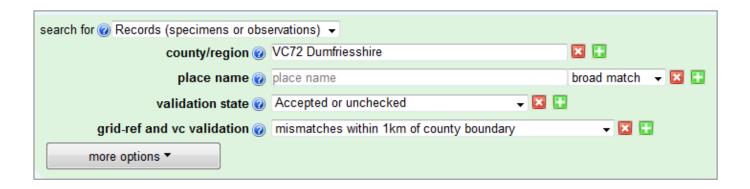
Examples of validation and verification

Andy Amphlett

- •Validation and verification issues from Scottish vice-counties
- •All examples were found using VCRs' my county > data validation tabs

vc72 – grid ref x vc mismatches



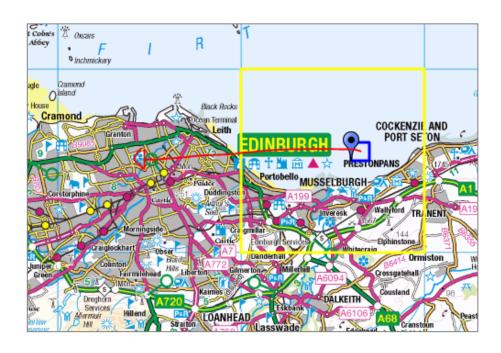


267 of 269 vc x grid ref mismatches from a single tetrad

In this case all site names and grid refs match, so just need to correct the vice-county. All records are from MapMate.





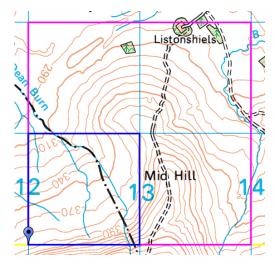


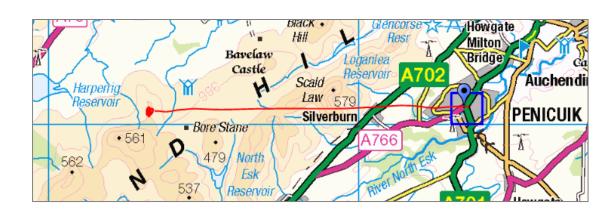
Grid ref is in sea. RBGE is in monad NT2475 (and in different hectad). Richard Pankhurst also worked at RBGE, which adds additional support to that being the correct grid ref.

Other possible oddities Please check occurrence records that the database system has highlighted (only a small proportion of these are likely to be erroneous). current validation state unchecked confirmed needs verification records near the maximum of their (inferred) altitudinal range records near the minimum of their (inferred) altitudinal range in the state of the state of

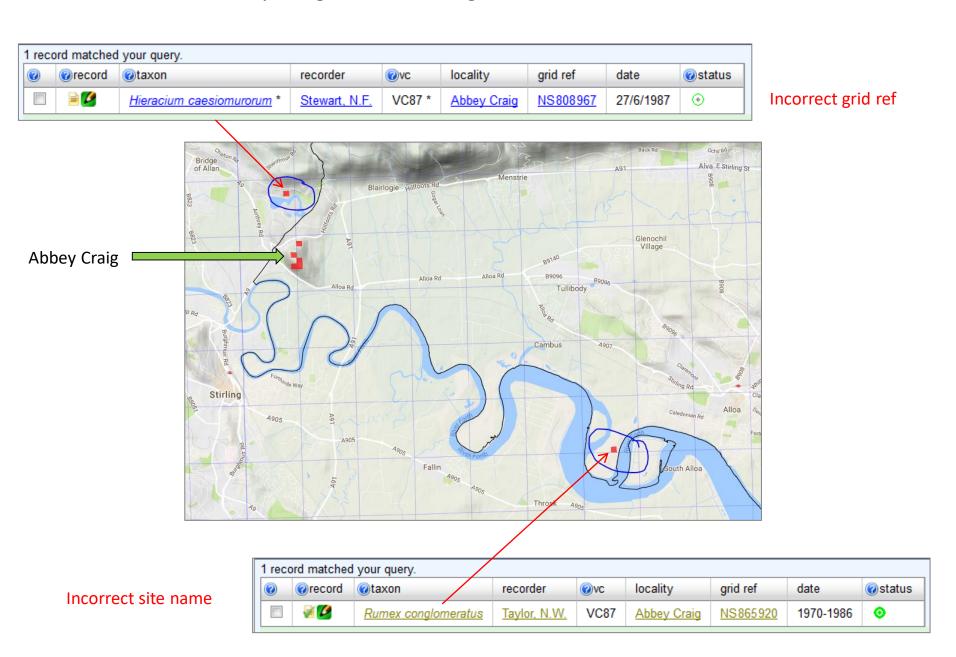
3 records matched your query.								
②	@record	@taxon	recorder		locality	grid ref	date 🔺	@status
		Rubus chamaemorus	Heern, K.	VC83	Mid Hill, Pentlands	NT234605	1976	0
	4	Rubus chamaemorus	Hearn, K.	VC83	Mid Hill, Pentlands	NT234605	1976	•
		Rubus chamaemorus	McKean, D.R.	VC83	West of Mid Hill	NT1260	1/7/1994	•

