



LIST OF PAPERS: 2022

1. A. M. Voiculescu, S. Hau, G. Stanciu, D. Avram, C. Gheorghe, "Optical thermometry through infrared excited green upconversion emissions of Er^{3+} - Yb^{3+} co-doped LaAlO_3 phosphors," *J. Lumin.* **242**, 118602 (2022).
2. C. Dumitrache, A. Gallant, N. Oliveira, C. O. Laux and G. D. Stancu, "Quantitative fs-TALIF in high-pressure NRP discharges: calibration using VUV absorption spectroscopy," *Plasma Sources Sci. Technol.* **31**(1), 015004 (2022).
3. A. Broasca, M. Greculeasa, F. Voicu, G. Stanciu, S. Hau, C. Gheorghe, C. A. Brandus, N. Pavel, M. Enculescu, L. Gheorghe, "Growth and characterization of 3.5 at.% Nd:LGSB bifunctional crystal," *Opt. Mat.* **123**, 111832 (2022).
4. A. Broasca, M. Greculeasa, F. Voicu, G. Stanciu, S. Hau, C. Gheorghe, L. Gheorghe, "Pr:LGSB as a new nonlinear optical crystal: Czochralski growth and optical characterization," *J. Alloys & Comp.* **908**, 164633 (2022).
5. A. Craciun, O.V. Grigore, "Superposition of vortex beams generated by polarization conversion in uniaxial crystals," *Sci. Rep.* **12**, 8135 (2022).
6. S. Hau, G. Stanciu, D. Avram, L. Gheorghe, C. Gheorghe, "Energy transfer and luminescent properties of Tb^{3+} and (Tb^{3+} , Yb^{3+}) doped CNGG phosphors," *J. Rare Earths* **40**(9), 1445-1453 (2022).
7. C. Gheorghe, S. Hau, G. Stanciu, D. Avram, A. Broasca, L. Gheorghe, "Novel optical temperature sensors based on the emission of the Pr^{3+} ions doped $\text{Ca}_3(\text{M,Ga})_5\text{O}_{12}$ ($\text{M}^{5+} = \text{Nb, Ta}$) garnet phosphors," *J. Alloys & Compds.* **922**, 166178 (2022).
8. C. Dumitrache, N. T. Vasile, G. Croitoru, N. Pavel, "Laser-induced ignition of methane-air mixtures by a four-beam, pulse-burst mode passively Q-switched Nd:YAG/ Cr^{4+} :YAG laser," *Results Phys.* **42**, 105958 (2022).