

## **Description of Additional Supplementary Files**

**File Name: Supplementary Movie 1**

**Description:** C1 peptide with heparin, showing no coacervate formation.

**File Name: Supplementary Movie 2**

**Description:** C2 peptide with heparin, forming nano-coacervates.

**File Name: Supplementary Movie 3**

**Description:** C3 peptide with heparin, forming micro-coacervates.