Supporting Information

Poly(ethylene glycol)-based cross-linked films with aligned micrometric channels: combining cryogenic processing and visible-light photopolymerization for the design of micro-patterned oriented platforms

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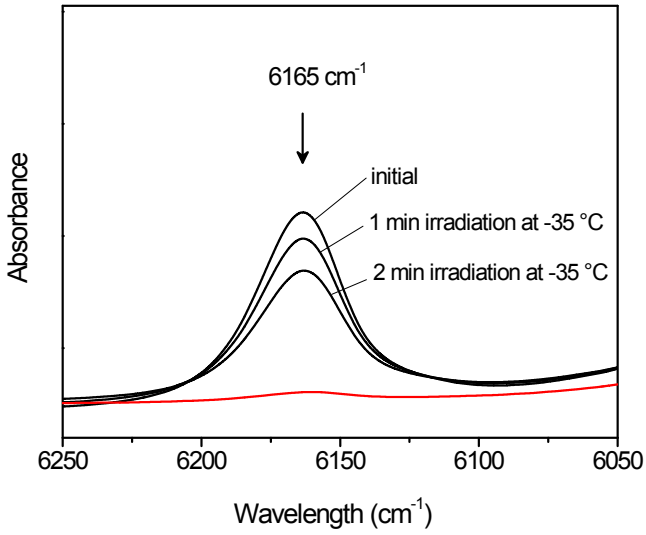

Figure S1. Decay of the characteristic near-IR peak of methacrylate groups during photopolymerization at -35 °C. The red curve corresponds to a sample that was irradiated at -35 °C for 2 min, and then defrosted and stored for 24 hours at room temperature in the dark.

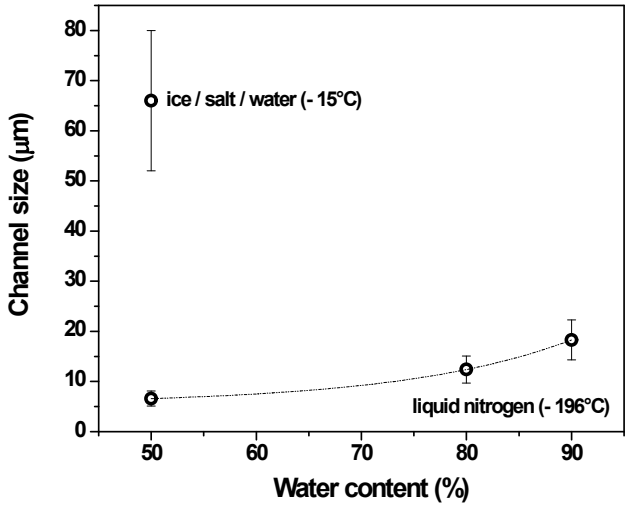

Figure S2. Channel Size as a function of the water content obtained by using two different cryogenic liquids: liquid nitrogen (-196°C) and a freezing mixture formed by ice, salt and water (-15ºC).

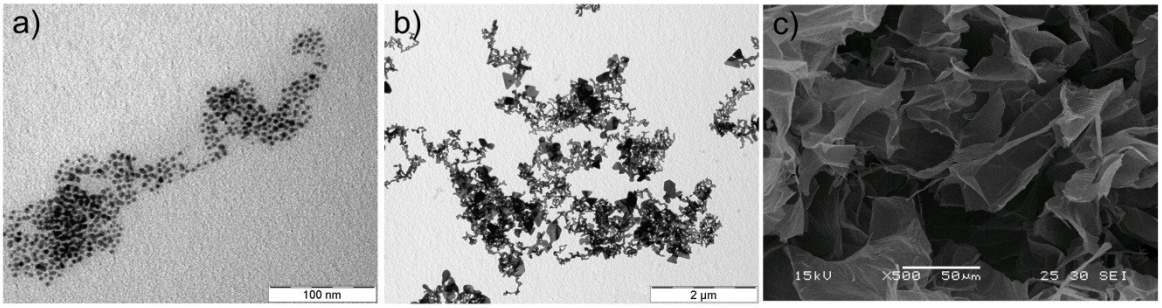

Figure S3. TEM (a,b) and SEM micrographs (c) of the nanostructures used for modification of the films. a) Ag@MUA NPs; b) gold branched plates; c) GO.

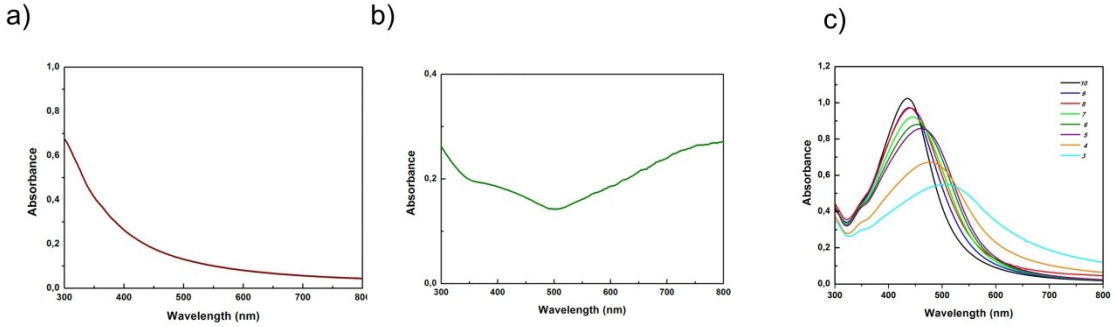

Figure S4. UV-vis spectra corresponding to (a) GO, (b) gold branched plates and (c) Ag@MUA NPs at different pH values.

Video S1: Live imaging showing infiltration of a patterned film, obtained with 80wt% of water, with an aqueous solution of CV dye (as separated file). Magnification: 100 X; resolution: 2048x1536 pixels.