

## Supplementary Information

### Lightwave trapping in thin film solar cells with improved photonic-structured front contacts

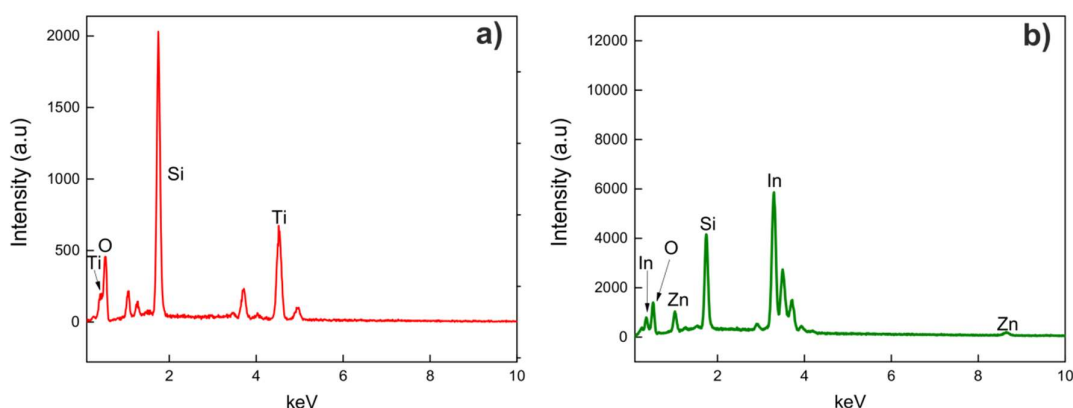
Olalla Sanchez-Sobrado\*, Manuel J.Mendes\*, Sirazul Haque, Tiago Mateus, Hugo Aguas, Elvira Fortunato, Rodrigo Martins

*i3N/CENIMAT, Department of Materials Science, Faculty of Science and Technology, Universidade NOVA de Lisboa and CEMOP/UNINOVA, Campus de Caparica, 2829-516 Caparica, Portugal*

*o.sanchez-sobrado@fct.unl.pt, mj.mendes@fct.unl.pt*

#### Section S1 – EDX analysis

Figure S1 presents the measured energy-dispersive X-ray spectroscopy (EDX) results of TiO<sub>2</sub> and IZO films deposited by sputtering, in order to analyze the composition of the photonic coating materials applied on the solar cells' front. As expected, peaks corresponding to the different elements presented in the structures appear: Ti and O, in the case of the TiO<sub>2</sub> analysis, and In, Zn and O for the IZO film. Both EDX spectra also reveal a pronounced peak corresponding to Si, since to carry out this analysis TiO<sub>2</sub> and IZO were sputtered directly on glass substrates.



**Figure S1.** EDX analysis corresponding to TiO<sub>2</sub> a) and IZO b) films deposited on glass substrates.