

# INES WORKSHOP

## Photovoltaics: towards a sustainable industry



>>> organized by



>>> with the support of



March 9<sup>th</sup> - 10<sup>th</sup> - 11<sup>th</sup> 2021  
Online workshop

### REGISTRATION

<https://www.ines-solaire.org/fr/evenements/ecopv2021/>  
Fee | 260 EUR

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### PROGRAMME

>>> [www.ines-solaire.org](http://www.ines-solaire.org)



#### Day 1 - Tuesday March 9<sup>th</sup> – 14:00 - 16:00

>>> 14:00 - Introduction – CEA – INES - Claire Agraffeil

#### 1<sup>st</sup> session | 14:15 >>> Sustainability

**SolarPower Europe - Aurélie Beauvais** - Up to the challenge - Solar's contribution to environmental, social and economic sustainability goals

**NREL - IEA-PVPS Task12 - Garvin Heath** - Sustainability of PV – status, opportunities and challenges in a Terwatt era

#### 2<sup>nd</sup> session | 15:00 >>> Industry best practices

**ENEL GREEN POWER - Fabrizio Bizzarri** - PV Industry Innovative solutions for a sustainable future

**REC - Shankar Sridhara** - Quality beyond expectations

**LONGI - Chen Zhu** - Hi-MO 4 Innovation of LCOE solution

## Day 2 - Wednesday March 10<sup>th</sup> – 10:00 - 15:30

### 3<sup>rd</sup> session | 10:00 >>> LCA & LCC

**UNSW - Rong Deng** - Comparative economic assessment of silicon photovoltaic module recycling by glass recycling, mechanical recycling and thermal recycling

**Bifa Umweltinstitut GmbH - Karsten Wambach** - Life Cycle Approach And Circular Economy of Photovoltaics Covering the Full Value Chain

**EC-JRC - Fulvio Ardente** - Recovery of critical and precious metals from silicon PV panel recycling

### 4<sup>th</sup> session | 11:00 >>> Policies & legislations

**EC-DG GROW - Davide Polverini** - Eco-design directive - Decisions & perspectives

**PV Cycle - Jan Clyncke** - State of play - PV Recycling legislations

*|| LUNCH BREAK ||*

### 5<sup>th</sup> session | 14:00 >>> Ecodesign

**Trinity College Dublin - John Gallagher** - Eco-design: it all starts with design

**EXXERGY - Thomas Sauer** - The inconvenient truth: How to separate chaff from wheat in the PV ecosystem

### 6<sup>th</sup> session | 14:45 >>> Quality & reliability

**OFI - Gabriele Eder / PCCL - Ernot Oreski** - Repair options for cracked backsheets

**Fraunhofer-ISE - Sina Herceg / Karl-Anders Weiss** - Green Manufacturing initiative

## Day 3 - Thursday March 11<sup>th</sup> – 10:00 - 15:45

### 7<sup>th</sup> session | 10:00 >>> Waste management

#### COLLECTION

**PV Cycle France - Nicolas Defrenne** - Challenges of PV waste collection

#### RECYCLING

**NPC - Taisuke Doi** - NPC new equipment for PV module recycling, status of recycling in Japan

**LuxChemtech - Wolfram Palitzsch** - PV Recycling – the long way to circular economy

**TIALPI - Lodovico Ramon** - FRELP By Sun - Full Recovery End of Life Photovoltaic by the energy from the sun

#### EXPERIENCES FROM OTHER FIELDS

**WEEE forum - Pascal Leroy** - An enhanced definition of EPR and the role of all actors.

**Votechnik - Lisa O'Donoghue** - Application of robotics as a disruptive technology for LCD recycling

### 8<sup>th</sup> session | 14:00 >>> Circular strategies

*|| LUNCH BREAK ||*

#### SOLAR INDUSTRY

**VITO - Tom Rommens** - Circular business models for the solar power industry - Circulol project

**First Solar - Andreas Wade** - Circularity - a pre-requisite for terawatt scale Photovoltaics

#### OTHER MODELS & PERSPECTIVES

**ZSI - Gorazd Weiss** - The Rain Model - A Regional Circular Living Lab Business Concept

**ECOCEM - Thomas Wattez** - Circular Economy in Civil Engineering: ECOCEM's waste upcycling approach

## || Conclusions & perspectives – Edition 2022 ||