

Supplementary

Laser-Induced Deposition of Plasmonic Ag and Pt Nanoparticles, and Periodic Arrays

Daria V. Mamonova ¹, Anna A. Vasileva ¹, Yuri V. Petrov ², Denis V. Danilov ³, Ilya E. Kolesnikov ⁴, Alexey A. Kalinichev ⁴, Julien Bachmann ^{1,5} and Alina A. Manshina ^{1,*}

- ¹ Institute of Chemistry, Saint-Petersburg State University, 26 Universitetskii Prospect, Saint-Petersburg 198504, Russia; magwi@mail.ru (D.V.M.); anvsilv@gmail.com (A.A.V.); julien.bachmann@fau.de (J.B.)
- ² Department of Physics, Saint-Petersburg State University, Ulyanovskaya 3, Saint-Petersburg 198504, Russia; y.petrov@spbu.ru
- ³ Interdisciplinary Resource Center for Nanotechnology, Research Park, Saint-Petersburg State University, Ulyanovskaya 1, Saint-Petersburg 198504, Russia; danilov1denis@gmail.com
- ⁴ Centre for Optical and Laser Materials Research, Research Park, Saint-Petersburg State University, Ulyanovskaya 5, Saint-Petersburg 198504, Russia; ilya.kolesnikov@spbu.ru (I.E.K.); kalinichev.alex@gmail.com (A.A.K.)
- ⁵ Department of Chemistry and Pharmacy, Friedrich–Alexander University of Erlangen–Nürnberg, IZNF, Cauerst. 3, 91058 Erlangen, Germany
- * Correspondence: a.manshina@spbu.ru

Citation: Mamonova, D.V.; Vasileva, A.A.; Petrov, Y.V.; Danilov, D.V.; Kolesnikov, I.E.; Kalinichev, A.A.; Bachmann, J.; Manshina, A.A. Laser-Induced Deposition of Plasmonic Ag and Pt Nanoparticles, and Periodic Arrays. *Materials* **2020**, *14*, 10. <https://doi.org/10.3390/ma14010010>

Received: 30 November 2020
Accepted: 21 December 2020
Published: date

Publisher's Note: MDPI stays neutral with regard to jurisdictional claims in published maps and institutional affiliations.



Copyright: © 2020 by the authors. Submitted for possible open access publication under the terms and conditions of the Creative Commons Attribution (CC BY) license (<http://creativecommons.org/licenses/by/4.0/>).

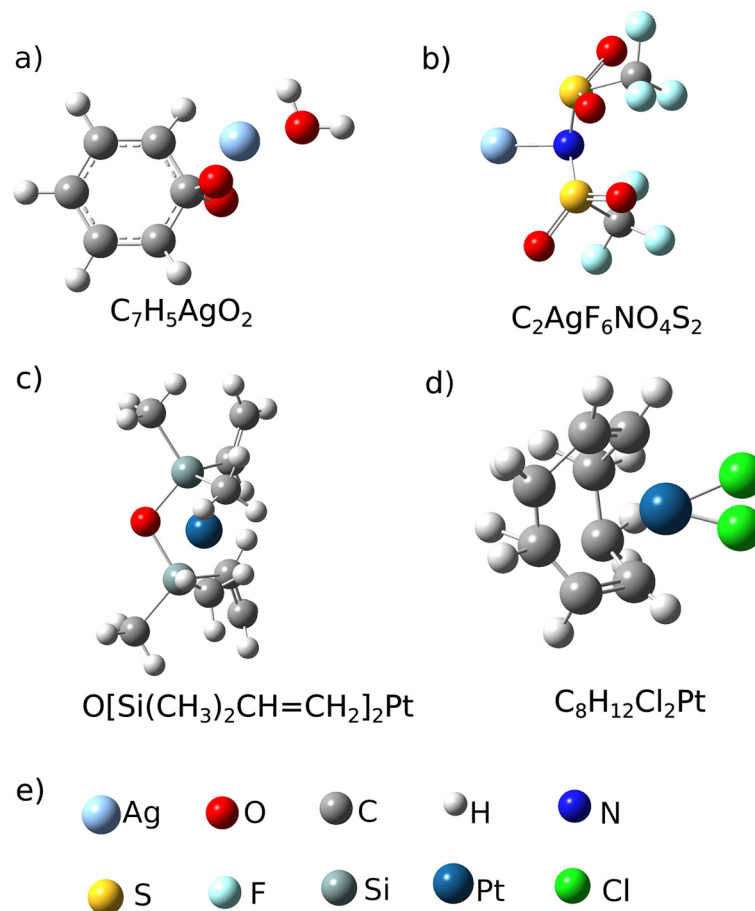


Figure S1. Structures of LID precursors.

