

Dr Sven Teske Diploma Engineer (FH)

RESEARCH PRINCIPAL

Dr Sven Teske is a Research Principal at the Institute for Sustainable Futures. Dr Teske has 20 years experience in technical analysis of renewable energy systems and market integration concept. He has published over 50 special reports about renewable energies including the “Global Wind Energy Outlook” and “Solar Generation”.

Dr Teske was the Renewable Energy Director at Greenpeace International for 10 years, where he was the project leader for five editions of the World Energy Scenario “Energy [R]evolution: A sustainable World Energy Outlook”. The energy [r]evolution is an independently produced report that provides a practical blueprint for a transition towards renewable energy supply by 2050. This research is a joined project of the German Aerospace Centre (DLR), NGO’s and the Global Wind Energy Council.

Sven was a lead author for the IPCC Special Report Renewables (Chapter 10: Scenario analysis) which was published in 2011. He was a member of the expert review committee for the IEA World Energy Outlook in 2010 and 2011 and is a member of the advisory panel of the Japanese Renewable Energy Foundation.

Sven also has practical experience in small-scale utility development. He originally developed the concept for a green utility and founded in 1999 the “Greenpeace energy eG”– Germany’s first cooperative in the power sector. Greenpeace Energy eG today employs 70 people and supplies 120.000 customers in Germany with green electricity. He has been a member of the board since 2000

Sven has significant experience in applying technical concepts (infrastructure, power grids and solar photovoltaic equipment) for rural electrification projects such as the Bihar Cluster utility project.

Sven also has a PhD in the *Integration of solar photovoltaic and wind into power systems* from the University of Flensburg in Germany.

AREAS OF EXPERTISE

- Decentralized energy and renewable energy system analysis
- Power grid integration for decentralized energy systems and smart grids
- Modelling, economics, planning and policy for delivering distributed energy
- Energy policy and regulations for liberalized electricity markets
- International renewable market development

EDUCATION

PhD	Integration of solar photovoltaic and wind into power systems - Engineering and Economics, University of Flensburg/Germany	2011–2015
Dipl. Ing.	Diploma of engineering (Hons I), Precision Engineering: Fach-hochschule (University of Applied Science) Wilhelmshaven/Germany	1989–1994

EMPLOYMENT HISTORY

2015 – present	Research Principal Institute for Sustainable Futures, University of Technology Sydney
2004 – 2015	Renewable Energy Director Greenpeace International, Amsterdam/Hamburg
1994 - 2004	Renewable Energy Director Greenpeace Germany, Hamburg

SELECTED PROJECTS

Global Energy Scenario Analysis

- The 5th edition of the Global Energy Scenario “Energy [R]evolution, includes an analysis about the employment potential for heating and cooling, a new fossil fuel analysis, detailed transport energy strategy as well as a review of renewable energy market projections published over the past 10years.< published September 2015.

National and Regional Energy scenarios

- Publication of over 40 energy scenario under the Energy [R]evolution series between 2007 and 2015, including energy analysis for Australia, New Zealand, Japan, China, India, Indonesia, South Africa, Brazil, Chile, Argentina, Mexico, USA, Canada, several European countries, Israel and Russia.

Power Grid Analysis

- Grid Analysis for the Chinese Province of Jiangsu – a joined publication of Energynautics, State Grid Company China, China Renewable Energy Industry Association (CREIA) and Greenpeace China, published June 2015
- PowE[R] 2030 – a report about the need grid infrastructure and how smart-grids and super grids work could together to implement 70% Renewable Power generation for Europe by 2030, published April 2014

Rural Electrification

- E[R] cluster for smart energy access – the role of micro-grids in promoting the integration of renewable energy in India: joined project of Energynautics, a rural community in North-Indian state of Bihar and Greenpeace. The project developed a technical and economical concept to establish a rural utility, which installs and operates solar photovoltaic and rice husk generator to power a community. The focus of the technical concept has been