is a first vice county 16 record. The capitula were noticeably larger than those of the native plant (3cm across, as compared with 1.5-2 cm) and the upper stem leaves were entire and linear-lanceolate (as distinct from toothed and lanceolate to ovate).

Lapsana communis subsp. intermedia at Sevenoaks. Photo: © Geoffrey Kitchener, July 2011.



Legousia hybrida (Venus's-looking-glass). Present under *Papaver rhoeas* (at the edge of a wheat crop on the west side of the Darent Valley near Eynsford, TQ53772 66095 and TQ53862 66248; recorded on 24 June 2011 by RMB.

Lonicera pileata (Box-leaved Honeysuckle). A seedling (parent not noted in vicinity) found in a former chalk pit near Swanscombe, TQ6174, on 13 July 2011 by GK.

Mentha pulegium ^R (Pennyroyal). Found to be abundant along the silty upper shore line of the eastern arm of Bewl Water (within the administrative county of East Sussex, but part of which is also in vice county 16, West Kent), TQ6932, on 30 August 2011 by GK and LR; also in TQ6931 (12 September 2011, GK). This strand line evidently provides a marginal habitat of disturbed and semi-open conditions suiting this plant, which freely roots through the silt and detritus. Its appearance at Ardingley reservoir in Sussex was attributed by Briggs (2001) to foreign seed introduced when the reservoir was constructed. The origin of the Bewl Water population may be similar, but there is always the possibility of spread through the movement of waterfowl.

Nardus stricta ^R (Mat-grass). Details of discovery of this rare (in Kent) grass in Knole Park have not been available to the compiler, but he became aware of it in 2010 through the sensitivities of Natural England towards cross-country races in its vicinity. Recorded by GK on 5 October 2011 as scattered tufts on the south eastern slope of head of the long valley on the west side of the park, north west facing, over an area c. 20 x 20 metres of deer-grazed *Agrostis capillaris* grassland on sandy / cherty ground, TQ5452. Longer term, general bracken encroachment in the park would appear a more significant threat than occasional trampling.

Nepeta cataria (Cat-mint). Twenty-three plants of this (nationally) Vulnerable species were recorded in flower on 29 July 2011 on the north side of a footpath near Luddesdown between TQ669 667 and TQ665 666 by RR.

Orchis purpurea ^R (Lady Orchid). A single plant was present at the lower slopes of the Greensand Ridge at One Tree Hill, TQ5621 5301, spotted in bud by JPe in the course of an OFC meeting on 23 April 2011 (comm. GJ). It was located about 15ft above the narrow Greensand Way footpath on a scrubby woodland margin. This record is remarkable, both for the geology of its occurrence, being on the Hythe Beds of the Lower Greensand, rather than on chalk; and for the location within Kent, as it is almost the westernmost vc16 currently extant plant. The westernmost may well be one in the vicinity of Otford, where a plant was seen in flower in May 2011 (details redacted).

Orobanche elatior ^R (Knapweed Broomrape). Twenty-five spikes were seen on *Centaurea scabiosa* alongside a public footpath near Higham Station, TQ7172 by BS on 13 July 2012.

Paeonia officinalis (Garden Peony). One small plant was seen by GK on 13 July 2011 in a former chalk quarry at Swanscombe, TQ6174, which has been subject to some infill many years ago. Not given as a Kentish plant in Stace et al. (2003) although also seen by the recorder as an escape away from gardens in vc16 in 2004, so that

between these various sightings this species should be treated as having been the subject of a **first vice county** 16 record.

Parapholis incurva ^R (Curved Hard-grass). Scattered along the verge of Grain Road, Isle of Grain, TQ866 750 (3 May 2011, GK).

Parthenocissus vitacea (= P. inserta, False Virginia-creeper). Very wide-spreading at top of a partly infilled chalkpit at Swanscombe, TQ6074 (6 August 2011, GK).

Pilosella praealta subsp. *thaumasia* (Small-flowered Fox-and-Cubs). A stoloniferous patch of this non-native hawkweed with about 15 scapes was found along about 1 metre of a north-facing sandy roadside bank of St Julian Road opposite Knole Park, TQ5513 5340, by GK on 24 May 2011 (conf. TR and DJM). The scapes held at least 7 capitula, including incompletely formed ones, and the ligules were yellow (in contrast with the orange of the usual Fox-and-cubs). The leaves were neither as broad nor as glaucous as might be expected from the otherwise not dissimilar *P. x floribunda*. McCosh & Rich (2011) refer to the taxon as a garden escape in the British Isles, although it would appear to be rare in gardens, let alone as an escape. *First Kentish and vice county 16 record.*

Polypogon monspeliensis ^R (Annual Beard-grass). Many plants were recorded on 16 June 2011 by GK in a semi-bare dampish area, 10 x 3 metres, bounding a sand quarry between Seal and Greatness, TQ54388 57372 – unusually inland for this species and perhaps arriving with birds or quarry vehicles.

