Supplementary Information for

Quasi-Unidirectional Shrinkage of Gels with Well-Oriented Lipid Bilayers upon Uniaxial Stretching

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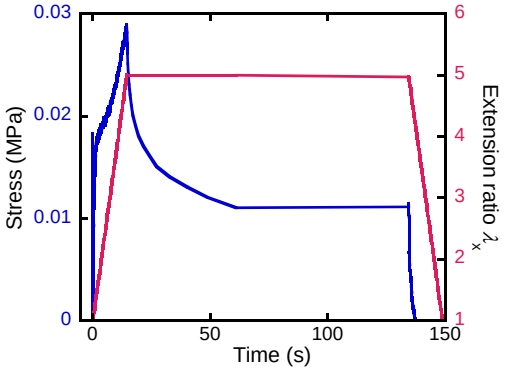

Figure S1: Stress-relaxation test results of the PDGI/PAAm gel at λ_x=5.0. The strain was applied at a stretching rate of 0.27 s^{-1}. Even at large λ_x of 5.0, which is larger than all of that used in our experiments, relaxation process of the gel was completed within 60 s. Since all the measurements in this paper have been done after at least 90 s waiting after deformation, this fact certifies that all the λ_y or λ_z results in this paper represent state of the gel in completely-relaxed state.

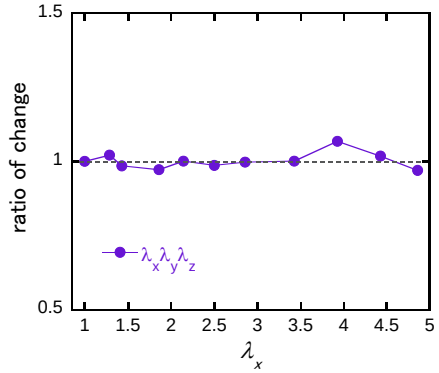

Figure S2: $\lambda_x\lambda_y\lambda_z$ of the PDGI/PAAm gel dependence on λ_x, where λ_y and λ_z were determined by direct observation and from reflection spectra, respectively. Almost 1 of $\lambda_x\lambda_y\lambda_z$ confirms accuracy of these measurements.