Electronic Supplementary Material (ESI) for Journal of Materials Chemistry C. This journal is © The Royal Society of Chemistry 2016

Supporting Information

Air-Stable and Highly Luminescent Bismuth Complex Nanoparticles

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Figure S1. EDS result of the S32 sample. Without consideration of other elements,

the Bi/S ratio is ca. 5%.



Figure S2. PLE spectrum for the S96 sample.



Figure S3. The maximum emission intensity of the Bi NPs as a function of the

reaction time.



Figure S4. EEM spectrum for the S96 sample after exposure in air for ten days. The

emission intensity decreases by 17% relative to the as-synthesized sample.



Figure S5. (a) EEM spectrum for the sample undergoing 96 h reaction without the introduction of MSA. The maximum intensity decreases by 7% relative to the S96 sample. (b) TEM image of the above sample.

Sample	B ₁ (%)	$\tau_{1 (ns)}$	B ₂ (%)	τ_{2} (ns)	B ₃ (%)	τ_{3} (ns)	$\tau_{(ns)}$	Ex (nm)	Em (nm)
S18	19.56	0.74	53.58	3.3	26.87	10	7.13	390	500
S32	55.42	4.12	17.43	0.95	27.15	11.6	8.23	455	550
S48	54.01	4.18	14.90	0.99	31.09	11.9	8.78	455	547
S72	52.46	4.36	15.61	1.09	31.93	12.0	8.93	455	550
S96	51.49	4.58	14.85	1.19	33.66	12.1	9.12	455	555

Table S1: The results of PL decay traces fitted by a tri-exponential model.