

VEF Bulletin



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SUMMARY OF THE VIENNA ENERGY FORUM 2018 SPECIAL SESSION: 14 MAY 2018

The Vienna Energy Forum 2018 Special Session took place from 14-16 May 2018 at the Vienna International Center in Vienna, Austria. Organized under the auspices of the UN Industrial Development Organization (UNIDO), Austrian Federal Ministry for Europe, Integration and Foreign Affairs (BMEIA), the Austrian Development Agency (ADA), the International Institute for Applied Systems Analysis (IIASA) and Sustainable Energy for All (SEforALL), the Forum gathered over 430 leaders from governments, civil society, international organizations and the private sector. The Special Session breaks the bi-annual cycle of the Forum in order to provide input to the formal review of Sustainable Development Goal (SDG) 7 (energy) by the High-Level Political Forum on Sustainable Development (HLPF) taking place in New York in July.

The Forum included plenaries and high-level round tables on 14 May, followed by side events and special events on 15 and 16 May. This report summarizes the presentations and discussions that took place on 14 May.

BRIEF HISTORY OF THE VIENNA ENERGY FORUM

The Vienna Energy Forum takes place every two years. It was established in 2008 by the Austrian Government, IIASA and UNIDO. The Forum aims to explore how energy can contribute to meeting global development challenges, based on the premise that issues such as poverty, climate change, security, health and income are closely linked to the nature, accessibility and affordability of existing energy systems.

The first Vienna Energy Forum convened in Vienna, Austria, from 22-24 June 2009 under the theme 'Towards an Integrated Energy Agenda Beyond 2020: Securing Sustainable Policies and Investments.' The conference served as an opportunity to: shift the debate on energy and development beyond generalities to identifying specific courses of action; initiate and advance regional and international cooperation; and present new international energy initiatives, such as the International Renewable Energy Agency (IRENA). One of the Forum's six key recommendations foresaw the creation of a SDG on energy, which aimed to achieve universal energy access by 2030.

The second Vienna Energy Forum themed 'Energy for All – Time for Action,' convened in Vienna from 21-23 June 2011. The Forum was held in parallel with a Ministerial Meeting on Energy and Green Industry. The Forum focused on energy poverty and increasing energy access in developing countries in light of the SEforALL initiative, and addressed a range of issues,



including: the key building blocks for developing a strategy for prioritizing the energy access agenda; energy efficiency; and reducing global energy intensity.

The third Vienna Energy Forum themed 'One Year after Rio+20: The Energy Future We Want,' took place in Vienna from 28-30 May 2013. The Forum addressed sustainable energy in the context of negotiating the post-2015 development agenda, a process initiated at the 2012 UN Conference on Sustainable Development (Rio+20).

The fourth Vienna Energy Forum themed 'Sustainable Energy for Inclusive Development' was held from 18-20 June 2015 in Vienna. The Forum aimed to contribute to the post-2015

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From L-R: **Liu Zhenmin**, Under-Secretary-General, UN Department of Economic and Social Affairs (UN DESA); **Karin Kneissl**, Federal Minister for Europe, Integration and Foreign Affairs, Austria; **Li Yong**, Director-General, UN Industrial Development Organization (UNIDO); **Marie Chatardová**, President, UN Economic and Social Council (ECOSOC); and **Abdelrahman Ayman Ibrahim**, Glob

development agenda and climate processes by emphasizing their multiple co-benefits, and showcasing best practices and actions on the ground.

The fifth Vienna Energy Forum themed 'Sustainable Energy for the Implementation of the SDGs and the Paris Agreement' convened from 9-12 May 2017 in Vienna, Austria. The event aimed at promoting dialogue on: the nexus between energy, climate, transport, food, water and health; linkages in the implementation of the SDGs and the Paris Agreement on Climate Change; and the role of innovation as a global driver for sustainable growth.

REPORT OF THE MEETING

OPENING PLENARY

The Vienna Energy Forum 2018 Special Session opened on Monday morning, 14 May 2018. Nisha Pillai, former BBC World News presenter, welcomed participants, stressing the importance of the theme of the Special Session "Powering Innovation for Prosperity."

Li Yong, Director General, UNIDO, highlighted that the experiences and practices of the participants will be reflected in the meeting's outcome document, which in turn will contribute to the formal review of SDG 7 by the HLPF in July.