6-fig grid ref is at 184m AOD (just possible), but location is in middle of Penicuik. Mid Hill is in tetrad NT16F (a different hectad), where there is a later record from monad NT1260 NB make sure both copies of incorrect record are corrected. One record is from MapMate and one is from VPDB (and which had previously been confirmed. NB recorder name spelt in two ways ... HEERN and HEARN. Which is correct?

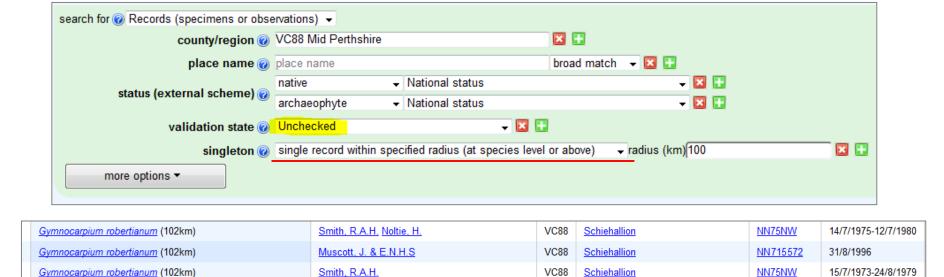




vc87 records from Abbey Craig – site name x grid ref mismatches



Gymnocarpium robertianum (102km)



Remove 'validation state' from the query and rerun. All look ok, except Babington record (confirmed) which may have incorrect date (wrong century?)

VC88

Limestone area opp Lochan an Daim

NN716573

24/7/2004

Roger Holme (Edinburgh Natural History Society)





Other possible oddities

Please check occurrence records that the database system has highlighted (only a small proportion of these are likely to be erroneous).

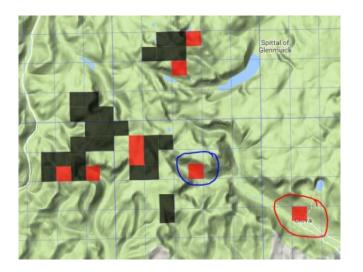
current validation state
unchecked
confirmed
records near the maximum of their (inferred) altitudinal range
records near the minimum of their (inferred) altitudinal range

1711
0
23
0

4 reco	records matched your query.							
0	@record	@ taxon	recorder	 ② ∨c	locality	grid ref	date	status
		Athyrium distentifolium	Edgington, J.	VC90	Glen Esk Whitehillocks	NO45367938	3/11/2013	0
		Carex rariflora *	Heath, D.M.	VC90	Glen Clova	NO3273	29/7/1933	0
		Lycopodium annotinum	Hogarth, B.G.	VC90	Montreathmont Forest	NO595546	2008	0
		Scrophularia scopolii *	Green, Paul Richard	VC90	Kinnaird Park	NO63095808	7/4/2012	0

