Summary of the Ministerial Thematic Forums
for the High-level Dialogue on Energy
21-25 June 2021

KEY RECOMMENDATIONS AND MILESTONES TOWARDS
CLEAN, AFFORDABLE ENERGY FOR ALL BY 2030
AND NET ZERO EMISSIONS BY 2050
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This summary was compiled by the secretariat of the High-level Dialogue on Energy under the overall guidance of Mr LIU Zhenmin, the Dialogue Secretary-General, and Mr. Achim Steiner and Ms. Damilola Ogunbiyi, the Dialogue Co-Chairs.

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I. Executive Summary: Priority Actions

1. The Ministerial Thematic Forums for the High-level Dialogue on Energy were held virtually, from 21 to 25 June 2021, convened by LIU Zhenmin, UN Under-Secretary-General for Economic and Social Affairs as the Dialogue Secretary-General, together with Dialogue Co-Chairs Achim Steiner, Administrator of UNDP, and Damilola Ogunbiyi, Special Representative of the UN Secretary-General for Sustainable Energy for All, co-hosted by the 30 Member State Global Theme Champions as shown in Annex 1.

2. The Forums brought together about 1,500 leaders and experts from governments, business, civil society and youth, featuring 300 speakers, including about 50 ministers and over 20 executive heads/deputy heads of UN organizations, and 80 side events. The Forums also featured the launch of Energy Compacts, to boost momentum and encourage all stakeholders to mobilize further voluntary commitments ahead of the Dialogue in September.

3. Reports of five multi-stakeholder Technical Working Groups, composed of more than 160 experts and co-led by 16 UN agencies and other relevant international organizations (as listed in Annex 1), were also officially launched, presenting a set of recommendations as key elements of a global roadmap towards the achievement of SDG 7 by 2030 and net zero emissions by 2050. Informed by these recommendations, the key priority actions outlined below are drawn from and build on the deliberations during the Forums.

4. **Energy is central to both achieving the 2030 Agenda for Sustainable Development and the Paris Agreement on climate change.** Achieving SDG 7 will catalyze action to combat climate change and attain the other SDGs on poverty eradication, gender equality, mitigation of and adaptation to climate change, food security, health, education, sustainable cities and communities, clean water and sanitation, jobs, innovation, transport, and refugees and other situations of displacement. Special emphasis should be placed on mainstreaming gender considerations into all SDG-related energy actions, as well as climate change responses, and on promoting energy services for productive end uses to enhance development benefits.

5. **We must accelerate action and raise ambition.** Without urgent action, the world will fall short of achieving SDG 7, and consequently other SDGs. We are not on a trajectory to achieve any of the SDG 7 targets by 2030 and we are lagging behind on reaching the Paris goals. Urgent action is needed to accelerate progress towards achieving universal access to clean and modern energy services by 2030 and to transition towards low-carbon and climate-resilient energy systems that are compatible with the goals of the Paris Agreement.
6. **Closing the energy access gap.** Energy policy, planning, financing and innovation must be aligned with achieving both universal access to electricity and clean cooking by 2030. This includes providing access to electricity for the 760 million people worldwide who lack it, and ensuring clean cooking solutions for the 2.6 billion people still relying on harmful fuels.

7. **Rapidly transitioning to clean energy pathways.** Ramping up clean energy technology deployment and phasing out harmful sources/devices must be an integral component of energy sector planning in the next decade. This includes rapid scaling up of available energy transition solutions to reach 8,000 GW of renewable energy by 2030, and to increase the annual rate of energy efficiency from 0.8 per cent to 3.0 per cent. It also entails abandoning all coal plants in the pipeline and reducing coal power capacity by 50 per cent by 2030.

8. **Leaving no one behind, strengthening inclusion, interlinkages and synergies.** Integration of socio-economic outcomes in the energy sector is critical to ensuring no one is left behind. This includes integration of principles of equity and equality in energy-sector policy, planning and financing vis-à-vis the energy needs of the most vulnerable communities, including women and children, youth and indigenous peoples. It also includes creating green energy jobs and mainstreaming energy-sector policies and strategies into economic, industrial, labour, educational and social strategies to ensure just energy transitions.

9. **Mobilizing adequate and well-directed finance.** This includes tripling clean energy investment globally by 2030, and accelerating access to finance particularly in the least developing countries. It also entails reforms to phase out inefficient fossil fuel subsidies and support market-based energy transitions. Equally important is creating enabling policy and regulatory frameworks to leverage private sector investment towards SDG 7 targets.

10. **Harnessing innovation, technology and data.** This includes expanding the supply of energy innovation that addresses key gaps and increasing demand for clean and sustainable energy technologies and innovation through market-oriented policies, harmonized international standards and carbon pricing mechanisms. This also addresses the digital divide, investing in quality data and improving the collection, management and applications of data and data systems.

11. **All stakeholders have a role to play and must step up action.** Member States and other stakeholders need to drive the global energy transformation forward by forming transformational partnerships. UN entities, international organizations and multilateral development banks, as well as businesses, civil society, science, cities and regional governments and other stakeholders, must step up and strengthen their efforts to support the implementation of SDG 7 and other SDGs.
12. **Energy Compacts are the vehicle to translate the global roadmap and key recommended actions into concrete plans with clear milestones and targets.** Energy Compacts offer a global, inclusive umbrella for Member States and other key stakeholders from the business sector, sub-national governments and civil society to bring together voluntary commitments to achieve all SDG 7 targets and net zero emissions in support of the goals of the 2030 Agenda and the Paris Agreement. All stakeholders are encouraged to develop and submit their Energy Compacts in time for the High-level Dialogue. A global network of Energy Compacts (i.e. Energy Compact Action Network) should be formed to maximize synergies, learn lessons, track progress and mobilize further action.

13. **Strengthening synergies with other key global processes is critical.** The High-level Dialogue on Energy can inspire actions in support of SDG 7. Other intergovernmental platforms should also be leveraged to support the achievement of SDG 7, including the Global Sustainable Transport Conference, the UN Ocean Conference, the Biodiversity Summit, the Food Systems Summit, the UN Framework Convention on Climate Change Conference of Parties, and the Assembly of the International Renewable Energy Agency. The UN Decade on Sustainable Energy for All 2014-2024 should also be leveraged to spur global momentum.

14. **The United Nations via UN-Energy has an important role in ensuring a successful outcome at the Dialogue and follow-up and delivery of results beyond the Dialogue towards 2030.** UN-Energy must be strengthened to enhance coordination and coherence among UN entities and other partners in their efforts towards reaching SDG 7 by 2030 and net zero emissions by 2050. In addition to delivering on the UN-Energy Pledge (Annex 2), UN-Energy must also ensure that the key priority areas and action recommendations of the global roadmap are translated into specific, strategic, bold and time-bound plans of action towards a clear set of milestones to be achieved by 2025, 2030 and 2050 (Table 1).
Table 1: Key milestones towards the achievement of SDG 7 and net zero emissions

<table>
<thead>
<tr>
<th>Now</th>
<th>2025</th>
<th>2030</th>
<th>2050</th>
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<tbody>
<tr>
<td><strong>Closing the energy access gap</strong></td>
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<tr>
<td>759 million without electricity access</td>
<td><strong>500 million</strong> more people have electricity access</td>
<td><strong>Universal access</strong> to electricity and clean cooking solutions</td>
<td><strong>Net zero</strong> energy systems that ensure universal access to electricity and clean cooking solutions</td>
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</tbody>
</table>
| 2.6 billion without clean cooking solutions | **1 billion** more people with clean cooking solutions | **1 billion** people served by mini grids/off-grid solar technologies | |}

| **Rapidly transitioning to clean energy pathways** | | | |
| 20% renewable energy in the global energy mix | All countries have a comprehensive energy transition strategy | **8,000 GW** of renewables | **Net zero emissions** achieved globally |
| 2799 GW of global renewable capacity | **Double** global renewable power capacity | **Double the global improvement in energy efficiency** | 92% of power comes from renewable technologies |
| Only about 1% annual primary energy intensity improvement | 100 countries have targets for 100% renewable-based power | **100 countries have achieved an annual energy efficiency increase of 3%** | **Phase out coal** globally |
| 60%: current share of fossil fuels in global energy mix | **Zero** new coal power plants in the pipeline | **Phase out coal** within the OECD | |}

| **Leaving no one behind, strengthening interlinkages and synergies** | | | |
| 11.5 million jobs in renewables (out of 58 million jobs in the energy sector) | All countries urgently integrate the SDGs as a guiding framework for energy transition through policy and planning | **60 million in renewables and efficiency** (out of 100 million jobs in the energy sector) | Leave no one behind by creating jobs, diversifying economies, ensuring people’s well-beings and empowering women, local communities and vulnerable groups including indigenous people, in achieving net zero emissions |
| 32% of renewable energy employees are women | Universal access to electricity in all health care facilities and all schools world-wide | | |}

| **Harnessing data, innovation and technology** | | | |
| 40% increase in private energy R&D funding since 2010 | Increase the supply of energy innovation that addresses key gaps | Scale up R&D and investment and align innovation timelines with net-zero goals | Use newly developed technologies to meet net-zero goals |
| 50% of the technologies necessary to meet net-zero emissions are still in R&D | | Implement ICT technology to reduce global CO₂ emissions by 20% | Develop efficient, low-cost, large scale CO₂ removal (e.g. direct air capture) |

| **Mobilizing adequate and well-directed finance** | | | |
| 1.7 trillion USD annual energy capital investment (40% is for clean energy technologies) | Re-direct fossil fuel consumption subsidies of 400 billion USD per year towards clean energy | **Triple worldwide investment in clean energy and energy-efficiency** (Renewables in the electricity sector to reach around USD 1.3 trillion annually) | Correct the investment gap and barriers to sustainable finance, including market-distorting subsidies and inadequate accounting of externalities |
| 12 billion USD for electricity access (of which 1 billion USD for mini-grids) | Increase clean cooking access to 25 billion USD annually | | |}
| Negligible financing for clean cooking access | Increase electricity access to 35 billion USD (of which 10 billion USD for mini-grids) | | |
II. Introduction

15. Pursuant to General Assembly resolution 74/225, the Secretary-General will convene a High-level Dialogue on Energy at the summit level during the 76th session of the UN General Assembly on 24 September 2021, in New York.

16. The High-level Dialogue on Energy, to be held on 24 September 2021, represents the first global gathering on energy under the auspices of the United Nations General Assembly since 1981. It presents a historic opportunity to provide transformational action in the first years of the SDG Decade of Action and support the implementation of the Paris Agreement.

17. A prospective result of the Dialogue will be a forward-looking statement calling for concrete actions to further accelerate SDG 7 implementation in support of the Decade of Action to deliver on the SDGs and the climate objectives of the Paris Agreement. Moreover, the Dialogue will also feature voluntary commitments and actions, in the form of “Energy Compacts”, from Member States and non-state actors such as companies, sub-national authorities and civil society organizations.

18. As the last milestone in the preparatory process ahead of the Dialogue in September, the Ministerial Thematic Forums aimed to generate a consolidated set of inputs to inform the final deliberations of the High-Level Dialogue in September.

19. The Ministerial Thematic Forums were held virtually, from 21 to 25 June 2021, convened by LIU Zhenmin, UN Under-Secretary-General for Economic and Social Affairs, as the Dialogue Secretary-General together with the Dialogue Co-Chairs Achim Steiner, Administrator of UNDP, and Damilola Ogunbiyi, Special Representative of the UN Secretary-General for Sustainable Energy for All, co-hosted by 30 Member State Global Theme Champions.

20. The week was structured around the five themes of the Dialogue: i) the Energy Access Forum (21 June), ii) the Energy Transitions Forum (23 June), iii) the Forum on Enabling SDGs through Inclusive, Just Energy Transitions (24 June), iv) the Forum on Innovation, Technology and Data (22 June), and v) the Forum on Finance and Investment (25 June). Each day of the Forum was co-hosted by the respective Global Theme Champions for that theme.

21. The Forums brought together about 1,500 leaders and experts from governments, business, civil society and youth, featuring 330 speakers, including about 50 ministers and over 20 executive heads/deputy heads of UN organizations, and 80 side events. Joining the grand opening, the Secretary-General announced that the HL
Dialogue on Energy will be held at the summit level on 20 September this year in New York [date later revised to 24 September].

22. The Forums also featured the launch of Energy Compacts, to boost momentum and encourage all stakeholders to mobilize further voluntary commitments ahead of the Dialogue in September. Reports of five multi-stakeholder Technical Working Groups, composed of more than 160 experts and co-led by 16 UN agencies and other relevant international organizations, were also officially launched, presenting a set of recommendations as key elements of a global roadmap towards the achievement of SDG 7 by 2030 and net zero emissions by 2050.

23. This summary provides an overview of the key outcomes of the Ministerial Forums and represents the final input of the preparatory process which will be submitted to the UN Secretary-General to inform the High-level Dialogue on Energy taking place in September.

III. Progress towards achieving SDG 7 by 2030 and net zero emissions by 2050

24. Since 2010, more than a billion people have gained access to electricity. As a result, 90 per cent of the planet’s population was already connected in 2019. Yet 759 million people still live without electricity, with about half of them living in fragile and conflict-affected settings.

25. The share of the global population without access to clean cooking fuels and technologies was 66 per cent in 2019, leaving almost three billion people or one-third of the global population without access.

26. While global investments in renewable energy capacity increased by 2 per cent to US$ 303.5 billion in 2020, on our current trajectory the share of all renewables is projected to rise only to around 21.5 per cent of total final energy consumption by 2030, from 17.1 per cent in 2018. The application of renewable technologies in end-use sectors remains specifically challenging. For example, coal, gas and oil still meet three-quarters of global heat demand, making it heavily fossil-fuel dependent.

27. Global primary energy intensity improved by only 1.1 per cent in 2018. This was the lowest average annual rate of improvement since 2010. The annual improvement until 2030 will now need to average 3 per cent if we are to meet the SDG 7 target of doubling the global rate of improvement.

28. International public financial flows to developing countries in support of clean energy amounted to $14 billion in 2018, a 35 per cent decrease from an all-time high of
$21.9 billion the year before. Nevertheless, the overall trend in public financial flows has been positive over the past decade, increasing threefold during the period 2010–18 when viewed as a five-year moving average.

