Supplementary Information

Persistence Length of Adsorbed Dendronized Polymers

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Salt (mM)	PG1 (nm)	PG2 (nm)	PG3 (nm)	PG4 (nm)
0.1	174 ± 10	187 ± 11	205 ± 16	458 ± 12
1	112 ± 8	145 ± 12	164 ± 13	197 ± 15
10	95 ± 8	109 ± 7	166 ± 12	205 ± 14
100	85 ± 6	104 ± 6	167 ± 16	170 ± 14

Table S1. Average length of adsorbed DPs of different generation and at different salt levels on mica pH 4.

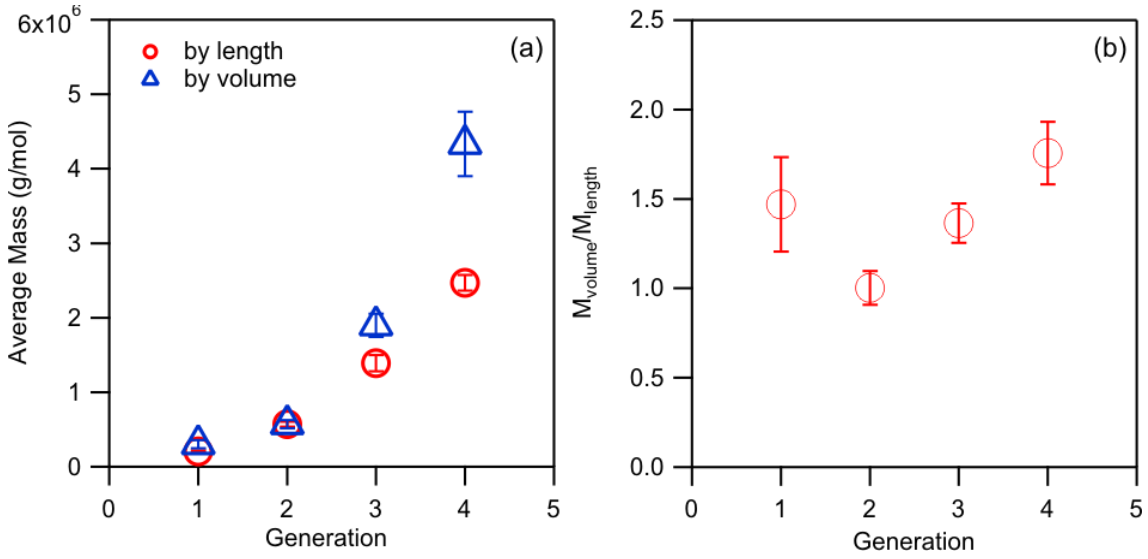

Figure S1. Molecular mass of PGn molecules calculated from the volume and the length of the molecule. (a) Molecular mass determined by the two methods, and (b) their ratio. Ideally this ratio should be unity, and deviations reflect experimental errors.

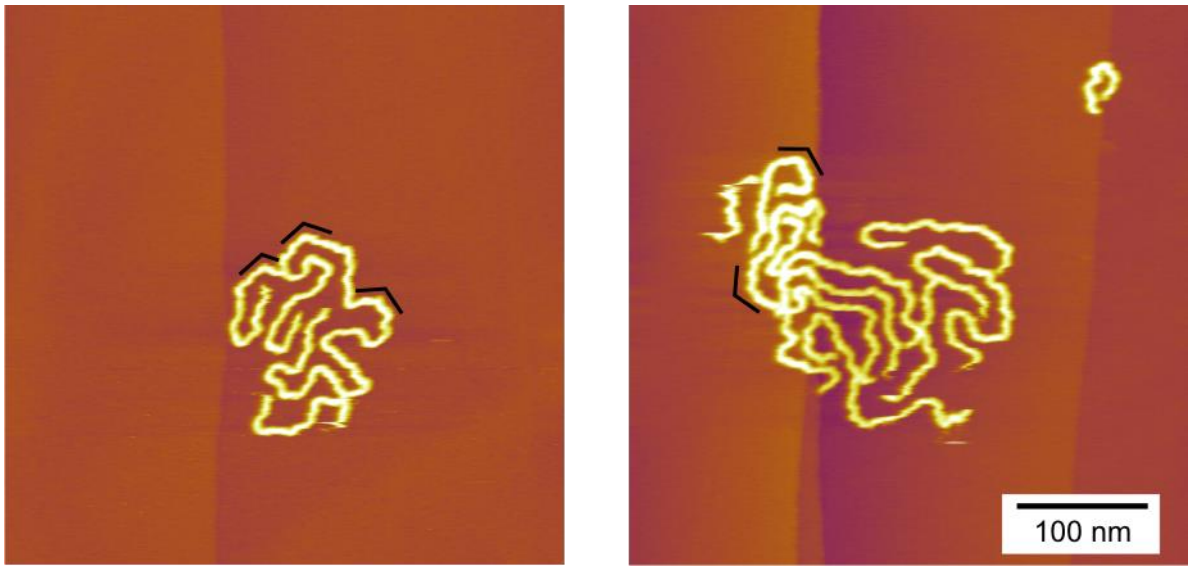

Figure S2. AFM images of PG4 adsorbed on HOPG at an ionic strength of 1.0 mM and pH 4.0. The two images show two different locations on the same substrate. Note the 120° kinks in the chain, especially in the left image (indicated with black angles).