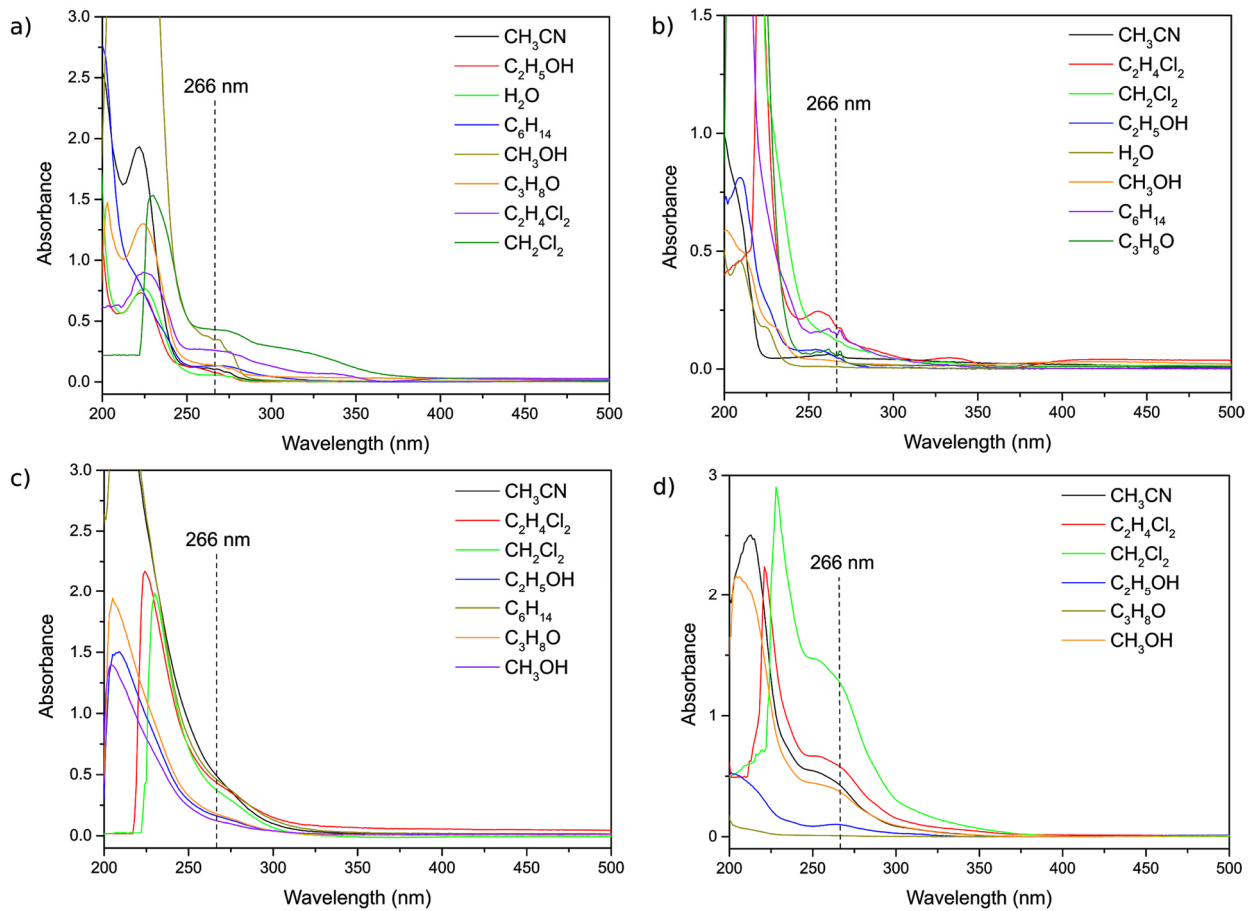


Figure S2. Absorbance spectra of precursors in different solvents (a) $C_7H_5AgO_2$; (b) $C_2AgF_6NO_4S_2$; (c) $O[Si(CH_3)_2CH=CH_2]_2Pt$; (d) $C_8H_{12}Cl_2Pt$.

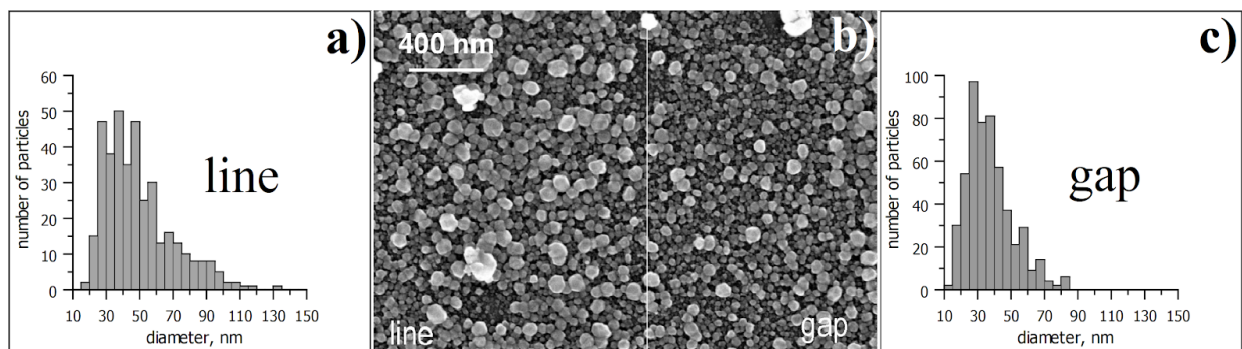


Figure S3. (a) Particles size histogram for line area of Ag NPs grating; (b) SEM for line and gap areas of Ag NPs grating, laser power of 200 mW, irradiation time 20 min periods of the interference pattern $3\ \mu m$ (c) Particles size histogram for gap area of Ag NPs grating.