

Supporting Information

Enzymatic Degradation of Polysaccharide-Based Layer-by-Layer Structures

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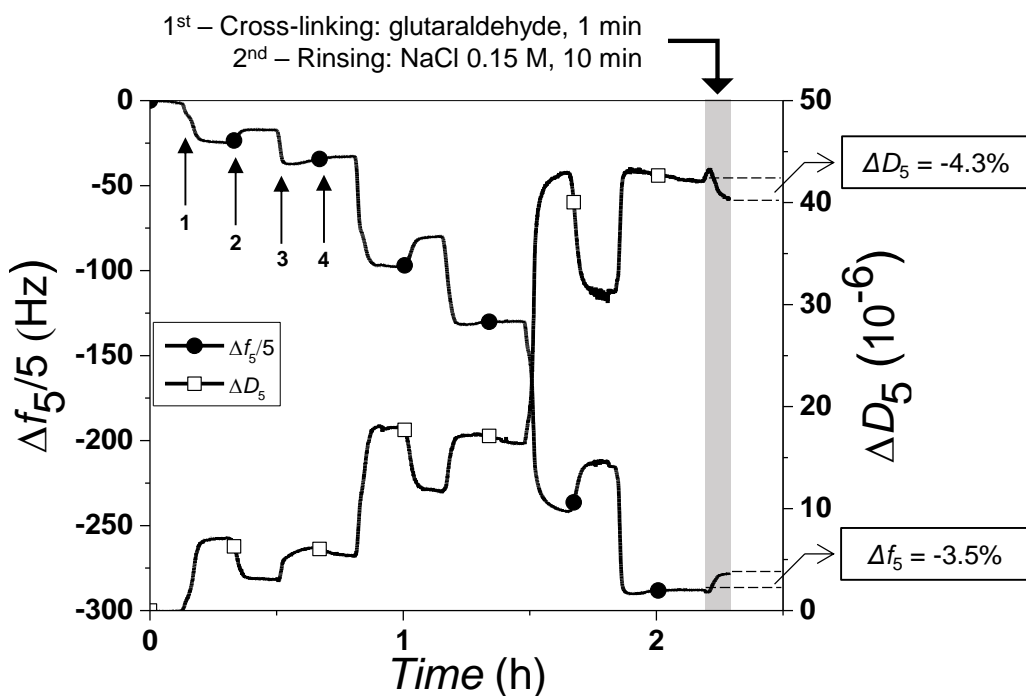


Figure S1. Representative QCM-D results of *in situ* buildup of (CHT/HA)₃ thin films, followed by 1% (w/v) glutaraldehyde injection during 1 min for cross-linking and a rinsing step afterwards during 10 minutes to stop the reaction. The 5th overtone with normalized variations of frequency ($\Delta f_5/5$, ●), and dissipation (ΔD_5 , □) are represented. (1) Addition of CHT; (2) and (4) rinsing steps with NaCl 0.15 M; (3) addition of HA. The cross-linking step caused variations of $\Delta f_5/5$ and ΔD_5 , of -3.5% and -4.3%, respectively. The negative variations of these parameters indicate release of water caused by the cross-linking.

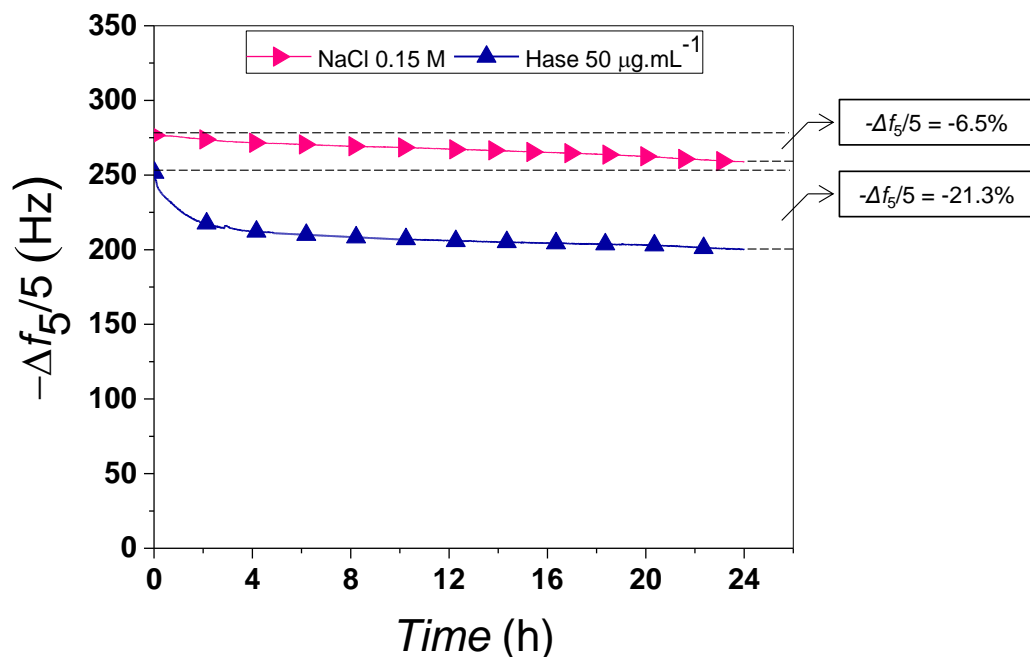


Figure S2. Normalized frequency variations for the 5th overtone ($-\Delta f_5/5$) during 24h for cross-linked (CHT-HA)₃ thin films after adding NaCl 0.15 M (►) and Hase at 50 $\mu\text{g}\cdot\text{mL}^{-1}$ (▲).

After treating the data with the Voigt-based viscoelastic model, the observed signal variations for NaCl- and Hase-incubated samples accounted for **thickness reductions of 2% and 23%, respectively.**