Supplementary Information for:

HIGHLY STRETCHABLE COMPOSITES FROM PDMS AND POLYAZOMETHINE FINE PARTICLES

Carmen Racles, Valentina Musteata, Adrian Bele, Mihaela Dascalu, Codrin Tugui, Ana-Lavinia Matricala

Figure 1S: H NMR spectrum of the glycidyl-oxy-propylsiloxane telechelic oligomer precursor (a) and of the corresponding tromethamol-modified polysiloxane used as particle stabilizer (b)
Figure 2S: H NMR spectrum of the siloxane dialdehyde (a) and the corresponding PAZ1Np (aromatic region, b)

Figure 3S: Aspect of the composites films and optical microscope image (middle picture)
Figure 4S: EDX analysis on the surface of samples PC1_20 (left) and PC2_10 (right)

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<th>Element</th>
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<th>A%</th>
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Figure 5S: Polarized light microscopy images of PAZ1 obtained in solution or as nanoparticles and of a composite film, at around 140°C

PAZ1  PAZ1 NP  PC1_20
**Figure 6S**: DSC curves of two composites and the PDMS reference in the negative temperature range (h1, h2 – first and second heating; c – cooling scans)

**Figure 7S**: FT-IR spectrum of the siloxane dialdehyde SDA