Supplementary Material

Unsurpassed cage effect for the photolysis of dibenzyl ketones in water-soluble dendrimers

Zhao Yuan, Jinping Chen*, Yi Zeng, Ying-Ying Li, Yongbin Han and Yi Li*

Key Laboratory of Photochemical Conversion and Optoelectronic Materials,
Technical Institute of Physics and Chemistry, Chinese Academy of Sciences, Beijing
100190, P. R. China.
E-mail: yili@mail.ipc.ac.cn, chenjp@mail.ipc.ac.cn.

Figure S1. $^1$H NMR spectrum (400MHz, CDCl$_3$) of G1-OH (2)
Figure S2. $^1$H NMR spectrum (400MHz, CDCl$_3$) of G1-Br (3)

Figure S3. $^1$H NMR spectrum (400MHz, CDCl$_3$) of G2-OH (4)
Figure S4. $^1$H NMR spectrum (400MHz, CDCl$_3$) of G2-Br (5)

Figure S5. $^1$H NMR spectrum (400MHz, CDCl$_3$) of G3-OH (6)
Figure S6. $^1$H NMR spectrum (400MHz, CDCl$_3$) of Core (7)

Figure S7. $^1$H NMR spectrum (400MHz, CDCl$_3$) of G1 dendrimer
Figure S8. $^1$H NMR spectrum (400MHz, CDCl$_3$) of G2 dendrimer

Figure S9. $^1$H NMR spectrum (400MHz, CDCl$_3$) of G3 dendrimer
Figure S10. $^{13}$C NMR spectrum (100MHz, CDCl$_3$) of G1 dendrimer

Figure S11. $^{13}$C NMR spectrum (100MHz, CDCl$_3$) of G2 dendrimer
Figure S12. $^{13}$C NMR spectrum (100MHz, CDCl$_3$) of G3 dendrimer

Figure S13. Absorption spectra of G1 to G3 dendrimers in aqueous solution.
Figure S14. DLS size distribution profiles: [G1] = 1.6 mM; [G2] = 0.8 mM; [G3] = 0.4 mM