

## SOLANUM

Vessels very variable in size, commonly ranging from very small (25-50  $\mu$  mean tangential diameter) to medium sized (100-200  $\mu$ ) even in different species of same genus. Mostly small (less than 100  $\mu$ ). Very variable in arrangement, but very commonly with irregular clusters and frequently with some multiples of 4 or more cells, occasionally with a tangential pattern in some species; woods with a tangential pattern often with groups of extremely small vessels that look like tracheids or parenchyma in TS. Mostly 7-30 per sq. mm, more than 100 per sq. mm. in some species. Ring-porous in some species. Spiral thickening reported, sometimes limited to smaller vessels. Perforations simple. Intervascular pitting typically moderately large. Pits to ray and wood parenchyma usually simple and elongated, but similar in size and shape to intervacular pitting in *Solanum*. Tyloses rare, not abundant. Mean member length 0.3-0.4 mm.

Parenchyma usually scanty and limited to a few cells or a narrow sheath round each vessel; predominantly apotracheal, as scattered cells or irregular uniseriate bands in occasional species of *Solanum*, e.g. *S. vitiense*; very rare in or absent from other species. Strands of 2 or 2-4 cells.

Rays sometimes of 2 distinct sizes, 1-8 cells wide; largest (5 or more cells wide) in some species. Uniseriate, in woods with heterogeneous rays, usually numerous and composed of square to upright cells only or with some procumbent cells; low and rather few in some species. Rays 4-13, mostly 7-9, per mm. Typically heterogeneous (Kribs Type II A and B, and occasionally I), sometimes with more than 4 marginal rows of square or upright cells, rarely with 10 or more rows. Homogeneous (Kribs Types I and III) in some species, e.g. *S. bicolor* and *S. wightii*; rays short and cells small in species with homogeneous rays.

Fibres typically with simple or indistinctly bordered pits, more numerous on radial than on tangential walls; pits often very few. Mean length 0.7-0.95 mm.