

(19) World Intellectual Property Organization  
International Bureau



(43) International Publication Date  
26 May 2005 (26.05.2005)

PCT

(10) International Publication Number  
**WO 2005/047746 A3**

(51) International Patent Classification<sup>7</sup>: **B32B 9/04**, 3/26,  
C08J 9/00, C08K 3/04, 3/34, H01L 21/31, 21/469

(21) International Application Number:  
PCT/US2004/037740

(22) International Filing Date:  
12 November 2004 (12.11.2004)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:  
60/519,400 12 November 2003 (12.11.2003) US

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(81) Designated States (unless otherwise indicated, for every  
kind of national protection available): AE, AG, AL, AM,  
AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN,

CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI,  
GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE,  
KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD,  
MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG,  
PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM,  
TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM,  
ZW.

(84) Designated States (unless otherwise indicated, for every  
kind of regional protection available): ARIPO (BW, GH,  
GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM,  
ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM),  
European (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI,  
FR, GB, GR, HU, IE, IS, IT, LU, MC, NL, PL, PT, RO, SE,  
SI, SK, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ,  
GW, ML, MR, NE, SN, TD, TG).

Published:

- with international search report
- before the expiration of the time limit for amending the  
claims and to be republished in the event of receipt of  
amendments

(88) Date of publication of the international search report:  
23 February 2006

For two-letter codes and other abbreviations, refer to the "Guid-  
ance Notes on Codes and Abbreviations" appearing at the begin-  
ning of each regular issue of the PCT Gazette.

(54) Title: COMPOSITION FOR THERMAL INSULATING LAYER

(57) Abstract: A curable coating composition for forming a thermal insulating layer, the composition comprising: (a) highly porous particles of a material obtained by drying a wet sol-gel, the particles having a porosity of at least 80% and a particle size in the range from 5 µm to 4.0 mm; and (b) a film forming resin system comprising a film forming polymer, wherein the particles (a) are dispersed in the resin system (b), and the resin system (b) contains at least one stabilizer having an average molecular weight in the range from about 1,000 to about 4,000, said stabilizer being at least one member selected from the group consisting of ethylene oxide-propylene oxide block copolymers, poly C<sub>2</sub> - C<sub>3</sub> alkoxyated C<sub>12</sub> - C<sub>18</sub> saturated or unsaturated fatty alcohols, poly C<sub>2</sub> - C<sub>3</sub> alkoxyated hydrogenated or partially hydrogenated castor oils, poly C<sub>2</sub> - C<sub>3</sub> alkoxyated hydrogenated or partially hydrogenated soybean oils, polydimethyl siloxane C<sub>2</sub> - C<sub>3</sub> alkoxyates, and sorbitan esters of C<sub>12</sub> - C<sub>18</sub> saturated or unsaturated fatty acids, the amount of the particles (a) is in the range from 2 to 6% by weight, based on the weight of the composition, and the amount of the stabilizer is in the range from about 50 % to about 90% by weight, based on the weight of the highly porous particles. The composition has high storage stability and forms a coating having excellent insulation value.

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