

INTERSPECIFIC HYBRIDIZATION IN FOREST TREES:
POTENTIAL NOT REALIZED

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The paper reviews the history of interspecific hybridization in general and more specifically interspecific hybridization of forest trees. The early views that interspecific hybridization would be a panacea for all tree improvement problems has largely been dispelled. Heterosis in hybrids, far from being a common phenomenon, is rare. Probably the more promising, and most useful contribution of interspecific hybridization is in transferring desirable genes from one species to another.

The problems of the application of interspecific hybridization in tree breeding and the utilization of hybrids are also reviewed. The lack of long-term plans in breeding programs as opposed to "now generation" makes it difficult to utilize products of interspecific hybridization (e.g., for gene transfer) as emphasis has been placed on the utility of the F1 generation. Information on the genetics, particularly population genetics, of hybrid is largely lacking and is essential if hybridization is to play a significant role in tree improvement.

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