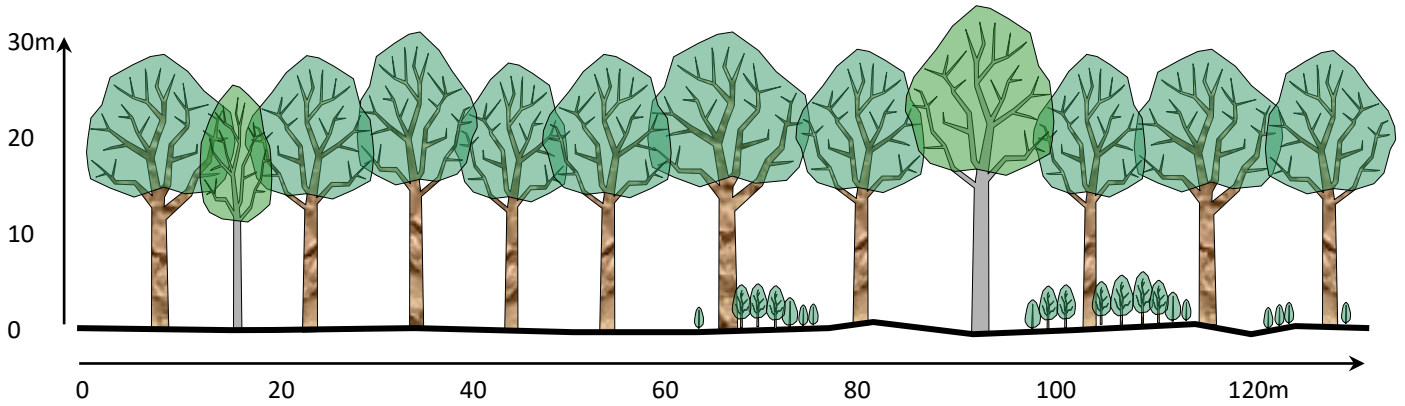
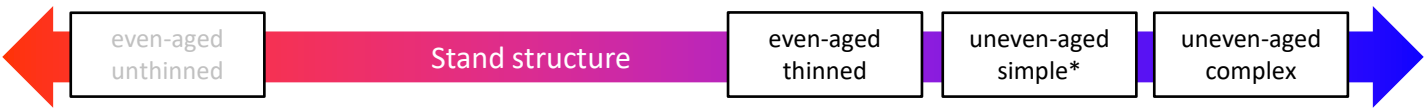
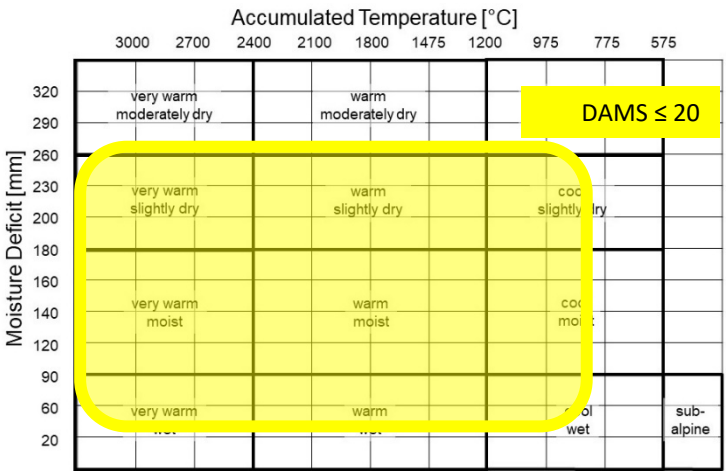
FDT 8.3.1 SY