Karin Kneissl, Federal Minister for Europe, Integration and Foreign Affairs, Austria, stressed the linkage between SDG 7 and the other SDGs and noted that Austria will host an event on regional energy centers in the fall of 2018.

Abdelrahman Ayman Ibrahim, Global President, International Association of Students in Economic and Commercial Sciences, stressed that young people can be a powerful growth engine for societies, particularly through technology.

Marie Chatardová, President, UN Economic and Social Council (ECOSOC), said a reliable and affordable energy supply is a prerequisite to achieving the SDGs, but that looking at current progress, the world is falling short of achieving SDG 7 by 2030. She urged participants to demonstrate leadership, form partnerships, and make SDG 7 and the 2030 Agenda a reality.

Liu Zhenmin, Under-Secretary-General, UN Department of Economic and Social Affairs (DESA), said energy lies at the heart of both the Sustainable Development Agenda and the Paris Agreement, stressing the need to realize synergies and highlighting the importance of multi-stakeholder approaches.

PLENARY SESSION

ENERGY SYSTEM TRANSFORMATION: This plenary session was chaired by Edu Willemse, GIZ. He highlighted the emerging trends of decarbonization, digitalization and decentralization in energy systems. Willemse asked panelists to address: why energy systems need to be transformed; why it is important for developing countries; the role of international organizations; and the role of technology.

Jeremy Rifkin, President, Foundation on Economic Trends, emphasized humanity challenges such as declining productivity gains, concentration of wealth and climate change; and stressed the need for a new paradigm and an off-carbon society by the next 35-40 years.

Rifkin said the third industrial revolution will be based on the confluence of new sources of energy, communication and new modes of transportation. He emphasized developing countries' opportunity to transition quicker because they do not have as much lock-in from existing infrastructure as developed countries. Rifkin stressed the magnitude of fossil fuel stranded assets, and the role of sub-national governments in facilitating the energy transition.

Mohamed Ali Alhakim, Executive Secretary, UN Economic and Social Commission for Western Asia (ESCWA), highlighted four challenges for his region: upgrading infrastructure; financing the energy transition, particularly for fossil-fuel based economies; human resources; and weak private sector. Ali Alhakim also underscored the problems of water and food security, inequality and conflict.

Rachel Kyte, Chief Executive Officer, SEforALL, and Special Representative of the UN Secretary-General for SEforALL, noted the SEforALL meeting held in Lisbon earlier in the month. She said some countries are moving extremely fast on energy efficiency and energy access, emphasizing that the question is

not how to do it, but how to get more countries to follow suit. Kyte stressed the adverse effects of fossil fuel subsidies for achieving SDG 7.

Scott Foster, Director, Sustainable Energy Division, UN Economic Commission for Europe (UNECE), underscored the importance of the building sector and of sectoral energy efficiency guidelines that address context, principles, and deployment. Foster emphasized the need for: removing fossil fuel subsidies; carbon pricing; addressing the social dimension of energy; and shifting business models from energy supply to energy services.



Rachel Kyte, CEO and Special Representative of the UN Secretary-General for Sustainable Energy for All

Megan Richards, Director of Energy Policy, Directorate-General for Energy,

European Commission, emphasized the Energy Union, including the dimensions of diversification, decarbonization, promotion of renewables, research and innovation. She underscored the EU clean energy package of 2016, including legislation on energy efficiency in buildings, energy efficiency targets, renewable energy and governance.

Providing recommendations for the Vienna Energy Forum's contribution to the HLPF SDG 7 review, panelists highlighted enabling environments and regulatory frameworks, integrated solutions, and stakeholder informed top down energy efficiency regulations to cover the whole economy.

CLIMATE AND CLEAN ENERGY TECHNOLOGY AND INNOVATION: EMPOWERING AND CATALYZING ENTREPRENEURIAL ECO-SYSTEMS FOR CLIMATE INNOVATION IN DEVELOPING COUNTRIES: This plenary session was chaired by Stephen Sicars, Director, Department of Environment, UNIDO.

Harish Hande, Chairman, SELCO India, said that "we paintbrush the poor as poor" rather than designing energy systems that consider their needs. He called for centers of excellence to provide technology and finance innovations. Patricia Espinosa, Executive Secretary, UN Framework Convention on Climate Change (UNFCCC), underscored the need to create innovation centers in communities to better adapt climate technologies to the local context.

