

as a duty we must foster the use of it. It is our birthright, and just in the same way that a man who has a child which is handicapped in some form or another will put up with shortcomings in order to further the advancement of that child, so it is our duty if we profess to live up to the moral of the "Gum Tree" or the Forest League to primarily consider what is best for Victoria—what suits our pockets second.

A little while ago I was talking to a timber merchant who told me that that month he had turned down orders to the extent of many thousand pounds, because he had no seasoned stuff, but he had four or five million feet of timber weather-drying, and he was conscientious enough to keep the stuff until effectively dried, so that while the four or five million feet were waiting perhaps a year to be put on the market, other timber was pouring into the country.

Thus there is a great plea for some quick effective method of seasoning, and had this amount of timber been kiln-seasoned and supplied to the market immediately, just that much less importation would have been necessary; in other words, proceeds would have gone into the pockets of Victorians instead of drifting to Japan or America.

Now it is well known that there is a vast difference in the length of life of seasoned and unseasoned timber, yet the consumers have shown very little interest except for profits. Some attention has been given to checking, warping and shrinking, but very little at that. For this purpose both kiln-drying and air-seasoning are largely in use. Kiln-drying, which steams and dries the wood at a uniformly rapid rate by subjecting it to various intense climatic changes in enclosed spaces, has become a necessary factor in timber for car-building, manufacture of furniture, tools and many other articles in ordinary use in America, and without it the construction of the finished product would even sometimes be impossible.

Complaints are daily, nay hourly, made by all users of the various Eucalyptus that the timbers twist and warp far more than they did years ago. The explanation for this is probably to be found in the tremendous development in recent years in these industries which require the use of timber in large quantities. As a matter of fact properly-seasoned timber in many cases cannot be obtained at all, and green timber or very partially-seasoned timber is the order of the day.

Professor Von Schrenk, of the American Forestry Service, is a great advocate of kiln-seasoning, and he claims that kiln-seasoned timber is not only absolutely uniform but that the germs of decay are destroyed during the heating process, and that the timber is therefore much more durable, while in air-seasoned timber the germs merely remain dormant and spring into life again when brought into touch with moisture absorbed from outside. In addition to the actual water which is exuded by the opening of the cells, much other matter is also done away with without apparently injuring the texture of the timber or in any way affecting the breaking strain.

Amongst a body of Victorian cabinetmakers kiln-seasoned timber was almost unanimously preferred to

air-seasoned timber, working up much more easily and being selected with confidence instead of almost each piece having to be tested. As already said, it is a commonly accepted fact that dry timber will not decay nearly as fast as wet timber. Nevertheless the immense superiority of seasoned over unseasoned wood for all purposes where resistance to decay is necessary has not been sufficiently recognised.

It will be objected that timber in any large sizes, over and above inch boards cannot be kiln-seasoned, but it has been proved that it can be done, although squares, etc., need a far more gentle treatment than boards, and of course take a correspondingly longer time, and providing large sizes are seasoned sufficiently gently (in order not to break down the walls of the cells), no detrimental factor has been observed. The intimate relation between the presence of water in wood and the rate at which wood decays requires a brief reference to the causes of wood decay, but it is sufficient to point out that low forms of plant life called Fungus grow in wood, and by so doing disintegrate and dissolve portions of the wood fibre, and as a result of this the wood changes in its physical structure and is called decayed.

When the Fungus has extracted a sufficient amount of material, it forms on the outside of the wood, and in the larger and more prolific kind, forms fruiting bodies known as punks and toadstools, and these when in decay are blown about and infect sound wood. In kiln-seasoning the germ life of this is killed, and it is very doubtful if the outside application of moisture can ever effect it in the same manner. Moreover, in spite of the existing prejudice against kiln-seasoning, it can never be stated that it is preferable to use green timber, and this seems to be the only alternative as far as our local market is concerned.

It will readily be seen to be impossible to wait while large supplies of timber are air-seasoned, otherwise we may as well abandon the idea of securing a local market for our timbers, let alone building up an export trade. The natural feeling throughout Australia against the use of Hardwoods and in favour of imported timber has been almost entirely caused through lack of seasoning, and perhaps lack of grading as well, and as a very considerable portion of timber in Victoria is used for building and furniture (building, of course, using the larger amount), architects and builders have spent more time in discussing seasoning than perhaps in anything else. Unfortunately many attempts have been made to pass off merely baked timber for seasoned timber, and this has resulted in "case hardening," with much subsequent twisting and warping, and on no less than two former occasions has Victorian timber been absolutely turned down in London because of these failures.

The financial position also needs great consideration with regard to air-seasoned or kiln-seasoned timber. How many of our small sawmillers, or even the big men, can afford to cut and stack timber for a year at a time, entailing a tremendous output of capital, and yet have nothing coming in. This is what it undoubtedly means, and although the big timber men with large resources of capital may be able to