

Title (en)

TRANSPARENT SUBSTRATE BEARING AN ANTI-STAIN, HYDROPHOBIC COATING, AND PROCESS FOR MAKING IT

Title (de)

TRANSPARENTES SUBSTRAT MIT HYDROPHOBER ANTISCHMUTZBESCHICHTUNG UND VERFAHREN ZU DESSEN HERSTELLUNG

Title (fr)

SUBSTRAT TRANSPARENT PORTANT UNE COUCHE HYDROPHOBE ANTI-TACHE ET SON PROCEDE DE PRODUCTION

Publication

**EP 1044073 A1 20001018 (EN)**

Application

**EP 98953562 A 19981014**

Priority

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- US 6234997 P 19971015

Abstract (en)

[origin: WO9919084A1] A process is described for applying a thin-film, hydrophobic, oil-repellant, stain-resistant, optical coating to a transparent substrate. The coating is applied using a treatment solution that incorporates an organosilane in a solvent of water, alcohol, and ethylene glycol or glycerol, and an acid catalyst, with the organosilane having a preferred concentration in the range of 0.05 to 50 mmole per liter. The treatment solution preferably is prepared in a two-step procedure, in which the organosilane is first reacted in concentrated form and then diluted. After the treatment solution has been applied to the transparent substrate, e. g., by dip coating, the coated substrate is dried, preferably by flash-drying at room temperature and then heating it to a prescribed elevated temperature, in a prescribed humidity.

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