29. The number of countries announcing pledges to achieve net zero emissions over the coming decades continues to grow. But the pledges by governments to date – even if fully achieved – fall well short of what is required to bring global energy-related carbon dioxide emissions to net zero by 2050 and give the world an even chance of limiting the global temperature rise to 1.5 °C.

30. Climate change and its impacts must be a key consideration in every energy decision in the coming years. The energy sector accounts for close to three-quarters of total global GHG emissions. These need to be reduced dramatically, and eventually eliminated, to meet the goals of the Paris Agreement.

31. SDG 7 action is also critical for realizing all the Sustainable Development Goals (SDGs). For example, the growth in renewable energy creates employment: already in 2019, 11.5 million worked in the renewables sector. Moreover, SDG 7 action is required to eliminate indoor air pollution resulting from cooking with polluting fuels and stoves, contributing to respiratory diseases that cause about 4 million premature deaths annually with disproportional impacts on women, children and the poor. Lack of energy often causes cold-chain breaks in emerging economies and developing countries, resulting in an estimated 20 per cent food loss. Given significant interlinkages such as these, an inclusive and just energy transition that leaves no one behind is critical.

IV. Challenges and opportunities to address the remaining gaps

32. The following section provides a synthesis of key challenges and opportunities raised during the deliberations of each of the Forums. It also highlights key recommendations from the Technical Working Groups reports on the five themes.

Day 1 - Energy Access

33. Insufficient and misdirected energy access financing is a major barrier. Current financial flows are not sufficient to achieve Sustainable Development Goal 7 by 2030. To reach our goals, we need about $60 billion a year: $35 billion for electricity and $25 billion for clean cooking.

34. Directing the right levels of public and private finance to scaling existing clean energy technologies and investing in new ones -- including phasing out fossil fuel subsidies and re-directing funds towards a just, inclusive energy transition -- are key
to decoupling recovery from COVID-19 and future economic growth from climate-intensive resource use.

35. Governments need help to build better enabling frameworks to attract investments and make national utilities more creditworthy. This would help them to get access to more abundant and cheaper capital. Energy access would become more affordable by rethinking the composition of financing flows to scale-up in particular support for clean cooking, as well as distributed renewable energy solutions especially in least-developed and fragile countries, and by making energy access financing more inclusive and gender-transformative.

36. Energy access needs to be made more equitable and inclusive. Accelerating progress cannot be at the expense of the poorest and the most vulnerable. Poverty cannot be ended, as long as energy poverty persists. Approaches need to be found that deliver affordable and reliable energy to the poor, not only to improve their living conditions but also to give them means to improve their livelihoods, leverage economic opportunities and build human capital. It is important not only to address the electrification of households, but also to place emphasis on electrifying healthcare facilities and schools, productive uses of energy and strong gender action.

Box 1: Key Recommendations from Technical Working Group on Energy Access

- Recommendation 1: Align energy policy and investment with energy transition pathways that accomplish universal access to electricity and clean cooking by 2030.
- Recommendation 2: Prioritize and coordinate political commitments and financing to accelerate access to clean cooking, building synergies with electrification efforts.
- Recommendation 3: Position universal access to energy as a key enabler and driver of inclusive, sustainable and resilient economic recovery and growth, and as an integral part of the transition to a just net-zero-emissions energy system.
- Recommendation 4: Put people at the centre of efforts to deliver universal energy.
- Recommendation 5: The 'last mile' of energy access must become the 'first mile' to be tackled.
- Recommendation 6: Support enterprises with innovative, cost-effective and scalable energy-access business models so that delivery of clean cooking and electricity solutions can be accelerated to households, businesses and community facilities.
- Recommendation 7: Accelerate the advancement of knowledge exchange, capacity-building, partnership-building and innovation.
- Recommendation 8: Improve the availability and quality of open-source, verifiable energy information and data pertinent to national, sub-national and local contexts.

Day 2 - Innovation, Technology and Data

Advanced unedited version
37. Urgent action by all stakeholders is necessary to ensure that energy innovation policies are aligned with meeting the 2030 and 2050 targets. There is a need to increase the commitment of governments, the private sector, academia and civil society towards mission-oriented innovations and technologies that are not fully commercialized yet. Credible targets and milestones are also important to unlock investments in proven technologies such as renewables for power generation and to address the technology needs in end-use sectors.

38. Strategic international and local cooperation will be critical to drive innovation when addressing key challenges and gaps. One example is the decarbonization of hard-to-abate sectors, where there is early-stage cooperation but more action is needed to avoid strategic competition. The architecture around cooperation needs to align incentives of policy makers and industry in developing countries to drive and create demand for decarbonizing innovation. Collaboration is also critical at the local level, as municipalities are often at the forefront of driving ‘homegrown’ innovation.

39. Cooperation also must focus on strengthening capacity, knowledge and skills for energy innovation. Deployment and development of new technologies will be hindered if there is a lack of capacity to implement and innovate at the local level. This also applies to increasing digital skills and literacy, closing the gap on the digital divide, as well as building skills related to the collection, management and application of data to support energy planning, policy and technology deployment. The Theme Report’s attention to youth in spearheading innovation was also well-received.

40. Demand for clean and sustainable energy technologies and innovation through market-oriented policies, harmonized international standards and carbon pricing mechanisms needs to be accelerated. This will enable infrastructure, fiscal incentives, access to finance, regional and local green value chain development, and commitments to public and private procurement of clean energy technologies.

41. Leveraging digitalization for innovation, while addressing the digital divide, and improving the collection, management and application of data and data systems are absolutely crucial. It is critical to tap the true potential of this “digitally-savvy generation” to work on energy innovation, digitalization and mobilizing advocacy for sustainable energy.

42. It is critical to recognize the needs of sub-national governments. Access to clean and affordable mobility is key in developing cities, as well as transitioning from oil to renewables in developed cities. EBRD runs a Green City Action Plan, supporting 49 cities, with about $800m invested so far over the first 5 years and pushing up to $2bn over the next 3 years.
Box 2: Key Recommendations from Technical Working Group on Innovation, Technology and Data

- Recommendation 1: Align energy innovation governance and international cooperation with meeting the targets for 2030 and 2050.
- Recommendation 2: Expand the supply of energy innovation that addresses key gaps.
- Recommendation 3: Increase the demand for clean and sustainable energy technologies and innovation.
- Recommendation 4: Leverage digitalization for innovation, while addressing the digital divide.
- Recommendation 5: Improve the collection, management and application of data and data systems.

Day 3 - Energy Transition

43. The global energy transition must become a transformational effort, a system overhaul, based on the rapid upscaling and implementation of all available technologies to innovate for the future. The emerging energy system must promote resilient economies and societies for a more inclusive and equitable world. Ambitious and targeted actions are needed now and throughout the coming decades to ensure the goals of SDG 7 are fulfilled and a decarbonized energy system achieved by 2050.

44. Updating ailing infrastructure or investing in expansion is an integral part of the energy transition and an enabler of modern technologies. Public finance can be used to attract private investment in the infrastructure needed, which will also help create jobs. Investments in infrastructure must be aligned with long-term plans and be reflective of broader strategies, including regional market integration.

45. OECD Countries should phase out coal by 2030 and redirect international energy financing towards the transition. Non-OECD countries should phase out coal by 2040, noting that many will require support for this process. Timely planning and implementation of coal phase-out will reduce the risk of stranded assets, improve energy independence, and bring about significant health and fiscal benefits. Countries should enact time-bound strategies to manage the social and economic aspects of the coal phase-out.

46. Energy policies need to be mainstreamed into economic, industrial, labour, educational and social strategies. Policy measures and investments for recovery from COVID-19 must drive a broader structural shift aligned with plans for long-term energy sector transformation. To deliver on energy ambitions and avoid, reduce or anticipate challenges, coherent, cross-ministerial policymaking is required.

47. Long-term energy scenarios, including net-zero mid-century scenarios, can be used to facilitate the dialogue needed to help reach consensus among all relevant stakeholders. When preparing energy transition, the ambitions of nationally determined
contributions (NDCs) should be raised and short-term challenges identified. Engaging sub-national and city-level decision-makers in transition planning and implementation will be essential, given rapid urbanization and the decentralized nature of the modern energy system.

48. Regional approaches to energy transition can reduce costs and enhance access to a reliable and affordable electricity supply through expanded and smarter grid infrastructure; security of supply should be achieved through resource diversification. Regional integration can also enhance the resilience of energy systems to extreme weather patterns, climate variability and climate change, and the reduction of carbon emissions, and generally foster green economic development and employment.

<table>
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<tr>
<th>Box 3: Key Recommendations from Technical Working Group on Energy Transition</th>
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<tr>
<td>• Recommendation 1: Rapidly scale up deployment of available energy transition solutions to reach 8000 GW(^1) of renewables by 2030 with due consideration to different contributions by individual countries.</td>
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<td>• Recommendation 2: Increase the average annual rate of energy efficiency improvement from the current 0.8% to 3% through the implementation of all available technologies while supporting further innovation.</td>
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<tr>
<td>• Recommendation 3: Invest in physical infrastructure to enable the energy transition.</td>
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<tr>
<td>• Recommendation 4: Countries of the Organisation for Economic Co-operation and Development (OECD) should phase out coal by 2030 and redirect international energy financing towards the transition. Non-OECD countries should phase out coal by 2040, noting that many will require support for this process.</td>
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<tr>
<td>• Recommendation 5: Mainstream energy policies into economic, industrial, labour, educational and social strategies.</td>
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<tr>
<td>• Recommendation 6: Establish medium and long-term integrated energy planning strategies, define decarbonization targets, and adapt policies and regulations to shape energy systems that boost sustainable development.</td>
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<tr>
<td>• Recommendation 7 (interlinkages with SDG 9): Create regional energy markets to facilitate the integration of renewables, promote cross-border power grid connectivity and trade, and further reduce costs through economies of scale.</td>
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<tr>
<td>• Recommendation 8 (interlinkages with SDG 10): Intensify international co-operation on energy transition to meet the 2030 Agenda for Sustainable Development and avoid future catastrophic climate change impacts.</td>
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<tr>
<td>• Recommendation 9 (interlinkages with SDG 9 and SDG 11): Develop sustainable transport roadmaps.</td>
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<tr>
<td>• Recommendation 10 (interlinkages with SDG 4 and SDG 8): Tailor labour and social protection policies to the specific needs of each region and country.</td>
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\(^1\) Estimate based on IRENA’s *World Energy Transitions Outlook*, and compatible with the recent IEA *Net Zero by 2050* report.
Day 4 - Enabling the SDGs

49. An inclusive and just energy transition can catalyze transformational co-benefits for the achievement of the SDGs. Energy is inextricably linked to virtually all the SDGs, and at the same time progress made towards achieving advancement of the other SDGs can also contribute to achieving SDG 7.

50. The impact of energy as an enabler of human capital development, including on health and education, needs to be maximized. Hundreds of clinics and facilities lack electricity in Africa: efforts towards electrification must consider enabling access to health care as a core priority. Just energy transition also needs to include an ambitious skills agenda. Less than 10 per cent of current NDCs include provisions on worker skills, while only 20 per cent of NDCs plan for human capital.

51. Energy transition is key to strengthening the growth and resilience of the global economy. Investing in energy transition can bring significant development co-benefits: every dollar spent on the clean energy transition will generate between three and seven dollars in return. Notably, of the 5 billion jobs that exist globally today, 1.4 billion jobs are dependent on climate stability.

52. It is necessary to think holistically and adopt a comprehensive set of policies to support energy transition. In addition to policies that help enable the deployment of renewables, it is necessary to consider: how industrial policy can help to create viable supply chains, including through access to credit; how best to support business incubation, capacity building and the forming of regional industrial clusters; how to approach education and training and devise active labour market policies; and how to enable private sector investment and strong public investment strategies.

53. We need a long-term vision that includes women, youth and the disabled and refugee communities, and to embed participation in decision-making and more inclusive financing. Women’s leadership in the energy sector is essential to promote a more inclusive role for women. Thus far, energy has largely been male dominated. While we are making headway in the right direction, we still have a long way to go to change stereotypes and social norms. Companies are realizing they can achieve improved results by pursuing gender equality.

54. In support of SDG 16 on partnerships, energy action can enable and strengthen well-functioning justiciaries and reliable institutions to anchor our systems and to make them more fair and inclusive.
Box 4: Key Recommendations from Technical Working Group on Enabling SDGs

- Recommendation 1: Every country and region should integrate achievement of the SDGs as a guiding framework into the planning and implementation of their own transition pathways towards clean and sustainable energy.
- Recommendation 2: Implement a sustainable energy transition strategy with social equity and inclusiveness at its centre to enable the SDGs.
- Recommendation 3: Integrate access to affordable, reliable, sustainable and modern energy, including access to electricity and clean cooking, as the central pillar of inclusive, just energy-transition strategies.
- Recommendation 4: Accelerate the integration of gender equity into energy transition pathways.
- Recommendation 5: Enable transformational change by promoting systemic approaches in the energy transition to achieving the SDGs and climate goals, while ensuring energy security.
- Recommendation 6: Track progress and integrate an Energy for SDG Impact Framework into energy transition strategies.
- Recommendation 7: Strengthen multi-stakeholder partnerships to leverage the transformational potential of energy for enabling the SDGs.
- Recommendation 8: Ensure that energy transition pathways are sustainably designed and implemented to enhance synergies and reduce trade-offs with other SDGs.

Day 5 - Finance and Investment

55. Financing is at the heart of the energy transition. If the world wants to be successful in the dual race towards 100 per cent energy access and net zero emissions, mobilizing public and private financial flows and aligning energy financing with all dimensions of the 2030 Agenda for Sustainable Development and the Paris Agreement are key.

56. Scaling up investment in clean energy technologies is imperative, and clean energy investment will need to triple within this decade. The bulk of the funding will have to come from the private sector. The role of the private sector is also critical in leveraging recovery stimulus investments into transformative investments for energy access, especially clean cooking, and the energy transition.

57. Countries are urged to use COVID-19 recovery strategies to increase support to developing countries that have limited resources to achieve SDG 7 by 2030. Developed countries need to honour their US$ 100 billion per year climate finance commitment and need to support the development of green investments and local financial actors in investing in clean energy.
58. The COVID-19 pandemic has exacerbated the debt pressure of many developing countries, putting a considerable strain on their financial resources. At the same time, market uncertainty and volatility in financial markets due to the crisis have made investors more risk averse, reducing the amount of capital available for renewables in developing countries. In a post-COVID recovery period, international public finance flows in support of clean energy are key to the development of the sector in these markets.

