Electronic Supplementary Material (ESI) for New Journal of Chemistry.

Supporting Information

Mesoporous Carbon Hollow Spheres Loaded with Fe/Fe_3C as Efficient Solar Vapour Generation Materials

Jianfeng Gao [a], *Hui Zhang* [a], *Zhaoshun Zhang* [a], *Changcheng Lin* [a], *Qun Yang* [b], *Shiwei Shi* [b], *Xueqin Zuo* [b], *Shaowei Jin* [a, b]*, *Guang Li* [a]*

[a] School of Materials Science and Engineering, Anhui Key Laboratory of Information Materials and Devices, Institute of Physical Science and Information Technology, Anhui University, Hefei 230601, People's Republic of China.

[b] School of Physics and Optoelectronic Engineering, Anhui University, Hefei 230601, People's Republic of China.

---

* **Corresponding author. E-mail: jinsw@mail.ustc.edu.cn (S. J.)**

* **Corresponding author. E-mail: liguang1971@ahu.edu.cn (G. L.)**

Figureures

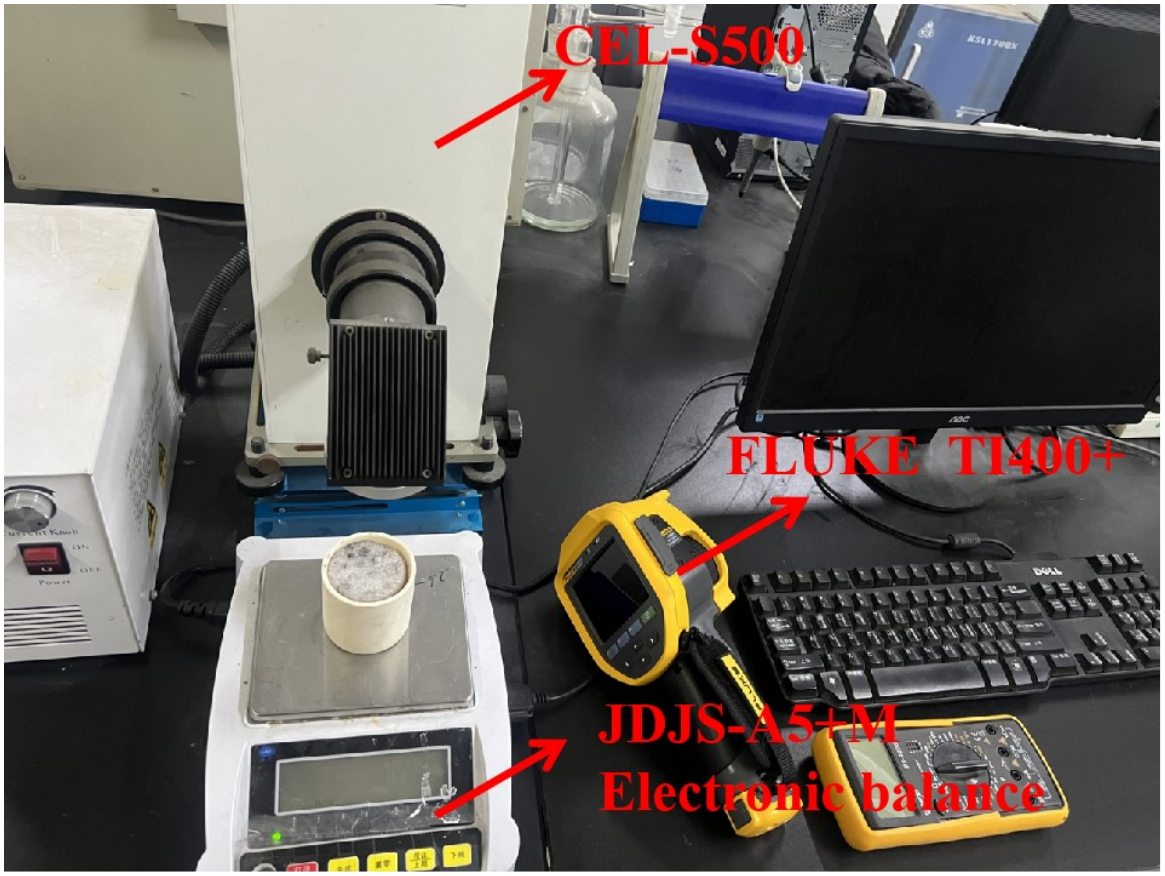

Fig.S1. Water evaporation system

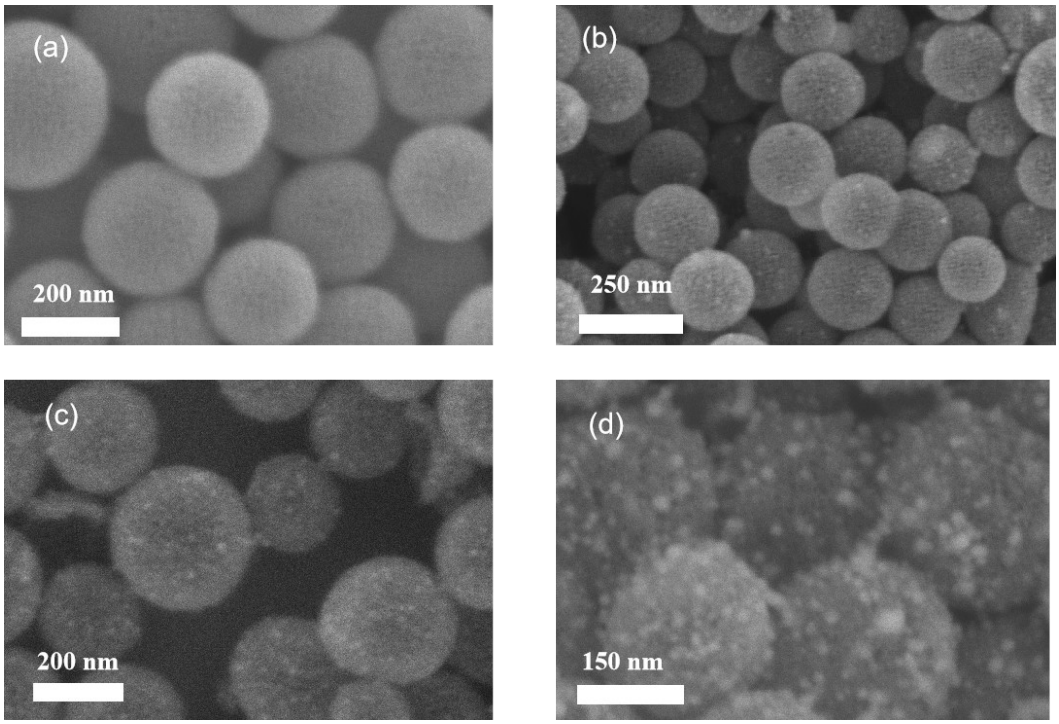

Fig.S2. SEM images of (a)MCHS, (b)Fe/Fe_3C@MCHS-1, (c)Fe/Fe_3C @MCHS-2, (d)Fe/Fe_3C@MCHS-3.