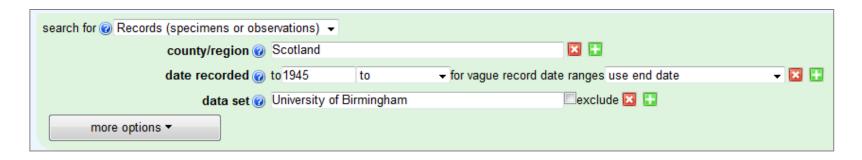
•Athyrium distentifolium – 239m AOD. Grid ref and site name match. From air photos location is river bank. Double check with recorder as very low altitude for this species.

•Carex rariflora - grid ref is for Glen Clova Hotel monad (circled in red on map). The only hectad record. Record has additional details; 'Jack Road' is Jock's Road; Glen Fiadh is Coire Fee. CHANGE grid ref to NO27 (hectad). Checking map found 3 further records in NO2576 (circled in blue on map). All have spurious precision; CHANGE to hectad NO27.



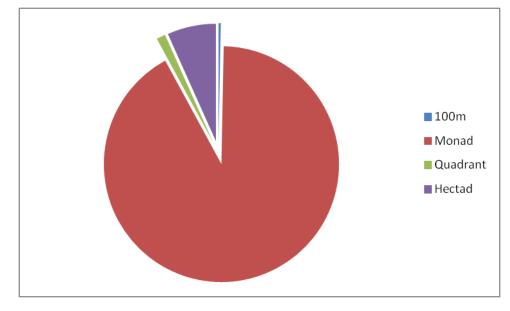
Record (voucher specimen)	
taxon	Carex rariflora (Wahlenb.) Sm. "Mountain Bog-sedge"
date	29/7/1933
locality	Glen Clova VC90 NO3273 G
collector	D.M. Heath
	sex/stage: present
attributes	abundance: Present
	curation: BIRM
notes	comment: Low down near Jack Rd, Clova, towards Glen Fiadh.
references	2004. University of Birmingham (1999-2004)
source data set	University of Birmingham (BIRM)
status	unknown
external id	BSBI:TPDB:record:169845
ddb row id	2cd4p9h.30rv5v #2cd4p9h.30rv5w
data source	Threatened plants database (via provider The Botanical Society of the British Isles)
last modified	Tue, 14 Sep 10 12:16:42 +0100

<u>University of Birmingham Herbarium</u> – records from Scottish vice-counties



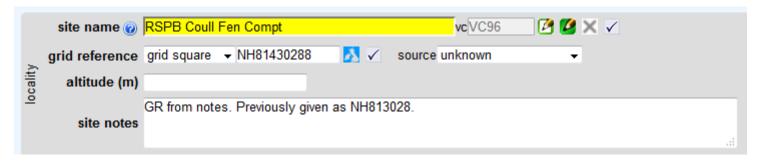


Grid reference precision of records derived from herbarium specimens dated prior to OS grid appearing on maps. All grid refs likely to have been assigned to records in the process of digitisation. Some grid refs known to be spuriously precise or incorrect.





