Electronic Supplementary Material (ESI) for Polymer Chemistry.

Supporting information

to

Naked Micelles: Well-Defined Polymer Nanoparticles from photo-cleavable block copolymer micelles

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Supporting Figures

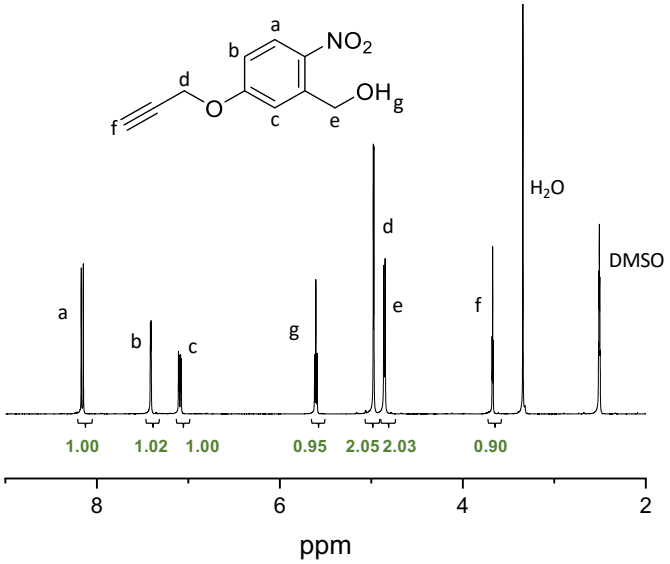

Figure S1: ^{1}H-NMR of 5-propargylether-2-nitrobenzyl alcohol

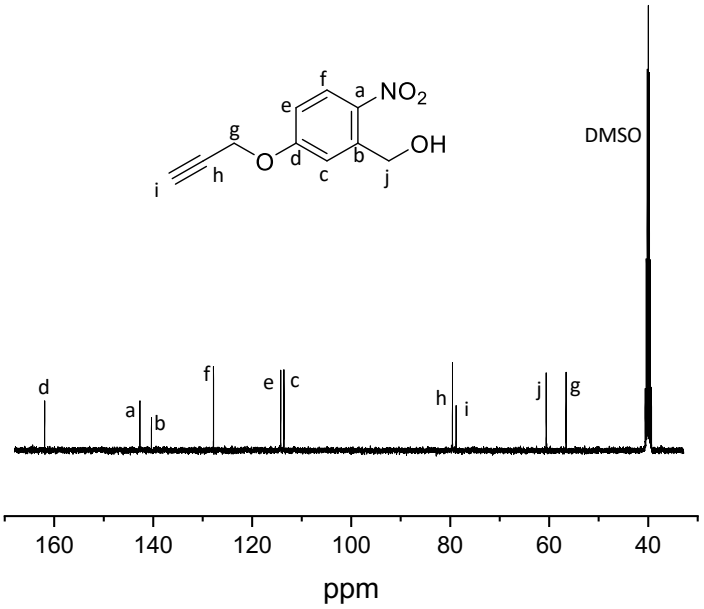

Figure S2 ^{13}C-NMR of 5-propargylether-2-nitrobenzyl alcohol

