
Most Relevant Publications List (2015-2023)

1. **V. Kuryliuk**, O. Tyvonovych, S. Semchuk. Impact of Ge clustering on the thermal conductivity of SiGe nanowires: atomistic simulation study. *Phys. Chem. Chem. Phys.*, 2023. Vol.25. P. 6263 (7p.).
2. **V.V. Kuryliuk**, S.S. Semchuk, K.V. Dubyk, R.M. Chornyi Structural features and thermal stability of hollow-core Si nanowires: A molecular dynamics study. *Nano-Structures and Nano-Objects*, 2022. V. 29. P. 100822 (8p.).
3. A. Nadtochiy, **V. Kuryliuk**, V. Strelchuk, O. Korotchenkov, P.-W. Li and S.-W. Lee Enhancing the Seebeck effect in Ge/Si through the combination of interfacial design features. *Scientific Reports*, 2019. V.9. P. 16335 (11 p.).
4. **V. Kuryliuk**, O. Nepochatyi, P. Chantrenne, D.Lacroix, and M. Isaiev Thermal conductivity of strained silicon: Molecular dynamics insight and kinetic theory approach. *Journal of Applied Physics*, 2019. V.126. P. 055109 (13 p.).
5. B. Gorelov, A. Gorb, A. Nadtochiy, D. Starokadomsky, **V. Kuryliuk**, N. Sigareva, S. Shulga, V. Ogenko, O. Korotchenkov, O. Polovina. Epoxy filled with bare and oxidized multi-layered graphene nanoplatelets: a comparative study of filler loading impact on thermal properties. *Journal of Materials Science*, 2019. V. 54. P. 9247 – 9266.
6. **V.V. Kuryliuk**, O.A. Korotchenkov. Atomistic simulation of the thermal conductivity in amorphous SiO₂ matrix/Ge nanocrystal composites. *Physica E: Low-dimensional Systems and Nanostructures*. 2017. V 88. P. 228–236.
7. M. I. Zakirov, **V. V. Kuryliuk**, O. A. Korotchenkov. Optical properties of ZnO fabricated by hydrothermal and sonochemical synthesis. *Journal of Physics: Conference Series*. 2016. V 741. P. 012028.
8. A. Gorb, O. Korotchenkov, **V. Kuryliuk**, A. Medvid, A. Nadtochiy, A. Podolian. Increase of Photoelectric Response of Ge Nanocones Formed on SiGe by Laser Radiation. *Advanced Materials Research*. 2015. Vol. 1117. P. 23–25
9. **V. Kuryliuk**, A. Nadtochiy, O. Korotchenkov, C.-C. Wang and P.-W. Li. A model for predicting the thermal conductivity of SiO₂-Ge nanoparticle composites *Phys. Chem. Chem. Phys.* 2015. Vol.17. P. 13429-13441.
10. A. Gorb, O. Korotchenkov, **V. Kuryliuk**, A. Medvid, G. Mozolevskis, A. Nadtochiy, A. Podolian. Electron and hole separation in Ge nanocones formed on Si_{1-x}Ge_x solid solution by Nd:YAG laser radiation. *Applied Surface Science*. 2015. Vol. 346. P. 177–181.