Noting that 2017 was the warmest year on record and the most expensive in terms of weather disaster-related losses, Petteri Taalas, Secretary-General, World Meteorological Organization (WMO), stressed the need for distributed energy systems and energy security. Given the magnitude of the climate problem, Pavel Kabat, Director-General and CEO, IIASA, stressed opportunities for innovation and cross-sector collaboration.

Howard Bamsey, Executive Director, Green Climate Fund (GCF), highlighted the need for technical and financial innovation for climate action in the developing world, and underscored the importance of partners and collaboration. Tadej Slapnik, State Secretary, Slovenia, discussed the emergence of block chain technology entrepreneurs in Slovenia. He highlighted the importance of scaling up new business models for future distributed energy markets.

In ensuing discussions, Sicars highlighted the relevance of reducing risk and fostering trust to encourage entrepreneurs. Slapnik noted that block chain technology is also called a protocol of trust and underscored the importance of smart contracts to manage risk. Espinosa stressed that the risk is very high in relation to climate change and that governments alone cannot deliver on the sustainable development agenda. Kabat noted that the leading climate science is not necessarily partnered with investment solutions. Bamsey said that the GCF has a higher appetite for risk than most other climate finance instruments. Taalas stressed the power of consumers and cooperation. Hande stressed that the poor are taking the most risk.

DELIVERING PROSPERITY THROUGH

PARTNERSHIPS: This plenary session was chaired by Christine Lins, Co-Founder, Global Women's Network for the Energy Transition. Dirk Fransaer, Managing Director, Flemish Institute for Technological Research, highlighted that collaborations are essential to guarantee renewable energy at an affordable price for everyone. He stressed the need for a paradigm shift to give decentralized energy systems at least the same amount of attention as centralized systems, particularly in Africa.

Irene Giner-Reichl, President, Global Forum on Sustainable Energy, stressed the lack of gender balance at all levels in the energy sector. She noted that the slow progress on energy access and cooking fuels has tremendous impacts on women. Giner-

Reichl stressed the opportunity to make progress on low carbon energy infrastructure through China's "One Belt, One Road" Initiative (BRI). Robert Zeiner, ADA, emphasized the crucial role regional initiatives and centers of excellence play in creating an enabling environment and reducing barriers for sustainable energy approaches.

Peter Traupmann, Managing Director, Austrian Energy Agency, highlighted that it is crucial to have emerging and developing countries



Irene Giner-Reichl, President, Global Forum on Sustainable Energy

move away from using fossil fuels without sacrificing economic growth. He suggested that an international regulatory framework should forbid the sale of inefficient products, such as old diesel vehicles, to developing countries.

André Faaij, University of Groningen, called for combinations of technologies and systems solutions for the full deployment of renewable energies that are implemented on the national, regional and local levels. He highlighted the importance of building strong partnerships in order to try new and innovative approaches. Alexandre Pinho, Microsoft, highlighted the importance of entrepreneurship in moving from serving

communities to community empowerment. He noted the importance of understanding behavior in developing countries in order to de-risk investments.

HIGH-LEVEL ROUNDTABLES

ENHANCING THE PARTICIPATION OF SMES AND START-UPS FROM DEVELOPING COUNTRIES IN THE GROWING MARKETS FOR CLIMATE AND CLEAN ENERGY TECHNOLOGY AND INNOVATION:

This roundtable session was moderated by Nisha Pillai. Tareq Emtairah, Director, Department of Energy, UNIDO, introduced the session noting the need to move away from project-based interventions, to upscale opportunities for startups and entrepreneurs in developing countries.

