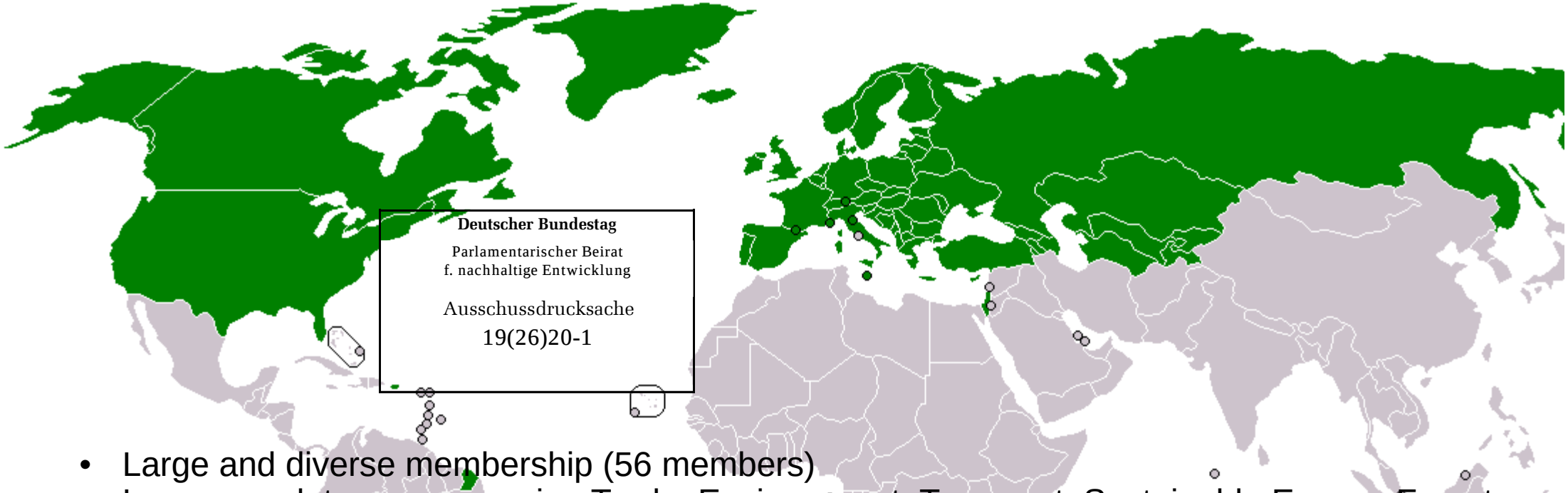
UNECE: United Nations Economic Commission for Europe



- Large and diverse membership (56 members)
- Large mandate encompassing Trade, Environrment, Transport, Sustainable Energy, Forestry, Housing and Land Management, Statistics, etc.
- UNECE helps implement the Sustainable Development Goals by translating global goals into norms, standards and conventions, building capacity and engaging in partnerships with the private sector, the academia, and civil society
- “UNECE’s achievements have made it a go-to source for improving global public goods and services, with more than 100 countries beyond the UNECE region benefiting from its work” (UN Secretary-General Ban Ki-moon)

UNECE Working Party on: Regulatory cooperation & std policies (WP.6)

What is it:

- Intergovernmental body
- Participation by: authorities, regional & int'l org, standards-setting bodies, business, certification bodies, test houses, civil society
- From all UN Member States
- 1970 – 2015: 45+ years

Mandate:

- ☑ Standardization ☑ Regulatory cooperation ☑ Conformity assessment ☑ Accreditation ☑ Metrology ☑ Market surveillance ☑ Risk Management in regulatory frameworks ☑ Education on standards and standards related issues

Activities

- Develop and share info & best practice
- Capacity-building (trainings and awareness-raising events)
- Develop and maintain a set of recommendations
- Implement a set of initiatives on specific industrial sectors

UNITED NATIONS
ECONOMIC COMMISION
FOR EUROPE

The Project on “Standards for the SDGs”

Objectives:

- Raising awareness among standards bodies on the 2030 Agenda
- Promoting the use of standards as a tool for policymakers, authorities, the civil society, business communities, and other stakeholders, for sustainable development
- Breaking silos, work across various organizational cultures and methods of work

A morning in the life of Mister G

Starting a successful day with the unnoticed support of standards

6:00 a.m.: The alarm clock rings. Dozy, Mister G opens his eyes. A look at the alarm clock tells him that it is time to get up. The first meeting is already scheduled for 9 o'clock. So, rise and shine! But honestly: who likes to push away a cosy and soft down quilt whose quality is ensured by a series of European standards and get out of bed.