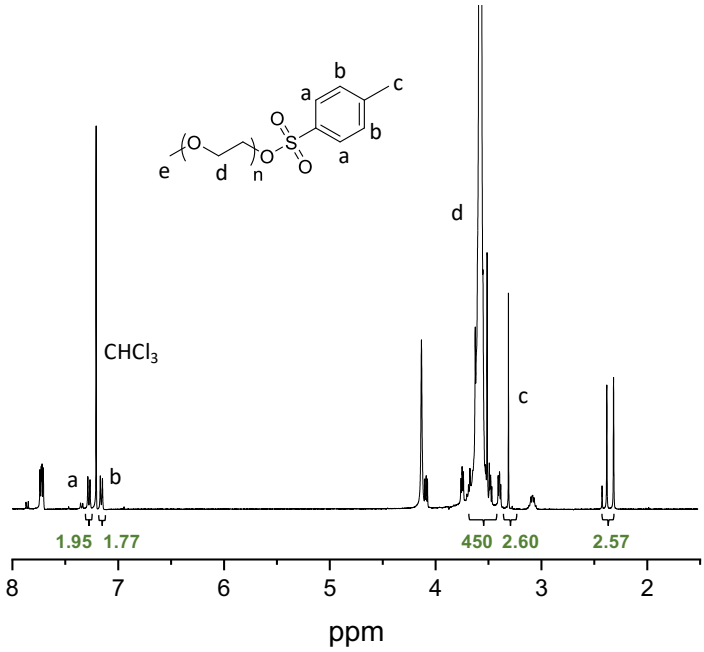

Figure S3 ^{1}H-NMR of PEO-OTs

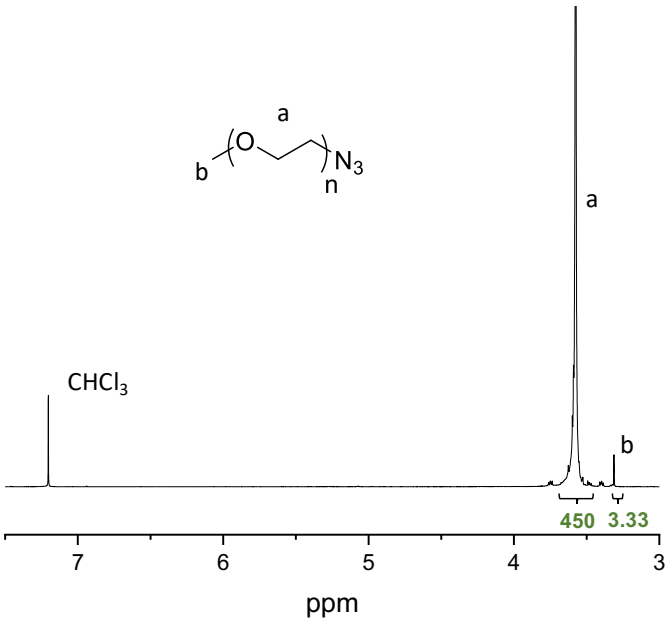

Figure S4 ^{1}H-NMR of PEO-N_3

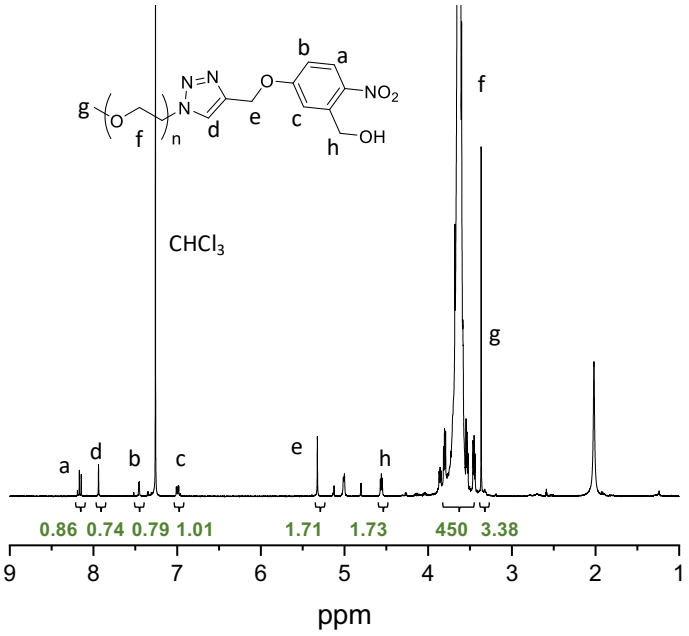

Figure S5 ^{1}H-NMR of PEO-ONB-OH

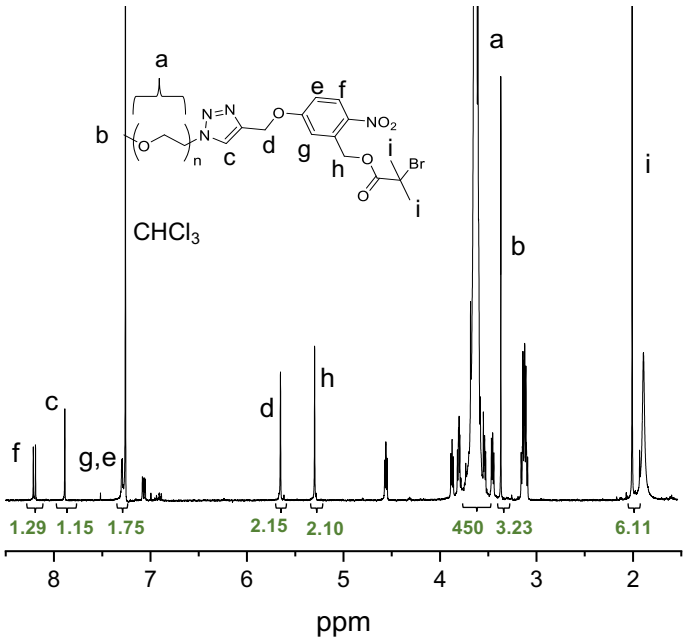

Figure S6 ^{1}H-NMR of PEO-ONB-Br

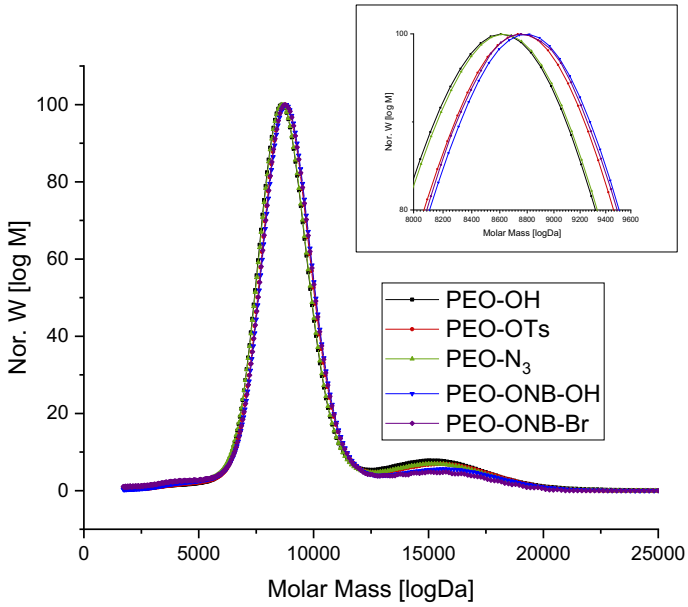

Figure S7 GPC traces with inset of PEO_{113}-OH, PEO_{113}-OTs, PEO_{113}-N_3, PEO_{113}-ONB-OH and PEO_{113}-ONB-Br

Table S1 Molecular weight and polydispersity of PEO_{113}-OH, PEO_{113}-OTs, PEO_{113}-N_3, PEO_{113}-ONB-OH and PEO_{113}-ONB-Br

BCP	M_n[a]	$Đ$
PEO_{113}-OH	8,400	1.07
PEO_{113}-OTs	8,550	1.04
PEO_{113}-N_3	8,350	1.02
PEO_{113}-ONB-OH	8,450	1.02
PEO_{113}-ONB-Br	8,900	1.10

[a] Number average molecular weight and polymer dispersity measured by GPC using THF as the eluent and PS standards for calibration.

