EREMOPHILA STUDY GROUP NEWSLETTER NO. 27 AUGUST 1983

We now have a total membership of 96 and the breakdown into States is: Western Australia 2, South Australia 54, Northern Territory 2, Victoria 20, New South Wales 8, A.C.T. 1, Queensland 8, Tasmania 1.

Whilst some States have far more members than others, it is a pattern dictated more by climatic conditions rather than anything else. The ability to grow the particular genus which interests them is what motivates people to join the study group of their choice. The main concentration of members is in the areas best suited for growing eremophilas; nevertheless other members have devised various methods to overcome unfavourable conditions. Some of these methods are grafting, raising garden beds, importing soil, etc., and they have provided valuable information to help in the introduction of eremophilas to the garden.

G.N.

A FURTHER FROST REPORT

Jacqui Merckenschlager

Now that the full effect of last year's frosts can be gauged, I thought some members might be interested in comparing notes on survivals and losses.

Our soil is a very light, deep sand of pH7.5, and when I plant the eremophilas I add a shovel full of clay-loam of pH8 to the sand around the little plant. Most of our eremophilas are planted in a fully exposed position and watered only every couple of weeks during the hottest months. Those planted in an area which has a black plastic and bark mulch have grown faster and have been slightly less affected by the frosts (probably because the plastic helps retain soil moisture).

Dave Gordon asked about the most effective method for protecting young plants from frost. We have used rabbit-proof netting guards about 30 cm high with a 23 cm wide strip of clear plastic, buried in the soil on one side, pulled over the top of the guard, and secured there by pieces of the wire, then buried on the other side, leaving two sides open. I believe two factors help minimise our frost damage. Firstly, the plastic helps retain moister air around the young plant, and secondly, the plastic becomes covered with a salty film which acts as a shade, reducing the ability of the early morning sun to thaw any frost on the plant too quickly.

The following is a list of species which we have growing, and of the damage which occurred. The temperature in Murray Bridge reached −5°C on two occasions and as we are in a hollow I would guess that we were a degree or so below that temperature:

D = dead, H = half growth burnt, M = moderate tip burn, L = light tip burn, X = not damaged. The height of the plant is in brackets

