STAPHYLEA

Vessels moderately small (50-100 µ mean tangential diameter), occasionally very small (about 40 µ); typically exclusively solitary or nearly so; varying in number from about 20 per sq. mm. in woods with the largest vessels to about 100 per sq. mm. in woods with the smallest vessels. Sometimes with a tendency to ring-porousness; spiral thickening sometimes present. Perforation plates scalariform and oblique, usually with 20-30 fine bars. Intervascular pitting rare owing to lack of paired vessels, opposite or transitional between scalariform and opposite; some alternate pitting noted. Pits to ray and wood parenchyma commonly simple. Mean member length 1.0-2.2 mm.

Parenchyma rather sparse, typically a few cells along the abaxial sides of the vessels, but in Staphylea may be limited to the radial walls. Strands of 4-8 cells.

Rays mostly 4 cells wide, up to 10 cells in some spp. usually about 1 mm. high; uniseriate rays numerous and composed of high upright cells; 5-15 per mm. Heterogenous (Kriss's Types I-IIA), with 4-10 rows of marginal upright cells.

Fibres with numerous distinctly bordered pits on all walls, the borders of about the same size as those of the intervacular pit pairs; walls moderately thin to very thick. Mean length 1.5-3.4 mm.