The panelists included: Leena Srivastava, Vice-Chancellor, TERI University; Dennis Pamlin, Research Institutes of Sweden; Stephen Sicars, Director, Department of Environment, UNIDO; Paul Horwitz, Green Climate Fund; Aladeen Shawa,

Deloitte Consulting; Hari Rao, CEO, Agnisumukh; Aard Groen, University of Twente; Habiba Ali, Managing Director and CEO, Sosai Renewable Energies Company; Harish Hande, Chairman, SELCO India; Fred Walti, CEO and President, Los Angeles Cleantech Incubator; Robert Denda, Enel; Vijay Modi, Columbia University; Ambuj Sagar, Indian Institute of Technology Delhi; Faris Hasan, Director, Organization of the Petroleum Exporting Countries (OPEC) Fund for International Development (OFID); Michael Wancata, Director, Development Bank of Austria; Kyungjin



Leena Srivastava, Vice-Chancellor and Professor, TERI University

Hyung, Korea Technology Finance Corporation; Omar El-Arini, GCF; Miroslav Polzer, Secretary General, International Association for the Advancement of Innovative Approaches to Global Challenges; Ibrahim Abdelrahman Ayman, President, International Association of Students in Economic and Commercial Sciences; Patrick Nussbaumer, UNIDO; and Alois Mhlanga, UNIDO.

On policy support for promoting small and medium-sized enterprises (SMEs) and startups in developing countries, panelists emphasized, among others: the relevance of energy service companies; the need for working capital; the importance of a global approach to reducing barriers such as tariffs; lessons from multilateral environmental agreements such as the Montreal Protocol; the establishment of international offices supporting integrated approaches for capacity building; the misalignment of national policies with local economic development opportunities; the importance of a systems-level approach to aligning policy objectives such as energy access and climate mitigation; and the importance of green technology certification schemes such as those in the Republic of Korea.

On reducing barriers for SMEs, panelists discussed, among others: the need for a networked ecosystem of actors; the importance of accelerator programmes; building competencies such as business skills; building customer-oriented products; the need to educate and engage communities; having access to "failure money;" measures to promote entrepreneurship amongst the poor; reducing barriers to SMEs operating globally; the relevance of enabling technology such as block chain technology; and the importance of de-risking and different models of financing.

On recommendations for UNIDO, panelists proposed, among others: interacting with large international companies so that product lines help solve poor peoples' problems; supporting energy champions that talk to government departments as well as the public; engaging with sectors critical for local livelihoods such as agriculture in sub-Saharan Africa; moving away from a project-by-project approach towards a systems-level approach; building the financial capabilities of SMEs; enabling national agencies and sectors to access the GCF; making SME incubators more effective; and helping address the need for innovation hubs, green certification and a globally connected set of incubators and accelerators.

A "NEW DEAL" FOR ECONOMIES OF SCALE AND INCLUSIVENESS - THE GLOBAL NETWORK OF REGIONAL SUSTAINABLE ENERGY CENTRES

(GN-SEC): This roundtable was moderated by Albert Binger, Secretary General, Small Island Developing States (SIDS) Sustainable Energy and Climate Resilience International Organization (SIDS DOCK).

Tareq Emtairah, Director, Department of Energy, UNIDO, noted 10 years of regional action, emphasizing that the rationale

for sub-regional cooperation is that tackling some issues at the sub-regional level is more effective than at the national level. Ashraf Kraidy, Regional Center for Renewable Energy and Energy Efficiency said the SDG Agenda should recognize the role of regional centers. Leonardo Barreto-Gomez, Austrian Energy Agency, underlined the role of regional centers in developing standards, regional markets and the local value chains.

Mark Lister, Head, Copenhagen Centre on Energy Efficiency, emphasized the importance of



Tareq Emtairah, Director, Department of Energy, UNIDO

regional centers in harmonizing energy efficiency standards in appliances and peer-to-peer learning. Radia Sedaoui, ESCWA, emphasized the need to address the energy, water and food nexus, as well as transversal issues such as gender and youth. Solomone Fifita, Manager, Pacific Centre for Renewable Energy and Energy Efficiency, underscored Pacific Islands' commitment



From L-R: **Miquel Muñoz Cabré**, IISD; **Cecilia Ugaz Estrada**, Director, Department of Policy Research and Statistics, UNIDO; **Edu Willemse**, Public Relations and Partnerships Manager, EnDev program, GIZ; **Carsten Hellpap**, Programme Manager, Energising Development Partnership, German Corporation for International Cooperation; and **Tareq Emtairah**, Director, Department of Energy, UNIDO

to achieve 100% renewable energy. He highlighted legislation reform, capacity building, removing fossil fuel subsidies, and gender.