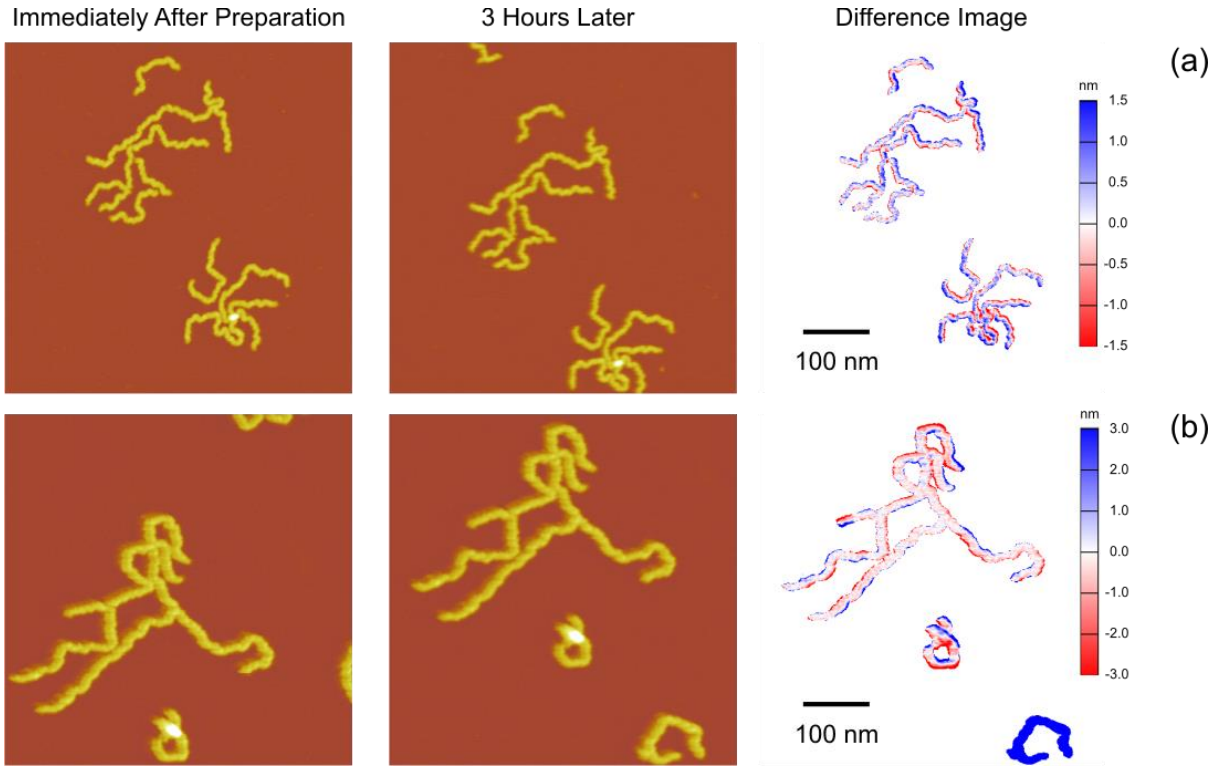

Figure S3. Adsorbed PG4 on mica at an ionic strength of 1.0 mM and pH 4.0 immediately after preparation (left) and 3 hours later while remaining in the solution (middle). The difference image is shown on the right. (a) Mica and (b) HOPG. This experiment demonstrates that the adsorbed molecules are immobile on the surface.