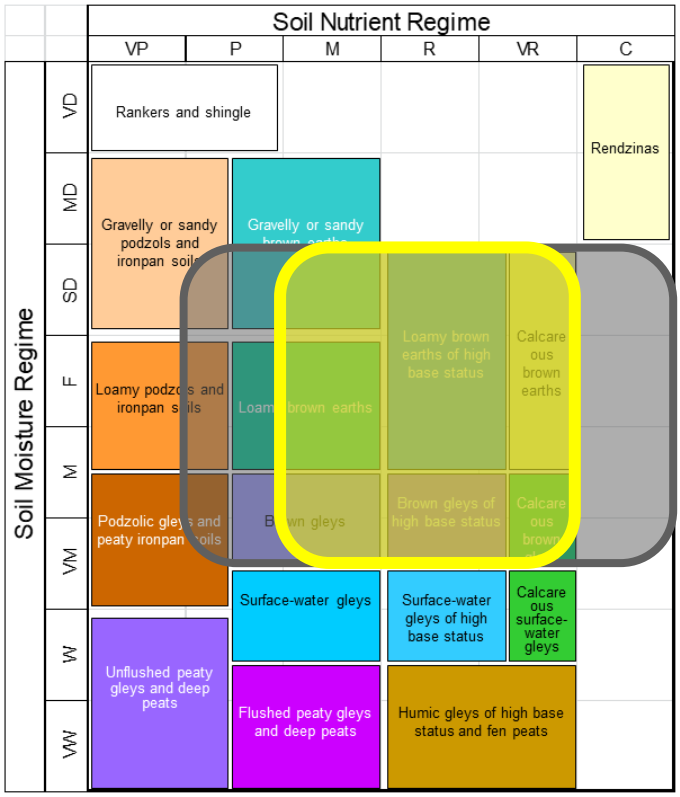


1. Structure and dynamics:
Initially single-storeyed SY stand with admixed category B species such as AH, BE, HBM, OK, BI and others.
Species distribution: SY 80 – 100% minor species: < 20%
Management under LIMA / CCF regimes, which will provide an opportunity for structural and species diversification. Most species should be propagated via natural regeneration.



2. Ecological suitability:
Represents no NVC type but provides niches for elements of W8, W9, W10 and W11. Suitable for deep, free draining loamy soils of better nutrient supply including calcareous soils.





3. Management objectives:

Economic (SY GYC > 6):	SY – veneer / joinery grade / sawlogs, target DBH > 50cm in 80 – 120yrs, optional (grey squirrels)
Environmental and social:	Broadleaved woodland with attractive spring aspect and autumn colours. SY also provides much of the ecological functionality of AH. The envisaged structural and species diversification is likely to increase the amenity and landscape value of this FDT further.

4. General management principles for the FDT

This FDT is designed for pure, even-aged stands of SY which often originate from afforestation schemes and are likely to diversify with regard to structure and species mixture over time. The presence of grey squirrels may restrict the ability to produce high quality timber. If high timber quality is a viable option, the Q/D management approach is recommended, using moderate to high initial stocking density and careful quality selection during respacing and thinning. Dominant trees of poor quality need to be eliminated by selective respacing, desirable FC trees promoted by thinning. The growth response of SY to thinning interventions is strong at young age but diminishes rapidly later; silvicultural interventions must therefore ensure the crowns of FC trees are fully developed at an age of about 40yrs. Crown thinning should be applied throughout. Thinning at later stages must aim to maintain steady growth of FC trees. LIMA / CCF methods should be used to introduce and maintain the desired horizontal and vertical stand structure.

5. Timeline

stage	H_{100} [m]	intervention
Establishment		• Planting of 3000 – 5000 trees/ha or natural regeneration.
Young stand	< 3	• Protection against animals / plants as necessary; in particular targeted long term control of grey squirrels. • Clearing of any damage caused by felling / extraction of overstorey trees. • Regulation of species composition and minor species as required.
Thicket stage	4 – 8	• Generally no interventions, except for: • Negative selective respacing (removal of undesirable trees), clearing of damage caused by felling / extraction of overstorey trees, and cleaning or pollarding of aggressive infill overtopping promising SY.
Pole stage	8 – 12	• Continue negative respacing if necessary, otherwise shift to positive selection and carefully promote up to 200 FC tree candidates/ha by removing 1 – 3 competitor(s). Maintain closed canopy for ongoing self-pruning, consider artificial pruning in low density scenarios.
Pole to small timber stage	12 – 16	• Thinning interventions start when FC tree candidates have reached the desired length of clean bole. Select 80 – 100 FC trees/ha, and apply crown thinning to release their crowns from competitive neighbours. In contrast to most other XBLL a slight clumping of FC trees is acceptable.
Timber stage		• Monitor competition status of FC trees, stand density, stability and health, and thin accordingly. Apply crown thinning as long as necessary for the benefits of FC trees. • Maintain and develop understorey where present, particularly where aggressive ground vegetation needs to be controlled. • Assess potential for natural regeneration and decide on harvesting method when FC trees approach target DBH – improve conditions if necessary.
Final harvesting and regeneration stage		• Carry out harvesting operations according to agreed LIMA / CCF method. • Monitor light level, ground vegetation, occurrence and growth rate of regeneration, supplement by planting if necessary.