Mister G sits up abruptly. His bed does not creak and the mattress does not cave in. Standards ensure the stability of the bedframe and the durability of the mattress.

Still a bit drowsy, Mister G goes to the bathroom first, seeing only blurred contours. As Mister G is near-sighted, the first thing he does in the morning is to insert his contact lenses. During the night, they were stored in a care product meeting the requirements defined in EN ISO 9394. Of course, the contact lenses themselves are well tolerated (thanks to standards). A good feeling. Then Mister G brushes his teeth. The toothbrush (EN ISO 20126) does not lose any bristles and the toothpaste (EN ISO 11609) does not scratch his teeth like scouring powder.

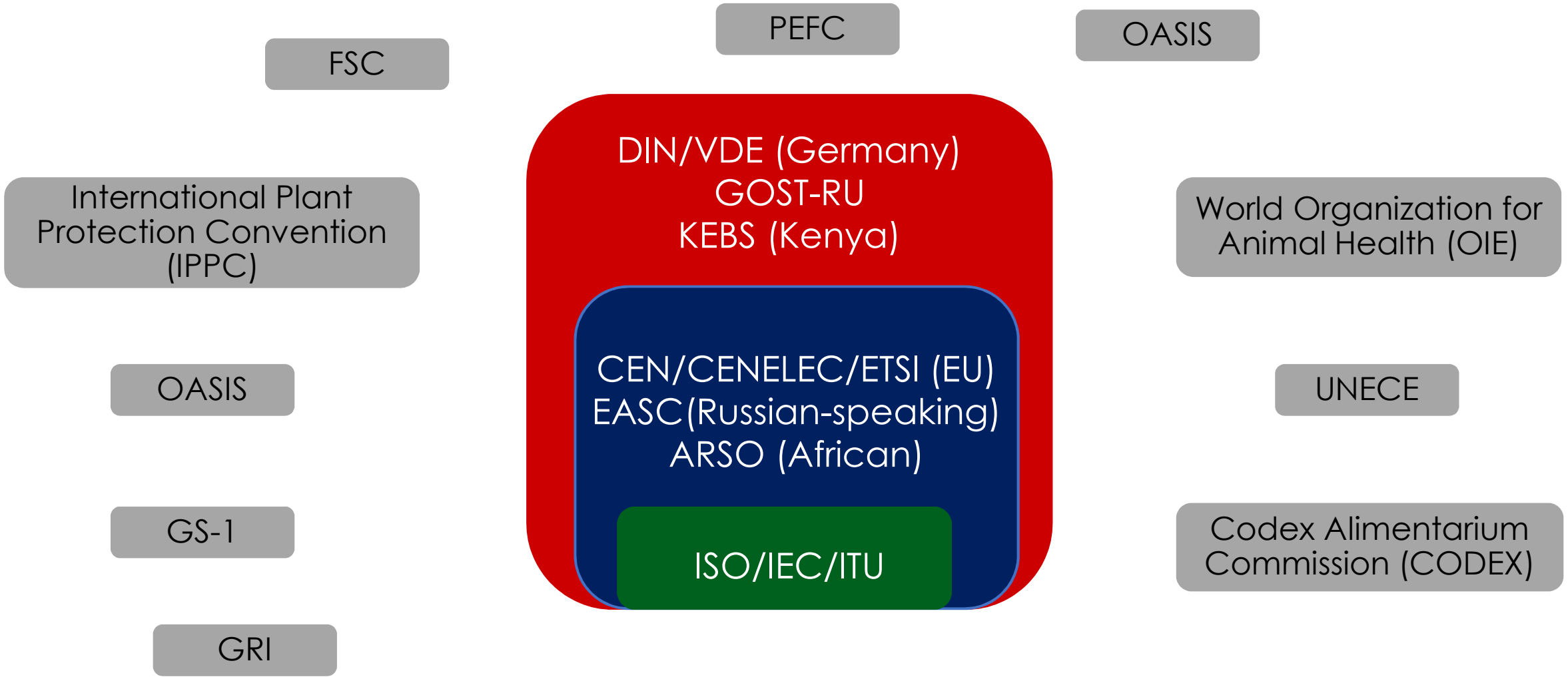
6:30 a.m.: To shake off his sleep completely and really get going, Mister G decides to go for a jog before breakfast. Although his jogging shoes are new, he immediately feels like running on clouds as the soles of his running shoes are agreeably springy. And this is owed to the fact that the manufacturer complied with the relevant standards – something that Mister G is not aware of.

