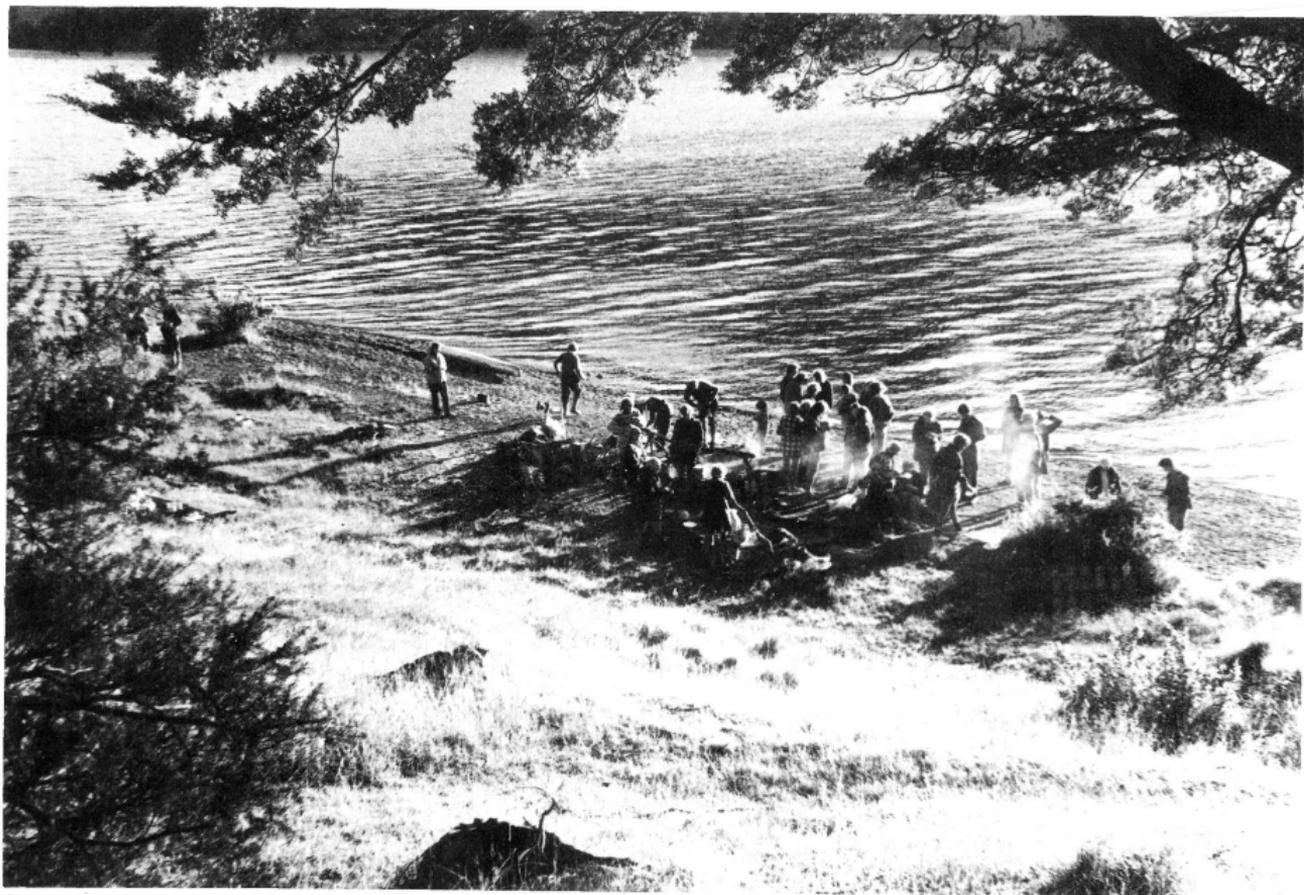