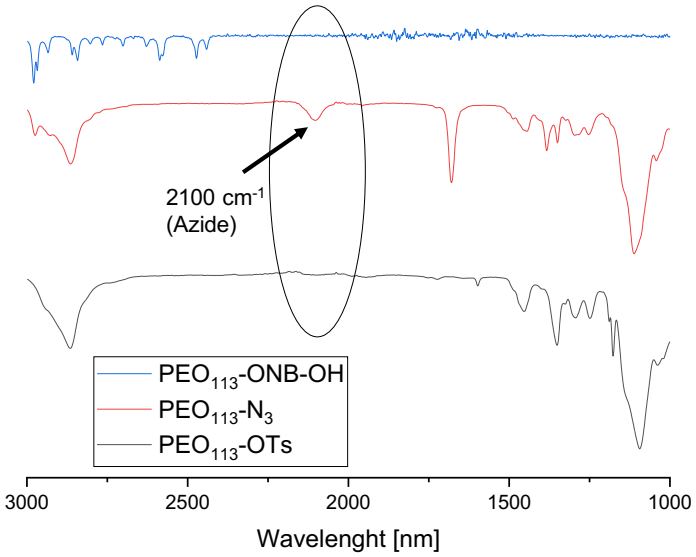

Figure S8 FT-IR of PEO functionalized with tosylate (black curve), azide (red curve) and ONB-OH through click chemistry (blue curve)