Robert Zeiner, ADA, said the regional center model is successful, but needs to adapt to each regional context. Carlos Aragon Gil de la Serna, Spain, stressed the effectiveness of the model. Hans Olav Ibrekk, Ministry of Foreign Affairs, Norway, emphasized the need for gender equity, including in the

leadership of regional centers. Mahama Kappiah, Executive Director, Economic Community of West African States (ECOWAS) Centre for Renewable Energy and Energy Efficiency, highlighted the need for innovative approaches to achieving energy access, particularly addressing investors' risk.

Igor Barat, International Investment Bank, said a regional approach can lower the risk of investments. He underscored his bank's financing of nuclear reactors in Hungary as clean energy. Benedikt Hoskuldsson, SEforAll, underscored project preparation support. Yan Huang, Chang



Robert Zeiner, Director of International Programmes and Projects, Austrian Development Agency

Jiang Survey Planning Design Research Co., noted the BRI's support of local governments, including through a consortium of investors.

Martin Hiller, Director General, Renewable Energy and Energy Efficiency Partnership (REEEP), emphasized the need to focus on entrepreneurs and to address the challenges in financing projects in the US\$50-100 million range. Jukka Uosukainen, Director, Climate Technology Centre and Network highlighted the importance of energy efficiency in addressing climate change. Christophe Nuttall, Chief Executive Officer, R20 Regions of Climate Action, stressed value chains, blended finance and certification processes. Berthold Breid, Chief Executive Officer, The Renewables Academy, stressed the role of regional centers in quality assurance and local training.

Kudakwashe Ndhlukula, Executive Director, Southern African Development Community (SADC) Center for Renewable Energy and Energy Efficiency, highlighted efforts to push for energy access and for integrating renewables in a fossil fuel-dominated grid. Aué Jan-Jaap, Centre of Expertise Energy, the Netherlands, highlighted building trust and embracing open innovation.

Michael Ahimbisibwe, Executive Director, East African Centre for Renewable Energy and Energy Efficiency, stressed prioritizing renewable energy finance. Christine Lins said it is time for regional energy centers to have a dedicated work stream on gender and energy.

EMERGING LOW-CARBON ENERGY SYSTEMS AS A CATALYST FOR INDUSTRIAL TRANSFORMATION IN DEVELOPING COUNTRIES: This high-level roundtable was moderated by Nisha Pillai. Discussants included Roberto Vigotti, Secretary General, Renewable Energy Solutions for Africa; William Brent, Power for All; Felice Zaccheo, European Commission; Roberto Ridolfi, Food and Agriculture Organization of the UN (FAO); Omar El-Arini, Scott Foster, UNECE; Abze Djigma, Chief Executive Officer, AbzeSolar, Desta Mebratu, Stellenbosch University; Enrique Pedrosa, Siemens Gamesa; Carsten Hellpap, GIZ; Saïd Mouline, Chief Executive Officer, Moroccan Agency for Energy Efficiency; Tarek Al-Amad, Chief Executive Officer, European Jordanian Renewable Energy Projects; Paul Horwitz, GCF; Roula Majdalani, ESCWA;, Rana Adib, Executive Secretary, Renewable Energy Policy Network for the 21st Century (REN 21); Louis Downing, Basel Foundation; Archalus Tcheknavorian-Asenbauer, Senior Adviser for Climate Change, Rabia Ferroukhi, IRENA; Nebojsa Nakicenovic, IIASA; and Cecilia Ugaz Estrada, Director, Department of Policy Research and Statistics, UNIDO.

On shifting the energy paradigm, participants addressed issues including: the need for energy efficiency and sufficiency; developing business models for companies to make money in decarbonized, digitized energy systems; the need to focus on decentralized areas and make investments in rural areas more attractive; bottom-up approaches; and the climate mitigation potential of energy efficiency versus energy decarbonization.

On barriers to the transition, discussants highlighted, among others: lack of institutional capacity; vested interests; energy planners' lack of awareness of current renewable energy costs; the gap between pledges and disbursements; lack of absorptive capacity, both for project finance and capacity building; long project implementation timeframes; and patent laws. Participants

also noted success factors from Morocco and Kenya's experiences in attracting investment, including through stable frameworks, planning and regulation, and focus on value chains.

On the socio-economic dimension, it was emphasized that while globally, the energy transition will bring great benefits, there will be losers at the national, local and company levels. Participants also underscored: different employment opportunities of focusing on different aspects of the value chain; the need to empower civil society; environmental awareness and the willingness to act of citizens in developing countries; governance at the local level; and affordability.

