



PROGRAM

PHOTON's 3rd PV Inverter Conference on Feb. 2 – ENTERING THE ERA OF ON-GRID INVERTERS WITH 99-PERCENT EFFICIENCY

9:00 - 9:10

CONFERENCE OPENING

Chairpersons:

- **Philippe Welter**, PHOTON, Germany
- **Sam Vanderhoof**, Solar Cowboyz, USA

Invited speakers

9:10 - 11:00

FUNDAMENTALS & GRID INTEGRATION

- **Sam Wilkinson**, IMS Research, UK
»The Future Development of the PV Inverter Market – Latest findings from IMS Research«
- **Michael Schmela**, PHOTON International, Germany
»Overview of PHOTON's inverter survey – product trends«
- **Ward Bower**, Sandia, USA
»Inverter benefits for the grid«
- **Bill Brooks**, Brooks Engineering, USA
»Requirements for on-grid inverters in the US – lessons learned«

11:00 - 11:15

Coffee Break

11:15 - 13:00

TECHNOLOGY: HIGH EFFICIENCY, LOW COST, LONG LIFE – HOW TO DESIGN THE PERFECT 99-PERCENT INVERTER

- **Bill Erdman**, BEW Engineering, USA
»The latest on inverter R&D«
- **Jeff Casady**, SemiSouth, USA
»New transistors (SiC, GaP) for higher efficiencies«
- **Adrian Haering**, SMA, Germany
»Sunny Tripower HE – the first 99-percent inverter«
- **Thomas Helgeth**, Steca, Germany
»Low-cost design of very high-efficiency small inverters«
- **Frank Liu**, Chint, China
»High efficiency design of photovoltaic inverters«

13:00 - 14:00

Lunch

14:00 - 16:00

TESTING INVERTERS

- **Chris Flückiger**, UL, USA
»Inverter certification – statistics from testing inverters for UL approval«
- **Heinz Neuenstein**, PHOTON Laboratory, Germany
»PHOTON efficiency – update on a testing method to provide meaningful efficiency results«
- **Patrick Saxton**, CEC, USA
»The California inverter listing – take-aways from many years of testing inverters«
- **Philippe Welter**, PHOTON, Germany
»Inverter material analysis – possibilities for reducing cost«

16:00 - 16:30

Coffee Break

16:30 - 18:00

LEVELIZED COST OF ELECTRICITY – POWER OPTIMIZERS, MICROINVERTERS & TRADITIONAL INVERTERS

- **Raghu Belur**, Enphase, USA
»Microinverters – performance data from the field«
- **John Berdner**, SolarEdge, USA
»Combined power optimizer and inverter solution – case studies«
- **Martina Siebmans**, PHOTON Laboratory, Germany
»Testing PV optimizers – results and analysis«
- **Marco Trova**, Power-One, USA
»LCOE from residential to large scale PV – comparing central, string and micro inverters – current status and future perspectives«

18:00 - 18:30

PANEL DISCUSSION:

WHAT WILL FUTURE INVERTERS LOOK LIKE?