59. As public resources are generally limited, they should be used strategically to crowd in additional private capital, especially in sectors and regions that private investors perceive as too risky to invest in. In those markets where the financing of generating capacity can be covered by the private sector, donors can increasingly finance supporting infrastructure such as grid integration and energy storage, as well as focusing on de-risking solutions.

60. Public resources should be allocated for those who need it most, including small business, and for increased engagement with youth from traditionally marginalized communities and impoverished backgrounds. Innovative financing options, such as flexible payments, are crucial.

61. We should apply the right kind of capital to the right kind of problem, highlighting grants and concessional debts for the initial stage, to build markets before graduation to commercial capital.

62. The role of blended finance is key in de-risking clean energy projects, and it should be directed towards mini-grids and new and innovative technologies.

63. The predictability and reliability of policies and regulations is a vital consideration for attracting investors, as it reduces risks related to policy reversals or renegotiations. In this regard, governments have a key role to play in the establishment of stable and coherent policy and regulatory frameworks. There needs to be an emphasis on creating bankable projects, including by focusing on de-risking through blended concessional finance. Local currency funding and support for the deepening of domestic capital markets to achieve SDG 7 should be enhanced.

64. While focusing on electricity generation, overcoming challenges facing the scale-up of investment in transmission and distribution systems will also need to be prioritized. Investors need predictable policies, transparency and attractive rates of return.

**Box 5: Key Recommendations from Technical Working Group on Finance and Investment**

- Recommendation 1: Accelerate delivery of public finance in support of sustainable energy goals.
- Recommendation 2: Regain the momentum lost on energy-access investments during the COVID-19 pandemic.
Recommendation 3: Align energy financing with all dimensions of the Paris Agreement.
Recommendation 4: Governments should work with relevant stakeholders to ensure that the realization of SDG 7 and the global energy transition leaves no one behind.
Recommendation 5: Enhance local currency funding and support for the deepening of domestic capital markets to achieve SDG 7.
Recommendation 6: Make better use of blended finance schemes to mobilize and maximize private capital for clean energy investments and innovative energy technologies.
Recommendation 7: Correct market-distorting subsidies and address the lack of carbon-pricing frameworks and inadequate accounting of environmental externalities that hold back sustainable investment.
Recommendation 8: De-risk projects and fix regulatory barriers to ensure market openness, attractiveness and readiness for private-sector finance.
Recommendation 9: Develop new mechanisms to link sustainable finance with opportunities to support SDG 7 and reward ambitious energy-transition strategies.

V. Key elements of a global roadmap towards 2030 and 2050

65. As an outcome of the Dialogue in September, a global roadmap towards achieving SDG 7 by 2030 and net zero emissions by 2050 will be presented as part of a political summary resulting from the summit. This roadmap will include priority recommended actions (Box 6) and a set of milestones (as presented in Table 1 above), building on the deliberations at the Ministerial Thematic Forums, including the reports submitted by five Technical Working Groups that have brought together over 160 experts since March, co-led by 16 UN and international organizations.

Box 6: Priority recommended actions

1. **Closing the energy access gap**: Energy policy, planning, financing and innovation must be aligned with achieving both universal access to electricity and clean cooking by 2030. This includes provision of access to electricity to the 760 million people worldwide who lack it, and ensuring clean cooking solutions for the 2.6 billion people still relying on harmful fuels.

2. **Rapidly transitioning to clean energy pathways**: Ramping up clean energy technology deployment and phasing out harmful sources/devices must be an integral component of energy sector planning in the next decade. This includes rapid scaling up of available energy transition solutions to reach 8000GW of renewable energy by 2030, and to increase the annual rate of energy efficiency from 0.8% to 3.0%. It also entails abandoning all coal plants in the pipeline and reducing coal power capacity by 50% by 2030.

3. **Leaving no one behind, strengthening inclusion, interlinkages and synergies**: Integration of socio-economic outcomes in the energy sector is critical to ensuring no one is left behind. This includes integration of principles of equity and equality in energy-sector policy, planning and financing vis-à-vis the energy needs of the most vulnerable communities, including women and children, youth and indigenous peoples. It also includes creating green
energy jobs and mainstreaming energy-sector policies and strategies into economic, industrial, labour, educational and social strategies to ensure just energy transitions.

4. **Mobilizing adequate and well-directed finance:** This includes tripling clean energy investment globally by 2030, and accelerating access to finance particularly in the least developed countries. It also entails reforms to phase out inefficient fossil fuel subsidies and support market-based energy transitions. Equally important is creating enabling policy and regulatory frameworks to leverage private sector investment towards SDG 7 targets.

5. **Harnessing innovation, technology and data:** This includes expanding the supply of energy innovation that addresses key gaps and increasing demand for clean and sustainable energy technologies and innovation through market-oriented policies, harmonized international standards and carbon pricing mechanisms. This also includes addressing the digital divide, investing in quality data and improving the collection, management and applications of data and data systems.

VI. **Delivering on the roadmap: Energy Compacts**

66. The global roadmap will only succeed at raising ambition and accelerating implementation if it can be translated into ambitious, timebound, quantifiable and measurable plans of action. Harnessing partnerships and mobilizing all stakeholders are also critical to accelerating implementation.

67. Designed as one of the key outcomes expected of the High-level Dialogue, Energy Compacts are voluntary commitments that provide a vehicle to translate the global roadmap into concrete steps and robust plans at all levels of society. They aim to mobilize all stakeholders, including Member States and non-state actors such as business, civil society, youth, cities and sub-national authorities, around specific actions towards accelerated progress.

68. Energy Compacts could be policies, investments, analytical work and concrete steps/actions to achieve affordable and clean energy for all by 2030. Various stakeholders can commit to an Energy Compact that includes the specific actions and the impact targets of their efforts. Energy Compacts can also include initiatives, partnerships and coalitions focused on a specific issue related to SDG 7.

69. Energy Compacts are also designed to complement Nationally Determined Contributions (NDCs) by building on targets already included but also those that are not reflected in a country’s NDCs, such as clean cooking access. Energy Compacts are also a more granular version of the actions stated in the NDCs, essentially the energy system “steps” to be taken towards achieving the energy-related goals of the NDCs.
70. Development of Energy Compacts is guided by a number of principles: Compacts must demonstrate ambition and accelerated action; Compacts must be aligned with the 2030 Agenda for Sustainable Development and ensure coherence with SDG implementation plans; Compacts must also be aligned with climate plans such as the NDCs, and net-zero commitments by 2050; Compacts must address leaving no one behind and just transition; and lastly they must be feasible, robust and measurable.

71. By the time of the Ministerial Thematic Forums, over 25 bold and ambitious Energy Compacts were showcased from a variety of stakeholders including national governments, regions and cities, and the private sector. A brief overview of the 25 Compacts previewed as well as other critical actions stated during the Ministerial Forums by country ministers are included in Table 2.

Table 2: Actions and announcements featured on each day of the Ministerial Forums

<table>
<thead>
<tr>
<th>Country/Organization</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>European Union</td>
<td>The European Union outlined its European Green Deal, urged participants to join a global Green Deal, and emphasized the EU-Africa green energy initiative to deliver clean energy and make energy poverty history.</td>
</tr>
<tr>
<td>China</td>
<td>China recalled its success in providing electricity for its entire population and pledged its willingness to work with developing countries to provide clean energy infrastructure.</td>
</tr>
<tr>
<td>Japan</td>
<td>Japan introduced its initiative to provide solar powered batteries complete with mobile payment solutions in Tanzania and other parts of East Africa.</td>
</tr>
<tr>
<td>Russian Federation</td>
<td>The Russian Federation emphasized the importance of providing affordable energy for all, underlined the importance of natural gas, nuclear, hydro and hydrogen in the clean energy mix, and advocated for a balanced approach.</td>
</tr>
<tr>
<td>Saudi Arabia</td>
<td>Saudi Arabia emphasized the importance of technology in achieving universal access goals.</td>
</tr>
<tr>
<td>Kenya</td>
<td>Kenya adopted ambitious market-based strategies to reach universal access to electricity and clean cooking by 2030.</td>
</tr>
<tr>
<td>UNDP</td>
<td>UNDP called for an Energy Promise that, among others, aims to increase access to clean and affordable energy for 500 million people.</td>
</tr>
<tr>
<td>The Rockefeller Foundation and IKEA Foundation</td>
<td>The Rockefeller Foundation and IKEA Foundation announced a $1 billion global platform to scale energy access for 1 billion people – representing the largest one-time commitment the former has made.</td>
</tr>
<tr>
<td>Google</td>
<td>Google announced to operate entirely on 24/7 Carbon-Free Energy (CFE) by 2030, to build a global 24/7 CFE movement, and to catalyze the development and commercialization of new technologies.</td>
</tr>
<tr>
<td>Coalition for 24/7 Carbon-Free Energy</td>
<td>Google coordinates the Coalition for 24/7 Carbon-Free Energy (CFE), in partnership with Sustainable Energy for All, supported by UN-</td>
</tr>
</tbody>
</table>
Energy. It calls for companies, national and local governments, and other stakeholders to join the CFE coalition to take steps to fully decarbonize their own electricity consumption; support the commercialization of advanced CFE technologies; and advocate for policies that accelerate the decarbonization of electricity systems.

**Sustainable Energy for All**

Sustainable Energy for All previewed its Energy Compact commitments: by 2023, it will directly provide over 2 million new energy connections through its Universal Energy Facility, displacing at least 1 million fossil-fuel based generators and 4 MT CO2e emissions, and creating about 2 million jobs. Also by 2023, it will leverage US$640 million towards energy access and/or clean energy transitions directly and indirectly through SEforALL’s work.

**Call to Action: Principles for Priority Action on Clean Cooking for All**

This Call to Action invites all governments and other stakeholders to sign the Principles for Priority Action on Clean Cooking for All and collaborate on an Energy Compact to deliver universal access to clean cooking solutions, which is an integral part to achieving global climate and sustainable development goals.

**Featured on Day 2**

**Finland**

Finland emphasized the need for local and clean innovative technology solutions to achieve equal access to clean energy around the world. These solutions can also support other SDGs and create new business opportunities.

**Morocco**

Morocco is committed to an ambitiously paced energy transition, to increase the share of renewable energy by more than 52% by 2030.

**Mauritius**

Mauritius will phase out use of coal by 2030, which currently accounts for 40% of the energy mix. Its Energy Compact will demonstrate projects to substitute for the use of coal.

**Basque Region**

The Basque Country in Spain discussed its Basque Green Deal and outlined commitments to develop sustainable local markets for hydrogen power and to create citizens’ co-operatives for photovoltaic technology.

**London**

The city of London announced a C40 Cities Climate Leadership Group commitment to help accelerate energy transition by aiding cities in delivering energy-related targets in their climate action plans.

**JK Cement**

The Indian company JK Cement announced several commitments for 2030: increasing their green power mix to 75% from its current 25%; cutting net carbon emissions by 21% below 2020 levels; and reducing groundwater dependency through increasing water productivity to five times current levels.

**UltraTech Cement**

The Indian company UltraTech Cement announced commitments to double energy productivity from 2010 levels by 2035, increase green energy use to 34% by 2024, cut its carbon footprint by 27% below 2017 levels by 2032, and cut scope 2 (indirect) greenhouse gas emissions by 69% within the same timeframe.
<table>
<thead>
<tr>
<th><strong>IRENA &amp; FAO</strong></th>
<th>IRENA has signed an MOU with FAO to jointly advance renewable energy in the agri-food sectors. The first output will be a joint report on how to scale up renewable energy, to be launched at the Food Systems Summit.</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Featured on Day 3</strong></td>
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<tr>
<td><strong>India</strong></td>
<td>India announced ambitious renewable energy commitments with renewable energy targets of 450 GW of installed capacity by 2030 at an unprecedented pace and price.</td>
</tr>
<tr>
<td><strong>The Netherlands</strong></td>
<td>The Netherlands announced its Energy Compact, which outlines a whole-of-society approach and the mobilization of partners across the board for clean energy.</td>
</tr>
<tr>
<td><strong>Germany</strong></td>
<td>Germany’s Energy Compact includes a pledge for the country to reach a 30% share of renewable energy in gross final energy consumption by 2030 and to support its partner countries in reducing energy poverty, improving energy efficiency and developing and implementing transformative energy policies away from fossil fuels towards renewable energies.</td>
</tr>
<tr>
<td><strong>Denmark</strong></td>
<td>Denmark’s Energy Compact aims for the country, among other things, to cover 100% of Danish electricity consumption with renewable energy by 2028 and to support energy transition in 16 countries through bilateral cooperation, sharing Danish expertise and know-how.</td>
</tr>
<tr>
<td><strong>RELAC</strong></td>
<td>Colombia, Chile, the Dominican Republic and the IDB announced an Energy Compact of the RELAC (Renewable Energy in Latin America and the Caribbean), with a regional goal of at least 70% share of renewable energy in the power matrix by 2030. It was noted that energy efficiency is key to achieving sustainable development; that investment in energy efficiency delivers jobs, especially in the context of the green recovery, and creates economic opportunities for people and industries.</td>
</tr>
<tr>
<td><strong>Brazil</strong></td>
<td>Brazil announced two Compacts – one on biofuels to lower the emissions from the Brazilian transportation sector, and one for green hydrogen to increase R&amp;D and implementation</td>
</tr>
<tr>
<td><strong>Ghana</strong></td>
<td>Ghana emphasized that there is a global move away from high-energy intensity to a path of low carbon development. New standards are awaiting parliamentary approval to move from voluntary to mandatory standards (legally enforceable) for appliances from kitchen to factory.</td>
</tr>
<tr>
<td><strong>The Alliance for Rural Electrification</strong></td>
<td>The Alliance for Rural Electrification presented an Energy Compact commitment to achieve 500 million additional people with access, 5 million new green jobs, and avoid 1 billion tonnes of CO2e emissions by 2030.</td>
</tr>
<tr>
<td><strong>Korea</strong></td>
<td>Korea emphasized the importance of international cooperation to advance sustainable energy and offered to help facilitate such cooperation between developed and developing nations.</td>
</tr>
<tr>
<td><strong>Enel</strong></td>
<td>Enel previewed an Energy Compact that includes voluntary commitments in five priority areas. They announced Enel's accelerated coal phase-out from 2030 to 2027, a tripling of renewable energy</td>
</tr>
</tbody>
</table>
Green Hydrogen Compact Catalogue | Denmark, Germany, IRENA, Race to Zero and WEF called for accelerated ambitions for a carbon-neutral green hydrogen economy through the Green Hydrogen Compact Catalogue. All stakeholders are encouraged to establish Energy Compacts and join the Green Hydrogen Compact Catalogue by taking the necessary measures to accelerate the development of a green hydrogen ecosystem and value chain that will help to achieve SDG7 and a 1.5C-compatible energy sector.