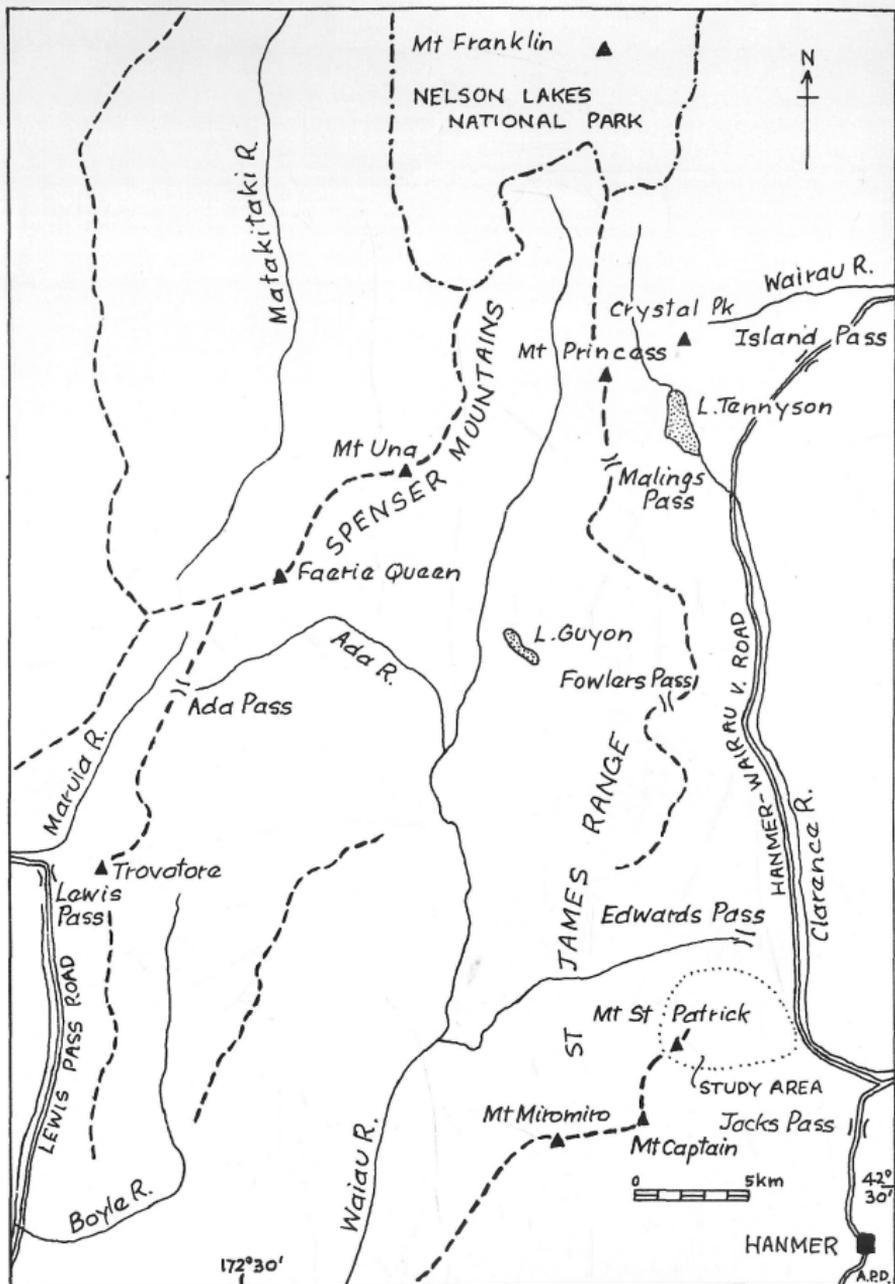