7:00 a.m.: After returning home, Mister G takes his breakfast. As you may have guessed already, standardization does not even neglect breakfast. Mister G is able to easily spread the butter thanks to ÖNORM DIN 10331. The good quality of his coffee is ensured by ÖNORM EN 14132. Toaster, coffee maker and egg boiler also function well on account of standards. Now, Mister G quickly loads the dishwasher: knives, spoons, cups and plates will again be perfectly clean tomorrow, without any stains or cracks. They are in line with numerous standards and therefore are dishwasher-safe. The dishwasher' suitability for use was tested in line with a standard. The same applies to the washing machine into which Mister G puts his sweaty jogging suit.

A standard: «Agreed way of doing something.»

Standards in our daily lives

How standards are developed:
The international standards system



Definitions (WTO)

- Technical regulations: document drawn up by a regulatory body which lays down product characteristics (shape, labelling, design, performance etc.) or related processes and production methods with which compliance is mandatory.

- Standards: document established by consensus & approved by ≠ a recognized body that provides, for common and repeated use, rules, guidelines or characteristics for products or related processes and production methods with which compliance is voluntary.

Standards ≠ Regulations

Standards	Regulations
Developed by standards development bodies	**Developed by** regulatory agencies, ministries, and parliaments
Reasons for uptake: - Access to markets / supply chains - Lower operational costs - Increase stability in operations - Gain public trust	**Reasons for introduction**: - Protect communities, environment & workers from hazards; - Correct market failures; - Address public concerns (health, environment)
Development Consensus-based process; Publication of draft standards; review of approved standards every 3 or 5 years ment;	**Development** In some countries, consultation of interested parties is required, but consensus not a binding constraint

Advantages of using standards in regulations

- Recent technological developments can be fed into the national regulatory system
- Efficiency of regulatory work is enhanced
- Ease the burden of compliance for economic operators
- Puts responsibility on the individual firm for meeting a specific target through its own criteria and systems
- “Good regulatory practice”

Also use of standards in policy work (not reg.)

- Standards – support, enhance and help evaluate policy action: procurement,, incentive schemes (i.e. cuts in insurance premiums), awareness raising
- Harmonization with international trade partners
- Standards – such as risk management standards – can also be used as the very foundation of regulatory systems: to decide whether or not to regulate, to decide how to regulate etc. (UNECE Recommendation R)

UNITED NATIONS ECONOMIC COMMISSION FOR EUROPE

Recommendations on Regulatory Cooperation and Standardization Policies

Revised Edition

R

Managing Risk in Regulatory Frameworks[1]

The Working Party on Regulatory Cooperation and Standardization policies,

Recognizing that mitigating risk that may affect society and hamper economic development is an important goal for policy-making,

Underlining that risk management is an important tool for promoting regulatory convergence at international and regional levels,

Emphasizing the role of risk management in achieving sustainable development goals, Stressing that risk-management tools are essential to enhancing the efficiency of regulatory action and of regulatory systems,

Recognizing the need of regulatory authorities, standardization, conformity assessment and accreditation bodies, as well as market surveillance authorities, economic operators, consumers, as well as other regulatory stakeholders, in promoting coherent, consistent, efficient, effective and systemic application of risk management in regulatory systems,

Taking into account international standards related to the management of risk, such as ISO 31000:2009, ISO 9001:2008, ISO/IEC 17000:2004, and other standards, including sector-specific standards, such as ISO/IEC 27001:2005

Examples of standards for «prosperity»

