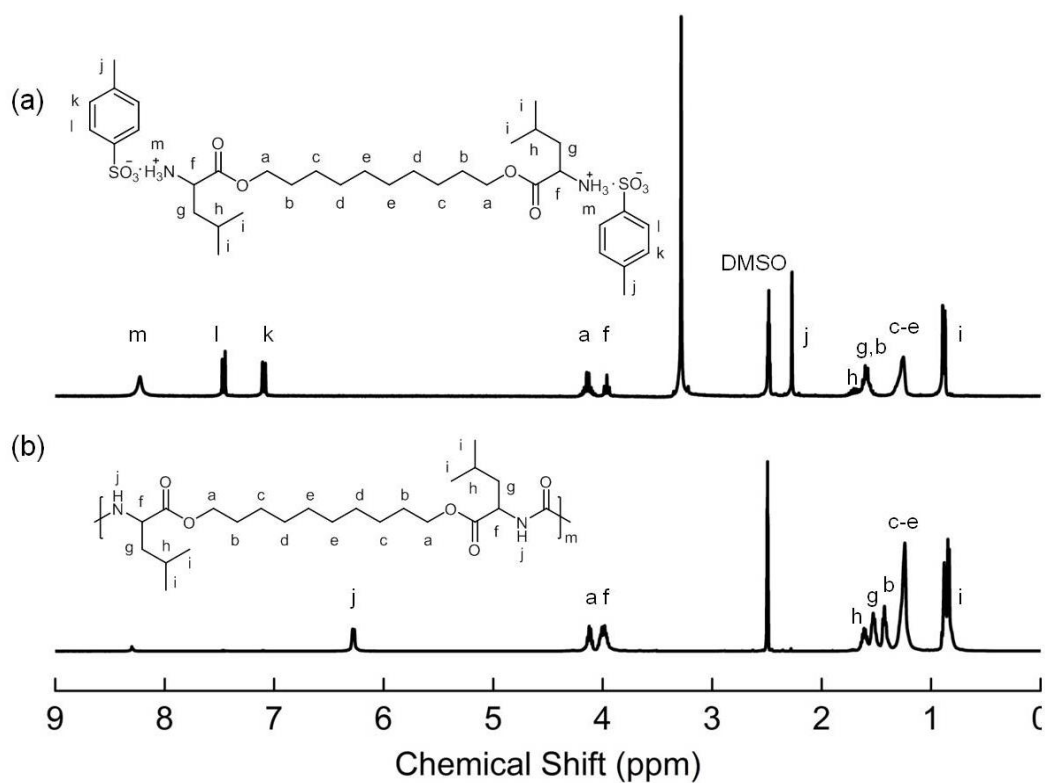


Copyright WILEY-VCH Verlag GmbH & Co. KGaA, 69469 Weinheim, Germany, 2016.