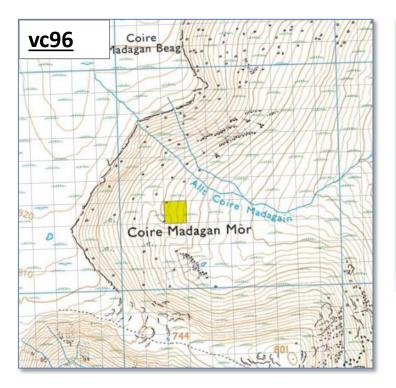
Site grid ref edited (was compartment centroid)

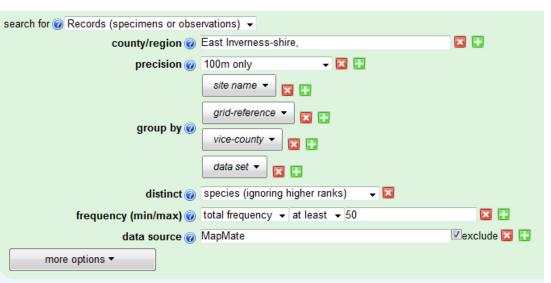




Site name includes a monad grid ref, that matches the locality name, but it does not match the actual site grid ref. No other details. Juncus castaneus is recorded from monad NH1534, but not from NH1133.

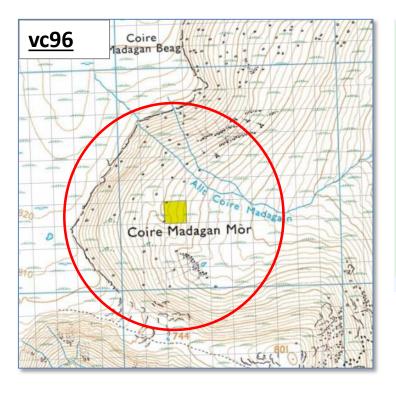
Check with recorder. If not able to confirm where record was from, reduce precision of record to hectad, or Reject.

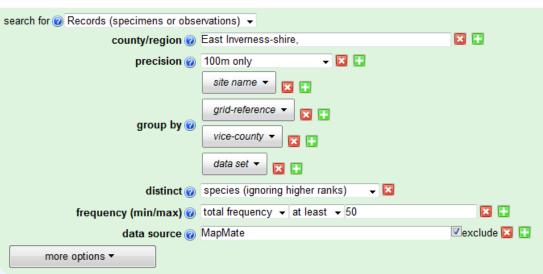




siteName	gridRef	VC	datasetname	taxa	
			Vascular plant data for		
Coire Madagan Mor	NN742853	96	Perthshire and Angus from	66	
			SNH and BSBI		
					_

Example of a site where a 100m precision grid reference was most probably used as an approximate site centroid. The coire extends into 2 tetrads / 3 monads, hence the grid reference can not sensibly be modified to a lower precision grid square.

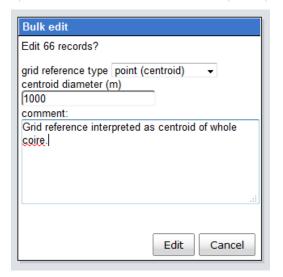




siteName	gridRef	VC	datasetname	taxa	
			Vascular plant data for		
Coire Madagan Mor	NN742853	96	Perthshire and Angus from	66	
			SNH and BSBI		
					_

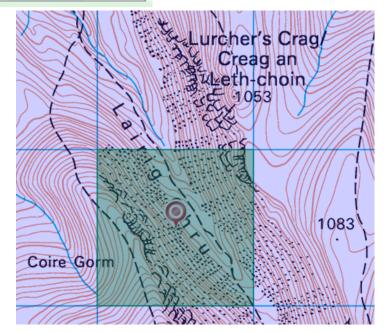
Example of a site where a 100m precision grid reference was most probably used as an approximate site centroid. The coire extends into 2 tetrads / 3 monads, hence the grid reference can not sensibly be modified to a lower precision grid square.

Therefore site grid reference has been altered to a centroid, with diameter 1km, (radius 500m).