Featured on Day 4

Nauru | Nauru previewed a comprehensive and ambitious Energy Compact which aims to achieve 50% electricity generation from renewable sources by 2023; a 30% improvement in energy efficiency by 2030 from a 2021 baseline; and the electrification of 20% of the vehicle fleet by 2030.

Panama | Panama shared an Energy Compact including more than 40 stakeholders, focused on people, inclusivity and diversity, and committed to phasing out fossil fuels.

GOGLA | GOGLA, the professional association for the off-grid energy industry, committed to delivering improved electricity access for 1 billion people by 2030 through deploying the latest innovations in distributed solar technology, efficient appliances and decentralized business models.

City of Ithaca | The city of Ithaca in New York aims to implement a community choice aggregation programme through which the city will procure below-average cost, 100% renewable energy from selected energy service companies. Through this, the city expects to have at least 30% of buildings in the city rely on 100% renewable energy by 2024, increasing to 60% by 2027 and 100% by 2030.

Honduras | Honduras announced its plans to present an Energy Compact during the HLDE in September, noting that this is a crucial moment to promote actions to achieve clean energy.

Iceland | Iceland committed to delivering an Energy Compact by the HLDE in September, referencing its work with IRENA, the World Bank and SEforALL to continue to contribute also in other countries, including SIDS, where sustainable energy is particularly important as an essential part of the Blue Economy.

Sustainable Water and Energy Solutions Network | Three member organizations of the Sustainable Water and Energy Solutions Network (ASAZGUA, Canal de Isabel II and Itaipu) made common but differentiated commitments for this Energy Compact. For instance, this includes commitments regarding the use of renewable energy for electricity generation or energy efficiency improvements by the companies, as well as improved energy access and energy reliability for consumers.
<table>
<thead>
<tr>
<th>Country</th>
<th>Commitment</th>
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</thead>
<tbody>
<tr>
<td>Portugal</td>
<td>Portugal committed to an Energy Compact on Green Hydrogen, and will pay particular attention to most vulnerable groups, noting that access to safe, secure and affordable energy is essential to deliver on the 2030 Agenda for Sustainable Development.</td>
</tr>
<tr>
<td>Featured on Day 5</td>
<td></td>
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<tr>
<td>EBRD</td>
<td>The European Bank for Reconstruction and Development (EBRD) announced an Energy Compact regarding its existing Green Cities programme. The Compact will contribute to a minimum of 50 Green City Action Plans and invest around EUR 1.9 billion in Green Cities priority investment by the end of 2023, with support going to areas such as “smart cities” technologies and increased energy efficiency in buildings, transport, water and waste management.</td>
</tr>
<tr>
<td>Student Energy</td>
<td>Student Energy previewed an Energy Compact to raise USD 150 million toward upskilling, mentoring and directly financing 10,000 youth-led clean energy projects by 2030.</td>
</tr>
<tr>
<td>NTPC Limited</td>
<td>India’s largest power utility, NTPC Ltd., announced in its Energy Compact to install 60 GW of cumulative renewable energy capacity and cut net energy intensity by 10% vs. 2012 levels by 2032. NTPC will also join at least two international alliances and groups to facilitate clean energy research and promote sustainability in the energy value chain by 2025.</td>
</tr>
<tr>
<td>Power Africa</td>
<td>The Power Africa partnership, led by the US Agency for International Development (USAID), said the partnership is developing an Energy Compact to mobilize USD 300 million to electrify 20,000 health clinics in Africa by 2030.</td>
</tr>
<tr>
<td>Dominican Republic</td>
<td>The Dominican Republic will commit by 2030 to achieve 99% energy access, raise the share of renewables in power generation to 30%, and increase energy efficiency by 30%.</td>
</tr>
<tr>
<td>Palau</td>
<td>Palau is exploring a commitment on going fossil fuel-free while ensuring water and food security.</td>
</tr>
</tbody>
</table>

VII. Way forward

67. The outcomes of the Ministerial Thematic Forums, including key elements of a global roadmap towards achieving SDG7 by 2030 and net-zero emissions by 2050, will inform the deliberations in September and its final outcomes.

68. The Dialogue Secretariat will continue to mobilize actions and commitments in the form of Energy Compacts in the months ahead. The Secretariat has set up an online platform on Energy Compacts as a dedicated resource with details on the process of development, submission and registration of Energy Compact commitments. This platform will continue to
unite SDG 7 commitments beyond the High-level Dialogue and throughout the current Decade of Action.

69. Beyond the day of the Dialogue, the global roadmap coupled with Energy Compacts will continue to put forward pathways and solutions to meet the needs of the 760 million people who still lack access to electricity and the 2.6 billion who lack clean, modern cooking and heating fuels and to spur energy transition away from fossil fuels.

70. UN-Energy will play a central role in working with all stakeholders in the aftermath of the Dialogue to rally support, maintain momentum, and mobilize partnerships and more Energy Compacts, while striving to raise ambition, and track progress over the next decade. UN-Energy will also strengthen coordination and collaboration with all relevant UN entities and partners to deliver the UN-Energy Pledge.
Annex 1. The Global Champions and the Co-Leads of the Technical Working Groups

Global Theme Champions for the High-level Dialogue on Energy

Thirty Member States have volunteered to serve as Global Champions for the Dialogue, spearheading global advocacy and showcasing their actions through Energy Compacts. The Champions are:

- **Energy access**: China, the European Union (EU), Japan, Kenya, Malawi, Netherlands, Russian Federation, Saudi Arabia
- **Energy transition**: Brazil, Chile, Colombia, Denmark, Germany, India, Nigeria, Poland, Spain, United Kingdom
- **Enabling SDGs through inclusive, just energy transitions**: the European Union (EU)**, Iceland, Honduras, Nauru, Panama, Portugal, United Arab Emirates
- **Innovation, technology and data**: Finland, Mauritius, Morocco, Russian Federation**
- **Finance and investment**: Dominican Republic, Italy, Netherlands**, Pakistan, Saudi Arabia** (** supporting role)**

Technical Working Groups for the High-level Dialogue on Energy

Five Technical Working Groups, composed of multi-stakeholder technical experts, were established to engage in the substantive preparations for the High-level Dialogue. Each Technical Working Group has been led by co-leads drawn from UN and international agencies and programmes as follows:

- **Energy Access**, with the UN Development Programme (UNDP), the UN Office for Least Developed, Landlocked and Small Island Developing States (UN OHRLLS) and the World Bank as co-leads;
- **Energy Transition**, with the International Renewable Energy Agency (IRENA), the UN Economic and Social Commission for Asia and the Pacific (UN ESCAP) and the UN Environment Programme (UNEP) as co-leads;
- **Enabling SDGs through Inclusive, Just Energy Transitions**, with the UN Department of Economic and Social Affairs (UN DESA), the UN Economic and Social Commission for Western Asia (UN ESCWA) and the World Health Organization (WHO) as co-leads;
- **Innovation, Technology and Data**, with the Food and Agriculture Organization of the UN (FAO); the UN Human Settlements Programme (UN-Habitat) and the UN Industrial Development Organization (UNIDO) as co-leads;
- **Finance and Investment**, with the European Investment Bank (EIB), International Energy Agency (IEA), International Finance Corporation (IFC), and the UN Economic Commission for Africa (UN ECA) as co-leads.

Advanced unedited version
Annex 2. The UN-Energy Pledge

UN-Energy, working with all UN system partners and UN Country Teams, commits to helping Member States and their partners to attain these **milestones to be achieved by 2025** towards SDG 7 and net zero emissions, as they build back better from the COVID-19 pandemic:

<table>
<thead>
<tr>
<th>Access</th>
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<tbody>
<tr>
<td>• 500 million more people with electricity access</td>
</tr>
<tr>
<td>• 1 billion more people with access to clean cooking solutions across</td>
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<tr>
<td>the world</td>
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<table>
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<tr>
<th>Transition</th>
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<tbody>
<tr>
<td>• 100% increase in modern renewables capacity globally and 100% renewable-based power targets established in 100 countries</td>
</tr>
<tr>
<td>• 3% annual efficiency improvement in at least 50 countries across the</td>
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<tr>
<td>world</td>
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<tr>
<th>Resilience</th>
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<tbody>
<tr>
<td>• 30 million jobs in renewable energy and energy efficiency</td>
</tr>
<tr>
<td>• Re-direct fossil fuel subsidies towards clean energy and end financing for new coal power plants</td>
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<tr>
<th>Finance</th>
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<tbody>
<tr>
<td>• Double annual clean energy investment globally (relative to the current level)</td>
</tr>
<tr>
<td>• Raise energy access investment to <strong>US$40 billion</strong> per year</td>
</tr>
</tbody>
</table>

Note: Draft as of August 2021, subject to further refinements.
MINISTERIAL THEMATIC FORUMS
FOR THE HIGH-LEVEL DIALOGUE ON ENERGY
21-25 JUNE 2021

PROGRAMME

CO-HOSTED BY:
Member State Global Champions for the High-level Dialogue on Energy

CO-CONVENED BY:
Dialogue Secretary-General and Dialogue Co-Chairs

IN PARTNERSHIP WITH:
Co-Leads of the Technical Working Groups

WITH TECHNICAL SUPPORT OF:
UN-ENERGY
# MINISTERIAL THEMATIC FORUMS
## FOR THE HIGH-LEVEL DIALOGUE ON ENERGY
### 21 – 25 June 2021

**Programme Overview**
- **Co-hosted by:** Global Theme Champions
- **Co-convened by:** HLD Secretary-General and HLD Co-Chairs
- **Participation:** Open by registration to all Member States and other stakeholders including business, CSOs, local governments, youth, academia and others
- **Location:** The Forums will be held virtually
- **Registration:** Registration for the Forums, including side event application, will be open early May 2021, through the [HLD Energy website](#).

<table>
<thead>
<tr>
<th>Monday 21 June</th>
<th>Tuesday 22 June</th>
<th>Wednesday 23 June</th>
<th>Thursday 24 June</th>
<th>Friday 25 June</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Ministerial Thematic Forum</strong></td>
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<tr>
<td>Energy Access</td>
<td>Innovation, Technology and Data</td>
<td>Energy Transition</td>
<td>Enabling SDGs Through Inclusive, Just Energy Transitions</td>
<td>Finance and Investment</td>
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<thead>
<tr>
<th>Time</th>
<th>Session</th>
<th>Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>6:00–7:00</td>
<td>SDG 7 Action Zone</td>
<td>Side events: Promoting actions from Member States, youth, business, academia, CSOs, local governments and other stakeholders</td>
</tr>
<tr>
<td>7:15–8:45</td>
<td></td>
<td><strong>Global Multi-Stakeholder Dialogues</strong></td>
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<tr>
<td></td>
<td></td>
<td>Parallel sessions with focus on priority tracks for each day’s theme</td>
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<tr>
<td></td>
<td></td>
<td>Co-organized by Global Champions with Co-lead Organizations</td>
</tr>
<tr>
<td>9:00–9:30</td>
<td>Grand Opening</td>
<td>UN Secretary-General, Dialogue Secretary-General, Dialogue Co-Chairs, Multi-Stakeholder Leaders</td>
</tr>
<tr>
<td>9:30–11:30</td>
<td></td>
<td><strong>Ministerial Segments</strong></td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Opening remarks by Global Champion Ministers for the day’s theme</td>
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<tr>
<td></td>
<td></td>
<td>• Other ministerial remarks</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Official launch of Technical Working Group report on that theme, by relevant Co-lead Organizations</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Remarks by leaders from business, civil society, youth and other stakeholders</td>
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<td></td>
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<td>• Reporting back from Global Multi-Stakeholder Dialogues for the day’s theme</td>
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<tr>
<td></td>
<td></td>
<td>• Concluding remarks for the day’s theme</td>
</tr>
<tr>
<td>11:30–20:00</td>
<td>SDG 7 Action Zone</td>
<td>Side events: Promoting actions from Member States, youth, business, academia, CSOs, local governments and other stakeholders</td>
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<tr>
<td>11:30–12:00</td>
<td></td>
<td><strong>Grand Closing/Way Forward</strong></td>
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<tr>
<td></td>
<td></td>
<td>Dialogue Co-Chairs, Dialogue Secretary-General</td>
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</tbody>
</table>

*Draft as of 17 May*
GRAND OPENING
&
MINISTERIAL THEMATIC FORUM ON ENERGY ACCESS
FOR THE HIGH-LEVEL DIALOGUE ON ENERGY
21 JUNE 2021

CO-HOSTED BY:
China, the European Union, Japan, Kenya, Malawi, Netherlands, Russian Federation, Saudi Arabia

CO-CONVENE BY:
Dialogue Secretary-General and Dialogue Co-Chairs

IN PARTNERSHIP WITH CO-LEADS OF TECHNICAL WORKING GROUP 1:
UNDP, UN OHRLLS and World Bank
### Theme 1: Energy Access

<table>
<thead>
<tr>
<th>06:00 – 07:00</th>
<th>SDG 7 ACTION ZONE SIDE EVENTS</th>
</tr>
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<tbody>
<tr>
<td></td>
<td>SIDE EVENTS: Promoting actions from Member States, youth, business, academia, CSOs, local governments and other stakeholders</td>
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<td>(List of side events is made available separately on the website for the Ministerial Thematic Forums)</td>
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</tbody>
</table>

