

# Tecnolita makes history protecting Suzano towers

*The company protected the three largest pulp bleaching towers ever built*



*Towers: 70 m high by 7.2 m each*

Facing tremendous complexity, some projects make history in the Brazilian industry of composites. The newest one to be part of this select group is the anticorrosive lining of the **Suzano's** new cellulose bleaching towers in Mucuri (BA). Carried out by **TECNOLITA Industrial** (Campinas, SP), the operation included the protection with composite materials of three towers each 70 meters high and with a diameter of 7.2 meters. "Including drain channels and collection pits of the fiber line, the lining totaled an area of 6,000 square meters, with thicknesses from 5 to 50 mm", explained Günther Reinprecht, director of Tecnolita.

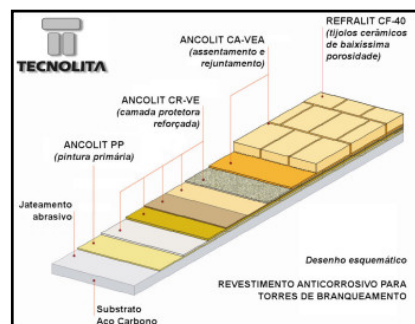
Beyond the colossal dimensions – (according to Reinprecht, up to this moment there is no notice of larger bleaching towers in the whole world) – Tecnolita's work was distinguished for its promptness. "The job was done in record time: just 120 days", he celebrates. Within the ANCOLIT® line of products, manufactured in their facilities in Campinas, and ceramic bricks REFRALIT® CF, made in Germany, more than 600 tons of anticorrosive materials were consumed.

"The extremely low porosity, less than 0.5%, and the raised percentage of silicon dioxide, over 70%, assure the excellent resistance of the ceramic bricks against chemical and thermal attacks, present as usual in bleaching processes. Not to mention that it's smoother surface minimizes the attrition generated by the cellulose flow", Reinprecht explains.

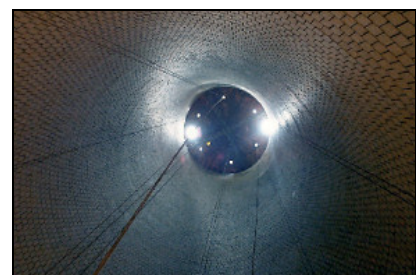
Ester-vinyl resins DERAKANE\* - supplied by Ara Ashland – were the raw material of the anticorrosive cement ANCOLIT® CA-VEA, used for set and joint of the bricks, as well as ANCOLIT® CR-VE, for the protective reinforced coating (both produced by Tecnolita). "The extreme conditions of the environment had demanded the use of high performance resins, which is the case of the DERAKANE\* family", describes Alexandre Jorge, Ara Ashland's technical manager.

Reinprecht points out that Tecnolita was careful about monitoring the climatic conditions during the lining application. "We take some measures so that the temperature of the environment and the substrate, as well as the relative humidity of the air and the dew point, were ideal for the polymerization of the resin".

**Georgia Engenharia** – under the supervision of Tecnolita – was in charge of Suzano's towers lining installation, while the Austrian-Finnish group **Andritz** was responsible for the implantation of the whole project. "Instead of using the traditional tubular scaffoldings, we introduced the use of motorized platforms and gondolas, minimizing the obligatory time for the vertical movement", relates Paulo Cabral, Tecnolita's techno-commercial manager. According to Cabral, this pioneering system sped all processes and allowed the applicators to work at the ideal position, that is, in the correct height for the optimal application of the materials. He went on to say: "To fulfill the lining chronogram of this magnitude, we developed this technique which gave a faster and safer way of working".



*Tecnolita's coating structure*



*Internal view of the tower*

Established in 1992, Tecnolita is one of the main Brazilian companies in the corrosion protection field. According to Reinprecht, the unique quality of Tecnolita is the wide experience of its technical body. "As well as I, other professionals who compose our team have been working with anticorrosive linings during the past thirty years or more. Together we carried out many of the biggest projects of the Pulp and Paper industry in Brazil, accumulating success histories like this one of Suzano", he affirms. More recently, Tecnolita was chosen to protect three similar towers in Três Lagoas, MS-Brazil – at the unit known as "Project Horizon". "The work will be accomplished this year and will rely on the same advanced application technology and techniques that we used for the Suzano project", he completes.

(\* ) Registered Trademark of Ashland, Inc.

Source: SLEA Comunicação

Reference text (in Portuguese):

<http://www.araquimica.com.br/aranews/91/index.html>