Evening meal St. James Station - 1976



7
Camp kitchen, Lake Tennyson, 1976



Flora of Mt St Patrick, St James Range, N. Canterbury

A. P. Druce, Wellington; M. J. A. Simpson, Lincoln

Mt St Patrick (1775m) is situated on the St James Range, south-east of the Spenser Mountains. Both ranges lie approximately in a north-south direction and form an important link between the floras of Canterbury and eastern Nelson. The St James Range forms the divide between the upper Clarence and upper Waiiau Rivers, and to the north meets the southern boundary of Nelson Lakes National Park. Peaks along the range increase in height from Mt Captain (1785m) in the south to Mt Princess (2125m) west of L. Tennyson. The range is interrupted by three low-level passes, Malings (1300m), Fowlers (1300m), and Edwards (900m), each occurring along a fault line. The parent rock is greywacke and the soils are classed as Kaikoura yellow-brown earths.

The botany of this part of Canterbury is not well documented. R. M. Laing in the course of a botanical expedition in 1911 with his brother, T. M. Laing, W. W. Rowntree, and C. E. Foweraker, crossed the range at Fowlers Pass on the way to Glacier Gully in the Spenser Mountains and returned by way of Malings Pass to L. Tennyson whence they climbed to about 1800m on Mt Princess. The results of the expedition were published in a brief account of the botany of the Spenser Mountains, together with a list of 310 species (Laing 1912). W. B. Brockie and H. Talbot visited the head of the Maruia R. and Ada Pass early in January 1945 and added a further 82 species (Brockie 1946). In an unpublished thesis (Scott 1959) some information is given about the past and present vegetation of the catchment of the upper Clarence.

The list below includes all the higher (vascular) plants we have seen between Williams and Peters Valleys on St James Station (825m), and the summit of Mt St Patrick (1775m), including the western slopes for some 300m below the summit ridge. Records made, and specimens collected, during a summer camp held in the area by the Canterbury Botanical Society provided the initial impetus in preparing the list. Subsequently one of us (A.P.D.) visited the area for two days with a small party in May 1973. We both visited the area for a day in April 1975 and again on the occasion of the Wellington Botanical Society's visit in January 1976.

There is a small area of mountain beech, *Nothofagus solandri* var. *cliffortioides*, remaining in Williams Valley with some red mistletoe, *Peraxilla tetrapetala*, present and a good number of young *Pittosporum patulum*. No other tree species were seen in this forest, which seems to have regenerated after the burning of a previous one. (At one time almost the whole area was clothed in beech forest up to the timberline at 1400m or so.) There is very little undergrowth in the forest except in seepages and along the margins of the stream, where a good many herbaceous plants occur.

The vegetation over most of St Patrick is shrubland, shrub-tussock land, and tussock land, with large areas of open rocky ground and scree. A continuous, unbroken cover of plants at higher altitudes (above 1200m) is found only locally, usually where there is some seepage, as in the large gully that leads from the summit down to the Amuri Ski Club buildings. Among the many plants growing in this area, which is dominated by the snow tussock, *Chionochloa pallens*, are *Coprosma atropurpurea*, *Abrotanella caespitosa*, *Caltha obtusa*, *Senecio* sp. (unnamed), *Astelia petriei*, a large unnamed spaniard (*Aciphylla* sp.), an uncommon whipcord hebe (*H. salicornioides*), and the grass, *Poa cheesemani*. This grass is common here, though recorded by Cheeseman only from L. Tennyson and from near Westport. It is easily recognised by its leaves which are glaucous on one side and green on the other.

We can only briefly mention here a few of the many groupings of plants found in the open rocky areas, and on the screes. On the wide, windswept saddle between the summit peaks *Myosotis traversii** and *Cotula pectinata* grow. To the south-west of the main summit on fine rock debris there is an unnamed raoulia, forming grey patches. The leaves are unusually harsh to the touch for a raoulia, and the shoots are quite brittle. On screes to the west of the summit the following characteristic scree plants occur: *Ranunculus haastii*, *Cotula dendyi*, *Lobelia roughii*, *Notothlaspi rosulatum* and *Lignocarpa carnosula*.

To the east of the saddle on the summit ridge there are small lobate terraces about 2m across, with risers of 30-40cm. On the terraces there are mats of *Anisotome* sp. (unnamed), and on the risers a dense cover of *Chionochloa australis*, *Raoulia apice-nigra*, *Chionohebe pulvinaris*, *Celmisia spectabilis*, *Luzula rufa*, and *Senecio bellidioides*, with little apparent zonation of species. On nearby terraces at a slightly higher level the zonation on the risers is more pronounced, with *Dracophyllum pronum*, *Aciphylla monroi*, *Celmisia viscosa* and *C. spectabilis* at the base, below a clear band of *Chionochloa pallens* and *Phyllachne colensoi*. Plants of *Celmisia incana*, *Raoulia apice-nigra*, *Poa colensoi*, and the lichen, *Thamolia vermicularis*, are locally prominent. These terraces create an unusual effect: looking along the slope the surface appears almost barren, but looking upwards the regular pattern of grey and yellow-green, vegetated, risers takes the eye.