- Standards help achieve higher levels of economic productivity
- Study on economic growth in 5 Nordic countries found that voluntary consensus standards were associated with 28% of GDP growth in the period 1976-2014
- AFNOR: voluntary standards added 0.81% to French GDP (2013 data). Also New Zealand study puts economic benefits of standards at about 1% of GDP (Goal 8)

Examples of standards for «environmental» goals

- Marine Stewardship Council “MSC” eco-label supports sustainable fishing (Goal 14);
- FSC Forest Management Certification provides assurance that a specific area of forest is managed in line with codified best practice. (Goal 15).
- Standards (such as ISO 14064 and ISO 14065) lay out an internationally agreed framework to measure Greenhouse Gas (GHG) emissions (Goal 13);

Examples of standards for «societal» goals

- Electrotechnical standards promote energy efficiency & transition to modern energy services (Goal 7);
- Standards for “non-sewered sanitation systems” support the delivery of proper sanitation systems in rural areas (Goal 6)
- Standards support integrated, interconnected systems for smarter and sustainable cities (Goal 11)

UNECE Work on “Standards for the SDGs”

Project on Standards for the SDGs aimed at promoting the use of standards as a tool for sustainable development

3 deliverables:

A. Case studies:
   i. Featuring practical experiences of policymakers using international standards for sustainable development
   ii. Focusing on **SDG6**, **SDG7**, **SDG11** and **SDG13**
   iii. UNECE **received 90 case studies**, of which **26 were selected** on the basis of predetermined criteria
   iv. Available at: https://www.unece.org/sdgs-isoweek2018.html

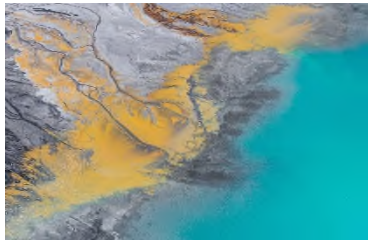
B. Database, which has **mapped 1,600 standards** so far, and allows users to:
   i. Identify standards that support specific policies for sustainable development
   ii. Link standards to the SDGs and associated targets

C. High-level conference, jointly organized with ISO which attracted **more than 800 participants** from all over the world

Deliverables of the «Standards for the SDGs» project

Case Studies



Database

Records: 104 (search term: "resilience")

Enter your search terms here...

SDG Goal	SDG Targets	Organizations	Technical Committees	Standard	Source
6 CLEAN WATER AND SANITATION	6.1 water access 6.2 sanitation 6.3 water quality 6.4 water efficiency 6.5 water resource management 6.6 water ecosystems 6.A water cooperation & capacity 6.B water participation	ISO	ISO/TC 292 Security and resilience	ISO 22301:2012 Societal security – Business continuity management systems — Requirements	
7 AFFORDABLE AND CLEAN ENERGY	7.1 Reliable and Modern Energy Services 7.3 Energy Efficiency	ISO	ISO/TC 292 Security and Resilience	ISO 22301:2012 Societal security – Business continuity management systems — Requirements	
11 SUSTAINABLE CITIES AND COMMUNITIES	11.5 Protecting the poor and people in vulnerable situations	ISO	ISO/TC 292 security and Resilience	ISO 22313 Societal security-Business continuity management systems-Guidance	
13 CLIMATE ACTION	13.1 Resilience in climate related hazards 13.3 Climate change mitigation and impact reduction	ISO	ISO/TC 207 Environmental Management Systems	ISO 14055 Environmental management – Guidelines for establishing good practices for combatting land degredation and desertification	Source