On industrial transformation, discussants stressed, among others: promotion of distributed manufacturing; the multifaceted nature of industrial development; shifting of energy intensive industries from developed to middle income countries; and maldevelopment inertia, with multilateral development institutions still operating on the old unsustainable paradigm of industrial development.

Discussants highlighted the importance of data, noting that, in addition to energy, mini-grids bring identity and data to investors by identifying people who can buy products and services including health and banking. Alternative sources of data in Africa such as phone and banking data were identified. Discussants also highlighted that the inclusion of SDG 7 and its three goals in the international agenda are a legacy of the Vienna Energy Forum.

HIGH-LEVEL SEGMENT: POWERING INNOVATION FOR PROSPERITY

Philippe Scholtès, Managing Director, Programme Development and Technical Cooperation, UNIDO, stressed the importance of an environment conducive for private sector investment. Simon D'Ujanga, Minister of State for Energy and Mineral Development, Uganda, described how a new energy act in 1999 encouraged private sector participation in his country's energy sector. He stressed the role of the Uganda Energy Credit Capitalisation Company in helping facilitate investments in Uganda's renewable energy sector.

Abdul Hussain bin Ali Mirza, Minister of Electricity and Water Affairs, Bahrain, described the challenges Bahrain faces as a small island with limited natural resources and the creation of a government think tank to encourage investment in renewable energy. He emphasized Bahrain's Vision 2030, which seeks



Philippe Scholtès, Managing Director, Programme Development and Technical Cooperation, UNIDO

to facilitate private sector investment in renewable energy.

Noting the complexity of providing energy access to an archipelago of 17,000 islands, Dadan Kusdiana, Ministry of Energy and Mineral Resources, Indonesia, highlighted, among others: a national fuel pricing programme; rural electrification programmes including

distribution of LED solar lights; and biodiesel from palm oil. Kusdiana described Indonesia's efforts to encourage its energy transition, including technical cooperation, attracting international investment and international collaboration.

Waldemar Lagoda, Ministry of Energy, Poland, noted that 80 percent of his country's electricity is produced from coal. He underscored Poland's decarbonization plans, including offshore wind farms, nuclear energy, cogeneration, and electro mobility. Lagoda stressed the importance of energy efficiency in Poland, noting efforts to implement LED lighting and grid modernization.

CLOSING

Minoru Takada, DESA, explained the planned process for the formal review of SDG 7 by the HLPF in July. Takada emphasized the importance of the global and regional gatherings supporting the SDG 7 review. He highlighted the policy briefs in support of the SDG 7 review, which he noted involved more than 70 organizations, as well as the document "Tracking SDG 7: the Energy Progress Report 2018," jointly produced by IRENA, the International Energy Agency, UN Statistics, World Bank, and WMO.

Emtairah noted some of the day's highlights, emphasizing energy transition, and transformation of energy markets from energy supply to energy services. He underscored the additional opportunities offered by regional approaches to energy and noted that the energy transformation is also an opportunity for a broader industrial transformation in developing countries. Thanking Vienna Energy Forum partners, participants and staff, he closed the Special Session of the Forum at 6.41pm.

UPCOMING MEETINGS

Energy Efficiency Global Forum (EE Global) 2018: This event will meet under the theme 'Energy efficiency: Innovation, Investment, Impact' and will kick off Nordic Clean Energy Week. The event will highlight, *inter alia*: energy efficiency on the international stage; and how to speed the transfer of successful energy efficiency practices to the developing world, so that uptake is accelerated towards the SDGs. The Forum is being co-organized by the Alliance to Save Energy and the Copenhagen Centre on Energy Efficiency, and supported by the Danish Ministry of Foreign Affairs. dates: 21-22 May 2018 location: Copenhagen, Denmark www: http://eeglobalforum.org/

Ninth Clean Energy Ministerial (CEM9): CEM9 will focus on promoting the green transition. CEM focuses on practical cooperation, the exchange of good ideas and experiences within green solutions, and private sector involvement. In addition, the Third Mission Innovation Ministerial will take place at Malmö Live on 23 May 2018. dates: 22-24 May 2018 location: Copenhagen, Denmark www: https://www.cem9-mi3.eu/