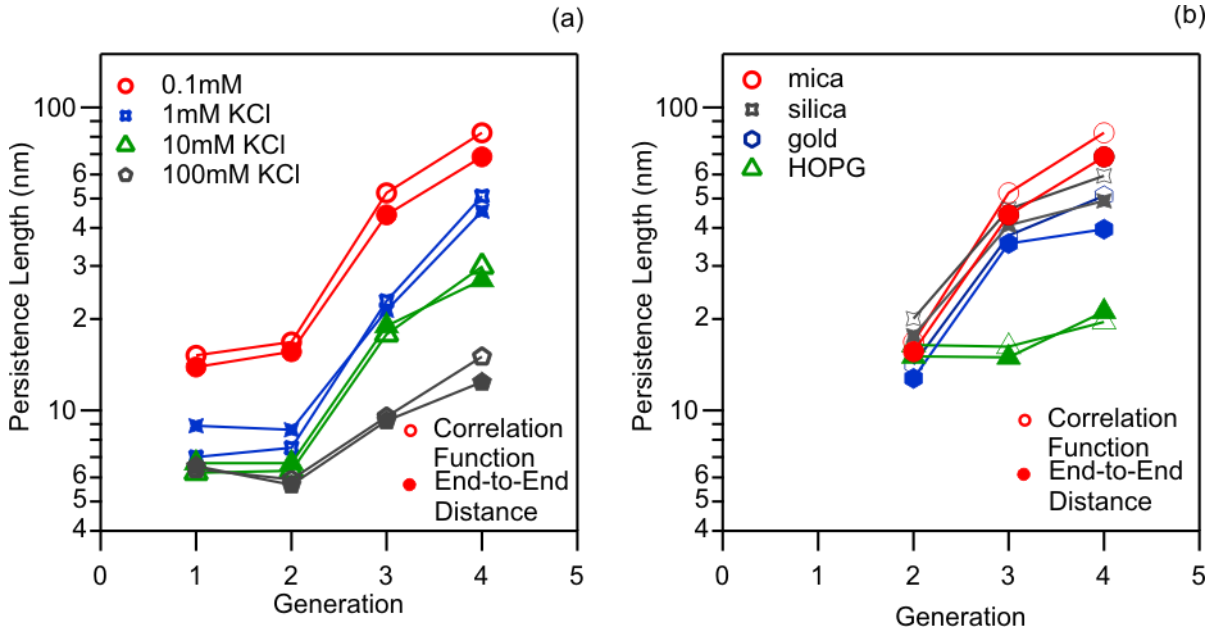

Figure S4. Dependence of the persistence length on the generation of adsorbed dendronized polymers at pH 4.0. Data are obtained from the directional correlation function (filled symbols) and the mean-square of the internal end-to-end distance (open symbols). (a) Different ionic strengths for mica as substrate. (b) Different substrates at an ionic strength of 0.1 mM.

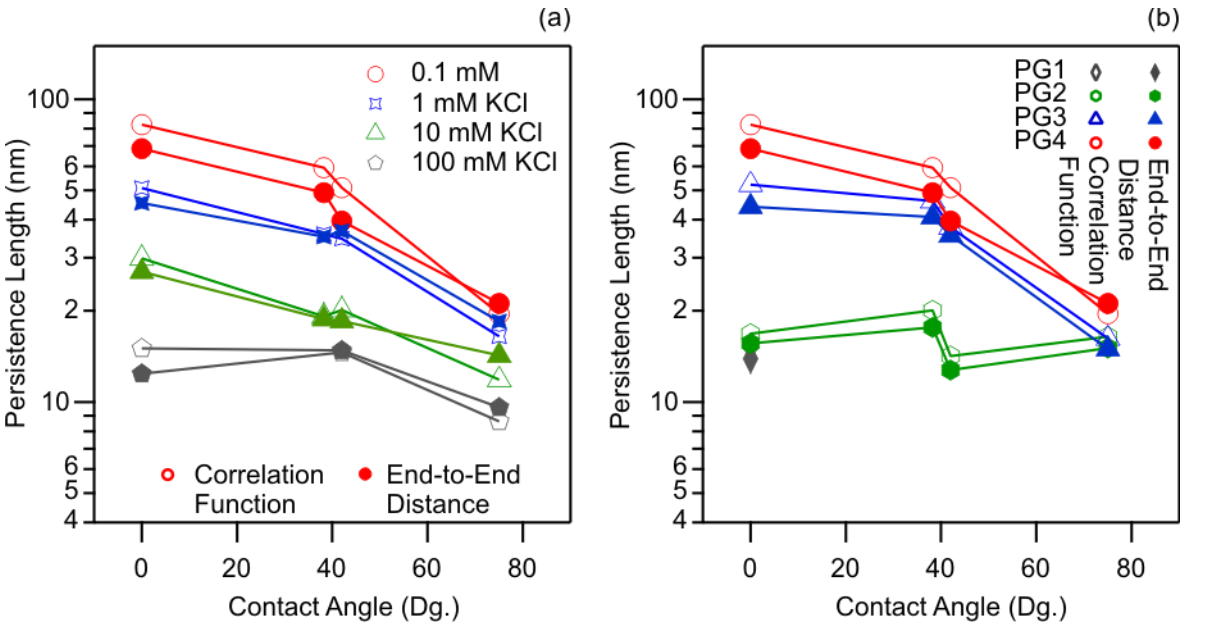

Figure S5. Dependence of the persistence length of adsorbed dendronized polymers on the contact angle of the substrate at pH 4.0. Data are obtained from the directional correlation function (filled symbols) and the mean-square of the internal end-to-end distance (open symbols). (a) Different ionic strengths for PG4. (b) Different generations at an ionic strength of 0.1 mM.