

2nd Perovskite Materials and Solar Cells Meeting

February 28th - March 1st 2024

Comisión Nacional de Energía Atómica

Buenos Aires, Argentina

Program

(v) stands for virtual sessions. Invited speakers are highlighted in green.

February 28th.

09:00 - 12:00 Registration

Oral presentations (Auditorio Emma Perez Ferreira)

10:30 - 11:30: Dr. M. Dolores Pérez.

Welcome words - Presentation.

Departamento de la Física de la Materia Condensada – INN - CNEA - UNSAM, San Martín

11:30 - 12:15: Dr. Juan-Pablo Correa-Baena.

Phase Transformations via Surface Defects in Halide Perovskites. (v) Georgia Institute of Technology.

Lunch break

Oral presentations (Auditorio Emma Perez Ferreira)

13:45 – 14:05: **Nahuel Martínez**, Pablo Ravazzoli, Martin Santiago, Fernando Alvira, Mariana Berruet. *Avances para la fabricación de CSP-C en la UNCPBA.*IFAS (UNCPBA) CIFICEN (UNCPBA-CICPBA-CONICET), Tandil.

14:05 – 14:25: **Jorge Caram**, Maximiliano Senno, Silvia Tinte, Victoria Gómez Andrade, Dolores Pérez, Raúl Urteaga. *Layer-by-layer degradation technique for profiling MAPbl3 thin films using high-energy UV irradiation in an oxygen-exposed environment.*Instituto de Física del Litoral, Facultad de Ing. Química.

14:30 – 16:00 Poster session



February 29th.

Oral presentations (Auditorio Emma Perez Ferreira)

09:15 - 10:00: Dr. Juan Bisquert

Halide perovskite synapses and neurons for information storage and processing. (v) Institute of Advanced Materials (INAM), Universitat Jaume I, Spain.

10:00 – 10:20: L. Imhoff, M.B Di Marco, C. Lavado, S. Barolin, **M. Stachiotti**. *Propiedades fotoferroicas de películas de PZT dopadas con Fe/Nb.*Instituto de Física Rosario - CONICET UNR, Rosario.

10:20 – 10:40: **Natalia B. Correa Guerrero,** Guo Zhanglin, Ajay K. Jena, Shibayama Naoyuki, Tsutomu Miyasaka. *Semitransparent Silver – Bismuth Iodide Solar Cell with V_{oc} above 0.8 V for Indoor Photovoltaics*.

Departamento de la Física de la Materia Condensada – INN CNEA- CONICET. TOIN University of Yokohama,

10:40 - 11:10 Coffee Break

11:10 – 11:30: M. B. Suárez, J. E. Durantini, L. Macor, C. Solis, D. A. Heredia, E. Durantini, L. Otero, M. A. Gervaldo. *Polímeros orgánicos sintetizados electroquímicamente con potencial aplicación como contactos selectivos en PSSCs.* (v)

IIITEMA Departamento de Química, Universidad Nacional de Río Cuarto-CONICET, Córdoba.

11:30 – 11:50: **Silvia Tinte**, Maximiliano Senno, Sergio Dalosto, Jorge Caram, Raúl Urteaga, Javier Schmidt. *Modeling organic-inorganic halide perovskites from ab-initio calculations*

Instituto de Física del Litoral, Facultad de Ing. Química. ICMol – Universidad de Valencia.

Lunch break

Oral presentations (Auditorio Emma Perez Ferreira)

13:45 - 14:30: Dr. Javier Schmidt.

Javier Schmidt, Sergio Dalosto, Silvia Tinte, Davide Ceratti, Rafael Ferragut. *Espectroscopía de tiempo de vida de aniquilación de positrones aplicada a monocristales de CH₃NH₃PbBr₃. Instituto de Física del Litoral y Facultad de Ingeniería Química, CONICET y UNL. Santa Fe.*

14:30 – 14:50: **Leonardo Kopprio**, Sylvain Le Gall. *Transient currents produced by mobile ions.* (v)

Group of Electrical Engineering—Paris (GeePs), CNRS, CentraleSupelec, Université Paris-Saclay, Sorbonne Université, France



14:50 – 15:10: Matías Córdoba, Kurt Taretto. Are mobile ions detrimental to perovskite solar cell efficiency? (v)

Dto. de Electrotecnia, Fac. de Ingeniería (UNCo), Neuquén.

15:10 - 15:55: Dr. Thomas Kirchartz

Using Transient Methods to Characterize Recombination and Extraction in Halide Perovskite Solar Cells. (v)

EK-5 Photovoltaik, Forschungszentrum Jülich.

Friday 1st.

Oral presentations (Auditorio Emma Perez Ferreira)

10:00 - 10:45: Dr. Federico Ventosinos

Sofia Chozas Barrientos, **Federico Ventosinos**, Manuel Piot, Vladimir Held, Lidon Gil Escrig, Henk J. Bolink. *Towards highly efficient fully evaporated perovskite/Si Tandem Solar Cells*.

Instituto de Ciencia Molecular - ICMol, Universidad de Valencia.

10:45 – 11:05: Andrés - Felipe Castro - Méndez, Farzaneh Jahanbakhshi, Andrew M. Rappe, Juan-Pablo Correa-Baena. *Understanding and designing the growth of \alpha-FAPbl3 by thermal evaporation.* (v) Georgia Institute of Technology.

11:05 - 11:35 Coffee Break

11:35 – 11:55: **Herman Heffner**, Julius Brunner, Marcos Soldera, Andrés Fabián Lasagni, Yana Vaynzof. *Periodic Surface Microstructures on TCO to Enhance Optoelectronic Properties.* (v)

TU Dresden.

12:00 - 13:00 Dr. Tsutomu (Tom) Miyasaka.

Discovery backgrounds of perovskite photovoltaics and high-voltage development of lead-based and lead-free perovskite solar cells.

TOIN University of Yokohama.