



ROSEA CACTUS

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Rosea cactus (*Opuntia rosea* D.C.; family Cactaceae) is a relatively new weed in South Africa, but it has the potential to create even greater problems than the notorious jointed cactus (*O. aurantiaca*) which requires some one million rand per year to control.

Rosea cactus is densely covered with vicious thorns that can injure animals and it spreads rapidly since any part of the plant that detaches can give rise to a new plant. This means that it suppresses the indigenous vegetation and reduces the carrying capacity of the veld. The common Afrikaans name is "roseakaktus".

MORPHOLOGICAL DESCRIPTION

Rosea cactus is a sturdy, compact, perennial succulent that reaches a height of 1,5 m. It consists of an erect stem which branches at the tip to form numerous cylindrical, half-curved stem joints. Spirally arranged areoles occur on the stem joints

FIG. 1 - Rosea cactus with flower (*Opuntia rosea*)



FIG. 2 - Infestations of rosea cactus near Douglas

and each areole is armed with up to 20 long, white to yellowish spreading thorns.

These thorns - which can reach a length of 25 to 40 cm - are covered with a white, powdery sheath that is easily removed and it is so dense that the stem joints are hardly visible.

The thorns are provided with barbed hooks and when this penetrates an animal's skin it is drawn in deeper. The barb is also the reason why the joints catch so readily on passing objects. The stem joints are about 10 to 20 cm long and 2 to 4 cm in diameter.

The bigger stem joints bear a number of smaller joints which detach at the slightest touch to cling to any object rubbing against it. Since there are no true leaves the green stem joints take over the leaves' function of photosynthesis.

Between November and January the plant bears large, deep-pink flowers that measure about 3 cm in diameter. The petals, which are arranged in three or four rows, are curved backwards to form an acute angle. The flowers produce hard, oval, yellowish fruit about the size of guavas, but the fruit contain only sterile seeds. The fruits also bear buds with groups of small thorns, but these are much smaller than those on the stem joints.

Another South African weed, the imbricate cactus (*O. imbricata*) also bears deep-pink flowers, but it can readily be distinguished from rosea cactus because its thorns are pale brown and sparse, while the plant has an open appearance and reaches a height of 1 to 3 m. The jointed cactus (*O. aurantiaca*) has yellow flowers, the stem joints are slightly compressed and the thorns are unsheathed, and the plant seldom reaches a height of more than 0,5 m.

DISTRIBUTION

This weed is indigenous to Mexico from where it was fairly recently introduced as an ornamental for South African rockeries. It is not known as a weed in other parts of the world.

In South Africa the infestation is at present restricted to five farms in the Orange Free State and the Northern Cape. The worst infestation occurs in the Herbert district near Douglas in the Broken Veld of the Orange River, but the plant has also been noticed at Vryburg, Jan Kempdorp and Hartswater.

A total area of 5 187 ha is infested with rosea cactus. This infestation originated from a rockery on one of the farms. Since succulent enthusiasts have established the plant in many rockeries, there is the very real danger that it could spread from these

rockeries to all of the more arid veld types of the Cape and also to the Free State and Transkei.

GROWTH AND REPRODUCTION

Reproduction of the rosea cactus is exclusively vegetative since any part of the plant, including the fruit, takes root wherever it touches the ground and gives rise to a new plant. The large stem joints form smaller joints that detach very easily and adhere, by means of the barbs, to any human, animal, farm implement or vehicle that touches it. In this way the joints are spread over vast distances. The weed tends to considerably reduce the carrying capacity of the veld by ousting the natural vegetation.

Rosea cactus does not propagate by means of seeds since the fruits produce only sterile seeds.

LEGISLATION

Rosea cactus has been proclaimed a weed under the Conservation of Agricultural Resources Act of 1983 (Act No. 43 of 1983). This implies that no-one may distribute it or permit its distribution. Under this legislation rosea cactus may not occur in any urban area, and if it occurs on any farm unit in the Republic, it must be controlled effectively.

CONTROL

Since its present distribution is very limited, rosea cactus control must be aimed at preventing spread of the weed to uninfested areas. It is therefore important for farmers and gardeners to be able to recognise and identify the plant wherever it occurs in the veld or in gardens. Everyone must also be made aware of the menace which the plant constitutes. Every single specimen of the plant should be eradicated, even solitary plants, since any existing plant is a new source of infestation.

Mechanical control is ineffective due to the plant's ability to propagate vegetatively. Existing infestations can, however, be controlled chemically by spraying them with a solution of 2,4,5-TP in water, preferably during the hot months when the plants are growing actively. The chemical should first be applied to the periphery of the infested area to prevent the plants from spreading to adjoining areas. For further information concerning the control of rosea cactus, farmers can contact their nearest agricultural extension officer.