E. alternifolia (1 m): M

E. behriana (ground cover, young plant): H

E. biserrata (ground cover): L

E. bignoniiflora (2 m): D (most plants)

E. brevifolia (1 m): X (buds burnt)

E. calorhabdos (1 m): X (buds burnt)

E. chamaephila (ground cover): L

E. crassifolia (20 cm): M

E. decipiens (fine leaf form, 50 cm): X

E. decipiens (coarse leaf form, 1 m): M

E. densifolia (10 cm): L (one in heavy loam suffered no damage)

E. denticulata (2 m): L

E. dichroantha (50 cm): D

E. divaricata (1.5 m): X

E. drummondii (broad leaf, 40 cm): D

E. *drummondii var. brevis (1 m):* X

E. drummondii (tall, fine leaf): M to L

E. glabra (ex Murchison River, 1 m): D

E. *glabra (yellow form, ground cover):* D

E. glabra (red, ground cover, from Owen, 15 cm): M

E. glabra (orange, ground cover, from Kiki, 10 cm): M

E. glabra (grey leaf, red flower—used to be called E. subfloccosa): X

E. glabra (grey leaf, green flower): X

E. glabra (grey leaf, serrated edge, green flower, ground cover): H

E. glabra (green leaf, red flower, ground cover, from Roseworthy): X

E. "gracilis" (very fine leaves, red flowers): X now included under E. decipiens (Ed.)

E. *hillii (orange and red forms, 10 cm):* X

E. ionantha (15 cm): X

E. interstans (30 cm): X

E. *lehmanniana var. dentata (50 cm):* L

E. laanii (65 cm): D

E. longifolia (3 m): X

E. maculata var. brevifolia (40 cm): L

E. maculata (yellow form, 1 m): X

E. maculata (orange, pink, and apricot coloured forms): L

E. macdonnellii (4 forms): X

E. "nivea" (50 cm): H or D

E. oppositifolia (30 cm): D, or may reshoot from base

E. pachyphylla: X (but was under shadecloth)

E. polyclada (10 cm): L

E. purpurascens (50 cm): D

E. racemosa (1.5 m): L

E. saligna (50 cm): D

E. sargentii (15 cm): H

E. serrulata (10 cm): D

E. serpens (well established): D

E. *sturtii (30 cm):* X

E. subfloccosa (50 cm): X

E. weldii (20 cm): X

E. youngii (10 cm): L

E. 550 (E. "barbata"): X

We are extending our Eremophila patch soon and intend incorporating a lot more loam into the topsoil this time, as plants, which I have put in at a local school where there is a red loam topsoil over limestone 10 cm down, are doing far better than our own plants.

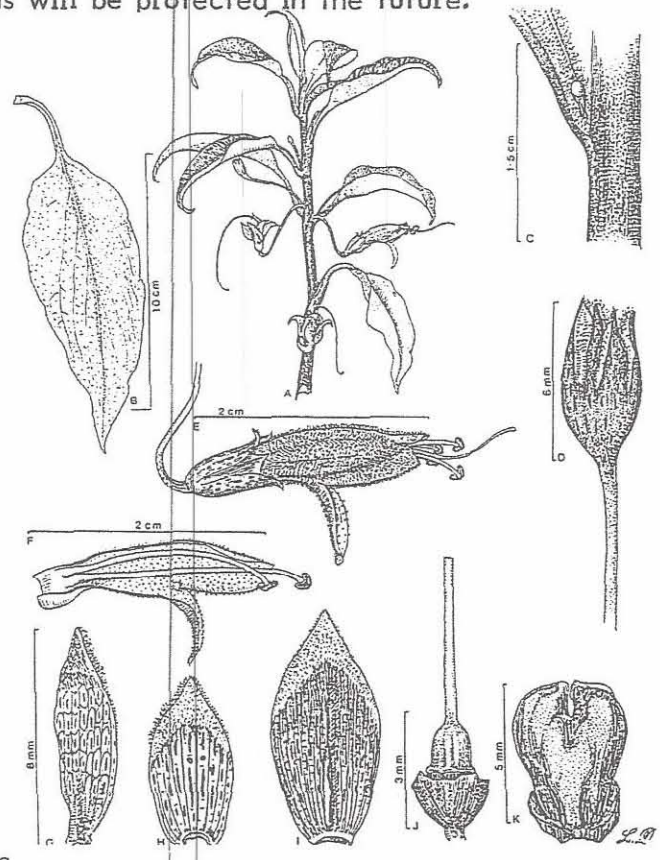
RARE FLORA LIST

Bob Chinnock

In Newsletter no. 20, I drew attention to two species of Eremophila, E. virens and E. denticulata, which were gazetted as rare flora under the Western Australian Wildlife Conservation Act 1950-1979.

Recently, the list has been expanded and an additional six Eremophila and one Myoporum have been added. They are Eremophila inflata, E. merralli, E. microtheca, E. resinosa, E. serpens, E. viscida, and Myoporum salsoloides.

Although most of these species are known only from a few localities, one might wonder, when they see the distribution map of E. viscida, why this species was placed on the list as it is known from at least nine locations. The answer is very simple. At most of these localities (almost all in the wheat belt) the species was restricted to roadsides and often only a few individuals were present. One of these populations was completely decimated in 1979 during roadside clearing and, as a result of the Wildlife Act, such roadside populations will be protected in the future.



Eremophila virens

A, habit; B, mature leaf; C, enlargement of branch; D, flower bud; E, side view of flower; F, longitudinal section through corolla; G-I, sepals showing prominent hair tufts at apex; J, gynoecium; K, fruit.