UNLEASH SDG Innovation Lab 2018: This event will design and deploy scalable solutions for the SDGs. There are eight themes for "SDG talents" to work on at this year's Innovation Lab, including SDG 7. dates: 30 May - 6 June 2018 location: Singapore, Singapore www: https://unleash.org/innovation-lab-2018/



European Sustainable Development Week (ESDW) 2018: ESDW is a European-wide initiative to stimulate and promote activities, projects and events that further sustainable development and the SDGs. dates: 30 May - 5 June 2018 location: TBA www: https://www.esdw.eu/

Global Solutions Summit 2018: The Global Solutions Summit 2018 will focus on the theme, 'From the Lab to the Last Mile: Technology Deployment Business Models for the SDGs.' This event will precede and complement the Third Annual STI Forum (the Multi-stakeholder Forum on Science, Technology and Innovation for the SDGs), taking place from 5-6 June. date: 4 June 2018 location: New York, US www: http://www.globalsolutionssummit.com/

G20 Energy Transitions Ministerial Meeting: This event will take place as part of the Sherpa Track for the 2018 G20 Leaders' Summit, which Argentina is hosting at the end of 2018, under the theme 'Building consensus for fair and sustainable development.' The meeting will address the future of work, infrastructure for development and a sustainable food future. date: 15 June 2018 location: Bariloche, Rio Negro, Patagonia, Argentina www: https://g20.argentina.gob.ar/en/calendar

High-level Political Forum on Sustainable Development (HLPF) 2018: The sixth session of the HLPF 2018 will meet under the theme 'Transformation towards sustainable and resilient societies.' The sub-set of SDGs to be reviewed in depth includes SDG 7 (affordable and clean energy). A three-day ministerial meeting will convene from 16-18 July, as part of ECOSOC's high-level segment. dates: 9-18 July 2018 location: New York City, US www: hlpf/2018

G7 Environment and Energy Ministers: The G7
Environment and Energy Ministers will meet on the theme of 'Working together on climate change, oceans and clean energy.' To feed into this meeting, Canada will host the 'Women Leaders Kicking It on Climate Summit.' The 2018 G7 Leaders' Summit will convene under the presidency of Canada in Charlevoix, Quebec, from 8-9 June 2018. date: 1 October 2018 [tentative] location: Canada www: https://g7.gc.ca/en/g7-presidency/events-calendar/

G-STIC 2018: The Global Sustainable Technology & Innovation Conference (G-STIC) is a series of conferences that aims to facilitate the world-wide implementation of the SDGs. G-STIC 2018 focuses on integrated technological solutions that potentially have a large impact on the achievement of the SDGs and climate change goals. The activities in G-STIC 2018 are organized and structured in 13 thematic areas to impact

the transition to less carbon and resource-intensive economic development models. **dates:** 28-30 November 2018 **location:** Brussels, Belgium **www:** https://2018.gstic.org/

Katowice Climate Change Conference: The Katowice Climate Change Conference will include the 24th session of the Conference of the Parties (COP 24) to the UNFCCC, along with meetings of the Conference of the Parties serving as the Meeting of the Parties to the Kyoto Protocol, the Subsidiary Body for Scientific and Technological Advice and the Subsidiary Body for Implementation, and the Conference of the Parties serving as the meeting of the Parties to the Paris Agreement. dates: 3-14 December 2018 location: Katowice, Poland contact: UNFCCC Secretariat phone: +49- 228-815-1000 fax: +49-228-815-1999 email: secretariat@unfccc.int www: http://unfccc.int/ and <a href

GLOSSARY

ADA	Austrian Development Agency
BRI	China's Belt and Road Initiative
ECOSOC	United Nations Economic and Social
	Council
ESCWA	United Nations Economic and Social
	Commission for Western Asia
GCF	Green Climate Fund
HLPF	High-Level Political Forum on
	Sustainable Development
IIASA	International Institute for Applied
	Systems Analysis
IRENA	International Renewable Energy Agency
SDGs	Sustainable Development Goals
SEforALL	Sustainable Energy for All
SMEs	small and medium-sized enterprises
DESA	United Nations Department of Economic
-	and Social Affairs
UNECE	United Nations Economic Commission
	for Europe
UNFCCC	United Nations Framework Convention
	on Climate Change
UNIDO	United Nations Industrial Development
	Organization
WMO	World Meteorological Organization