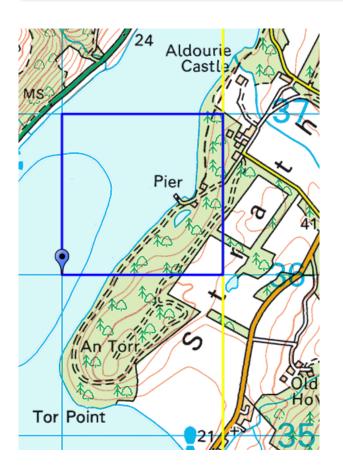


7	@record	@taxon	recorder	@vc	locality	grid ref	date 🔺	@status
		Arabidopsis petraea	Somerville, A.	VC96	Lairig Ghru	NH9602	21/7/1892	0
	4	Arabidopsis petraea	Somerville, A.	VC96	Lairig Ghru, pass	NH90	21/7/1892	•
	¥ 💋	Arabidopsis petraea	Melvill, J.C.	VC96	Lairig Ghru, pass	<u>NH90</u>	1901	•
		Arabidopsis petraea	Melvill, J.C.	VC96	Lairig Ghru	NH9602	1901	©
		Arabidopsis petraea	Groves, H.	VC96	Lairig Ghru	NH9602	29/8/1901	©
	4	Arabidopsis petraea	Groves, H.	VC96	Lairig Ghru, pass	<u>NH90</u>	29/8/1901	•
		Arabidopsis petraea	Groves, H.	VC96	Lairig Ghru	NH9602	29/8/1901	©
		Arabidopsis petraea	Haines, E.S.	VC96	Lairig Ghru	NH9602	22/6/1935	©
	J 💋	Arabidopsis petraea	Haines, E.S.	VC96	Lairig Ghru, pass	<u>NH90</u>	22/6/1935	•
		Arabidopsis petraea	Wells, T.C.E.	VC96	Lairig Ghru	NH9602	16/7/1958	•
		Arabidopsis petraea	Wells, T.C.E.	VC96	Lairig Ghru	NH9602	16/7/1958	•
	4	Arabidopsis petraea	Wells, T.C.E.	VC96	Lairig Ghru, pass	<u>NH90</u>	16/7/1958	©

- •Spurious precision (monad) cf duplicate hectad records
- •Change monad to hectad, or
- •Change all records to NH90SE Quadrant
- •Record dated 1958 may have correct grid ref, and is in same tetrad as other more recent records



Record (field observation)	
taxon	Lythrum portula (L.) D.A.Webb "Water-purslane"
date	1904
locality	Lochan near Aldourie Pier VC96 NH63 G
recorder	G.T. West
validity	confirmed externally, assessed by external VPDB user
source data set	Vascular plant data for Scottish vice-counties: Easterness (v.c. 96) (VPDB:dataset:551)

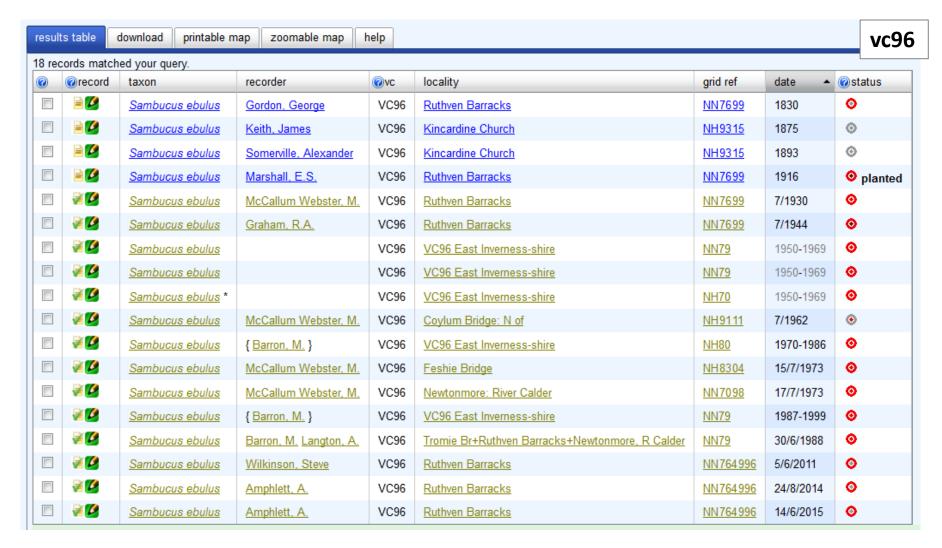


- •Record originally assigned to hectad NH63 (to right of yellow line on map)
- •But site name 'Lochan near Aldourie Pier' clearly refers to NH5936 in hectad NH53
- •NH53 is a 'new' hectad record

