Supplementary Information

Procedure for mAb 1 Excipient Removal and Purification
(referenced from MedImmune documentation)

Prior to product loading, the column of MabSelect SuRe resin was stripped with 100mM Acetate for 4 control volumes (CV), washed with 10X PBS pH 7.2 (Life Technologies, Cat # 70013-032), and sanitized with 100mM NaOH for 2CV and held for 30 minutes. The column was then washed with 10X PBS and left overnight.

The column was then equilibrated with 5CVs of PBS pH 7.2 2 (Life Technologies, Cat # 20012-043).

mAb 1 was diluted with PBS pH 7.2 (using an EC = 1.4).

mAb1 was loaded onto the MabSelect SuRE at 150 cm/hr (XK 2.6) and washed with PBS for 3CV. The product was washed with PBS +1% Triton X-100 pH 7.2 for 5CVs.

After the Triton wash, the column was equilibrated with PBS until baseline (Triton absorbance down to less than 10 mAU) and the flow rate was increased to 300 cm/hr for 20 CV. The product was then eluted off the column with 50mM Acetate, 30mM NaCl pH 3.5. The eluate was then titrated to pH 7.3 with 500mM Tris pH 9.0. The neutralized elution was 0.22μm filtered.

Movie with particle ejection
Please see the file 20150220_01mgmL_002uL_s_stat.avi for the movie corresponding to Figure 6 in the paper, in which a 1.5 hr statically-aged A/S interface in 0.1 mg/mL solution is dilatationally contracted at a prescribed rate of Q = 0.02 uL/s.