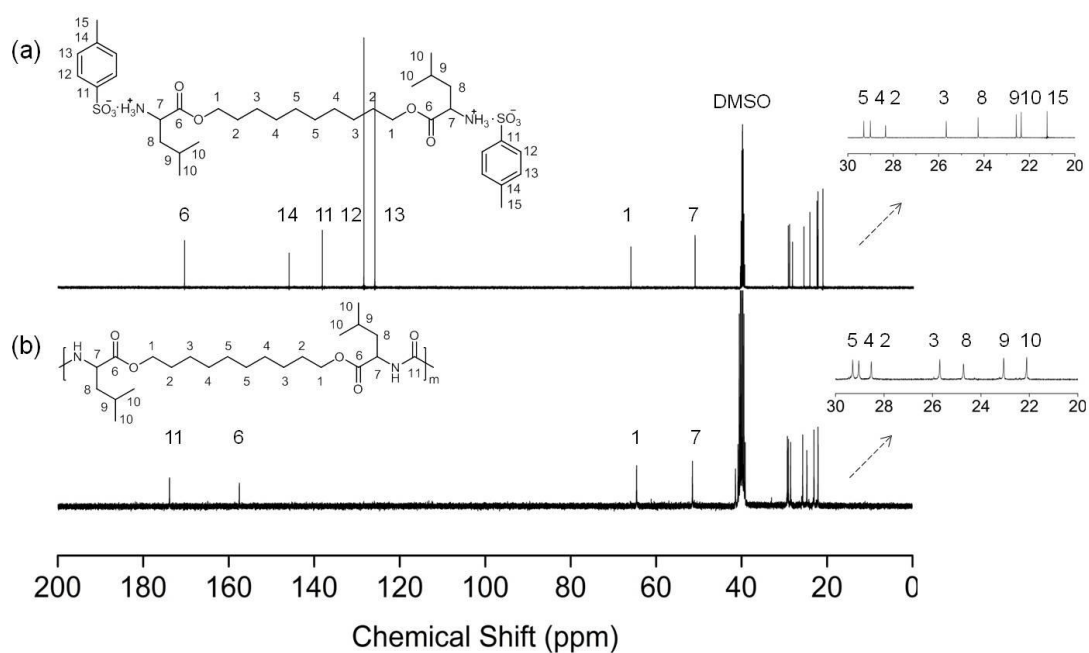
## Supporting Information

### Pilot Mouse Study of 1 mm Inner Diameter (ID) Vascular Graft Using Electrospun Poly(ester urea) Nanofibers

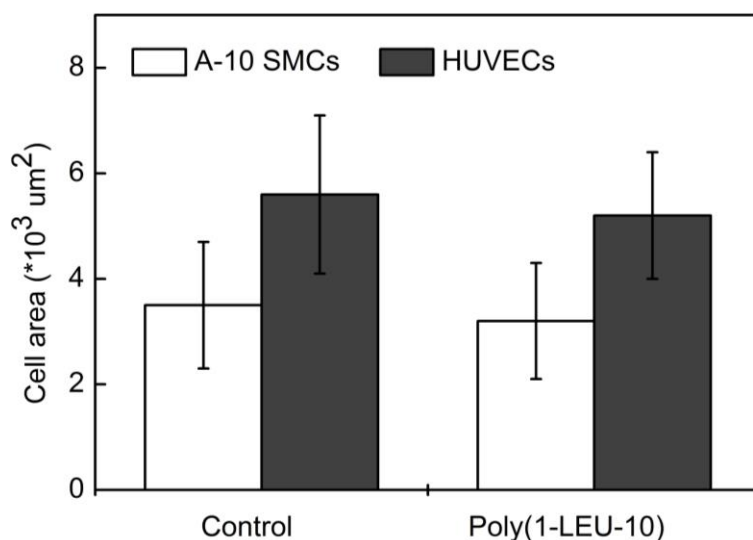
Yaohua Gao, Tai Yi, Toshi Shinoka, Yong Ung Lee, Darrell H. Reneker, Christopher Breuer, and Matthew L. Becker\*



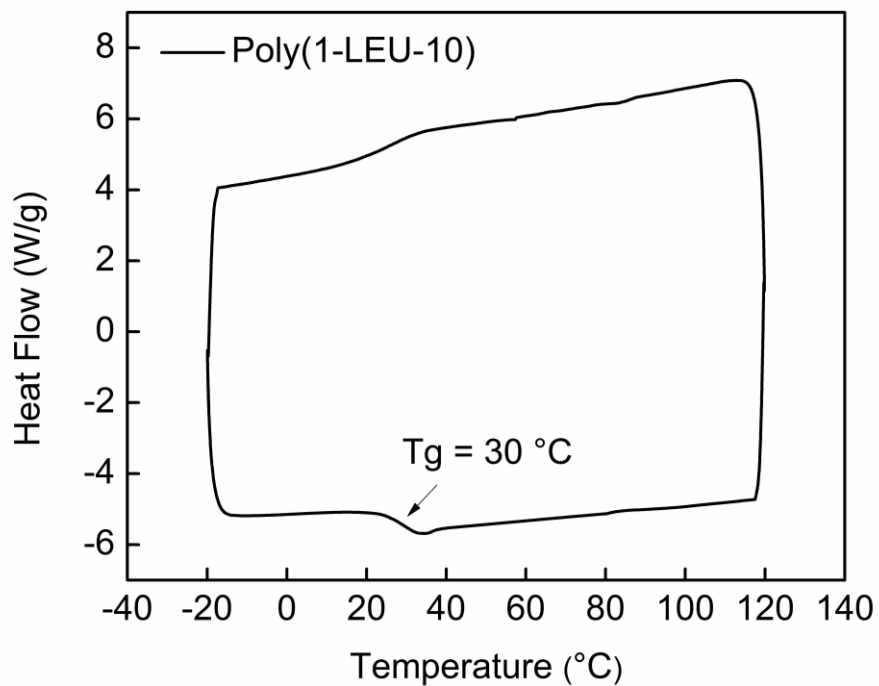
**Figure S1.**  $^1\text{H}$  NMR (DMSO- $d_6$ ) of (a) Poly(1-LEU-10) monomer and (b) Poly(1-LEU-10) polymer. All assigned peaks are expected from the structure of the monomer and polymer.



**Figure S2.**  $^{13}\text{C}$  NMR (DMSO- $d_6$ ) of (a) Poly(1-LEU-10) monomer and (b) Poly(1-LEU-10) polymer. All assigned peaks are expected from the structure of the monomer and polymer.



**Figure S3.** A-10 smooth muscle cells (A-10 SMCs) and human umbilical vein cells (HUVECs) attachment and spreading on PEU electrospun nanofibers (cell seed density:  $78 \text{ mm}^{-2}$ ; red: F-actin stained by rhodamine phalloidin; blue: nucleus stained by DAPI). Quantification of cell spread area revealed that cells spread comparably with those cultured on control glass coverslips, which means cells put down attachments and stretched out on the PEU electrospun nanofibers as they normally would on glass coverslips.



**Figure S4.** DSC trace of Poly(1-LEU-10) at a scanning rate of 20 °C/min within a temperature range from -20 to 120 °C. The glass transition temperature is determined as the midpoint of the step change in the second heating cycle of DSC.