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PROCESS FOR DEGUMMING TEXTILE FIBERS

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1 Claim. (Cl. 92—10)

Careful researches on the degumming of textile fibres have brought to light the general fact that all substances which are operative for the protection of colloids in any emulsions, operate also, when brought into an alkaline or acid solution, at suitable temperature and pressure, the degumming of textile fibers.

Amongst the said protective colloids the following may be included, by way of example: protein substances (native or conjugated proteins) such as albumen, glues, gelatines and casein; organic sulpho-acids, such as free or combined sulpho-ricinoleic acid; oleate, stearate, palmitate of sodium and of potassium etc., and generally the soaps including those having an organic base; gums, resins, starches etc.

The process of degumming is carried out in ordinary autoclaves, into which the fiber is immersed, so as to be completely covered by a liquid consisting of water, the weight of which is about ten times the weight of the fiber immersed therein, the said water containing one of the colloidal substances mentioned above, for example, casein, in the proportion of from 5 to 15% of the weight of the water used, and adding to the said mixture from one to 5% of caustic soda, and a suitable quantity of hydro-carburated soap.

The autoclave is then closed, and the sub-

stances contained therein are brought to a pressure of from two to six atmospheres, by heating it either directly or by means of steam.

After heating for about forty minutes, according to the consistency of the bundles of fibers to be degummed, the fiber is washed with water which is introduced at two atmospheres in the same autoclaves in which the operation above described has been effected; the fiber is subsequently dried, in which condition it is ready to be used either for textile or for other industrial applications.

The process above described is also used when, instead of the substances above mentioned, other colloidal substances are used, the proportion of the latter varying in proportion of their gold number.

We claim:

The process of degumming textile fibers, which comprises immersing a textile fiber in an aqueous solution containing casein in a proportion of from 5 to 15 parts by weight of the water used, adding from 1 to 5 parts of caustic soda to the solution, adding hydro-carburated soap to the mixture, subjecting the fiber immersed in the mixture to a pressure of from 2 to 6 atmospheres and to heat, washing the fiber and then drying the same.

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