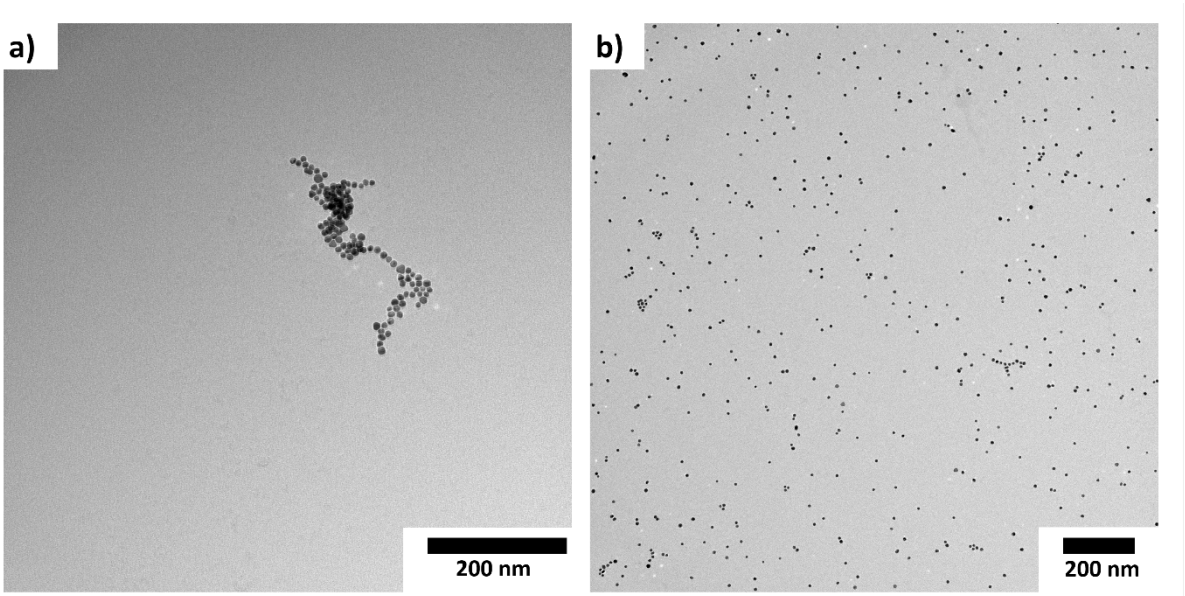

Figure S9 TEM Characterization of AuNPs; a) Negative batch, b) positive batch

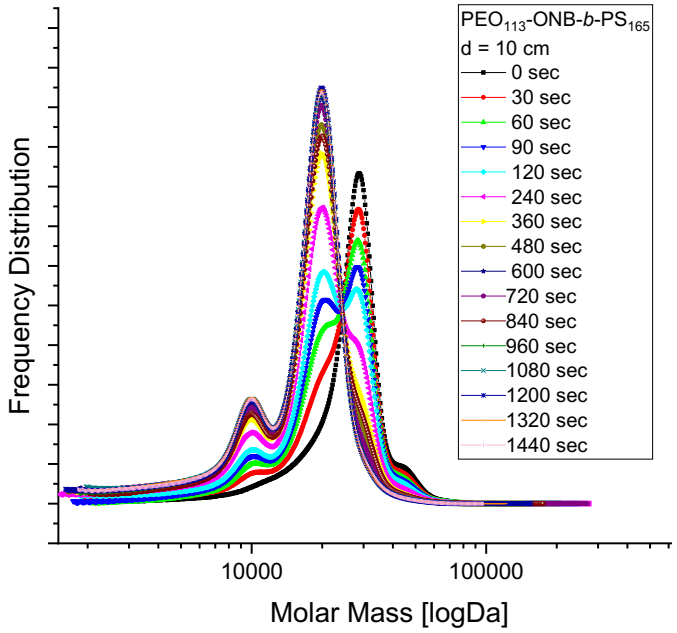

Figure S10 GPC traces of P2 at different irradiation times

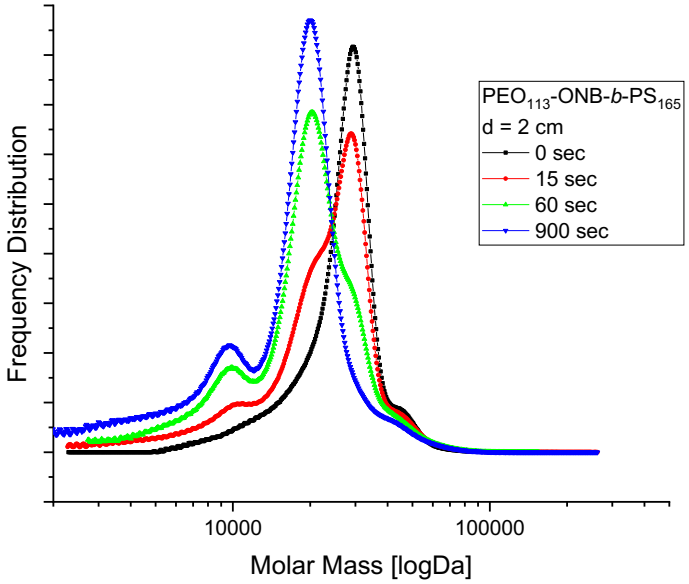

Figure S11 GPC traces of P2 micelles at different irradiation times