Case Studies

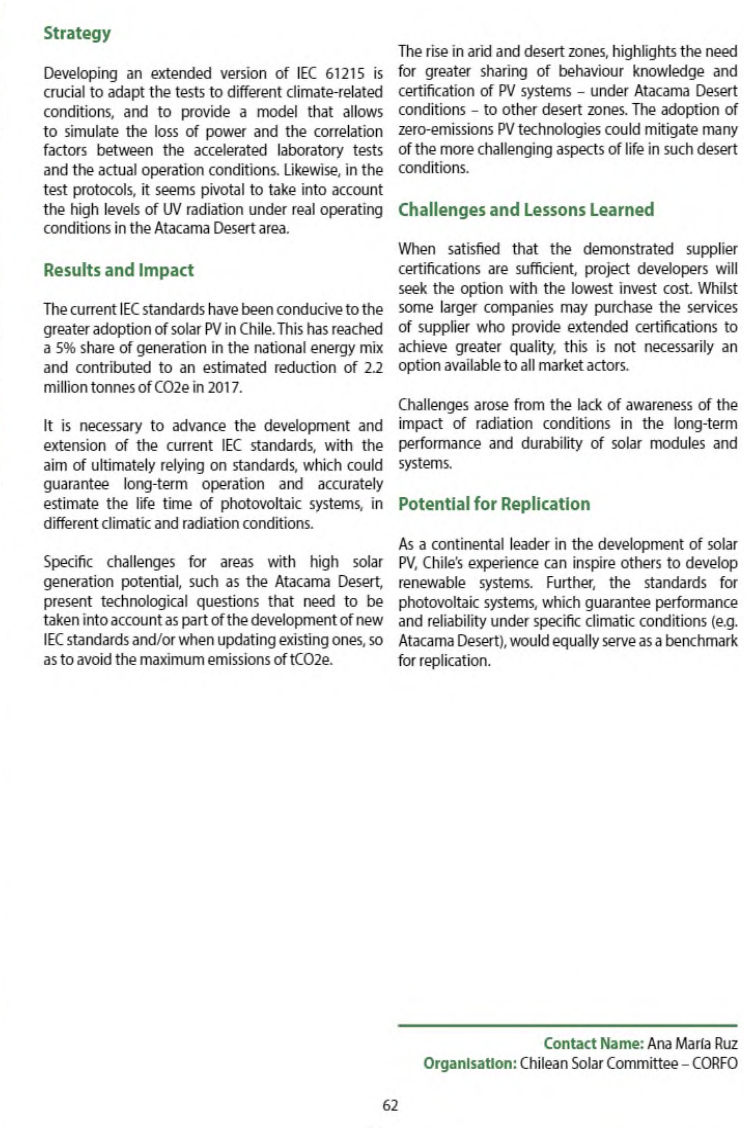
- **Practical experience of policy makers** using international standards for sustainable development

- Presented by regulatory authorities, governments and administrations, as well as regional groups

- Focused on:
  - **SDG6** – Clean Water and Sanitation
  - **SDG7** – Affordable and Clean Energy
  - **SDG11** – Sustainable Cities and Communities
  - **SDG13** – Climate Action

- Examples ranging from the subnational and national to the global levels, and from all regions

- Case studies available at: https://www.unece.org/sdgs-isoweek2018.html



Strategy

Developing an extended version of IEC 61215 is crucial to adapt the tests to different climate-related conditions, and to provide a model that allows to simulate the loss of power and the correlation factors between the accelerated laboratory tests and the actual operation conditions. Likewise, in the test protocols, it seems pivotal to take into account the high levels of UV radiation under real operating conditions in the Atacama Desert area.

Results and Impact

The current IEC standards have been conducive to the greater adoption of solar PV in Chile. This has reached a 5% share of generation in the national energy mix and contributed to an estimated reduction of 2.2 million tonnes of CO_2e in 2017.

It is necessary to advance the development and extension of the current IEC standards, with the aim of ultimately relying on standards, which could guarantee long-term operation and accurately estimate the life time of photovoltaic systems, in different climatic and radiation conditions.

Specific challenges for areas with high solar generation potential, such as the Atacama Desert, present technological questions that need to be taken into account as part of the development of new IEC standards and/or when updating existing ones, so as to avoid the maximum emissions of tCO_2e.

The rise in arid and desert zones, highlights the need for greater sharing of behaviour knowledge and certification of PV systems – under Atacama Desert conditions – to other desert zones. The adoption of zero-emissions PV technologies could mitigate many of the more challenging aspects of life in such desert conditions.

Challenges and Lessons Learned

When satisfied that the demonstrated supplier certifications are sufficient, project developers will seek the option with the lowest invest cost. Whilst some larger companies may purchase the services of supplier who provide extended certifications to achieve greater quality, this is not necessarily an option available to all market actors.

Challenges arose from the lack of awareness of the impact of radiation conditions in the long-term performance and durability of solar modules and systems.

Potential for Replication

As a continental leader in the development of solar PV, Chile's experience can inspire others to develop renewable systems. Further, the standards for photovoltaic systems, which guarantee performance and reliability under specific climatic conditions (e.g. Atacama Desert), would equally serve as a benchmark for replication.