The vegetable sheep, *Haastia pulvinaris*, grows amongst the lichen-covered summit rocks. Cushions are generally small, the largest being only one metre across. *H.p.* var. *minor*, which we think should be ranked a distinct species, is more common on north-facing slopes and forms larger, flatter cushions. Both are clearly regenerating, with many young plants present. Some vegetable sheep (both kinds) support an epiphytic flora that includes: *Epilobium tasmanicum*, *Raoulia grandiflora*, *R. bryoides*, *Cotula pyrethrifolia*, *Colobanthus buchananii*, and sometimes *Celmisia viscosa*.

Finally, we give one plant special mention as so few people have ever seen it and that is *Swainsona novae-zelandiae*. This occurs on semi-stabilised scree facing west, on a ridge to the north of the summit, in sites somewhat protected by overhanging tussocks.

*See p.58.

VASCULAR PLANTS ON MT ST PATRICK, ST JAMES RANGE,
N. CANTERBURY, 825-1775m

Grid ref. S47 105878

(unc) — uncommon or local

§ — voucher specimen in Botany Division Herbarium, Lincoln

INDIGENOUS PLANTS (351 SPECIES)

GYMNOSPERM TREES AND SHRUBS

§*Phyllocladus alpinus*

Podocarpus hallii (unc)

P. nivalis

P. hallii × *P. nivalis* (unc)

DICOT TREES

Nothofagus solandri var. *cliffortioides*

§*Pittosporum patulum* (unc)

DICOT SHRUBS

§*Aristolotelia fruticosa* var. *microphylla*

§*Carmichaelia arborea* var. (*C. robusta*)
(unc)

§*Cassinia leptophylla* var. *leptophylla*
(incl. *C. fulvida* var. *fulvida*)

§*C. vauvilliersii* (incl. *C. fulvida* var.
montana)

§*C. leptophylla* × *C. vauvilliersii*

Coprosma atropurpurea (unc)

C. cheesemanii s.s.

§*C. ciliata*

C. depressa

C. microcarpa (unc)

C. petriei (unc)

C. propinqua subsp. *propinqua*

C. pseudocuneata s.s.

C. pumila

C. rhamnoides (incl. *C. polymorpha*)

C. sp. (a) (unnamed; included in *C. parviflora* by Oliver, 1935, and others) (lf under-surface not minutely hairy as is usual in *C. parviflora*; drupes clear, or tinged pink or pale yellow)

C. sp. (b) (unnamed; aff. *C. pseudocuneata*) (low-growing shrub with small, thick, arcuate lvs)

§*Coriaria plumosa* (unc)

§*C. sarmentosa*

C. plumosa × *C. sarmentosa* (unc)

Cyathodes fraseri (incl. *C.f.* var. *muscosa*)

C. sp. (*Leucopogon suaveolens*) (incl. *C. colensoi*)

Discaria toumatou

§*Dracophyllum pronum*

D. uniflorum

Exocarpus bidwillii

§*Gaultheria crassa*

G. sp. (unnamed; included in *G. depressa*, as var. *novae-zelandiae*, by Franklin 1962)

G. crassa × *G. sp.* (unnamed)

§*Hebe cheesemanii* (unc)

§*H. ciliolata* (unc)

H. decumbens

§*H. epacridea*

§*H. glaucophylla* var. *glaucophylla* (unc.)

§*H. lycopodioides*

§*H. macrantha* var. *brachyphylla*

§*H. pinguifolia*

§*H. rakaiensis*

§*H. raoulii* var. *raoulii*

§*H. salicornioides* (unc)

H. traversii (unc)

§*H. venustula* (incl. *H. brachysiphon*)

§*H. sp.* (a) (unnamed? — aff. *H. odora*)
(CHR 275309)

§*H. sp.* (b) (lvs larger than in *H. rigidula*, up to 4 × 1cm, widest above the midpoint, weakly keeled, boat-shaped) (unc) (CHR 228697)

§*Helichrysum depressum* (unc)

§*H. parviflorum*

§*H. selago* var. *acutum*

Hymenanthera alpina

Leptospermum ericoides var. *ericoides*

Muehlenbeckia axillaris

§*Myrsine nummularia*

Olearia avicenniaefolia (unc)

O. cymbifolia

Pentachondra pumila (unc)

Peraxilla tetrapetala (unc)

Pimelea oreophila

P. traversii (unc)

§*P. sp.* (sprawling shrub; lvs silvery, densely hairy on both surfaces)
(CHR 283010)

Pittosporum anomalum (unc)