<table>
<thead>
<tr>
<th>07:05 – 07:15</th>
<th>DAILY PROGRAMME OVERVIEW</th>
</tr>
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<tbody>
<tr>
<td></td>
<td>Mr. Minoru Takada, Team Leader, Sustainable Energy, Division for Sustainable Development Goals, UN DESA</td>
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<thead>
<tr>
<th>07:15 – 08:45</th>
<th>GLOBAL MULTI-STAKEHOLDERS DIALOGUE (parallel sessions)</th>
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<tr>
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<td>ACHIEVING UNIVERSAL ACCESS TO CLEAN COOKING SOLUTIONS</td>
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<td>7:15 – 7:21</td>
<td>Call for Action: Principles for priority actions on clean cooking for all</td>
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<td></td>
<td>Mr. Paul N. Mbuthi, Deputy Director of Renewable Energy, Ministry of Energy, Kenya (3 min)</td>
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<td>Mr. Frank van der Vleuten, Policy Coordinator, Climate, Finance and Energy, Ministry of Foreign Affairs, the Netherlands (3 min)</td>
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<tr>
<td>7:21 – 8:00</td>
<td>Action Commitments [1]: Creating enabling conditions</td>
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<td>Moderator: Mr. Marcel Alers, Head of Energy, UNDP</td>
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<td>Action announcements: (2 min announcement per panelist)</td>
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<td></td>
<td>- Mr. Marcel Raats, Team Manager, Energy and Climate Change, RVO, the Netherlands</td>
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<td>- Mr. Harish Hande, Co-Founder, SELCO Foundation</td>
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<td>- Ms. Sheila Oparaocha, Coordinator, ENERGIA</td>
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<td>- Ms. Jillene Connors Belopolsky, Chief of Staff, Clean Cooking Alliance</td>
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<td>- Mr. Guangqing Liu, Director, China Alliance for Clean Cookstoves</td>
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<td>- Ms. Heather Adair-Rohani,</td>
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Technical Officer, WHO

Q&A Session (5 min)

8:00 – 8:39

Action Commitments [2]: Creating markets for innovative solutions

Moderator:
Ms. Yabei Zhang, Senior Energy Specialist, Lead, Clean Cooking Fund, World Bank

Action announcements: (2 min announcement per panelist)
- Mr. Patrick Matanda, Principal Secretary, Ministry of Energy, Malawi
- Dr. Walid Mehalaine, Function Head, Strategic Planning & Economic Services, OPEC Fund
- Ms. Deborah Cornland, Program Manager, Energy Specialist, Unit for Global Cooperation on Environment at the Swedish International Development Cooperation Agency
- Ms. Sinead Walsh, Climate Envoy/Counsellor, Ireland
- Mr. Ed Brown, Research Director, MECS
- Ms. Katrina Pielli, Senior Energy Advisor, World Food Programme

Q&A Session (5 min)

7:47 – 8:13

PANEL 2: Sharing knowledge and good practices

Moderator:
Mr. Kikuchi Nobuyuki, Director, Resource Security Division, Ministry of Foreign Affairs, Japan

Panel Discussions: (Davos-style moderated discussion)
- Mr. Vijay Modi, Professor, The Earth Institute at Columbia University
- Ms. Jacqueline Kimeu, Coordinator, Alliance of Civil Society Organisations for Clean Energy Access (ACCESS)
- Dr. Andrew Jones, Director, Geoscience Energy and Maritime Division, PCREEE

Q&A Session (5 min)

8:13 – 8:39

PANEL 3: Advancing electricity access leaving no one behind

Moderator:
Ms. Heidi Schroderus-Fox, Director, UN OHRLLS

Panel Discussions: (Davos-style moderated discussion)
- Mr. Andrey Maximov, Director of the Department of Electric Power Industry Development, Ministry of Energy of Russia (3 min)
- Mr. Thomas Fohgrub, Team Leader, Coordination Unit for the Global Action Plan of Action for Energy in Displacement, UNIATAR
- Mr. Hafeez Rehman, Director India, VITO Arabia LLC
- Ms. Elisa Portale, Senior Energy Specialist, World Bank

Q&A Session (5 min)

8:39 – 8:45

Conclusion and way forward by the Co-Chairs:
H.E. Perks Clemency Ligoya, Permanent Representative of the Republic of Malawi to the United Nations (3 min)
Mr. Fareed Alasaly, Senior Advisor to HRH Minister of Energy, Saudi Arabia (3 min)
## GRAND OPENING

<table>
<thead>
<tr>
<th>Time</th>
<th>Event</th>
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<tbody>
<tr>
<td>09:00 – 09:30</td>
<td><strong>Master of Ceremonies</strong>&lt;br&gt;Mr. Matthew Bishop, Senior Fellow, Brookings, and Former US Business Editor &amp; New York Bureau Chief, The Economist</td>
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<td><strong>Special Guest</strong>&lt;br&gt;Mr. Mihskakwan James Harper, Clean Energy Leader, Sturgeon Lake Cree Nation, Treaty 8 Territory, Canada</td>
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<td><strong>Opening remarks by the High-Level Dialogue on Energy Leadership</strong>&lt;br&gt;Mr. António Guterres, Secretary-General, United Nations (Video Message)&lt;br&gt;Mr. LIU Zhenmin, Under-Secretary-General for Economic and Social Affairs and Secretary-General of the High-level Dialogue&lt;br&gt;Mr. Achim Steiner, Administrator of the United Nations Development Programme (UNDP), UN-Energy Co-Chair and Dialogue Co-Chair&lt;br&gt;Ms. Damilola Ogunbiyi, Special Representative of the Secretary-General for Sustainable Energy for All, UN-Energy Co-Chair, Dialogue Co-Chair and Dialogue High-Level Champion</td>
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<td><strong>Energy Compact Showcases</strong>&lt;br&gt;Dr. Rajiv J. Shah, President, The Rockefeller Foundation&lt;br&gt;Mr. Per Heggenes, CEO, IKEA Foundation</td>
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<tr>
<td>09:30 – 11:30</td>
<td><strong>MINISTERIAL SEGMENT</strong></td>
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<td><strong>Master of Ceremonies</strong>&lt;br&gt;Ms. Damilola Ogunbiyi, Special Representative of the Secretary-General for Sustainable Energy for All, UN-Energy Co-Chair, Dialogue Co-Chair and Dialogue High-Level Champion</td>
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<td><strong>Our Vision, Our Future: Special Remarks from Youth Advocates</strong>&lt;br&gt;Mr. Mohamed Alhaj, Founder &amp; Director, Clean Energy 4 Africa</td>
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<td><strong>Opening remarks by Global Champions</strong>&lt;br&gt;H.E. Mr. Newton Kambala, Minister of Energy of the Republic of Malawi (4 min)&lt;br&gt;H.E. Mr. Frans Timmermans, Vice-President of the European Commission (4 min)&lt;br&gt;H.E. Mr. ZHANG Jianhua, Administrator of the National Energy Administration of the People’s Republic of China (4 min)&lt;br&gt;H.E. Mr. WASHIO Eiichiro, State Minister for Foreign Affairs of Japan (4 min)&lt;br&gt;H.E. Ms. Kitty van der Heijden, Vice Minister for International Cooperation of the Kingdom of the Netherlands (4 min)</td>
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</table>
— **H.E. Mr. Anatoly B. Yanovsky**, Deputy Minister of Energy of the Russian Federation (4 min)

— **Mr. Zachary Ayieko**, Chief Administrative Secretary, Ministry of Energy, Kenya (4 min)

— **Mr. Khalid M. Abuleif**, Senior Sustainability Advisor to HRH the Minister/ The Chief Negotiator, Climate Agreements Ministry of Energy, Saudi Arabia (4 min)

10:10 – 10:30

**Official Launch of Theme Report on Energy Access by the Co-lead Organizations of the Technical Working Group 1**

**Moderator:** Mr. Matthew Bishop, Senior Fellow, Brookings, and Former US Business Editor & New York Bureau Chief, The Economist

**Panel Discussion:** *(Davos-style interactive discussion)*

— **Mr. Achim Steiner**, Administrator of the United Nations Development Programme (UNDP)

— **Ms. Fekitamoeloa Katoa 'Utoikamanu**, Under Secretary-General and High Representative for the Least Developed Countries, Landlocked Developing Countries and Small Island Developing States (UN OHRLLS)

— **Mr. Pablo Fajnzylber**, Acting Infrastructure Vice President, World Bank

10:30 – 10:40

**Fire Side Chat**

An **Energy Compact conversation with Ms. Kate Brandt**, Chief Sustainability Officer, Google moderated by Mr. Matthew Bishop, Senior Fellow, Brookings, and Former US Business Editor & New York Bureau Chief, The Economist

10:40 – 11:27

**Remarks from Ministers and global leaders**

Remarks by:

— **H.E. Ms. Janine Alm Ericson**, State Secretary, Ministry of Foreign Affairs, Sweden (2-3 min)

**Leadership conversation** *(Davos-style interactive discussion)*

**Moderator:** Mr. Matthew Bishop, Senior Fellow, Brookings, and Former US Business Editor & New York Bureau Chief, The Economist

**Panel Discussions:**

— **Ms. Dymphna van der Lans**, CEO, Clean Cooking Alliance

— **Ms. Reema Nanavaty**, Director, Self-Employed Women’s Organization

— **Ms. Jacqueline Kimeu**, Coordinator, Alliance of Civil Society Organisations for Clean Energy Access

— **Mr. Chibunna Ogbonna**, Youth Advocate, Student Energy

11:27 – 11:30

**Closing remarks by Master of Ceremonies**

11:30 – 20:00

**SDG 7 ACTION ZONE SIDE EVENTS**

SIDE EVENTS: Promoting actions from Member States, youth, business, academia, CSOs, local governments and other stakeholders

*(List of side events is made available separately on the website for the Ministerial Thematic Forums)*
MINISTERIAL THEMATIC FORUM ON INNOVATION, TECHNOLOGY AND DATA FOR THE HIGH-LEVEL DIALOGUE ON ENERGY

22 JUNE 2021

CO-HOSTED BY:
Finland, Mauritius, Morocco, Russian Federation*

CO-CONVENED BY:
Dialogue Secretary-General and Dialogue Co-Chairs

IN PARTNERSHIP WITH CO-LEADS OF THE TECHNICAL WORKING GROUP 4:
FAO, UN-Habitat and UNIDO

*Supporting role
## Theme 4: Innovation, Technology and Data

### 06:00 – 7:00

**SDG 7 ACTION ZONE SIDE EVENTS**
SIDE EVENTS: Promoting actions from Member States, youth, business, academia, CSOs, local governments and other stakeholders
(List of side events is made available separately on the website for the Ministerial Thematic Forums)

### 07:05 – 07:15

**DAILY PROGRAMME OVERVIEW**
Ms. Bahareh Seyedi, Senior Sustainable Development Officer, Division for Sustainable Development Goals, UN DESA

### 07:15 – 07:39

**GLOBAL MULTI-STAKEHOLDERS DIALOGUE**
(parallel sessions)

<table>
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<tr>
<th>DATA SYSTEMS FOR SUSTAINABLE ENERGY</th>
<th>ENERGY INNOVATION AND TECHNOLOGY (I)</th>
<th>ENERGY INNOVATION AND TECHNOLOGY (II)</th>
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<tr>
<td>7:15 – 7:21 Opening remarks by the Co-Chairs: Mr. Riku Huttunen, Director General of Energy, Ministry of Economic Affairs and Employment Finland (3 min)</td>
<td>7:15 – 8:00 PANEL 1: Innovation and technology in the food sector Moderator: Mr. Zitouni Ould-Dada, Deputy Director, FAO Welcoming remarks: Ms. Ute Collier, Head of Policy, Renewable Energy Markets, IRENA Panel Discussions: (Davos-style moderated discussion) - Mr. Arnold Simwaba, Director, Ministry of Energy, Zambia - Mr. Ravindra Dolare, President, Ecozen Solutions Q&amp;A Session (5 min)</td>
<td>7:15 – 8:42 PANEL 1: Innovation and technology in the industry sector Moderator: Mr. Tareq Emtairah, Director, Energy Department, UNIDO Panel Discussions: (Davos-style moderated discussion) - Mr. Oleg Zhdaneev, Deputy Director General of the Federal State Budgetary Institution, Russian Energy Agency - Mr. Wei Huang, Director of Division, Department of Nuclear Energy, IAEA - Mr. Juha Erkkilä, Vice President - Group Sustainability, Excellence &amp; Reliability, Outokumpu - Mr. Dan Dorner, Head of Secretariat, Clean Energy Ministerial - Dr. Arunabha Ghosh, CEO, Council on Energy, Environment and Water Q&amp;A Session (5 min)</td>
</tr>
<tr>
<td>7:21 – 8:00 PANEL 1: Digitalization’s role in leading the transformation Moderator: Mr. Alois Mhlanga, Chief of Climate Technologies and Innovation, UNIDO Panel Discussions: (Davos-style moderated discussion) - Mr. Jussi Matilainen, Manager, R&amp;D, Fingrid - Ms. Reyna Ubeda, Project Officer, ITU - Mr. Mark Howells, Professor, Loughborough University and Imperial College, London - Ms. Melanie A. Kenderdine, Principal, Energy Futures Initiative Q&amp;A Session (5 min)</td>
<td>8:00 – 8:45 PANEL 2: Innovation and technology in the urban sectors Moderator: Mr. Vincent Kitio, Lead Urban Energy Solutions, Urban Basic Services Section, UN-HABITAT Panel Discussions: (Davos-style moderated discussion) - Mr. Matthew Jordan-Tank, Director, Sustainable Infrastructure Policy &amp;</td>
<td>8:42 – 8:45</td>
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<td>8:00 – 8:39</td>
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### 07:39 – 07:45

8:00 – 8:39 PANEL 1: Innovation and technology in the food sector Moderator: Mr. Zitouni Ould-Dada, Deputy Director, FAO Welcoming remarks: Ms. Ute Collier, Head of Policy, Renewable Energy Markets, IRENA Panel Discussions: (Davos-style moderated discussion) - Mr. Arnold Simwaba, Director, Ministry of Energy, Zambia - Mr. Ravindra Dolare, President, Ecozen Solutions Q&A Session (5 min)

### 07:45 – 07:50

8:00 – 8:39 PANEL 1: Innovation and technology in the food sector Moderator: Mr. Zitouni Ould-Dada, Deputy Director, FAO Welcoming remarks: Ms. Ute Collier, Head of Policy, Renewable Energy Markets, IRENA Panel Discussions: (Davos-style moderated discussion) - Mr. Arnold Simwaba, Director, Ministry of Energy, Zambia - Mr. Ravindra Dolare, President, Ecozen Solutions Q&A Session (5 min)

