
Visit Bakelite manufacture – Li Shen Wood Product Inc.

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December 17, 2007



Li Shen Wooden Product, Inc.

We visited the Bakelite manufacture on 12/16/2007.

Li Shen Inc. is located at Xinji City (辛集市), He Bei Province (河北省), about 270 km southeast of Beijing. It is a manufacture for variety of wooden products, such as wall decoration board, floor board, etc. The facility used for making Bakelite sheet for Daya Bay RPC was used to make fire-retarded board, which is a kind of regular Bakelite plate, now due to the bad market situation, this line has been idle for some time. They restart this production line is solely due to the effort of IHEP and GNKD.

On the day we visited there the production line was not working on the Bakelite, so in the following we only can show the photos for the idle facility.



Resin coating line



Resin coating production line, shown here are two lines – upper and lower, only the lower line is being used for Daya Bay Bakelite production.

Stack of coated papers, ready to be used for making Bakelite.

Paper feeding station



The raw base paper roll is placed at the paper feeding station of the production line, waiting for being fed to resin coating station.

The paper is similar to shopping bag paper, but with lower density to absorb more resin.

Resin pool and coating rolls



Melamine resin heating pool, the rolls shown here will be adjusted to the adequate gap to control the quantity of the coating resin on the paper.



A pool-full resin, which has been used for the first 40 trial Bakelite sheets, now is waiting for mass production.



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Coated and dried paper measure and cut station



The wet coated paper will go through a long heating enclosure chamber and get dried before being rolled out.



The coated and dried paper will be rolled out from this port, and cut to specified length.



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Resin coated and dried paper for surface and body of Bakelite sheet



Melamine resin coated and dried white paper, which is used as the surface layer of the Bakelite sheet. The resin used here is different from the resin used for the brown paper.

Melamine resin coated and dried brown paper, which is used for the body of Bakelite sheet. Layers of such paper stacked together, sandwiched by two white papers, then placed between two S.S. plates, heated and pressed under 2500 tons pressure.



Mirror quality surface S.S. plates



Polished S.S. plates, mirror quality surface. Shown in the photo is the mirror image of the wall.

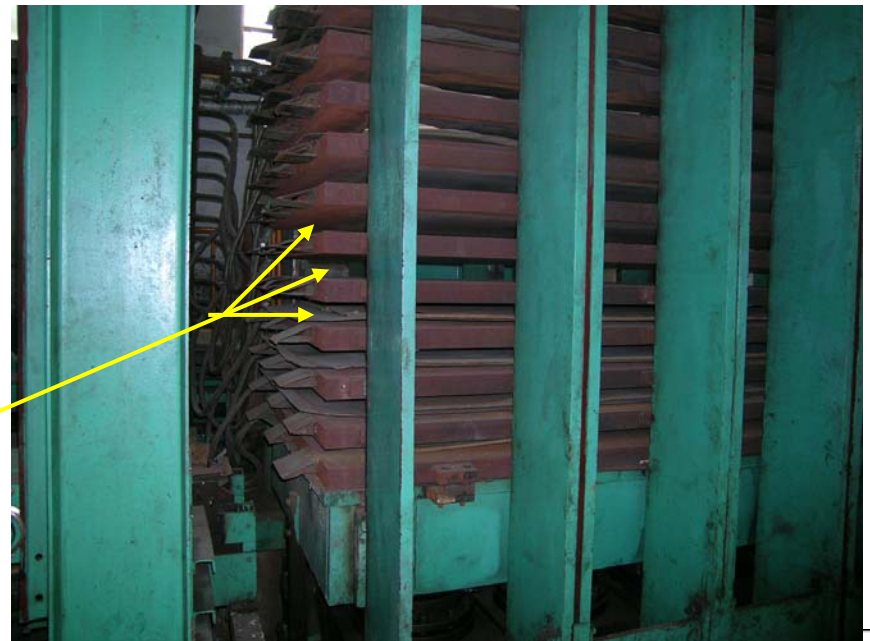


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Heat and press station



Heat and press station. Shown here is the loading platform of S.S.Plate/ Paper lamination/S.S.Plate stack.



The prepared stack will be inserted into the gap between thick steel blocks, in which hot steam will pass through an embedded hollow channel to heat up the block.



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