Supporting Information

Synthesis, magnetic characterization and sensing applications of novel dextran-coated iron oxide nanorods

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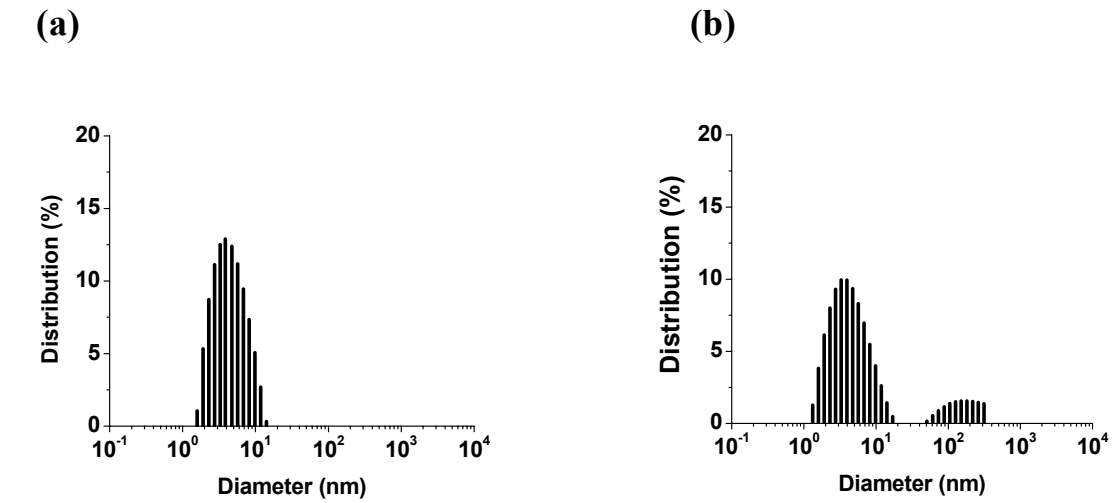
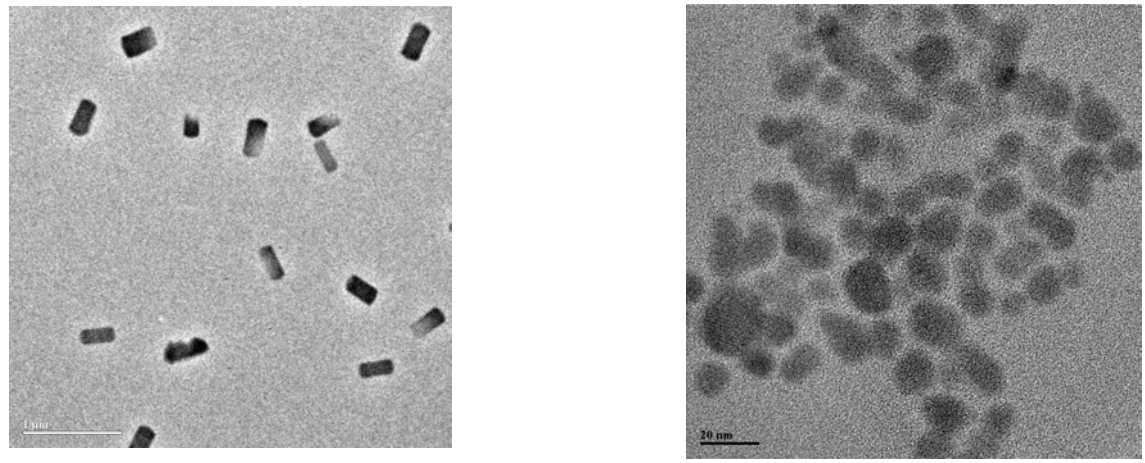
Supplemental Figure 1: Photograph of DIONrods suspension stored at 4 ºC.

Supplemental Figure 2: DLS of the Amersham **(a)** and Sigma **(b)** 10-K dextrans, indicating that the Amersham polymer has a narrower distribution, whereas the Fischer polymer has a significant population (13%) with larger diameters. TEM images of dextran-coated iron oxide nanoparticles synthesized with 10-K dextran from either Amersham **(c)** or Sigma **(d)**.





Supplemental Figure 3: Kinetics of peroxidase activity of DION particles made from the Sigma 10-K dextran, having TMB as a substrate.