Supporting Information for "Microwave absorption enhancement, magnetic coupling and ab initio electronic structure of monodispersed  $(Mn_{1-x}Co_x)_3O_4$  nano-particles"

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Figure S1. A digital photo showing the largescale synthesis of our monodispersed  $(Mn_{1-x}Co_x)_3O_4$ .

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Figure S2. Microwave absorption measurements (a) co-axis method, (b) reflection sheet <sup>30</sup> method.



Figure S3. Schematic diagram for the microwave absorption mechanism of the  $(Mn_{1-x}Co_x)_3O_4$ .