Contact Name: Ana María Ruz
Organisation: Chilean Solar Committee – CORFO

62

Database

Records: 1553

Enter your search terms here...

SDG Goal	SDG Targets	Organizations	Technical Committees	Standards	Sources
	6.1 Water Access 6.2 Sanitation 6.3 Water Quality 6.4 Water Efficiency 6.5 Water Resource Management 6.6 Water Ecosystems	ASTM INTERNATIONAL	E50.5 Environmental Risk Management	E1689.95:2014 Standard Guide for Developing Conceptual Site Models for Contaminated Sites	Source
	7.1 Reliable and Modern Energy Services 7.3 Energy Efficiency	ISO IEC	ISO/TC 301 Energy Management and Energy Savings	ISO/IEC 13273-1:2015 Energy Efficiency and Renewable Energy Sources – Common International Terminology – Part 1: Energy Efficiency	
	11.1 Access to Basic Services 11.2 Transport Services 11.3 Governance and Ethics 11.4 Protect and Safeguard Cultural Heritage 11.5 Protecting the Poor and People in Vulnerable Situation	ITU	ITU-T Study Group 20 et al. IoT and its Applications including Smart Cities and Communities (SC&C)	Recommendation ITU-T Y.4903/L. 1603 Key Performance Indicators (KPIs) for Smart Sustainable Cities (SSCs) to Help Cities Achieve Sustainable Development Goals (SDGs)	
	13.1 Resilience in Climate-Related Hazards 13.3 Climate Change Mitigation and Impact Reduction	WWF	WWF Network WWF Network	WWF Programme Standards WWF Standards of Conservations Project and Programme Management	

Current Status: 1,600 Standards and Counting

The database allows users to:

- Cross-reference standards through a dynamic search
- Identify standards that support specific policies
- Link standards to SDGs and associated targets (currently, SDG6, SDG7, SDG11 and SDG13)

Deliverables of the «Standards for the SDGs» project

«Standards for the SDGs» event 26/9/2018

- Standards for the SDGs: joint UN-ISO event (26/09/18)
- Over 800 people attended
- Built on a peer learning: line ministries & administrations shared standards-based approaches to common challenges and aspirations
- 4 breakout sessions: one on SDG 11 with two panels on smart cities and on DRR, one on water (SDG6), one on sustainable energy (SDG7) and one on climate change (SDG 13)

Way forward

- WP. 6 meeting (Geneva: 14-16 November) will discuss & hopefully approve Recommendation T on "Standards and Regulations for Sustainable Development"
  A. Promoting the **uptake of risk management tools among regulatory authorities** when building regulatory frameworks needed to operationalize the SDGs
  B. Fostering the **engagement of all stakeholders concerned** (economic operators, consumers, communities, regulators and legislators) in managing the risks associated with the achievement of the SDGs

United Nations ECE/CTCS/WP.6/2018/5

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Steering Committee on Trade Capacity and Standards

Working Party on Regulatory Cooperation and Standardization Policies session

Twenty-eighth session
Geneva, 14–16 November 2018
Item 6 (b) of the provisional agenda
Risk Management in regulatory systems: Discussion on draft Recommendation T on "Standards and Regulations for Sustainable Development"

Draft Recommendation T on "Standards and Regulations for Sustainable Development"

Integrating sustainable development goals and targets in risk-based regulatory frameworks

Submitted by the Group of Experts on Risk Management

Summary

The text of the Recommendation is presented to the Working Party for discussion and adoption.

Mandate

The Working Party agreed at its twenty-fifth session to continue discussion on how it could further contribute to the Sustainable Development Goals (ECE/CTCS/WP.6/2015/2, para. 11).

Proposed decision:

Member States approve the new Recommendation T on "Standards and Regulations for Sustainable Development". They mandate the secretariat to report on its implementation. They encourage the donor community to make available resources for capacity-building projects to assist member States in its implementation.

GE.18-14860(E)

Please recycle

Thank You!

Lorenza Jachia

Secretary, Working Party on Regulatory Cooperation and Standardization Policies (WP.6)

United Nations Economic Commission for Europe (UNECE)

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