

Projekta Izp-2018/1-0187 rezultāti

Plazmonisku oksīdu kvantu punkti enerģiju taupošiem gudrajiem logiem

Oriģināli zinātniskie raksti, kas publicēti zinātniskos žurnālos, rakstu krājumos vai konferenču rakstu krājumos, kuri ir indeksēti datu bāzēs Web of Science Core Collection, SCOPUS vai ERIH PLUS

1. Eglītis, R.; Joost, U.; Zukuls, A.; Rubenis, K.; Ignatāns, R.; Avotiņa, L. G.; Baumane, L.; Šmits, K. N.; Hirsimäki, M.; Käämbre, T.; Šutka, A. Strong, Rapid, and Reversible Photochromic Response of Nb Doped TiO₂Nanocrystal Colloids in Hole Scavenging Media. – *Interfaces*, 2020, 12 (51), 57609-57618, <https://doi.org/10.1021/acsami.0c17902>
2. Šutka, A.; Eglītis, R.; Kuzma, A.; Smits, K.; Zukuls, A.; Prades, J. D.; Fàbrega, C. Photodoping-Inspired Room-Temperature Gas Sensing by Anatase TiO₂Quantum Dots. - *Nano Mat.*, 2021, 4 (3), 2522-2527, <https://doi.org/10.1021/acsanm.0c03089>
3. Joost, U.; Šutka, A.; Oja, M.; Smits, K.; Döbelin, N.; Loot, A.; Järvekülg, M.; Hirsimäki, M.; Valden, M.; Nömmiste, E. Reversible Photodoping of TiO₂ Nanoparticles for Photochromic Applications. - *Chem. Mater.*, 2018, 30 (24), 8968-8974, <https://doi.org/10.1021/acs.chemmater.8b04813>
4. Zukuls, A.; Eglītis, R.; Käämbre, T.; Kook, M.; Kisand, V.; Maiorov, M.; Ignatans, R.; Duarte, R. F.; Järvekülg, M.; Šutka, A. Magnetic and optical properties in degenerated transition metal and Ga co-substituted ZnO nanocrystals. - *J Alloys Compd.*, 2019, 805, 1191-1199, <https://doi.org/10.1016/j.jallcom.2019.07.197>
5. Zukuls, A.; Eglītis, R.; Käämbre, T.; Ignatans, R.; Šmits, K.; Rubenis, K.; Začs, D.; Šutka, A. Permanent photodoping of plasmonic gallium-ZnO nanocrystals. – *Nanoscale*, 2020, 12 (12), 6624-6629, <https://doi.org/10.1039/d0nr01005g>
6. Eglītis, R.; Zukuls, A.; Vīter, R.; Šutka, A. Kinetics of TiO₂photochromic response in different hole scavenging solvents. - *Photochem. Photobiol. Sci.*, 2020, 19 (8), 1072-1077, <https://doi.org/10.1039/d0pp00079e>
7. Šutka, A.; Zukuls, A.; Eglītis, R.; Käämbre, T.; Kook, M.; Vlassov, S.; Rubenis, K.; Ignatans, R. Stronger Reductive Environment in Solvothermal Synthesis Leads to Improved Ga Doping Efficiency in ZnO Nanocrystals and Enhanced Plasmonic Absorption. - *Phys. Status Solidi A Appl. Mater. Sci.*, 2019, 216 (22), <https://doi.org/10.1002/pssa.201900335>