Polypogon viridis (Water Bent). A grass extending its range, sometimes with garden plants: it is perhaps not surprising that CC recorded it as flowering in a pot of *Iris* in a garden at Hartley, TQ6068, but indicative of the versatility of the plant that it flowered at the end of June 2011 and began again at the end of November. Also recorded by CC and MG at the (demolished) Joyce Green hospital site, Dartford, TQ5475, on 27 June 2011; and by GK on 14 July 2011, as about 20 plants growing as a street weed along the road to Tunbridge Wells central station car park, TQ5846 3911.

Potamogeton polygonifolius (Bog Pondweed). Abundant in shallow water in cleared area of former brickworks in woodland north west of Chiddingstone Causeway, TQ5147, noted by GK on 22 April 2011.

Potentilla anglica ^R (Trailing Tormentil). A further instance of the excellence of the flora in the Ranscombe reserve is shown by RM's discovery on 11 October 2011 of this species in a clearing in Cobham woods, just off a main ride, TQ700 684 (conf. GK).

Quercus x rosacea (hybrid between Sessile and Pedunculate Oaks). Recorded in a woodland margin at a roadside south of Knole Park, Sevenoaks, TQ5453, by GK on 24 May 2011.

Rhinanthus angustifolius (Greater Yellow-rattle). The presence of this plant was reported anonymously to the Natural History Museum on 5 July 2011 from the Saltbox Hill SSSI, Biggin Hill (having been noted as flowering later than might be expected of *R. minor*, Yellow-rattle), and its identity was confirmed by FR. Investigation by GK on 25 July 2011 showed several scattered groups on a west-facing slope of grazed scrubby chalk grassland, TQ4061. It is a plant of similar habitats in Surrey, but its appearance in (metropolitan) vc16 is somewhat of a surprise. However, JP (Pitt, 2010) points out that the introduction of an annual hay cut at Spring Park Woods, West Wickham from 1992 brought this species from the "native" Surrey sites accidently on the hay cutting machinery; and that it is possible that a similar introduction accounts for its discovery in quantity by JP in 2010 near Burwood School, Avalon, Orpington (TQ4765). The means of introduction at Saltbox Hill, if it was introduced, is not clear, given that the grass is grazed (under management by LWT), rather than cut. On the other hand, the site has been surveyed by JP some years back on a number of occasions without *R. angustifolius* being seen (JP, pers. comm.). It is not impossible that there may be some connection with butterflyrich Surrey *R. angustifolius* sites, with naturalists visiting both, given the lepidopteral interest of Saltbox Hill. Or the link may be the grazing stock, but this is speculation. It is, however, clear that this species should be regarded as having been the subject of a **first record for vice county 16**.

Rosa multiflora (Many-flowered Rose). Found growing in a field hedgerow at Shoreham, TQ51901 61150, by GH (who detected it by scent) and GK on 29 June 2011, not near housing or any public access

Rumex maritimus ^R (Golden Dock).

- (1) Nineteen plants were found on 30 August 2011 by GK and LR scattered in a mat of *Crassula helmsii* on the northern shore of the east arm of Bewl Water, TQ669 329, in the administrative county of East Sussex, but within vc16 (West Kent). It is possible that this is much more extensive around the reservoir, brought in by waterfowl, but very little of the reservoir banks lie within vc16, although a further monad record was added by GK on 12 September 2011, at TQ69804 31717, on the southern shore of the east arm.
- (2) Golden Dock is known from the Stoke Marshes, and GK on 15 September 2011 surveyed along the cattle-trampled north side of Stoke Fleet from TQ8461 7584, through TQ8476 to TQ8500 76159, noting 1032 plants of *R. maritimus*, which obviously extends much further along neighbouring dykes. With them were 112 plants of *R. x knafii* (the hybrid between Golden and Clustered Docks), i.e. 10% of the joint total, so hybridization is a significant feature of the population.

Rumex x abortivus (hybrid between Clustered and Broad-leaved Docks). This was found on 21 July 2011 by GK at Edenbridge TQ447 457, in a pasture with parents nearby.

Rumex x dufftii (hybrid between Broad-leaved and Wood Docks). Widespread in West Kent, often in marginal habitats where the parents meet, this hybrid was seen by GK on 26 July 2011 in a ditch by pasture at Marsh Green, TQ4344; on 13 August 2011 in unimproved pasture at Gilridge, TQ456 426; on 26 August 2011 by a hedge near Edenbridge, TQ4548; on 23 September 2011 at the edge of downland pasture, TQ6267 6030; and recorded by a KBRG meeting (det. GK) on 30 July 2011 in valley grassland near Devil's Den, Edenbridge, TQ4345.