(Record has been edited on DDb)

results table download printable map zoomable map help							vc9	
18 re	ords match	ned your query. taxon	recorder	@vc	locality	grid ref	date 🔺	Status
	#	Sambucus ebulus 1st	McCallum Webster, M.	VC96	Kincardine Church	NH91	1875	•
	¥ 6	Sambucus ebulus	McCallum Webster, M.	VC96	Kincardine Church	<u>NH91</u>	1893	•
	¥ 💋	Sambucus ebulus	McCallum Webster, M.	VC96	Ruthven Barracks	NN7699	7/1930	•
	4	Sambucus ebulus	Graham, R.A.	VC96	VC96 East Inverness-shire	NN763995	7/1944	O
	¥ 💋	Sambucus ebulus		VC96	VC96 East Inverness-shire	<u>NN79</u>	1950-1969	0
	4	Sambucus ebulus		VC96	VC96 East Inverness-shire	<u>NN79</u>	1950-1969	O
	¥ 💋	Sambucus ebulus *		VC96	VC96 East Inverness-shire	<u>NH70</u>	1950-1969	0
	4	Sambucus ebulus	McCallum Webster, M.	VC96	Coylum Bridge: N of	NH9111	7/1962	•
	¥ 💋	Sambucus ebulus	{ Barron, M. }	VC96	VC96 East Inverness-shire	NH80	1970-1986	0
	4	Sambucus ebulus *	Webster, M.McC.	VC96	VC96 East Inverness-shire	NH8304	15/7/1973	o
	¥ 💋	Sambucus ebulus	McCallum Webster, M.	VC96	Feshie Bridge	NH8304	15/7/1973	o
	4	Sambucus ebulus	McCallum Webster, M.	VC96	Newtonmore: River Calder	NN7098	17/7/1973	o
	4	Sambucus ebulus	Webster, M.McC.	VC96	VC96 East Inverness-shire	NN7098	17/7/1973	o
	4	Sambucus ebulus	{ Barron, M. }	VC96	VC96 East Inverness-shire	<u>NN79</u>	1987-1999	0
	2	Sambucus ebulus	Barron, M. Langton, A.	VC96	Tromie Br+Ruthven Barracks+Newtonmore, R Calder	<u>NN79</u>	30/6/1988	o
		Sambucus ebulus	Wilkinson, Steve	VC96	RSPB Ruthven Compt	NN763998	5/6/2011	0
	4	Sambucus ebulus	Amphlett, A.	VC96	Ruthven Barracks	NN 764 996	24/8/2014	0
	4	Sambucus ebulus	Amphlett, A.	VC96	Ruthven Barracks	NN764996	14/6/2015	0

- •McCallum Webster was not born in 1875 or 1893. Record dates are correct but refer to herbarium specimens listed in her Flora.
- •Record by Graham (1944) location is Ruthven Barracks. 6 fig grid ref differs by 100m from current location. Most likely a minor grid ref error (OS grid was only shown on maps post 1945). But could be a stand now lost.
- •Record by Wilkinson (2011) is a reserve compartment centroid and clearly refers to current location.