P. divaricatum (incl. *P. lineare*)

Pseudopanax sp. (unnamed; included in *P. colensoi*, as var. *ternatus*, by Wardle 1968)

Senecio bidwillii var. *viridis*

§*Traversia baccharoides*

DICOT LIANES

- Clematis forsteri* (incl. *C. australis*, *C. hookeriana*, and *C. petriei*)
 §C. sp. (cf. *C. marata* and *C. quadribracteolata*) (unc) (CHR 275291)

LYCOPODS

- Lycopodium australianum*
L. fastigiatum
L. scariosum

FERNS

- §*Asplenium flabellifolium* (unc)
 §A. *richardii*
Blechnum penna-marina
B. sp. (*B. capense* agg.) (bog sp.; lower pinnae reduced in length; fronds narrower than in common lowland sp.) (unc)
Cystopteris fragilis
 §*Grammitis armstrongii*
 §*G. givenii* (unc)
 §*G. patagonica* (unc)
 §*Hymenophyllum multifidum* (unc)
H. peltatum (unc)
H. sanguinolentum (incl. *H. villosum*) (unc)
Hypolepis millefolium
 §*Ophioglossum* sp. (cf. *O. coriaceum*) (CHR 283010)
Polystichum cystostegia (unc)
P. vestitum
Pteridium aquilinum var. *esculentum*

ORCHIDS

- Corybas macranthus* (unc)
C. trilobus (unc)
Microtis oligantha (unc)
Prasophyllum colensoi
 §*Pterostylis areolata* (unc)
 §*P. cynocephala* (unc)
Thelymitra formosa (unc)
 §*T. longifolia* (unc)

GRASSES

- §*Agropyron ensyisii*
 §A. sp. or spp. (*A. scabrum* agg.) (there may be two species present — one glabrous, CHR 283008-9, the other with hairy sheaths, CHR 225722, 275287)
 §*Agrostis dyeri*
 §A. *pallescens* (unc)
 §A. sp. (cf. *A. subulata*) (CHR 275285, 283022)
 §*Chionochloa australis*
 §C. *macra*
 §C. *pallens* var. (lvs broader than in var. *pallens*)

- §C. sp. (unnamed) (*C. flavescens* auct. South Island, non *C. flavescens* Zotov)

- C. macra* × *C. pallens*
C.m. × *C. sp.* (unnamed)
Cortaderia richardii
 §*Deschampsia chapmanii* (unc)
D. tenella (unc)
Deyeuxia avenoides (incl. *D.a.* var. *brachyantha*)
Dichelachne crinita
Erythrhanthera australis (unc)
 §*E. pumila* (unc)
Festuca novae-zelandiae var. *novae-zelandiae*
 §*F. sp.* (cf. *F. rubra*) (CHR 275264, 313055-6)

- Hierochloa novae-zelandiae*
 §*Koelaria cheesemanii*
 §*K. sp.* (*K. novo-zelandica* agg.) (lvs up to 2mm wide, flat to rolled) (CHR 283007)
 §*Lachnagrostis* sp. (unnamed; included in *L. filiformis*, as var. *semi-glabra* by Zotov 1965)
Notodanthonia buchananii
N. gracilis
N. penicillata
 §*N. setifolia* var.
 §*Poa breviglumis* s.s.
 §*P. buchananii*
 §*P. cheesemanii*
P. colensoi (incl. *P.c.* var. *breviligulata*)
 §*P. mackayi*
P. laevis var.
 §*P. novae-zelandiae* var. (CHR 283027)
 §*P. sp.* (a) (cf. *P. kirkii*) (unc) (CHR 275265-7)
 §*P. sp.* (b) (unnamed?) (unc) (CHR 275280)
 §*Trisetum youngii*
 §*T. sp.* (unnamed) (plant slender; if sheath glabrous, or nearly so) (CHR 275302)

SEDGES

- Carex acicularis* (unc)
C. breviculmis
C. comans (unc)
 §C. *coriacea*
C. diandra (unc)
C. dissita (unc)
C. flagellifera (unc)
 §C. *gaudichaudiana*
 §C. *inversa* (unc)
 §C. *petriei*
C. sinclairii
 §C. *wakatipu*

