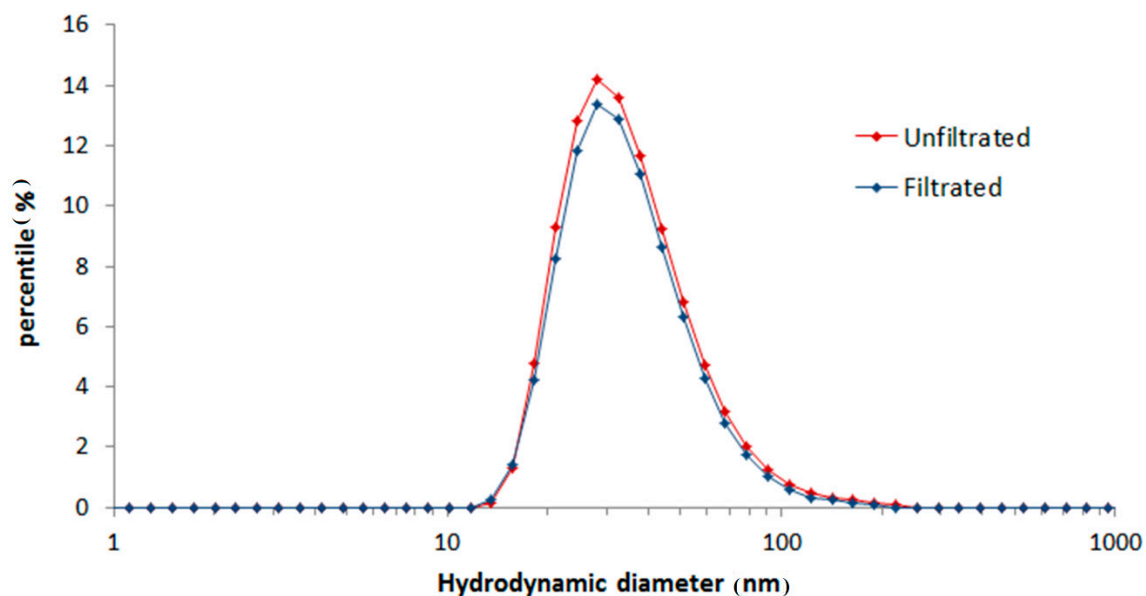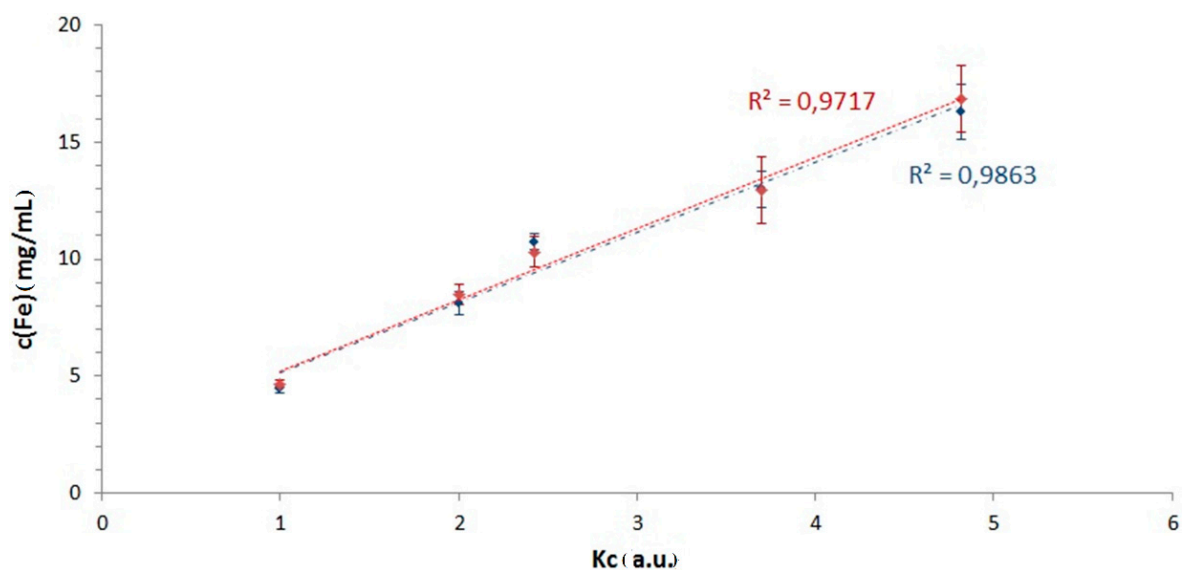# Supplementary Information

Figure S1. Size distribution of SEON^{LA-BSA} at pH 7 before (red dots) and after (blue dots) filtration. Both samples are displayed as distribution by volume. The dots represent the mean of $n = 3$ individual measurements. The lines are drawn to guide the eye.

Figure S2. Comparison of iron content measurements with UV-VIS and MP-AES. SEON^{LA-BSA} samples with different concentration factors K_C were measured by UV-VIS (Red dots and regression line) and MP-AES (Blue dots and regression line). All measurements were performed in triplicates. The values are displayed as mean ± standard deviation.