Betulaceae

BETULA

Vessels small (50-100 / mean tangential diameter) or slightly larger in some sp. numerous multiples of up to 3 cells and usually some multiples of 4 or more; often with loose oblique pattern, usually about 9-30 per sq. mm. (Inst. slide vessels seem much larger, as well as fewer, than in Alnus), (also seem mainly radial in arrangement). Perforation plates scalariform with 20, or fewer bars, never reticulate. Intervascular pitting typically alternate and minute. Pits to ray and wood parenchyma similar to the intervascular pitting. Mean member length 0.6-1.2 mm.

Parenchyma apotracheal, rather sparse, as cells scattered among the fibres and along the ring-boundaries, terminal parenchyma often in continuous bands. Metatracheal bands 1-3 cells wide in the cylindrostachya Wall. Strands usually of 8 cells.

Rays up to 4, occasionally 5 cells wide, rarely aggregated. Rays of B. alba var cordifolia mostly uniseriate. Betula normally has moderately numerous to rather few uniseriates. 7-15 rays per mm. Homogeneous (Kribs's Types I and III).

Fibres with rather few pits, which tend to be more numerous on the radial than on the tangential walls, the pits with small but distinct borders. Walls of medium thickness. Mean length 1.1-1.8 mm.