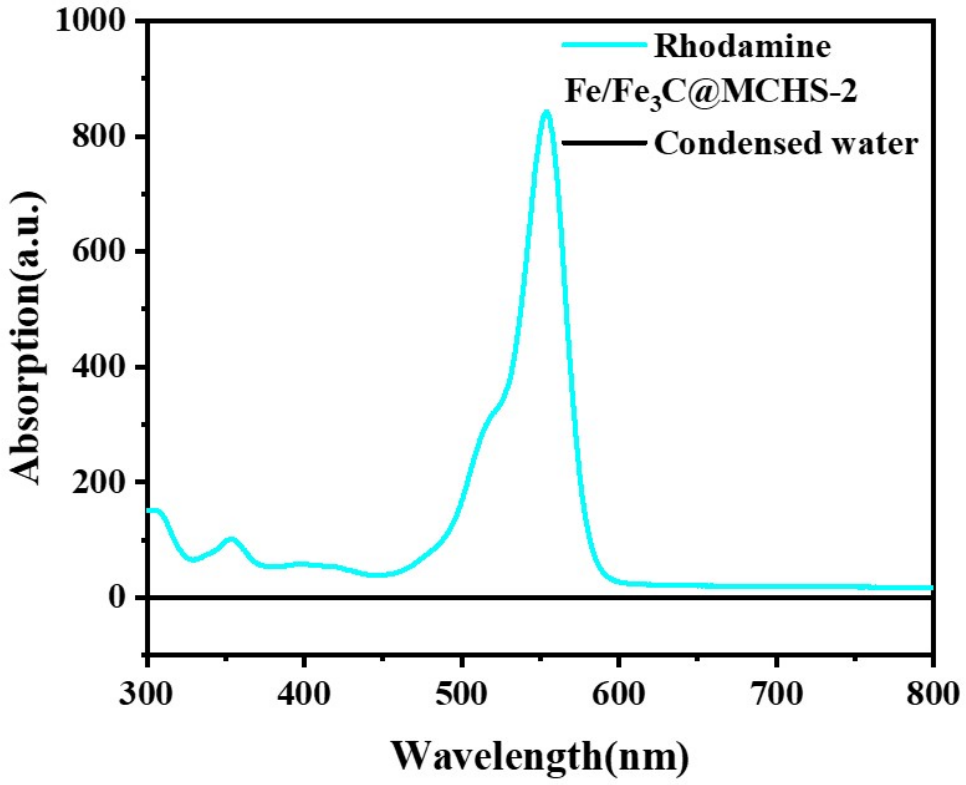

Fig.S3. Organics adsorption (rhodamine-Fe/Fe_3C@MCHS-2)

.

Fig.S4. Temperature of the heated surface of the dry sample interface at different times under primary solar radiation(Fe/Fe_3C@MCHS-2).