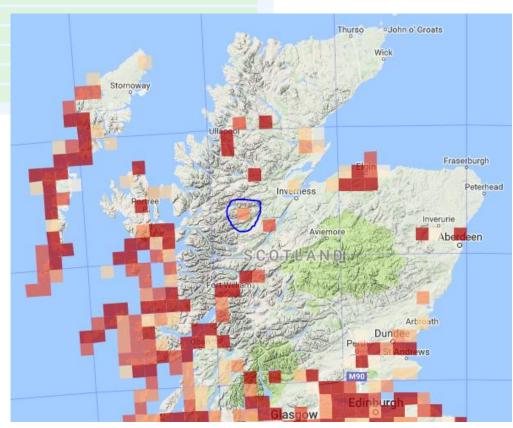


- •4 'new' historic records added (in blue).
- •2 incorrect McCallum Webster records rejected.
- •Graham record assigned a site name and grid ref reduced to monad.
- •Wilkinson record site name edited and centroid grid ref replaced by accurate grid ref.

NB *S. ebulus* now shown to have been at Ruthven barracks since at least 1830. Some edits relied on local knowledge of sites. NH70 Atlas record not supported by detailed record. Looks suspicious, but retain for now.

Record (field observation)						
taxon	Centaurium erythraea Rafn "Common Centaury"					
date	6/8/1997					
locality	Loch Mullardoch (S. of), Allt Fraoch - choire to Dam VC96 NH23SW G					
recorder	P. Batty and D. Batty					
	Mapmate:method: Field record / observation					
attributes	Mapmate:status: Not recorded					
validity	doubtful: Centaurium erythraea is crossed off on the back of the recording card, but with a ? mark and a tick at each end of the entry. On the front of the card in the then VCR's handwriting is written 'Query Centaurium erythraea'. Checked with original recorder and they can not recall making the record. Record considered unsubstantiated. (Ambiguous identification) 2016-12-05 by Andy Amphlett					
references	VC96 VC96 Record cards (held by VCR)					
source data set	MapMate centre 2dd (Andy Amphlett)					
status	unknown					
external id	MapMate:record:nud2v2dd					
ddb row id	2cd4p9h.dhrhpf#2cd4p9h.dhrhpg					
data source	MapMate (via provider MapMate)					
last modified	Fri, 18 Nov 16 10:23:01 +0000					

Example of a vc Scarce species, with doubtful entry on record card.





Incorrect transcription of field notes into database. Now corrected, but errors would not have affected Atlas 2020.





Duplicate records, one assigned to incorrect vc Incorrect record from Scarce Plant Project (VPDB)



Grid ref (circled in red) 100km east of actual location (NL985419)

- •Incorrect record from Taraxacum database
- •Same record as MM record below, with correct, more detailed grid ref



HEBRIDES

Acharacle

As61

Coll

Arinagour

Tobermory

Loch na

Keal

Scarinish

Treshnish
Isles

ISLE OF

MULL

Scridain

Loch na

Keal

Craignure

Kerrera

Oban

Fionnphort

Ross of Mull

ARGYLL AND BUTE Seil

Mellor

ARGYLL AND BUTE

As61

Research

Res

morar, moidart &

Ardnamurchan

Loch

Shiel

Record has been edited; see version history

Record (field observation) map status attributes version history admin

Sat, 20 Aug 16 12:13:58 +0100, 'BSBI public data set' workspace by user <admin user>
record Taraxacum polyodon Ferguson-Smyth, C. Tiree NM985419 30/3/2011 revert to this version

Thu, 02 Mar 17 13:30:53 +0000, 'BSBI public data set' workspace by user Andy Amphlett
record Taraxacum polyodon Ferguson-Smyth, C. Tiree NL985419 30/3/2011 origin id 9151314443188254127

