



LumiDoz-10

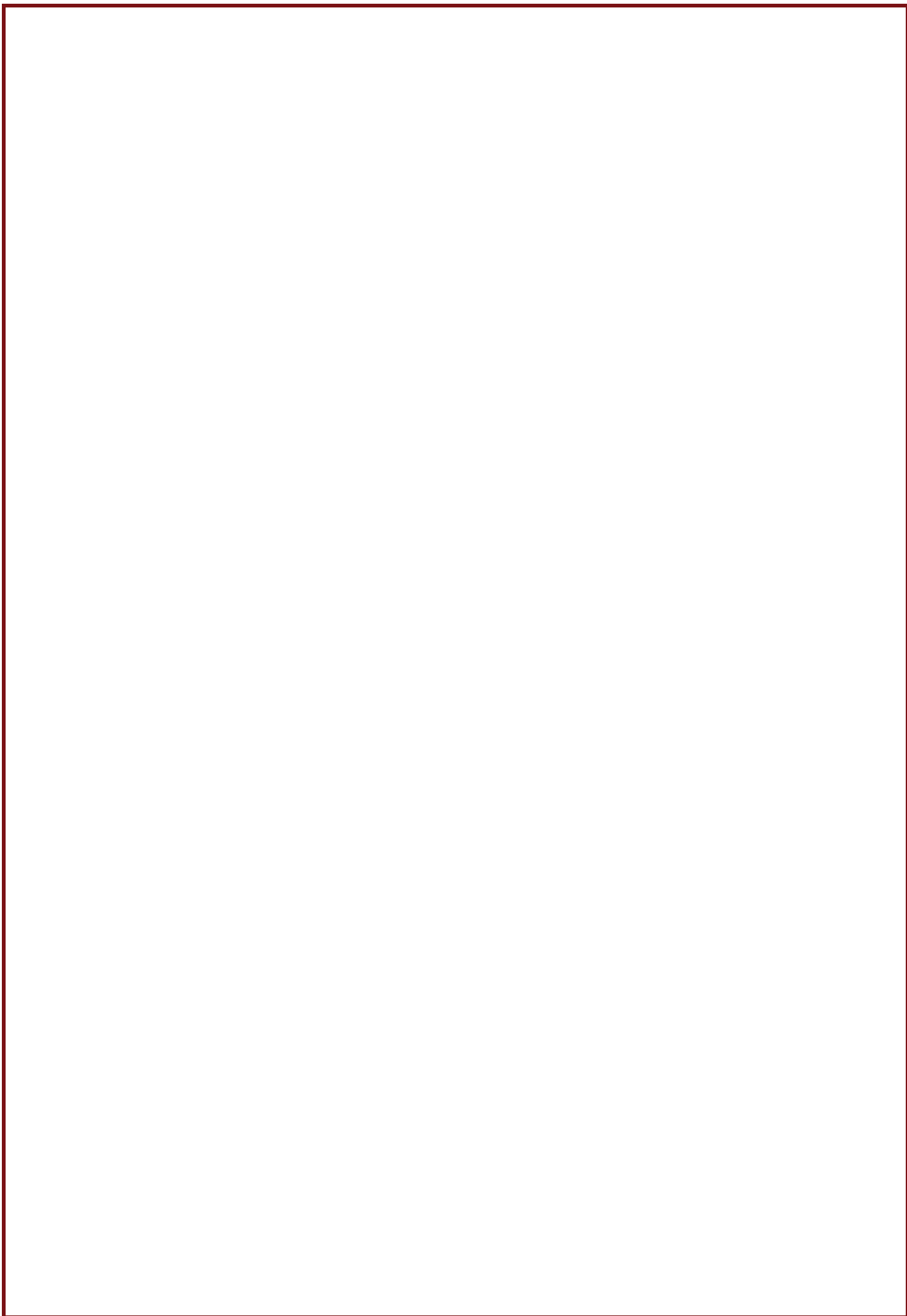
**10th International Conference on
Luminescence and ESR Dosimetry**

Book of Abstracts



**5-7 September 2016
Çukurova University, Adana, TURKEY**

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Editors

Mustafa Topaksu, Mehmet Yüksel, Tamer Doğan
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Synthesis and Thermoluminescence Characterization of CaSO₄:Nd

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Abstract

In this study, CaSO₄:Nd having an average thickness of 11 µm were prepared using the hydrothermal method and the structural and chemical characterizations of produced samples were determined. After the beta irradiation and preheat process at 170°C, thermoluminescence readouts were taken from room temperature up to 500°C using linear heating rate of 2°C/s under nitrogen atmosphere. As a result of TL analysis, it has been observed that CaSO₄:Nd samples have two well defined peaks at 280 and 400°C.

Keywords: *Thermoluminescence, CaSO₄:Nd, Beta irradiation, Preheat.*

Acknowledgement: *This work was supported by Research Fund of Çukurova University (Project Number: FBA-2014-1931). All authors would like to thank for this support.*

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