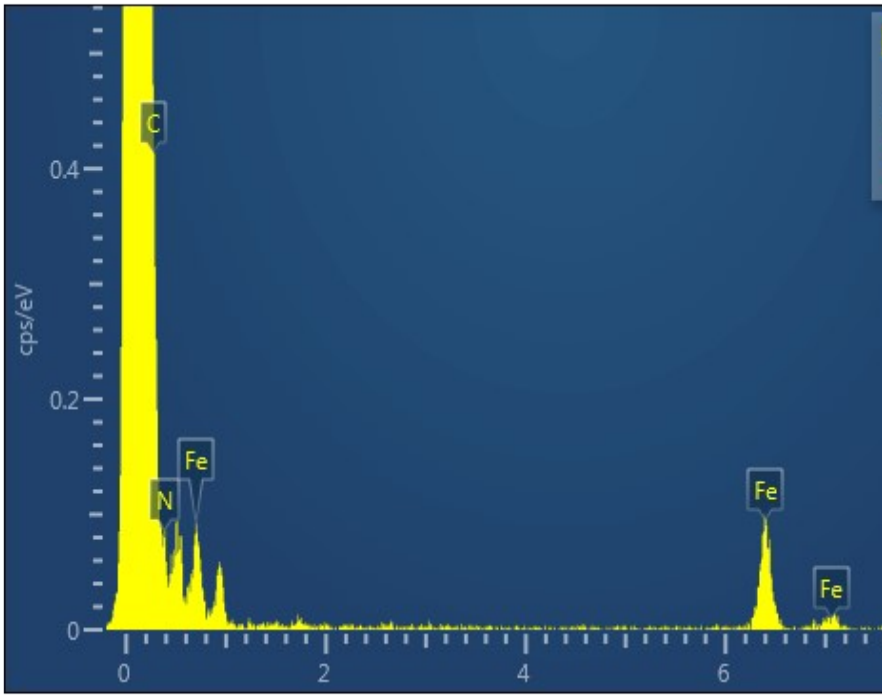

Fig.S5. EDS energy spectrum analysis（Fe/Fe_3C@MCHS-2）

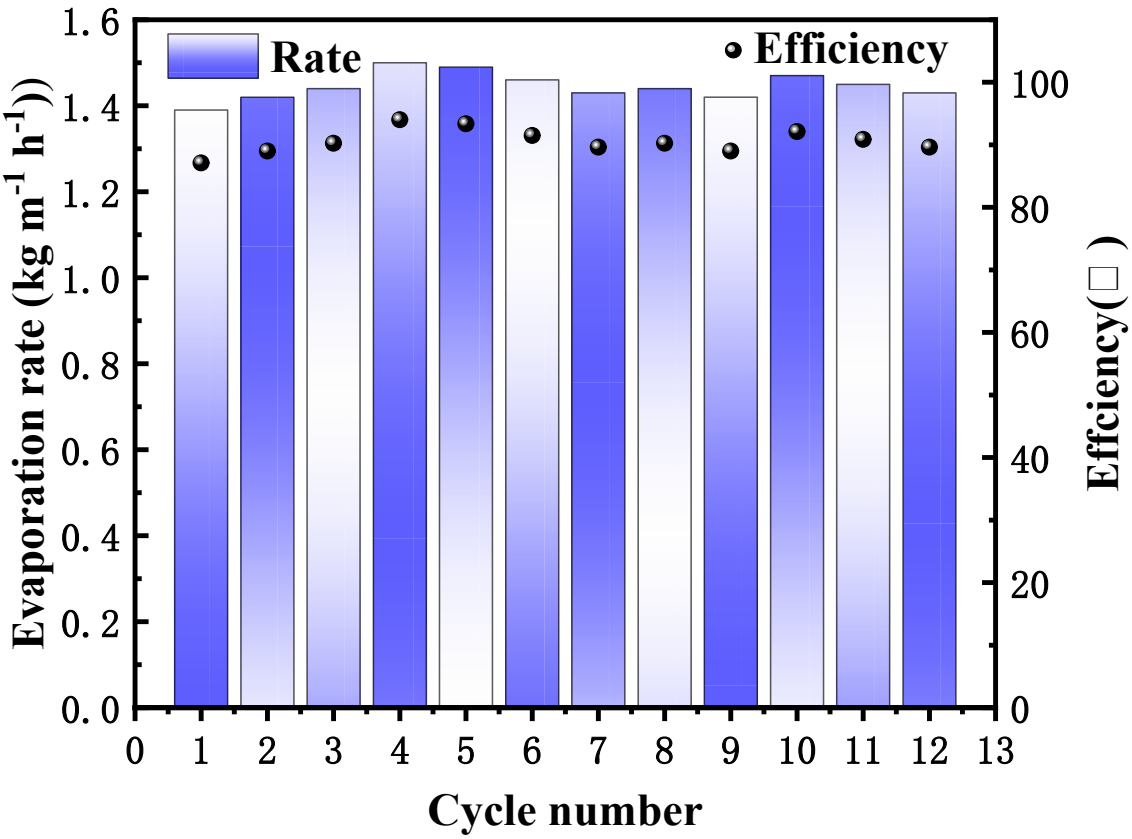

Fig.S6. Rate and efficiency after cycling（Fe/Fe_3C@MCHS-2）

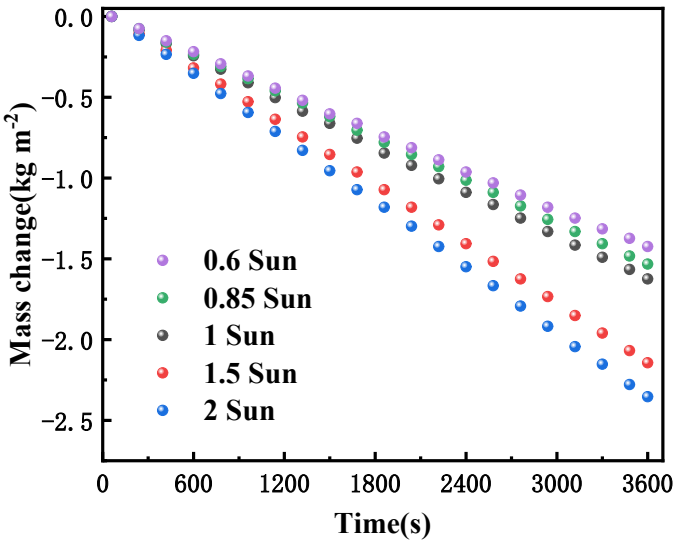

Fig.S7. The change of water quality under different irradiation intensity （Fe/Fe_3C@MCHS-2）