Supporting information

Near-infrared Polyfluorene Encapsulated in Poly(ε-caprolactone) Nanoparticles with Remarkable Large Stokes Shift

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Fig. S1 ¹H NMR spectrum of PF8NT2/6.



Fig S2 ¹³C NMR spectrum of PF8NT2/6.





Fit a single exponential

 $G(\tau) = A [1 + B \exp(-2\Gamma\tau)]$





 $G(\tau) = A [1 + B \exp(-2\Gamma\tau)]$

$$\begin{split} A &= \text{the baseline of the correlation function} \\ B &= \text{intercept of the correlation function} \\ \Gamma &= Dq^2 \\ \text{where } D &= \text{translational diffusion coefficient} \\ q &= (4 \ \pi \ n \ / \ \lambda_0) \sin (\theta/2) \\ \text{where } n &= \text{refractive index of dispersant,} \\ \lambda_0 &= \text{wavelength of the laser,} \\ \theta &= \text{scattering angle.} \end{split}$$

Fig. S3 Autocorrelation function obtained from dynamic light scattering (DLS) for the PCL-PF8NT2/6-3 nanoparticles.



Fig. S4 TGA of PCL-PF8NT2/6-2 and PCL-PF8NT2/6-3 nanoparticles compared to neat PCL and PF8NT2/6.



Fig. S5 TEM micrographs of (a) PCL-PF8NT2/6-1 and (b) PCL-PF8NT2/6-2 nanoparticles.



Fig. S6 Particle size distribution of PCL-PF8NT2/6-3 nanoparticles determined from TEM images.



Fig. S7 EDS spectrum of PCL nanoparticles.



Fig. S8 Histogram of PCL-PF8NT2/6-3 (at 1.5 mg of dye) in an aqueous phase and RPMI cell culture media.