- §*C. sp.* (unnamed; included in *C. secta*, as var. *tenuiculis*, by Petrie 1920) (unc)
Carpha alpina (unc)
Eleocharis acuta (unc)
E. gracilis (unc)
Oreobolus pectinatus
§*Schoenus pauciflorus*
§*Scirpus aucklandicus*
S. caligenis
S. habrus (unc)
§*Uncinia divaricata*
§*U. fusco-vaginata* (cf. var. *caespitans*) (unc) (CHR 275277, 275292-4)
U. rubra (unc)
U. uncinata
- RUSHES
Juncus antarcticus (unc)
J. gregiflorus
§*J. novae-zelandiae*
Luzula migrata (unc)
§*L. pumila* (unc)
§*L. rufa* s.s.
§*L. traversii* s.s. (unc)
L. sp. (a) (unnamed; included in *L. picta*, as var. *limosa*, by Edgar 1966) (unc)
§*L. sp.* (b) (unnamed; included in *L. crinita*, as var. *petriana*, by Edgar 1966) (unc)
L. sp. (c) (?) (a plant brought into cultivation from 1400m, N47 115885, could not be placed in any of the above spp.; it subsequently died)
- MONOCOT HERBS (OTHER THAN ORCHIDS, GRASSES, SEDGES, RUSHES)
Astelia nervosa s.s.
A. petriei
§*Bulbinella hookeri*
Potamogeton cheesemani (unc)
Phormium cookianum
- COMPOSITE HERBS
Abrotanella caespitosa (unc)
Brachycome radicata var. *radicata* (unc)
§*B. sp.* (*B. sinclairii* agg.) (CHR 226085, 228621-2)
§*Celmisia allanii*
C. alpina (unc)
C. coriacea var.
§*C. gracilentata* var. (CHR 226053, 228638, 228640)
§*C. incana* (incl. *C. discolor*)
§*C. laricifolia*
§*C. lateralis* (incl. *C.l.* var. *villosa*)
§*C. sessiliflora*
C. setacea
§*C. spectabilis* var. *spectabilis*
§*C. traversii*
§*C. viscosa*
C. sessiliflora × *C. viscosa* (unc)
C. spectabilis × *C. traversii* (unc)
C. s. × *C. viscosa* (unc)
§*Cotula dendyi*
C. dioica subsp. *dioica* (unc)
C. pectinata subsp. *pectinata*
§*C. perpusilla* (unc)
§*C. pyrethrifolia* subsp. *pyrethrifolia*
§*C. serrulata* (unc)
C. squalida subsp. *mediana*
§*Craspedia sp.* (a) (cf. *C. incana* and *C. lanata*) (growing in well drained soils; fls yellow) (CHR 282941-3)
§*C. sp.* (b) (unnamed?) (growing in seep-ages; fls white) (CHR 282944)
Gnaphalium audax s.s.
§*G. ensifer*
G. limosum (unc)
G. mackayi
G. traversii
§*G. sp.* (a) (*G. luteo-album* agg.) (CHR 244347)
§*G. sp.* (b) (?) (CHR 282939, with solitary capitula, may represent another sp.)
§*Haastia pulvinaris* s.s.
§*H. sp.* (unnamed; included in *H. pulvinaris*, as var. *minor*, by Laing 1912)
Helichrysum bellidioides s.s.
H. filicaule
§*Lagenifera barkeri* (unc)
L. cuneata
L. strangulata
§*Leucogenes grandiceps*
§*L. g.* × *Raoulia bryoides* (unc)
Microseris scapigera
§*Raoulia apice-nigra*
R. australis
§*R. bryoides*
R. glabra (unc)
R. grandiflora
R. subsericea
R. tenuicaulis (incl. *R.t.* var. *dimorpha* and *R.t.* var. *pusilla*)
§*R. sp.* (unnamed) (forming loose, grey patches; lvs rigid, recurved) (unc) (CHR 275276)
§*Senecio bellidioides*
§*S. dunedinensis* (unc)
§*S. glaucophyllus* subsp. (aff subsp. *raoulii*) (unc) (CHR 275258)
S. lyallii
S. quadridentatus
S. scorzoneroides
§*S. sp.* (unnamed) (lvs mostly > 4× as long as wide; lower with long petioles and elliptic, shallowly lobed blades; upper becoming sessile, amplexicaul and narrower, with irregular, doubly serrate margins) (CHR 228700, 275275, 282926-7, 312931)
S. lyallii × *S. scorzoneroides*
Taraxacum magellanicum
Vittadinia australis var.

