

Original basic activation for enhancing silica particles reactivity: characterization by liquid phase silanization and silica-rubber nanocomposite properties

Enzo Moretto¹, Chuanyu Yan¹, Reiner Dieden¹, Pascal Steiner², Benoît Duez², Damien Lenoble¹, Jean-Sébastien Thomann^{1,*}

¹ MRT Department, Luxembourg Institute of Science and Technology, 41 Rue du Brill, Belvaux, L-4422 Luxembourg, Luxembourg; enzo.moretto@list.lu (E.M.), chuanyu.yan@list.lu (C.Y.), reiner.dieden@list.lu (R.D.), damien.lenoble@list.lu (D.L.)

² Goodyear S.A, Avenue Gordon Smith, Colmar-Berg, L-7750 Luxembourg, Luxembourg; benoit_duez@goodyear.com (B.D.); pascal_stiner@goodyear.com (P.S.)

* Correspondence: jean-sebastien.thomann@list.lu (J.-S.T.)

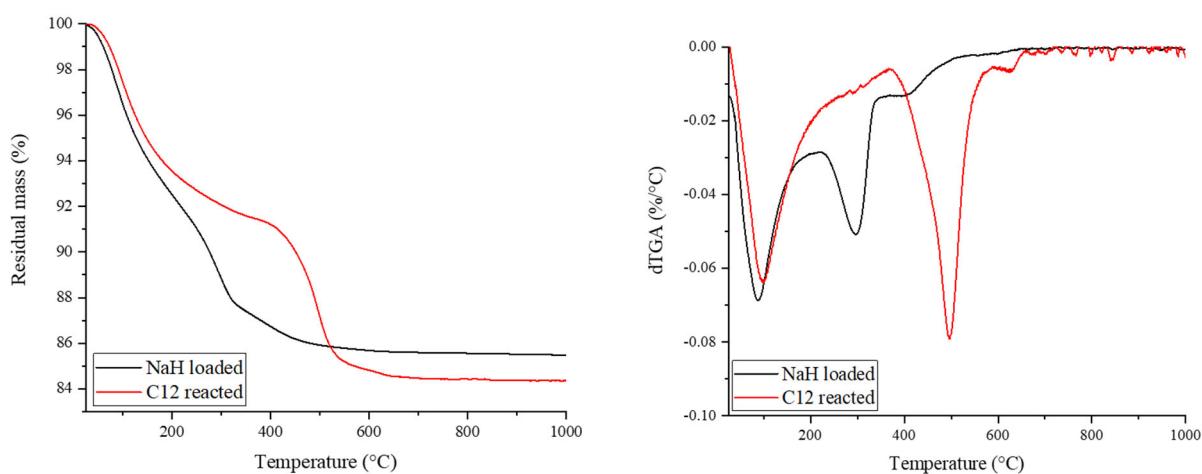


Figure S1 – Thermogram (left) and dTGA (right) curves of NaH activated silica (black) and NaH-C12 reacted silica (red)

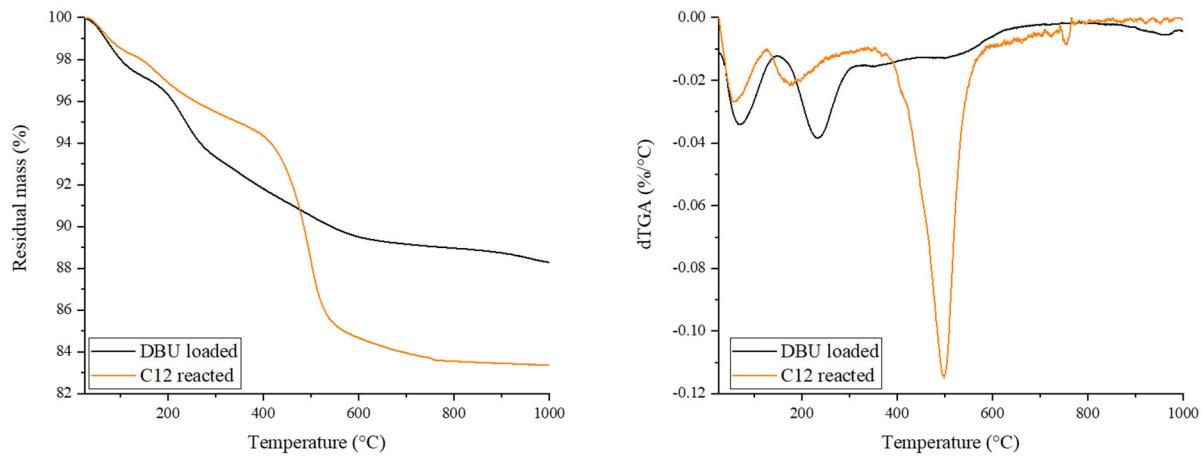


Figure S2 – Thermogram (left) and dTGA (right) curves of DBU-activated silica (black) and DBU-C12 reacted silica (orange)



Figure S3 – Photograph of the white residual film after reaction of C12 silane with CsF/DCl/D₂O solution