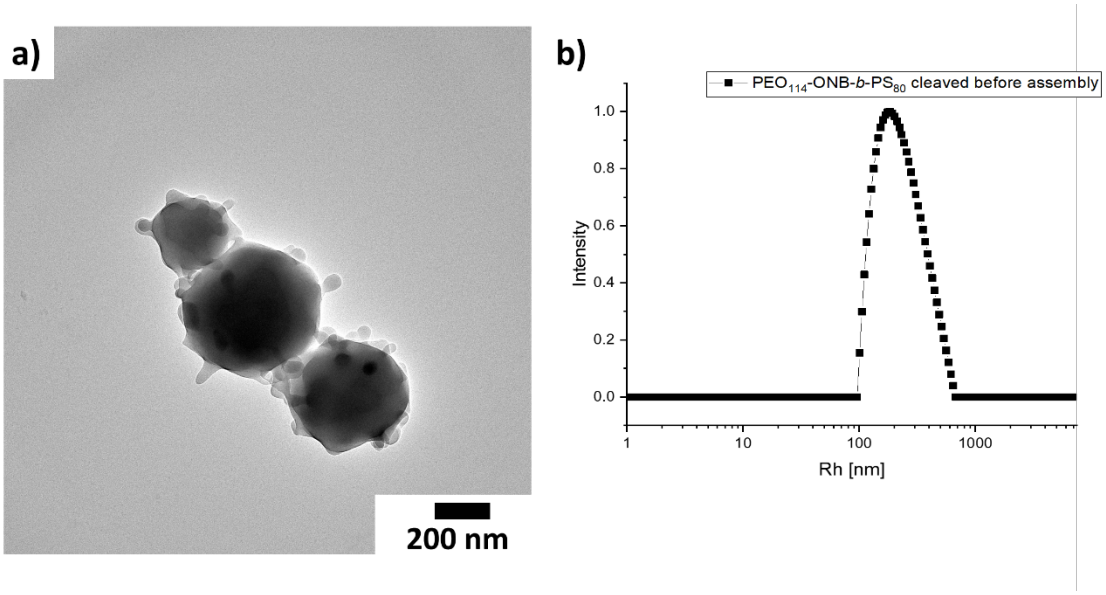

Figure S12 Characterization of PEO-ONB-*b*-PS corona stripped before assembly; a) TEM; b) DLS

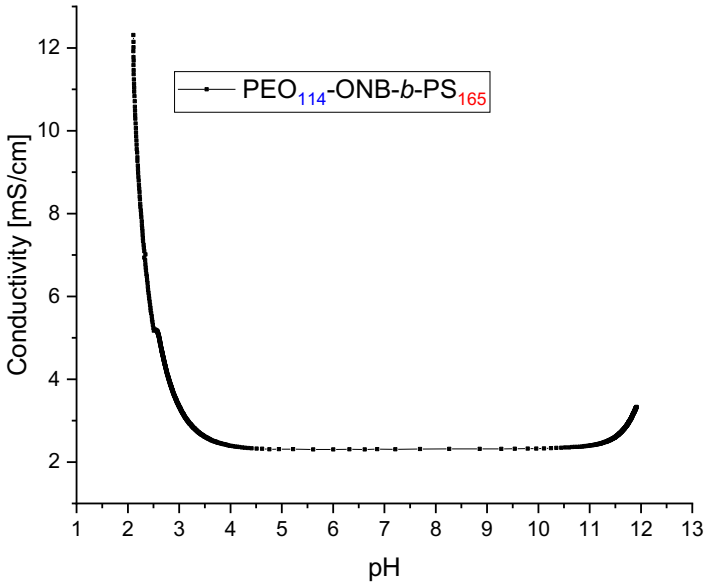

Figure S13 Conductivity titration of PEO_{113}-ONB-*b*-PS_{165}

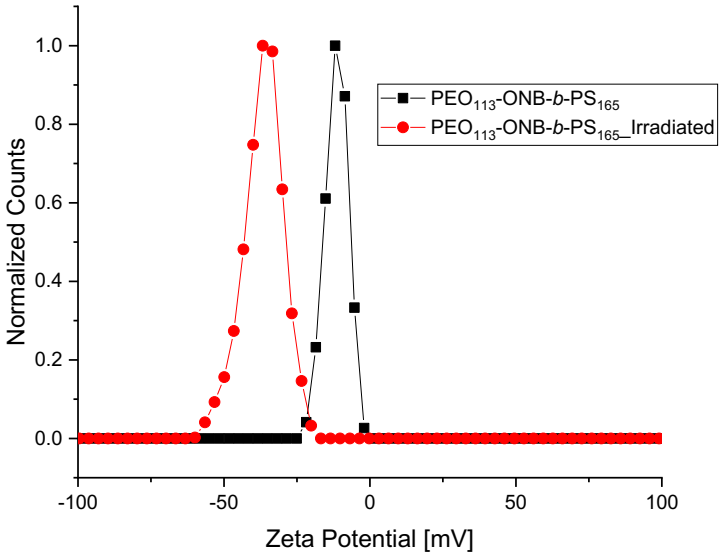

Figure S14 Zeta potential distribution of P2 before (black) and after (red) irradiation