DICOT HERBS (OTHER THAN COMPOSITES)

- §*Acaena anserinifolia*
 §*A. caesiiglauca* (incl. *A.c.* var. *pilosa*)
 §*A. fissistipula*
 §*A. glabra*
 §*A. inermis* (incl. *A. microphylla* var. *robusta*)
 §*A. saccaticupula*
 §*A.* sp. (cf. *A. hirsutula* and *A. anserinifolia* var. *paucidens*) (CHR 275305)
 A. anserinifolia × *A. inermis*
 §*Aciphylla aurea*
 §*A. colensoi*
 §*A. monroi*
 §*A. subflabellata* (unc)
 §*A.* sp. (unnamed) (Section Elongatae, group c) (unc) (CHR 275318)
 §*A. colensoi* × *A.* sp. (unnamed) (unc) (CHR 275319)
 §*Anisotome aromatica*
 §*A. filifolia*
 §*A. pilifera*
 §*A.* sp. (unnamed; included in *A. imbricata*, as var. *prostrata*, by Dawson 1961)
 Caltha obtusa
 §*Cardamine* sp. (a) ("Scree Race" of Pritchard 1957) (CHR 312950)
 §*C.* sp. (b) (*C. debilis* agg.) (fls small or large, 3.5mm - 10mm; capsules us. densely, minutely hairy) (CHR 275295, 312951-2, 312970-1)
 C. sp. (c) (?) (several plants seen could not be placed in either of the above species)
 Cheesemanina sp. (unc)
 §*Chionohebe pulvinaris*
 §*Colobanthus acicularis*
 §*C. apetalus* (incl. *C.a.* var. *alpinus*)
 §*C. buchananii*
 C. strictus
 §*Crassula sieberiana*
 Drapetes villosus
 Epilobium alsinoides s.s (unc)
 §*E. atriplicifolium* s.s.
 §*E. brevipes* (unc)
 E. brunnescens s.s.
 E. chionanthum (unc)
 §*E. chlorifolium*
 §*E. crassum*
 E. hirtigerum (unc)
 E. insulare
 E. komarovianum (unc)
 §*E. macropus*
 §*E. melanocaulon*
 E. microphyllum
 E. nerteroides
 E. pedunculare agg. (unc)
 §*E. porphyrium*
 E. pubens
 §*E. pycnostachyum*
 §*E. tasmanicum*
 E. tenuipes
 §*E.* sp. (unnamed; included in *E. brunnescens*, as subsp. *minutiflorum*, by Raven and Englehorn, 1971)
 §*Euphrasia revoluta* (unc)
 E. zelandica (unc)
 Forstera tenella (unc)
 Galium trilobum (unc)
 G. sp. (cf. *G. perpusillum*)
 §*Gentiana corymbifera*
 G. grisebachii (unc)
 §*G.* sp. (in seepage at 1500m, N47 112887; not seen in fl) (unc) (CHR 275290)
 Geranium microphyllum
 G. sessiliflorum var. *novae-zelandiae*
 §*Geum* sp. (*G. parviflorum* agg.) (stock short; terminal leaflet about as long as broad; fls up to 13mm diam.) (CHR 275308, 282940)
 §*Gingidia decipiens* (unc)
 §*G. montana*
 §*G. trifoliolata* (unc)
 Gonocarpus aggregatus
 G. micranthus subsp. *micranthus* (unc)
 §*G. montanus* (unc)
 §*Gunnera densiflora* (unc)
 Hydrocotyle tripartita
 H. sp. (unnamed; included in *H. novae-zelandiae*, as var. *montana*, by Kirk 1899)
 §*Lignocarpa carnosula*
 Lobelia roughii
 Mazus radicans (unc)
 Mentha cunninghamii (unc)
 Montia calycina (incl. *Claytonia australasica* var. *biflora*)
 M. fontana s.s.
 §*Myosotis elderi* (unc)
 §*M. traversii* s.s.
 §*M.* sp. (a) (unnamed; included in *M. pygmaea*, as var. *drucei*, by Moore 1961) (unc)
 §*M.* sp. (b) (*M. australis* agg.) (*M. saxatilis* Petrie 1918, non *M. saxatilis* Pallas 1795) (CHR 225842)
 §*M.* sp. (c) (*M. australis* agg.) (fls yellow) (CHR 226056, 228665)
 Myriophyllum elatinooides (unc)
 M. propinquum (unc)
 Nertera balfouriana (unc)
 N. ciliata (unc)
 Notothlaspi australe
 §*N. rosulatum*
 §*Oreomyrrhis colensoi* s.s. (incl. *O.c.* var. *hispida* and *O.c.* var. *multifida*)
 O. ramosa

