



ST. XAVIER'S COLLEGE (AUTONOMOUS)
PALAYAMKOTTAI - 627 002
(Recognized as "College with Potential for Excellence" by UGC &
Accredited by NAAC at A++ Grade with a CGPA of 3.66 out of 4)



ANNUAL REPORT 2022-2023
CRYSTAL RESEARCH CENTRE

In charge: Dr. V. Siva Sankar

The Crystal research Centre was established in the year 2015 headed by Dr. V. Sivashankar, Assistant Professor in Physics. DST – SERB funded project of worth 13.44 lakhs was successfully completed in 2016. Currently 4 Ph. D candidates are pursuing their research work. Along with nonlinear optical materials, nanomaterials, super capacitors and solar cells are taken into attention by the researchers. We are producing crystalline materials and super capacitors focusing towards industrial applications. Our scholar Ms. Josephine gladia focuses on L-Threonine and γ -glycine based non linear optical single crystals. The grown crystals are subjected to various characterization techniques like structural, optical, mechanical, thermal and electrical analysis. Fe II metallo polymer based super capacitor is fabricated using spray pyrolysis We have published 8 research papers in peer reviewed reputed journals. A book entitled "Recent research in crystal growth and characterization" is published by the scholar Mr. Gershome Jebaraj from the centre.