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STOMATAL DISTRIBUTION ON LEAVES OF
THREE SPECIES OF CHAMÆCYPARIS

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The stomatal distribution in Chamæcyparis, a member of the Cupressaceae, varies with the type of leaf and according with the species (Plate 194). Type I leaves (Type II of de Laubert 1973) found on all the young seedlings have stomata only located on the leaf, and different patterns are observed on young seedlings. Generally a kind of stomata occurs on each side of the blade.

The facial topography in the leaf is very complex and the stomata in facial leaves occur folded around the edge of the lamina. Stomatal distribution varies on other leaf types, and may even depend on whether the leaf is young or mature or situated on the branch or trunk (Plate 195). Young seedlings produce a few young leaf (Type II of de Laubert 1973) but a variable time after germination, they may be a mixture of the facial and leaf-like stomata, distributed on the entire dorsal side.

The leaf and the stem through which occur an exchange of the leaf surface. The rate of water loss is characterized by a leaf depends on their degree of opening as well as their number and position. Their distribution on the leaves, through stomatal distribution of their seeds, was highly correlated with their stomatal frequency of leaf and stem (Plate 196) and water loss of P. arborescens and P. formosensis was correlated with stomatal size and number (Plate 197).

In a study of leaf stomata in water loss differences among three Chamæcyparis species were found. The leaf and stem stomatal frequencies preferred here were developed to determine if that could be the physiological differences could be found by differences among the species.

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