

***Gymnocarpium robertianum* (Hoffm.) Newman Limestone Fern**

Native

GB & England: Least Concern

GB Scarce

VC5 Rare; VC6 Scarce

A deciduous fern forming patches on open scree, rocks and stonework. Unknown in VC5 until 1981 when it was discovered by Caroline Giddens on a spoil heap in a disused slate quarry at Treborough, where it is increasing. In VC6 the distribution has contracted. Murray (1896) listed nineteenth century records for this species at Leigh Woods, Brockley, Burrington, Mellis, Friary Wood, Frome, Tor Hole near Chewton Mendip and Ebbor (where it was believed planted); however there have been no subsequent records at any of these sites. In 1894, it was discovered on lias ledges in the railway cutting near Saltford, where White (1912) believed it had been “brought along the railway by traffic from some limestone locality”. As a colonist of stonework, it was also recorded on walls below the canal between Bath and Batheaston by S.T. Dunn; found by Miss Roper at Congresbury station, established on the supporting wall of a platform (White, 1912) and in 1917 it was seen on stonework at Litton Reservoir by B.W. Tucker. There are no later records for any of these sites. *Gymnocarpium robertianum* can now be found at only two of the sites listed by White (1886) and Murray (1896): Cheddar Gorge and Cleeve. The upper part of Cheddar Gorge remains the stronghold for this species in Somerset. It is no longer “plentiful” but is locally abundant in several locations on loose scree on both sides of the gorge and also on a wall at Black Rock reserve as well as other scattered locations. At Cleeve, a small patch is known in Goblin Combe on lightly shaded scree. Two new sites have been found in the last century: on the walls of an old buddle house (formerly used for storing lead ore) in Biddlecombe, West Horrington, found by Joan Appleyard in 1970 (Willis, 1971), and on the inside walls of a disused lead flue at Priddy Mineries, found by John Boyd in 1987. In Somerset this species is at the southwest limit of its British distribution.



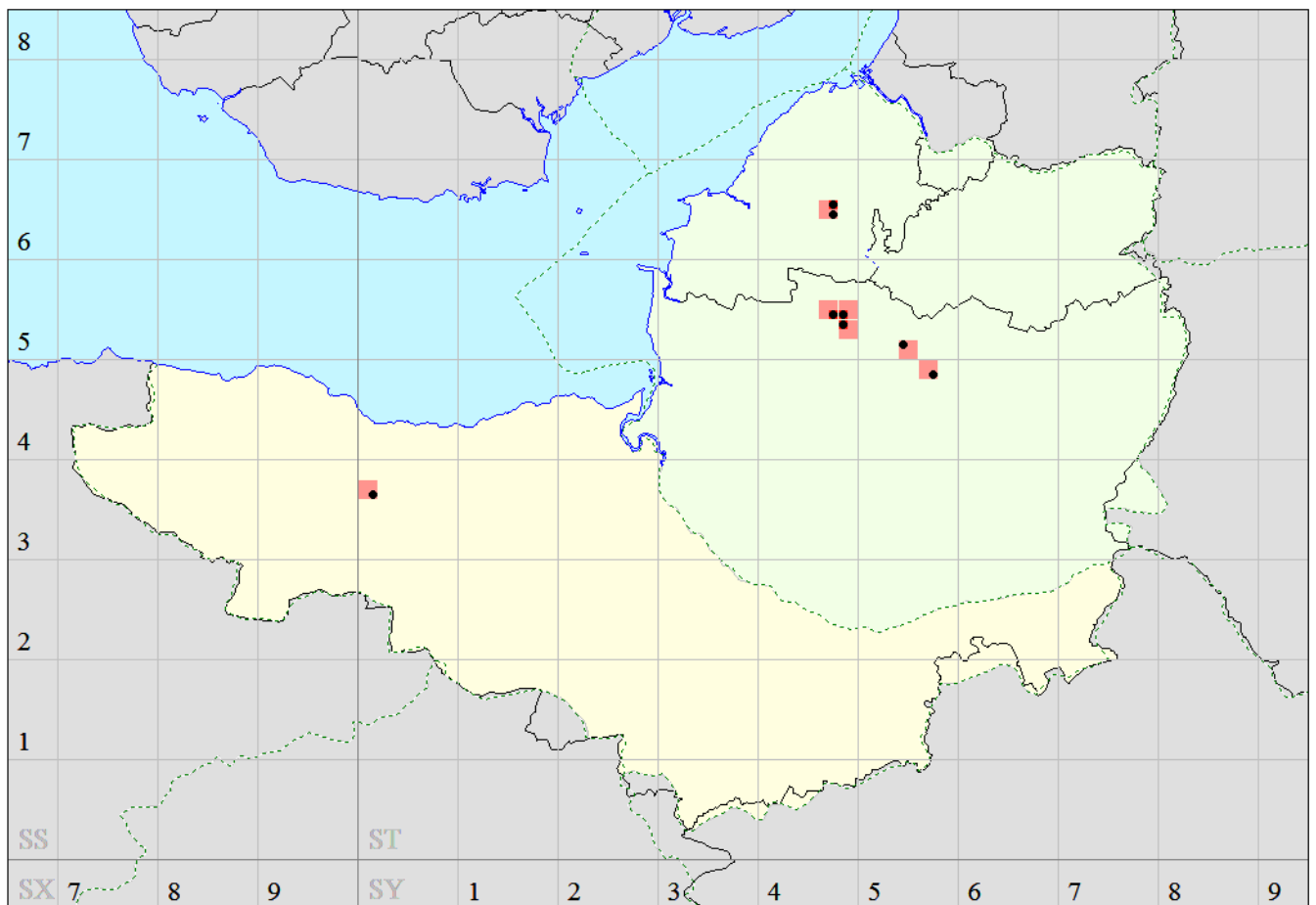
Gymnocarpium robertianum at Treborough Wood (2011). Photo: HJC