INNER

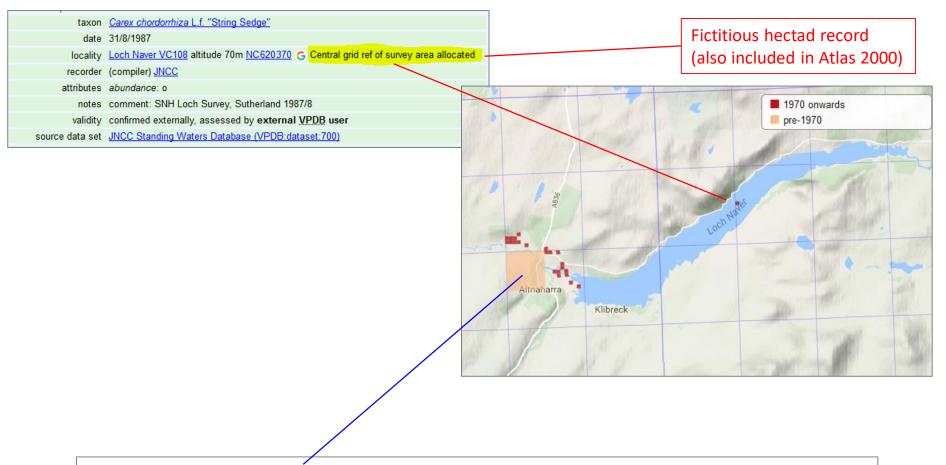
<u>vc103</u>

Record (field observation)	
taxon	Juniperus communis subsp. nana (Hook.) Syme "Dwarf Juniper"
date	19/6/2002
locality	Coll, Sloc na Faochag VC103 NM24035633 G
rec order	C.D. Preston, D.A. Pearman and A. Pearman
attributes	abundance: 4 shrubs
validity	confirmed externally, assessed by external VPDB user
source data set	Additional records for Coll and Tiree (VPDB:dataset:465)

- •Grid ref is in sea, and c.500m south of location on map,
- •Grid ref perhaps NM24035683, the 8 being misread as a 3
- •So incorrect grid ref probably in correct monad



<u>Carex chordorrhiza – vc108</u>

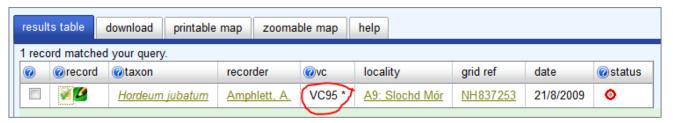


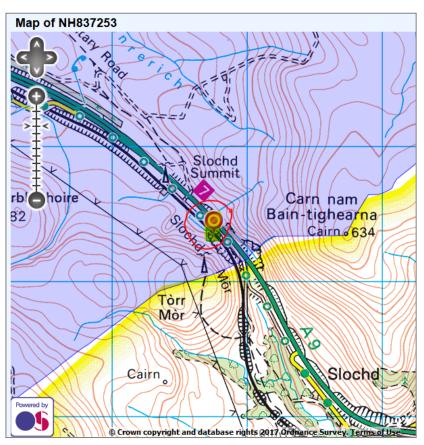
4 records from monad NC5635 (1897 – 1949) from *RDB Plants - historic records* dataset (from VPDB). No subsequent records from this monad, despite other more recent detailed surveys. Monad grid ref likely to be spurious; if so, reduce to tetrad.

Grid reference x vc mismatches

Grid-reference - vicecounty boundary matching **vc95** Records are hidden on public maps (and would be excluded from the Atlas) if a grid-reference is further than 2km from the specified county. Exceptions will be made for boundary errors and to allow marine species to occur off-shore. number of records 214,518 good <= 1km 10 1 - 2km 0 2 - 10km 0 10 - 50km 0 > 50km 0 <= 2km offshore 0 > 2km offshore 0 not testable 0

Grid reference x vc mismatches





- •Grid ref x vc mismatches close to vc boundary are commonly created in MapMate
- •This record, originally assigned to vc95 is actually from vc96
- •Because the location is within 2km of the vc boundary it would still be mapped and included in Atlas 2020, even if the vc was incorrect
- •But, it is one of only 2 post 2000 vc96 records, so assigning correct vc matters