- §*Ourisia caespitosa* (incl. *O.c.* var. *gracilis*) (unc)
O. macrophylla var. *lactea*
Oxalis lactea
Parahebe decora (unc)
P. lyallii
 §*Phyllachne colensoi*
Plantago lanigera
P. triandra
 §*P. uniflora*
Potentilla anserinoides (unc)
Pratia angulata
P. macrodon
 §*Ranunculus cheesemanii* s.s. (unc)
 (Kirk 1899, in his description of this sp., says: "Flowers not seen"). However, being small and completely apetalous, the fls are easily overlooked. The description in Allan 1961 appears to include plants other than *R. cheesemanii* s.s.)
 §*R. foliosus* (incl. *R. royi*?) (plants seen in Jan. 1976 were producing fls with few or no petals (CHR 283016-8); when a number of these were brought into cultivation they produced fully petalous fls the following spring)
- R. glabrifolius* (unc)
R. gracilipes
R. haastii subsp. *haastii*
R. hirtus s.s.
R. insignis
R. sp. (*R. lappaceus* agg.) (fls petalous, on long peduncles) (unc)
Rumex flexuosus (unc)
Schizeilema nitens
 §*S. pallidum*
 §*S. roughii*
 §*Scleranthus brockieii*
S. uniflorus
Stackhousia minima (unc)
Stellaria gracilentia
S. parviflora (incl. *S. minuta*)
 §*S. roughii*
Swainsona novae-zelandiae (unc)
Viola cunninghamii
 §*Wahlenbergia albomarginata* var. *albomarginata* (incl. *W. pygmaea* var. *laxa* and *W. simpsonii*)
 §*W. gracilis* (unc)
- ERRONEOUS RECORD
- Lagenifera montana* (Drury 1974) (the identity of the plant on which this record was based is *L. barkeri*)

ADVENTIVE PLANTS (68 SPECIES)

TREES AND SHRUBS

- Larix decidua*
Pinus sp.
Salix fragilis
Rosa rubiginosa
Sarothamnus scoparius

GRASSES

- Agrostis tenuis*
Aira caryophylla
Alopecurus sp.
Anthoxanthum odoratum
Cynosurus cristatus
Dactylis glomerata
Festuca rubra subsp. *commutata*
Glyceria declinata
Holcus lanatus
Lolium perenne
Phleum pratense
Poa annua
P. pratensis
P. trivialis
Vulpia bromoides

SEDGES AND RUSHES

- Carex ovalis*
Juncus articulatus
J. bufonius
J. effusus
J. tenuis
 §*J. effusus* × *J. gregiflorus*(?) (CHR 278216)

COMPOSITE HERBS

- Achillea millefolium*
Chrysanthemum leucanthemum
Cirsium arvense
C. vulgare
Crepis capillaris
Hieracium pilosella
 §*H. praealtum*
Hypochoeris radicata
Matricaria inodora
M. matricarioides
Mycelis muralis
Senecio jacobaea

DICOT HERBS (OTHER THAN COMPOSITES)

Callitriche stagnalis
Centaurium erythraea
Cerastium holosteoides
Dianthus armeria
Echium vulgare
 §*Epilobium ciliatum*
Hypericum perforatum
Linum catharticum
Mimulus moschatus
 §*Myosotis caespitosa*
M. discolor
Navarretia squarrosa
Orobanche minor
Plantago lanceolata
P. major

§*Polygonum arenastrum*
Prunella vulgaris
Ranunculus fluitans
 §*R. sceleratus*
Rorippa sp.
Rumex acetosella
R. crispus
R. obtusifolius
Sagina procumbens
 §*Stellaria alsine*
Trifolium arvense
T. dubium
T. pratense
T. repens
Verbascum thapsus
Veronica serpyllifolia

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