### 07:50 – 08:00

8:00 – 8:39 PANEL 1: Innovation and technology in the food sector Moderator: Mr. Zitouni Ould-Dada, Deputy Director, FAO Welcoming remarks: Ms. Ute Collier, Head of Policy, Renewable Energy Markets, IRENA Panel Discussions: (Davos-style moderated discussion) - Mr. Arnold Simwaba, Director, Ministry of Energy, Zambia - Mr. Ravindra Dolare, President, Ecozen Solutions Q&A Session (5 min)

### 08:00 – 08:05

8:00 – 8:39 PANEL 1: Innovation and technology in the food sector Moderator: Mr. Zitouni Ould-Dada, Deputy Director, FAO Welcoming remarks: Ms. Ute Collier, Head of Policy, Renewable Energy Markets, IRENA Panel Discussions: (Davos-style moderated discussion) - Mr. Arnold Simwaba, Director, Ministry of Energy, Zambia - Mr. Ravindra Dolare, President, Ecozen Solutions Q&A Session (5 min)

### 08:05 – 08:10

8:00 – 8:39 PANEL 1: Innovation and technology in the food sector Moderator: Mr. Zitouni Ould-Dada, Deputy Director, FAO Welcoming remarks: Ms. Ute Collier, Head of Policy, Renewable Energy Markets, IRENA Panel Discussions: (Davos-style moderated discussion) - Mr. Arnold Simwaba, Director, Ministry of Energy, Zambia - Mr. Ravindra Dolare, President, Ecozen Solutions Q&A Session (5 min)

### 08:10 – 08:15

8:00 – 8:39 PANEL 1: Innovation and technology in the food sector Moderator: Mr. Zitouni Ould-Dada, Deputy Director, FAO Welcoming remarks: Ms. Ute Collier, Head of Policy, Renewable Energy Markets, IRENA Panel Discussions: (Davos-style moderated discussion) - Mr. Arnold Simwaba, Director, Ministry of Energy, Zambia - Mr. Ravindra Dolare, President, Ecozen Solutions Q&A Session (5 min)

### 08:15 – 08:20

8:00 – 8:39 PANEL 1: Innovation and technology in the food sector Moderator: Mr. Zitouni Ould-Dada, Deputy Director, FAO Welcoming remarks: Ms. Ute Collier, Head of Policy, Renewable Energy Markets, IRENA Panel Discussions: (Davos-style moderated discussion) - Mr. Arnold Simwaba, Director, Ministry of Energy, Zambia - Mr. Ravindra Dolare, President, Ecozen Solutions Q&A Session (5 min)

### 08:20 – 08:25

8:00 – 8:39 PANEL 1: Innovation and technology in the food sector Moderator: Mr. Zitouni Ould-Dada, Deputy Director, FAO Welcoming remarks: Ms. Ute Collier, Head of Policy, Renewable Energy Markets, IRENA Panel Discussions: (Davos-style moderated discussion) - Mr. Arnold Simwaba, Director, Ministry of Energy, Zambia - Mr. Ravindra Dolare, President, Ecozen Solutions Q&A Session (5 min)

### 08:25 – 08:30

8:00 – 8:39 PANEL 1: Innovation and technology in the food sector Moderator: Mr. Zitouni Ould-Dada, Deputy Director, FAO Welcoming remarks: Ms. Ute Collier, Head of Policy, Renewable Energy Markets, IRENA Panel Discussions: (Davos-style moderated discussion) - Mr. Arnold Simwaba, Director, Ministry of Energy, Zambia - Mr. Ravindra Dolare, President, Ecozen Solutions Q&A Session (5 min)

### 08:30 – 08:35

8:00 – 8:39 PANEL 1: Innovation and technology in the food sector Moderator: Mr. Zitouni Ould-Dada, Deputy Director, FAO Welcoming remarks: Ms. Ute Collier, Head of Policy, Renewable Energy Markets, IRENA Panel Discussions: (Davos-style moderated discussion) - Mr. Arnold Simwaba, Director, Ministry of Energy, Zambia - Mr. Ravindra Dolare, President, Ecozen Solutions Q&A Session (5 min)

### 08:35 – 08:40

8:00 – 8:39 PANEL 1: Innovation and technology in the food sector Moderator: Mr. Zitouni Ould-Dada, Deputy Director, FAO Welcoming remarks: Ms. Ute Collier, Head of Policy, Renewable Energy Markets, IRENA Panel Discussions: (Davos-style moderated discussion) - Mr. Arnold Simwaba, Director, Ministry of Energy, Zambia - Mr. Ravindra Dolare, President, Ecozen Solutions Q&A Session (5 min)

### 08:40 – 08:45

8:00 – 8:39 PANEL 1: Innovation and technology in the food sector Moderator: Mr. Zitouni Ould-Dada, Deputy Director, FAO Welcoming remarks: Ms. Ute Collier, Head of Policy, Renewable Energy Markets, IRENA Panel Discussions: (Davos-style moderated discussion) - Mr. Arnold Simwaba, Director, Ministry of Energy, Zambia - Mr. Ravindra Dolare, President, Ecozen Solutions Q&A Session (5 min)
PANEL 2: Better data for low carbon energy  
Moderator:  
Mr. Leonardo Souza, Chief, Energy Statistics Section, UN Statistics Division  
Panel Discussions: (Davos-style moderated discussion)  
- Ms. Heidi Krohns-Välimäki, Research Manager, Smart Energy and Built Environment, VTT Technical Research Centre of Finland  
- Ms. Nithya Ramanathan, Chief Executive Officer and Co-founder, Nexleaf Analytics  
- Mr. Michael Wilkinson, Chief Product Officer, Utopus Insights  
- Mr. Mikhail Gitarskiy, Head of the Division, Department of Sustainable Development of the Fuel and Energy Complex, Russian Energy Agency  
Q&A Session (5 min)  

8:39 – 8:45  
Conclusion and way forward by the Co-Chairs:  
Ms. Helena Sarén, Head, Smart Energy Business, Finland (3 min)  

09:00 – 11:00  
MINISTERIAL SEGMENT  

9:00 – 9:03  
Master of Ceremonies  
- Mr. San Rahi, Executive Vice President, Growth & Innovation, Sid Lee  

9:03 – 9:07  
Our Vision, Our Future: Special Remarks from a Youth Advocate  
- Mr. Vijjasena Sugiono, Chair, US National Student Energy Consortium  

9:07 – 9:20  
Opening remarks by Global Champions  

Conclusion and way forward by the Co-Chairs:  
Mr. Oleg Zhdaneev, Deputy Director General of the Federal State Budgetary Institution, Russian Energy Agency (3 min)  

Advanced unedited version
— H.E. Mr. Mika Lintilä, Minister for Economic Affairs of Finland (4 min)
— H.E. Mr. Mohammed Ghazali, Secretary-General of the Department of Energy and Mines, Morocco (4 min)
— Dr. P.M.K. Soonarane, Director Technical Services, Ministry of Energy and Public Utilities, Mauritius (4 min)

9:20 – 9:40
**Official Launch of Theme Report on Innovation, Technology and Data by the Co-lead Organizations of the Technical Working Group 4**

**Moderator:** Mr. San Rahi, Executive Vice President, Growth & Innovation, Sid Lee

**Panel Discussion:** *(Davos-style interactive discussion)*

— Ms. Maimunah Mohd Sharif, Executive Director of the United Nations Human Settlements Programmed (UN-Habitat)
— Mr. Li Yong, Director General of the UN Industrial Development Organization (UNIDO)
— Ms. Ismahane Elouafi, Chief Scientist, of the Food and Agriculture Organization of the UN (FAO)

9:40 – 10:05
**Energy Compact Showcases**

— Ms. Shirley Rodrigues, Deputy Mayor of London for Environment and Energy/ Member, C40 Board (2-3 min)
— Ms. Arantxa Tapia, Regional Counsellor for Economic Development, Sustainability and Environment, Basque Country (2-3 min)
— Dr. Arvind Bodhankar, Chief Sustainability Officer, Ultratech Cement (2-3 min)
— Mr. RBM Tripathy, President, Operations, JK Cement (2-3 min)

10:05 – 10:57
**Remarks from Ministers and global leaders**

Remarks by:

— H.E. Ms. Aminath Shauna, Minister of Environment, Climate Change and Technology, Maldives (2-3 min)
— H.E Mr. Raymond Ghajar, Minister, Ministry of Energy and Water, Lebanon (2-3 min)
— H.E. Dr. Ith Praing, Permanent Secretary of State, Ministry of Mines and Energy, Cambodia (2-3 min)
— Mr. Salvador Handal, Executive Secretary, National Energy Council, El Salvador (2-3 min)

**Leadership conversation** *(Davos-style interactive discussion)*

**Moderator:** Mr. San Rahi, Executive Vice President, Growth & Innovation, Sid Lee

**Panel Discussions:**

— Dr. Angela Wilkinson, Secretary- General and CEO, World Energy Council
— Mr. Feng An, Founder and Executive Director, Innovation Center for Energy and
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<td>10:57 – 11:00</td>
<td>Closing remarks by Master of Ceremonies</td>
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<td>11:30 – 20:00</td>
<td>SDG 7 ACTION ZONE SIDE EVENTS</td>
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<td>SIDE EVENTS: Promoting actions from Member States, youth, business, academia, CSOs, local governments and other stakeholders</td>
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<td>(List of side events is made available separately on the website)</td>
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- **Mr. Robert Stoner,** Deputy Director, MIT Energy Initiative/ Director, Tata Center for Technology and Design
- **Ms. Kayla Choi,** Youth Advocate, Student Energy
MINISTERIAL THEMATIC FORUM ON ENERGY TRANSITION
FOR THE HIGH-LEVEL DIALOGUE ON ENERGY

23 JUNE 2021

CO-HOSTED BY:
Brazil, Chile, Colombia, Denmark, Germany, India, Nigeria, Poland,
Spain, United Kingdom

CO-CONVENED BY:
Dialogue Secretary-General and Dialogue Co-Chairs

IN PARTNERSHIP WITH CO-LEADS OF THE TECHNICAL WORKING GROUP 2:
IRENA, UN ESCAP and UNEP

Advanced unedited version
### Theme 2: Energy Transition

#### 06:00 – 07:00
**SDG 7 ACTION ZONE SIDE EVENTS**  
SIDE EVENTS: Promoting actions from Member States, youth, business, academia, CSOs, local governments and other stakeholders  
(List of side events is made available separately on the website for the Ministerial Thematic Forums)

#### 07:05 – 07:15
**DAILY PROGRAMME OVERVIEW**  
Mr. Martin Niemetz, Sustainable Development Officer, Division for Sustainable Development Goals, UN DESA

#### 07:15 – 08:45
**GLOBAL MULTI-STAKEHOLDERS DIALOGUE** (parallel sessions)

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<tr>
<th>SCALING UP RENEWABLE ENERGY</th>
<th>TECHNOLOGY SOLUTIONS AND INNOVATION ON RENEWABLE ENERGY AND ENERGY EFFICIENCY</th>
<th>PARTNERSHIP AND COOPERATION FOR THE ENERGY TRANSITION</th>
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<tr>
<td>7:15 – 7:21 Opening remarks by the Co-Chairs: Mr. Indu Shekhar Chaturvedi, Vice-Minister of the Ministry of New and Renewable Energy, India (3 min) Dr. Juergen Zattler, Director General, International Development policy, 2030 Agenda, Federal Ministry for Economic Cooperation and Development, Germany (3 min) 7:21 – 8:00 PANEL 1: Harnessing renewable energy potentials worldwide for socio-economic resilience and equity Moderator: Ms. Elizabeth Press, Director of Planning and Programme Support, IRENA Panel Discussions: (Davos-style moderated discussion)</td>
<td>7:15 – 7:21 Opening remarks by the Co-Chairs: Ms. Kate Hughes, Director, International Climate and Energy, Department for Business, Energy and Industrial Strategy, United Kingdom (3 min) Mr. Francisco Javier Lopez, Undersecretary, Ministry of Energy, Chile (3 min) 7:21 – 8:02 PANEL 1: Opportunities &amp; challenges for the acceleration of energy efficiency expansion Moderator: Ms. Gabriela Prata Dias, Head, Copenhagen Centre on Energy Efficiency Panel Discussions: (Davos-style moderated discussion) - Mr. Gabriel Prudencio, Head of Sustainable Energy Division, Ministry of Energy, Chile - Mr. Kofi Agyarko,</td>
<td>7:15 – 7:21 Opening remarks by the Co-Chairs: Mr. Asser Berling, Head of Department, Centre for Global Climate Action, Ministry for Climate, Energy and Utilities, Denmark (3 min) H.E. Mr. Goddy Jedy Agba, Minister of State for Power, Nigeria (3 min) 7:21 – 8:00 PANEL 1: From coal to clean: Energy transition strategies to match short term actions with long-term objectives Moderator: Mr. Michael Williamson, Section Chief, Energy Division, UN ESCAP Panel Discussions: (Davos-style moderated discussion) - Ms. Ida Krabek, Head of Global Sustainability, Ørsted, Denmark - Mr. Mele Kyari, Group Managing Director of Nigerian National Petroleum Corporation - Dr. Bill Hare, CEO, Climate</td>
</tr>
</tbody>
</table>
- **Dr. Sascha Thielmann**, Head of Sector Program Energy Cooperation and Regulatory Policy, GIZ, Germany
- **Mr. Dinesh Dayanand Jagdale**, Director General, International Relations, Ministry of New and Renewable Energy, India
- **Mr. Daniele Agostini**, Head of Low Carbon and Energy Policies, Enel
- **Ms. Rana Adib**, Executive Secretary, REN21

**Q&A Session (5 min)**

8:00 – 8:39

**PANEL 2: Capacity building to accelerate renewable energy deployment in industry and transport**

**Moderator:**
- Ms. Ulrike Lehr, Head of Policy, Socioeconomics, IRENA

**Panel Discussions:** *(Davos-style moderated discussion)*

- **Mr. Julián Antonio Rojas**, Head of Regulatory and Entrepreneurial Affairs - Ministry of Mines and Energy, Colombia
- **Dr. Plinio Nastari**, Founder, IBIO Institute and DATAGRO, Brazil
- **Ms. Sheila Watson**, Director of Environment and Research, FiA Foundation
- **Ms. Rana Ghoneim**, Director, Renewable Energy, Energy Efficiency and Climate Change, Ghana Energy Commission
- **Mr. Ricardo Ranieri Bernard**, Professor, Pontificia Universidad Católica de Chile
- **Ms. Jennifer Layke**, Global Director, Energy Program, World Resources Institute

