

the purpose in view and to keep up a sustained yield. This may mean that more trees must be left than under the present system with a slight increase in present logging expenses but a large decrease the expense in future operations. In changing over from an unregulated to a regulated forest the expenses for logging will be larger for the first felling but thereafter should gradually decrease as the stand of merchantable timber increases.

We also want to utilize every possible tree. At present we have a large amount of hardwood which is left in the woods and as I have said before hinders the growth of the coniferous trees. It is quite possible to use this for pulp with the soda or sulphate processes but I understand that it cannot be utilized with the sulphite process. I visited a mill in Austria which used beech entirely and made a good quality of pulp. There is, it seems to me, no reason why hardwood should not be used for ground wood; the fibre is, of course, shorter, but it ought to make a good filler. The objections are that it is difficult to float and some difficulty might be encountered in barking it. The first difficulty can



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be overcome by spring cutting and the second might be overcome by peeling in the woods as is done with poplar. This would lengthen the time over which our supply of spruce and balsam would last and add much to the value of our timber limits. The Laurentide Company in co-operation with the Forest Products Laboratories hopes to try some experiments along these lines this winter.

31,000 Cords Wasted.

Then there is the elimination of logging wastes which are at present larger than they should be. The lumber companies usually take logs from a tree until a diameter of six inches is reached but the pulp companies take down to four inches. However, a very bad custom still holds of using logs thirteen and one half feet long and as it is often impossible to get a log that length out of a tree top much good wood is wasted. We have measured up over two thousand tops and we find that in the St. Maurice Valley about 31,000 cords of wood are wasted each