Electronic Supplementary Material (ESI) for RSC Advances. This journal is © The Royal Society of Chemistry 2015

Supporting information:

Morphology dependent surface enhanced fluorescence study on silver nanorod arrays fabricated by glancing angle deposition

Dhruv Pratap Singh^{1,2}, Samir Kumar¹ and J. P. Singh^{1*}

^{*} Correspondence to: jpsingh@physics.iitd.ac.in

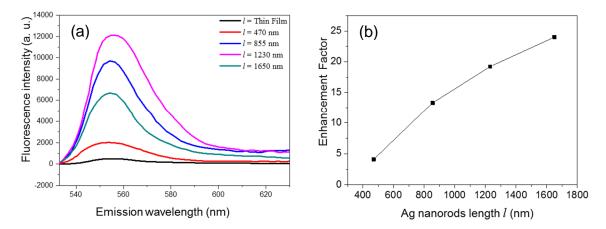


Fig. S1 (a) Fluorescence spectra of Rh6G on LT Ag nanorod arrays of different nanorod lengths *l*. (b) Enhancement factor (EF) measured as a function of the nanorods length *l* of the LT Ag nanorod arrays.

The fluorescence measurement was performed by depositing a constant volume (5 μ L) drop of Rh6G (1.2×10⁻⁶ M in DI water) on each Ag nanorods sample. The Ag nanorods of four different lengths (470 nm, 855 nm, 1230 nm, and 1650 nm) and one conventional Ag thin film for comparative study were used for these measurements. A clear enhancement in fluorescence signal with increase in nanorods length can be observed in the Fig. S1 (a). The trend in increment of enhancement factor is almost same as observed for the samples dip coated in Rh6G aqueous solution.

¹Department of Physics, Indian Institute of Technology Delhi, Hauz Khas, New Delhi 110016, India

²Max Planck Institute for Intelligent Systems, Heisenbergstrasse 3, 70569 Stuttgart, Germany