**Q&A Session (5 min)**

8:02 – 8:42

**PANEL 2: Emerging technologies for a sustainable energy future: offshore wind and green hydrogen**

**Moderator:**
- **Mr. Scott Foster**, Director, Sustainable Energy Division, UNECE

**Panel Discussions:** *(Davos-style moderated discussion)*

- **Ms. Monika Morawiecka**, Chairman of the Board, PGE Baltica
- **Ms. Nguy Thi Khanh**, Executive Director, Green Innovation and Development Centre, Vietnam
- **Mr. Miguel Ángel Muñoz Rodriguez**, Head of Climate Policies and Alliances, IBERDROLA

**Q&A Session (5 min)**

8:00 – 8:39

**PANEL 2: International cooperation and regional integration to advance the energy transition**

**Moderator:**
- **Mr. Mark Radka**, Deputy Director, Economy Division, UNEP

**Panel Discussions:** *(Davos-style moderated discussion)*

- **Mr. Vladislav Kaim**, Member of the UN Secretary General’s Youth Advisory Group on Climate Change
- **Mr. Youba Sokona**, Vice Chair, IPCC/The South Centre
- **Mr. Edmond Alphandéry**, Founder and Chairman of the Euro50 Group, Chairman of the Task Force on Carbon Pricing in Europe, Former Finance Minister of France

**Q&A Session (5 min)**

8:39 – 8:45

**Conclusion and way forward by the Co-Chairs:**
- **Ms. Laura Martín Murillo**, Director, Just Transition Institute, Spain (3 min)
- **Mr. Kabir Yusuf**, Technical Adviser on Energy and Emission, Ministry of Environment, Nigeria (3 min)
### Chief, Energy Systems and Infrastructure Division, UNIDO
- **Mr. Jamshyd Godrej**, MD & Chairman at Godrej & Boyce, India

### Q&A Session (5 min)

8:39 – 8:45
Conclusion and way forward by the Co-Chairs:
- **Ms. Faryde Carlier**, Director of Economic, Social and Environmental Affairs - Ministry of Foreign Affairs, Colombia (3 min)
- **Ms. Agnes de Costa**, Senior Officer, Ministry of Energy, Brazil (3 min)

### 09:00 – 11:00

#### MINISTERIAL SEGMENT

9:00 – 9:03
**Master of Ceremonies**
- **Mr. Achim Steiner**, Administrator of the United Nations Development Programme (UNDP), UN-Energy Co-Chair and Dialogue Co-Chair

9:03 – 9:07
**Our Vision, Our Future: Special Remark from Youth Advocates**
- **Mr. John Leo Algo**, Deputy Executive Director for Programs and Campaigns, Living Laudato Si’ Philippines

9:07 – 9:46
**Opening remarks by Global Champions**
- **H.E. Mr. Diego Mesa Puyo**, Minister of Mines and Energy of the Republic of Colombia (4 min)
- **H.E. Mr. Dan Jorgensen**, Minister for Climate, Energy and Utilities of Denmark (4 min)
- **H.E. Mr. Mohammad Mahmod Abubakar**, Minister of Environment of the Federal Republic of Nigeria (4 min)
- **H.E. Mr. Bento Albuquerque**, Minister of Mines and Energy of the Federative Republic of Brazil (4 min)
- **H.E. Mr. Gerd Müller**, Federal Minister for Economic Cooperation and Development of the Federal Republic Germany (4 min)
9:46 – 10:06
Official Launch of Theme Report on Energy Transition by the Co-lead Organizations of the Technical Working Group 2

Moderator: Ms. Elise Labott, Columnist, Foreign Policy
Panel Discussion: (Davos-style interactive discussion)

— Mr. Francesco La Camera, Director-General, International Renewable Energy Agency (IRENA)
— Ms. Inger Andersen, Executive Director of the United Nations Environment Programme (UNEP)
— Ms. Armida Salsiah Alisjahbana, Executive Secretary of the United Nations Economic and Social Commission for Asia and the Pacific (UN ESCAP)

10:06 – 10:16
Fire Side Chat
A conversation with Mr. Francesco Starace, CEO, ENEL, moderated by Mr. Randall Lane, Chief Content Officer, Forbes Media

10:16 – 10:26
Energy Compact Showcases

Moderator: Mr. Alexander Trepelkov, Officer-in-Charge, Division for Sustainable Development, UN DESA

— Green Hydrogen [Denmark, Germany, IRENA, Race to Zero, WEF]
  Mr. Francesco La Camera, Director-General, International Renewable Energy Agency (IRENA) (2-3 min)
— Alliance for Rural Electrification
  Mr. David Lecoque, CEO, ARE (2-3 min)
— RELAC [Colombia, Chile, Dominican Republic, IDB]
  Ms. Alejandra Bernal, Head of International Affairs of the Ministry of Mines and Energy, Colombia (2-3 min)

10:26 – 11:00
Remarks from Ministers and global leaders

Moderator: Mr. Alexander Trepelkov, Officer-in-Charge, Division for Sustainable Development, UN DESA

Remarks by:
— H.E. Mr. Udaya Gammanipila, Minister of Energy, Sri Lanka (2-3 min)
| 11:30 – 20:00 | **SDG 7 ACTION ZONE SIDE EVENTS**  
SIDE EVENTS: Promoting actions from Member States, youth, business, academia, CSOs, local governments and other stakeholders  
(List of side events is made available separately on the website for the Ministerial Thematic Forums) |
MINISTERIAL THEMATIC FORUM ON
ENABLING SDGs THROUGH
INCLUSIVE, JUST ENERGY
TRANSITIONS

FOR THE HIGH-LEVEL DIALOGUE ON ENERGY

24 JUNE 2021

CO-HOSTED BY:
European Union*, Iceland, Honduras, Nauru, Panama, Portugal, United
Arab Emirates

CO-CONVENED BY:
Dialogue Secretary-General and Dialogue Co-Chairs

IN PARTNERSHIP WITH CO-LEADS OF THE TECHNICAL
WORKING GROUP 3:
UN DESA, UN ESCWA and WHO

*Supporting role
## Thursday 24 June

### Theme 3: Enabling SDGs through Inclusive, just Energy Transitions

<table>
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<th>Time</th>
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</table>
| 06:00 – 07:00 | **SDG 7 ACTION ZONE SIDE EVENTS**  
SIDE EVENTS: Promoting actions from Member States, youth, business, academia, CSOs, local governments and other stakeholders  
(List of side events is made available separately on the website for the Ministerial Thematic Forums) |
| 07:05 – 07:15 | **DAILY PROGRAMME OVERVIEW**  
Ms. Bahareh Seyedi, Senior Sustainable Development Officer, Division for Sustainable Development Goals, UN DESA |
| 07:15 – 08:45 | **GLOBAL MULTI-STAKEHOLDERS DIALOGUE**  
(parallel sessions) |

#### EMPOWERING PEOPLE: ACCELERATING SDG7 ACHIEVEMENT IN SUPPORT OF HUMAN HEALTH, GENDER EQUALITY, AND EDUCATION

<table>
<thead>
<tr>
<th>Time</th>
<th>Event Description</th>
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</table>
| 7:15 – 7:18 | Opening remarks by the Co-Chairs:  
Mr. Reagan Moses, Secretary for Climate Change & National Resilience, Ministry of Environment, Nauru (3 min) |
| 7:18 – 7:46 | **PANEL 1: Energy and health**  
Moderator:  
Dr. Maria Neira, Director, WHO  
Panel Discussions:  
(Davos-style moderated discussion) |
  - Mr. Solomon Nzioka, National Professional Officer, WHO Kenya Country Office  
  - Dr. Ligia Castro de Doens, Former Minister of  
| 7:21 – 7:48 | **PANEL 1: Energy and jobs**  
Moderator:  
Mr. Moustapha Kamal Gueye, Coordinator at ILO  
Panel Discussions:  
(Davos-style moderated discussion) |
  - Dr. Eloy Fisher Hogan, General Secretary of the Ministry of Economy and Finance of Panama  
  - Mr. Ricardo Espino, President of the Panama |

#### ENHANCING PROSPERITY: ACCELERATING SDG7 ACHIEVEMENT IN SUPPORT OF JUST, INCLUSIVE SOCIETIES

<table>
<thead>
<tr>
<th>Time</th>
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</table>
| 7:15 – 7:21 | Opening remarks by the Co-Chairs:  
H.E. Mr. Jorge Rivera Staff, National Secretary of Energy of the Republic of Panama (3 min)  
Ms. Anna Hjartardóttir, Deputy Director General, International Affairs and Development Cooperation, Ministry for Foreign Affairs, Iceland (3 min) |
| 7:21 – 7:48 | **PANEL 1: Energy and jobs**  
Moderator:  
Mr. Moustapha Kamal Gueye, Coordinator at ILO  
Panel Discussions:  
(Davos-style moderated discussion) |
  - Dr. Eloy Fisher Hogan, General Secretary of the Ministry of Economy and Finance of Panama  
  - Mr. Ricardo Espino, President of the Panama |

#### PROTECTING THE PLANET: INTEGRATED PLANNING AND CROSS-SECTORAL COORDINATION FOR SUSTAINABLE DEVELOPMENT

<table>
<thead>
<tr>
<th>Time</th>
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</table>
| 7:15 – 7:18 | Opening remarks by the Co-Chairs:  
Dr. Miguel Figueroa, General Director of Electricity and Markets, Ministry of Energy, Honduras (3 min) |
| 7:18 – 7:46 | **PANEL 1: Pathways towards net zero emissions**  
Moderator:  
Ms. Roula Majdalani, Lead Climate Change and Natural Resource Sustainability Cluster, UNESCWA  
Panel Discussions:  
(Davos-style moderated discussion) |
  - HRH. Princess. Noura Al-Saud, Partner and co-founder AEON Strategy, Saudi Arabia  
  - Mr. Massamba Thiyoue, Manager, Mitigation Division, UNFCCC  
  - Ms. Roberta Boscolo, Lead of Climate & Energy, |
<table>
<thead>
<tr>
<th>Time</th>
<th>Panel 2: Energy and gender</th>
<th>Moderator</th>
<th>Panel Discussions: (Davos-style moderated discussion)</th>
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<tr>
<td>Q&amp;A Session (5 min)</td>
<td>Future Energy Leaders - Mr. Roberto Suarez Santos, Secretary General, International Organization of Employers - Mr. Chuck Hookham, Executive Director, CMS Energy, United States - Mr. Michael Renner, Programme Officer, IRENA</td>
<td></td>
<td>Q&amp;A Session (5 min)</td>
</tr>
</tbody>
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7:48 – 8:15
PANEL 2: Promoting the diversification and framework of a circular economy
Moderator: Ms. Merlyn Van Voore, Head of Secretariat, International Resource Panel, Economy Division, UNEP
Panel Discussions: (Davos-style moderated discussion)
- Mr. João Oliveira Miguel, Administrator, Águas de Portugal
- Mr. Mohammed Alsayed, Manager Economic Infrastructure Division Economic and Social Infrastructure Department Islamic Development Bank Group
- Dr. Bassam Fattouh, Director Studies, Oxford Energy Studies Institute
- Mr. Isaac Berzin, CTO, VAXA
Q&A Session (5 min)
8:15 – 8:42
PANEL 3: Private Sector and entrepreneurship
Moderator: WMO
- Ms. Hajar Khamlichi, President, The Mediterranean Youth Climate Network, Morocco
- Mr. Grammenos Mastrojeni, Senior Deputy Secretary General of the Union for the Mediterranean, Energy and Climate Action Division
Q&A Session (5 min)
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<td>09:00</td>
<td>MINISTERIAL SEGMENT</td>
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<tr>
<td>9:00</td>
<td>Master of Ceremonies</td>
<td>Dr. Kandeh Yumkella, CEO, TENN</td>
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<td>9:03</td>
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**PANEL 3: Energy and Education**

**Moderator:** Dr. Jon-Hans Coetzer, Team Leader, Online Learning and Education, UNITAR

**Panel Discussions:** (Davos-style moderated discussion)
- **Dr. Behjat Al Yousuf,** Executive Vice President for Outreach and Engagement, Mohamed bin Zayed University of Artificial Intelligence, UAE
- **Ms. Rakshya Thapa,** Climate and Energy Specialist, UNICEF
- **Ms. Asma Rouabhia,** Sustainability Young Arab Leader for UNESCO
- **Dr. Hazir Farouk Abdelraheem El Haj,** Associate Professor in Mechanical Engineering Sudan University of Science & Technology, Khartoum, Sudan

**Q&A Session** (5 min)

8:42 – 8:45
Conclusion and way forward by the Co-Chairs:
**Ms. Anna Kruij,** Manager, Environment and Climate, UN Global Compact
**Mr. Nazmul Haque,** Director, Investment/Head of Advisory, IDCOL
**Ms. Shefali Kothari,** Strategist and Investor Relations, Village Data Analytics
**Mr. Adam Kendall,** Partner, McKinsey

8:42 – 8:45
Conclusion and way forward by the Co-Chairs:
**Ms. Paula Cristina Gomes,** Directorate of Energy Sustainability, Ministry of Environment and Climate Action, Portugal (3 min)

**and communities**

**Moderator:** Mr. David Koranyi, Senior Energy Expert, UN DESA

**Panel Discussions:** (Davos-style moderated discussion)
- **Mr. Eero Ailio,** Advising Senior Management on Clean Energy Transition and Related Topics, Directorate-General for Energy, European Commission
- **Mr. Kazuhiko Takeuchi,** President, IGES
- **Ms. Cherop Soy,** Thematic Focal Point, UNMGCY SDG7 Youth Constituency
- **Mr. Rohit Sen,** Head of Climate & Energy Action Team, ICLEI World Secretariat, Germany

**Q&A Session** (5 min)

8:42 – 8:45
Conclusion and way forward by the Co-Chairs:
**Mr. Pedro Ballesteros,** Senior Administrator, Directorate-General for Energy, European Commission (3 min)
Our Vision, Our Future: Special Remarks from Youth Advocates
— Ms. Kervelle Baird, SDG 7 Youth Constituency