VC5

Treborough Wood ST013369 2011 HJC, FJR Thousands of fronds on spoil in disused quarry

VC6

Cheddar Gorge	SSSI	ST470541	1997	RFG, EJMCD	30-40 fronds in shade on steep mossy scree
Cheddar Gorge	SSSI	ST474543	1997	RFG, EJMCD	Hundreds in stabilised scree below cliff edges
Cheddar Gorge	SSSI	ST476546	1997	RFG, EJMCD	Thousands of fronds in wooded / open scree
Cheddar Gorge	SSSI	ST47735461	2009	SRPG	Small patch 1m x 1m on S-facing scree
Cheddar Gorge	SSSI	ST47925446	2013	HJC, IPG	Only a couple of fronds
Cheddar Gorge	SSSI	ST47965450	2012	HJC	Thousands of fronds on scree, S side of gorge
Cheddar Gorge	SSSI	ST480546	2012	MW	
Cheddar Gorge	SSSI	ST480538	1997	RFG, EJMCD	100+ fronds on mossy scree below rock edges
Cheddar Gorge	SSSI	ST48185384	2007	EJMCD	On mossy scree
Cheddar Gorge	SSSI	ST482537	1997	RFG, EJMCD	Hundreds of fronds on shaded mossy scree
Cheddar Gorge	SSSI	ST482538	1997	RFG, EJMCD	On NE-facing mossy scree and open slopes
Black Rock	SSSI	ST484545	1997	RFG, EJMCD	Small population on shaded mossy wall
Black Rock	SSSI	ST485546	1997	RFG, EJMCD	Few fronds inside lime kiln flue
Black Rock	SSSI	ST486548	1997	RFG, EJMCD	On shaded wall
Black Rock	SSSI	ST487548	2009	HJC, FJR	On N-facing side of wall beside footpath
Black Rock	SSSI	ST487549	1997	RFG, EJMCD	In woodland below steep NE-facing cliffs
Goblin Combe	SSSI	ST478649	2009	JPM	60+ fronds in 5m ² patch of lightly shaded scree
Goblin Combe	SSSI	ST4765	2005	SJP	About 10 plants, seems to have decreased
Priddy Mineries	SSSI	ST54565113	2011	HJC, FJR	16 fronds on inner stonework of linear flue
Biddle Combe		ST57074808	2011	HJC, JPC	26 fronds on walls of ruined Biddle House



Distribution of *Gymnocarpium robertianum* in Somerset, mapped using MapMate
Black dots are post-2000 records; pink squares are 1987-1999 tetrad records