

ESI Hot Papers in March 2023

1. [Thermally stable and highly efficient red-emitting \$\text{Eu}^{3+}\$ -doped \$\text{Cs}_3\text{GdGe}_3\text{O}_9\$ phosphors for WLEDs: non-concentration quenching and negative thermal expansion](#)

Peipei Dang, Guogang Li, Xiaohan Yun, Qianqian Zhang, Dongjie Liu, Hongzhou Lian, Mengmeng Shang & Jun Lin

Light Sci Appl **10**, 29 (2021). DOI: 10.1038/s41377-021-00469-x
2. [High-performance quasi-2D perovskite light-emitting diodes: from materials to devices](#)

Li Zhang, Changjiu Sun, Tingwei He, Yuanzhi Jiang, Junli Wei, Yanmin Huang & Mingjian Yuan

Light Sci Appl **10**, 61 (2021). DOI: 10.1038/s41377-021-00501-0
3. [Circularly polarized luminescence from organic micro-/nano-structures](#)

Yongjing Deng, Mengzhu Wang, Yanling Zhuang, Shujuan Liu, Wei Huang & Qiang Zhao

Light Sci Appl **10**, 76 (2021). DOI: 10.1038/s41377-021-00516-7
4. [Progress on AlGaN-based solar-blind ultraviolet photodetectors and focal plane arrays](#)

Qing Cai, Haifan You, Hui Guo, Jin Wang, Bin Liu, Zili Xie, Dunjun Chen, Hai Lu, Youdou Zheng & Rong Zhang

Light Sci Appl **10**, 94 (2021). DOI: 10.1038/s41377-021-00527-4

ESI Hot Papers in March 2023

5. [Augmented reality and virtual reality displays: emerging technologies and future perspectives](#)

Jianghao Xiong, En-Lin Hsiang, Ziqian He, Tao Zhan & Shin-Tson Wu

Light Sci Appl **10**, 216 (2021). DOI: 10.1038/s41377-021-00658-8

6. [One ion to catch them all: Targeted high-precision Boltzmann thermometry over a wide temperature range with Gd³⁺](#)

Dechao Yu, Huaiyong Li, Dawei Zhang, Qinyuan Zhang, Andries Meijerink & Markus Suta.

Light Sci Appl **10**, 236 (2021). DOI: 10.1038/s41377-021-00677-5

7. [Compact ultrabroadband light-emitting diodes based on lanthanide-doped lead-free double perovskites](#)

Shilin Jin, Renfu Li, Hai Huang, Naizhong Jiang, Jidong Lin, Shaoxiong Wang, Yuanhui Zheng, Xueyuan Chen & Daqin Chen

Light Sci Appl **11**, 52 (2022). DOI: 10.1038/s41377-022-00739-2

8. [Blue LED-pumped intense short-wave infrared luminescence based on Cr³⁺-Yb³⁺-co-doped phosphors](#)

Yan Zhang, Shihai Miao, Yanjie Liang, Chao Liang, Dongxun Chen, Xihui Shan, Kangning Sun & Xiao-Jun Wang

Light Sci Appl **11**, 136 (2022). DOI: 10.1038/s41377-022-00816-6

ESI Hot Papers in March 2023

9. [Tunable liquid crystal grating based holographic 3D display system with wide viewing angle and large size](#)

Yi-Long Li, Nan-Nan Li, Di Wang, Fan Chu, Sin-Doo Lee, Yi-Wei Zheng & Qiong-Hua Wang

Light Sci Appl **11**, 188 (2022). DOI: 10.1038/s41377-022-00880-y

10. [Towards higher-dimensional structured light](#)

Chao He, Yijie Shen & Andrew Forbes

Light Sci Appl **11**, 205 (2022). DOI: 10.1038/s41377-022-00897-3