9:07 – 09:35
Opening remarks by Global Champions
— H.E. Mr. Roberto A. Ordoñez Wolfovich, Minister of Energy of Honduras (4 min)
— H.E. Mr. Gudlaugur Thór Thórdarson, Minister for Foreign Affairs and International Development Cooperation of Iceland (4 min)
— H.E. Mr. Rennier Gadabu, Minister for Climate Change of the Republic of Nauru (4 min)
— H.E. Mr. Abdulllah Bin Mohammed Belhaif Al Nuaimi, Minister of Climate Change and Environment of the United Arab Emirates (4 min)
— H.E. Mr. João Galamba, Deputy Minister and Secretary of State for Energy, Portugal (4 min)
— H.E. Mr. Jorge Rivera Staff, National Secretary of Energy of the Republic of Panama (4 min)
— H.E. Ms. Kadri Simson, European Commissioner for Energy (4 min)

9:35 – 9:55
Official Launch of Theme Report on Enabling SDGs through Inclusive, just Energy Transitions by the Co-lead Organizations of the Technical Working Group 3

Moderator: Dr. Kandeh Yumkella, CEO, TENN
Panel Discussion: (Davos-style interactive discussion)
— Mr. LIU Zhenmin, Under-Secretary-General for Economic and Social Affairs (UN DESA)
— Ms. Rola Dashti, Executive Secretary of the UN Economic and Social Commission for Western Asia (UN ESCWA)
— Dr. Tedros Adhanom Ghebreyesus, Director-General, World Health Organization (WHO)

9:55 – 10:10
Fire Side Chat
A conversation with Mr. Omran Hamad Al-Kuwari, CEO, Qatar Foundation International, moderated by Dr. Kandeh Yumkella, CEO, TENN

10:10 – 10:25
Energy Compact Showcases
— Mr. Svante Myrick, Mayor, City of Ithaca (2-3 min)
— Mr. Patrick Tonui, Head of Policy, GOGLA (2-3 min)
— Mr. Ivan Vera, Senior Energy Advisor, on behalf of the Global Sustainable Water and
### Energy Solutions Network (facilitated by UN DESA) (2-3 min)

10:25 – 10:57

**Remarks from Ministers and global leaders**

**Moderator:** Dr. Kandeh Yumkella, CEO, TENN

**Remarks by:**
- **H.E. Dr. Eng Seleshi Bekele**, Minister for Water, Irrigation and Energy, Ethiopia (2-3 min)
- **H.E. Mr. Eamon Ryan TD**, Minister for of the Environment, Climate and Communications, Ireland (2-3 min)
- **H.E. Mr. Abdessalam Ould Mohamed Salah**, Minister, Ministry of Petroleum, Energy and Mining, Mauritania (2-3 min)
- **Dr. Javier Papa**, Undersecretary of Energy Planning, Energy Secretariat of the Argentine Republic (2-3 min)
- **Prof. Petteri Taalas**, Secretary-General, WMO (2-3 min)

**Leadership conversation** *(Davos-style interactive discussion)*

**Panel Discussions:**
- **Mr. Hans Olav Ibrekk**, Special Envoy for Climate and Security, Norway
- **Mr. Miguel Stilwell de Andrade**, CEO, Energias de Portugal
- **Ms. Sheila Oparaocha**, Coordinator, ENERGIA
- **Ms. Kristina Skierka**, CEO, Power for All
- **Mr. Shakti Ramkumar**, Youth Advocate, Student Energy

10:57 – 11:00

**Closing remarks by Master of Ceremonies**

### 11:30 – 20:00

**SDG 7 ACTION ZONE SIDE EVENTS**

SIDE EVENTS: Promoting actions from Member States, youth, business, academia, CSOs, local governments and other stakeholders

*(List of side events is made available separately on the website for the Ministerial Thematic Forums)*
MINISTERIAL THEMATIC FORUM ON FINANCE AND INVESTMENT
FOR THE HIGH-LEVEL DIALOGUE ON ENERGY

25 JUNE 2021

CO-HOSTED BY:
Dominican Republic, Italy, Netherlands*, Pakistan, Saudi Arabia*

CO-CONVENED BY:
Dialogue Secretary-General and Dialogue Co-Chairs

IN PARTNERSHIP WITH CO-LEADS OF THE TECHNICAL WORKING GROUP 5:
EIB, IEA, IFC and UN ECA

*Supporting role
### Theme 5: Finance and Investment

**06:00 – 07:00**

**SDG 7 ACTION ZONE SIDE EVENTS**
SIDE EVENTS: Promoting actions from Member States, youth, business, academia, CSOs, local governments and other stakeholders

*List of side events is made available separately on the website for the Ministerial Thematic Forums*

**07:05 – 07:15**

**DAILY PROGRAMME OVERVIEW**
Mr. David Koranyi, Senior Energy Expert, UN DESA

**07:15 – 08:45**

**GLOBAL MULTI-STAKEHOLDERS DIALOGUE**
(parallel sessions)

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<th>LEAVING NO ONE BEHIND: INCLUSIVE AND SUSTAINABLE RECOVERY</th>
<th>FINANCING THE GLOBAL CLIMATE AND ENERGY GOALS</th>
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<tr>
<td>7:15 – 7:21 Opening remarks by the Co-Chairs: Ms. Sarah Ashour, First Secretary, Head of the Economic and Financial (Second) Committee, Permanent Mission of Saudi Arabia to the United Nations (3 min) Mr. Nicola Bazzani, Deputy Head of the Office for Energy, Environment and Sustainability, Ministry of Foreign Affairs and International Cooperation, Italy (3 min)</td>
<td>7:15 – 7:18 Opening remarks by the Co-Chairs: Dr. Sardar Mohazzam, Managing Director, National Energy Efficiency and Conservation Authority, Pakistan (3 min)</td>
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<tr>
<td>7:21 – 8:01 PANEL 1: Advancing SDG7 through sustainable COVID-19 recoveries Moderator: Mr. Jean-Paul Adam, Director, Technology, Climate Change and Natural Resources Management, ECA Panel Discussions: (Davos-style moderated discussion) - Ms. Teddy Mpinganzima Mugabo, CEO, FONERWA - Ms. Ishita Yadav, Climate Action Buddies, India - Ms. Leslie Labruto, Head of Global Energy, Acumen - Mr. Abyd Karmali, Managing Director for Climate Finance, Bank of America - Mr. Tim Scott, Senior Policy Advisor, UNDP</td>
<td>7:18 – 7:46 PANEL 1: Financing for adaptation Moderator: Mr. Alan Miller, Expert on Private Sector Engagement and Climate Adaptation, UNDP Panel Discussions: (Davos-style moderated discussion) - H.E. Mr. Alfonso Rodríguez, Deputy Minister, Energy Saving and Efficiency, Ministry of Energy and Mines, Dominican Republic - Mr. Filippo Berardi, Coordinator – Climate Change Focal Area, Global Environment Facility - Mr. Irfan Tariq, Director General, Environment and Climate Change, Ministry of Climate Change, Pakistan - Mr. Espen Mehlum, Head of Knowledge Management and Integration Energy, Materials and Infrastructure Platform - Ms. Hong Paterson, CFO and Director, Support Services, Green Climate Fund - Mr. David Arinze, Program Officer, Off-Grid Energy Program, Diamond Development Initiatives, Nigeria</td>
</tr>
</tbody>
</table>
- Mr. Rigoberto Ariel Yepez-Garcia, Energy Division Chief, IADB

Q&A Session (5 min)

8:01 – 8:42

PANEL 2: Investment in clean energy technologies

Moderator:

Mr. Tim Gould, Head, Division for Energy Supply Outlooks and Investment, IEA

Panel Discussions: (Davos-style moderated discussion)

- Dr. Abdullah Alsubaie, Advisor on Clean Energy Technology, Ministry of Energy, KSA, Saudi Arabia
- Ms. Marina Pannekeet, Manager Energy, Southern and East Africa, FMO, the Netherlands
- Mr. Luca D’Agnese, Chief Energy and Digital Officer, Cassa Depositi e Prestiti, Italy
- Mr. Shah Jahan Mirza, Managing Director, Private Power and Infrastructure Board Pakistan
- Mr. Sumant Sinha, Chairman and CEO, Renew Power and Infrastructure Board Pakistan
- Ms. Cecilia Tam, Head, OECD Clean Energy Finance and Investment Mobilisation Programme
- Ms. Surabhi Visser, Head of Investments, SunFunder

Q&A Session (5 min)

8:42 – 8:45

Conclusion and way forward by the Co-Chairs:

Ms. Laurien Berkvens, Senior Policy Advisor, Ministry of Foreign Affairs, the Netherlands (3 min)

- Ms. Tara L. Guelig, Director of Sustainability and Impact, Lightsmith Group

Q&A Session (5 min)

7:46 – 8:14

PANEL 2: Accelerating sustainable finance through international cooperation and capacity building

Moderator:

Mr. Manuel Baritaud, Senior Economist, EIB

Panel Discussions: (Davos-style moderated discussion)

- Mr. Andrew Shaw, Head of Capacity Building, Dutch Development Bank, the Netherlands
- Ms. Valeria Termini, Professor of Political Economics, Università degli Studi di Roma Tre
- Ms. Hela Cheikhrouhou, Chair and Executive Officer, Nithio
- Ms. Stephanie Akinyelure, Engagement Manager, Group Sustainable Finance, HSBC Group Management Services Limited
- Ms. Shorouq Abdul Ghani, Director of Planning and Institutional Development, Ministry of Energy and Mineral Resources, Jordan

Q&A Session (5 min)

8:14 – 8:42

PANEL 3: Setting a global carbon price

Moderator:

Mr. Marcel Alers, Head of Energy, UNDP

Panel Discussions: (Davos-style moderated discussion)

- Mr. Irfan Tariq, Director General, Environment and Climate Change, Ministry of Climate Change, Pakistan
- Mr. Ruben Contreras, Economic Affairs Officer, ECLAC
- Dr. Bright Okogu, Chief of Staff, Office of Director General, World Trade Organization

Q&A Session (5 min)

8:42 – 8:45

Conclusion and way forward by the Co-Chairs:

H.E. Mr. Alfonso Rodríguez, Deputy Minister,
## MINISTERIAL SEGMENT

9:00 – 9:03
**Master of Ceremonies**

Mr. Hubert Danso, Chairman, Africa Investor (Ai), African Green Infrastructure Investment Bank Advisory Board (AfGIIB)

9:03 – 9:07
**Our Vision, Our Future: Special Remarks from Youth Advocates**

− Ms. Cathy Yitong Li, Foundraising Officer, COY16

9:07 – 09:27
**Opening remarks by Global Champions**

− H.E. Mr. Antonio Almonte, Minister of Energy and Mines of the Dominican Republic (4 min)
− H.E. Mr. Roberto Cingolani, Minister of Ecological Transition of Italy (4 min)
− H.E. Mr. Hammad Azhar, Federal Minister, Ministry of Energy of Pakistan (4 min)
− H.E. Ms. Yoka Brandt, Permanent Representative of the Netherlands to the United Nations (4 min)
− Mr. Khalid M. Abuleif, Senior Sustainability Advisor to HRH the Minister, The Chief Negotiator for the Climate Agreements, Ministry of Energy, Saudi Arabia (4 min)

09:27 – 09:47
**Official Launch of Theme Report on Finance and Investment by the Co-lead Organizations of the Technical Working Group 5**

Moderator: Mr. Hubert Danso, Chairman, Africa Investor (Ai), African Green Infrastructure Investment Bank Advisory Board (AfGIIB)

**Panel Discussion:** *(Davos-style interactive discussion)*

− Mr. Werner Hoyer, President of the European Investment Bank (EIB)
− Ms. Vera Songwe, Executive Secretary, United Nations Economic Commission for Africa (UN ECA)
− Ms. Stephanie von Friedeburg, Senior Vice President, Operations, IFC
− Ms. Mary Warlick, Deputy Executive Director of the International Energy Agency (IEA)

9:47 – 9:57
**Fire Side Chat**

A conversation with Mr. James Mwangi, Group Managing Director and Group Chief Executive Officer, Equity Group Holdings Plc.,
moderated by **Mr. Hubert Danso**, Chairman, Africa Investor (Ai), African Green Infrastructure Investment Bank Advisory Board (AfGIIB)

10:00 – 10:15

**Energy Compact Showcases**

- **Mr. Matthew Jordan-Tank**, Director, Sustainable Infrastructure Policy & Project Preparation, EBRD (2-3 min)
- **Student Energy:**
  - **Ms. Meredith Adler**, Executive Director
  - **Mr. Kabir Nadkarni**, Climate Finance Advisor
- **Mr. Mark Carrato**, Coordinator, Power Africa
- **Mr. Gurdeep Singh**, Chairman and Managing Director, NTPC Limited

10:15 – 10:57

**Remarks from Ministers and global leaders**

**Moderator: Mr. Hubert Danso**, CEO, Africa Investor

**Remarks by:**

- **H.E. Ms. Teresa Ribera**, Vice-President and Minister for the Ecological Transition and the Demographic Challenge, Spain (2-3 min)
- **HE. Mr. Gesler E. Murray**, Minister, Ministry of Mines and Energy, Republic of Liberia (2-3 min)
- **H.E. Mr. Charles I. Obichang**, Minister, Ministry of Public Infrastructure and Industries, Palau (2-3 min)
- **H.E. Mr. Nidal Karmousha**, Deputy Minister of Electricity, Syria (2-3 min)
- **Mr. Yannick Glemarec**, Executive Director, Green Climate Fund (2-3 min)

**Leadership conversation** *(Davos-style interactive discussion)*

**Panel Discussions:**

- **Ms. Hela Cheikhrouhou**, Chair and Executive Officer, Nithio
- **Dr. Wiebe Boer**, CEO of All On, Shell
- **Ms. Cristina Duarte**, Under-Secretary-General and Special Adviser on Africa
- **Ms. Oluwadabira Abiola-Awe**, Youth Advocate, Student Energy

10:57 – 11:00

**Closing remarks by Master of Ceremonies**
11:15 – 12:00

**Moderator:** Mr. Alexander Trepelkov, Officer-in-Charge, Division for Sustainable Development, UN DESA

**Closing remarks by the High-Level Dialogue on Energy Leadership**

— **Mr. Achim Steiner,** Administrator of the United Nations Development Programme (UNDP), UN-Energy Co-Chair and Dialogue Co-Chair

— **Ms. Damilola Ogunbiyi,** Special Representative of the Secretary-General for Sustainable Energy for All, UN-Energy Co-Chair, Dialogue Co-Chair and Dialogue High-Level Champion

— **Mr. LIU Zhenmin,** Under-Secretary-General for Economic and Social Affairs and Secretary-General of the High-level Dialogue