Rumex x lousleyi (hybrid between Greek and Broad-leaved Docks). One plant was recorded by GK on 13 July 2011 in a former chalk pit at Swanscombe, TQ6074, with the parents.



Rumex x mixtus (hybrid between Fiddle and Wood Docks). One plant was found by GK on 13 July 2011 on the margin of margin of the track in front of Ifield Court, Singlewell, TQ64752 70044, bordering a paddock with parents present. It was wide branching, as with the *R. pulcher* parent, but with mostly entire tepals (from *R. sanguineus*), some with reticulation derived from *R. pulcher*. Attempts to photograph it were counterproductive, by attracting the attention of the paddock occupant!

Rumex x mixtus being considered for grazing potential at Singlewell. Photo: © Geoffrey Kitchener, July 2011.

Rumex x sagorskii (hybrid between Curled and Wood Docks). Three plants were recorded by GK on 19 August 2011 with the parents in rough

vegetation in the grounds of Lullingstone Castle, TQ5364.

Rumex x schulzei (hybrid between Curled and Clustered Docks). Recorded on 21 July 2011 by GK in a pasture at Edenbridge, TQ447 457; and on 29 July 2011 in a disturbed grassy area by a cattle trough at Halstow Marshes, TQ78275 78612, the parents being present in both cases.

Sasa palmata (Broad-leaved Bamboo). Established and extensive in a wood near Sandy Lane, Foots Cray, TQ47957 70446; seen by RMB on 20 June 2011.

Saxifraga granulata ^R (Meadow Saxifrage). One of the Darenth Valley populations: noted by RMB on 7 May 2011 as about 70 plants in St Peter & Paul's churchyard, Farningham, TQ5466, but affected by the spring drought.

X Schedonorus Ioliaceus (= x Festulolium Ioliaceum, hybrid between Meadow Fescue and Perennial Ryegrass). Present with the parents on arable field margins at Lullingstone Park, TQ5249 6392, and on a field margin next to the park, TQ52611 63763 (GK, 29 May 2011).

Senecio inaequidens (Narrow-leaved Ragwort). Records were widespread: from CC and MG at Joyce Green (TQ5475); from CC, RW and MG in the adjoining monad, TQ5476, where there was a population of hundreds of

plants; from GK at Polhill (TQ5476), near Bluewater (TQ5873), at Swanscombe (TQ5974), Stoke crossing (TQ8475) and at Grain (TQ8975).

Solanum nigrum subsp. schultesii (Black Nightshade). This subspecies, with patent glandular hairs, was recorded by MG and MC on areas of rough soil at Danson Park (TQ4775) on 6 June 2011 and by GK in a disturbed area with weeds at Erith / Belvedere, TQ5055 7938, on 17 September 2011.

Symphytum x hidcotense (= 'Hidcote Blue', Hidcote Comfrey). An attractive comfrey with changing red/ blue flowers, recorded by SB on 8 April 2011 at Basted, TQ607 557.

Symphytum grandiflorum (Creeping Comfrey). One of the parents of the previous taxon, seen at One Tree Hill, TQ5611 5302 by an OFC meeting on 23 April 2011 as well-naturalized along footpath banking, comm. GJ.

Tellima grandiflora (Fringecups). A casual plant was noted by RR and RP on 4 May 2011 flowering on the northern bank of Groombridge Road at TQ526 379.

Thuja plicata (Western Red-cedar). A seedling on a chalk roadside bank was noted by GK on 15 June 2011, north west of Shoreham, TQ5162, with no parent in view.

Tragopogon x mirabilis (hybrid between Goat's-beard and Salsify). Recorded by DG on 16 May 2011 at Cliffe Woods, TQ7473.

Tsuga heterophylla (Western Hemlock-spruce). Occasional self-sown saplings were seen by GK on 8 November 2011 in a plantation south east of Sundridge, TQ4953, and many in chart woodland, both near and away from plantations at High Chart, Westerham, TQ4352, on 25 November 2011.

Ulex minor (Dwarf Gorse). A KBRG meeting on 10 August 2011 recorded this gorse (quite unusual in Kent given the extent to which it may be found in Surrey, Sussex and Hampshire) at Bedgebury pinetum, TQ72279 33178.

Verbena bonariensis (Argentinian Vervain). Present as a casual escape on soil banks around parking area at Exedown, TQ5959, between Kemsing and Wrotham. (GK, 14 October 2011).

Viburnum x rhytidophylloides (hybrid between Wayfaring-tree and Wrinkled Viburnum). A large bush was recorded by GK on 11 April 2011 in a copse/field boundary on the valley slope west of Shoreham, TQ5171 6238.

Vinca major var. oxyloba (Greater Periwinkle). This variety was found to be abundant in a copse at the junction of Long Barn Road and Hale Oak Road, Sevenoaks Weald, TQ5241 5044, by GK on 22 April 2011.



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