



3<sup>rd</sup> Almaty  
Energy Forum

## Session 3 – Developing human capital for a just energy transition in Central Asia



7 November 2023

15:30 – 17:15 ( UTC/GMT +6 hours )

### BACKGROUND

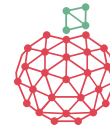
A “just transition” is an integrated approach to sustainable development that brings together social progress, workers’ protection, environmental consciousness, and economic success into a framework of democratic governance and institutional support.

While it can be expected that decarbonization efforts will create new opportunities and employment across all economic sectors, it will surely have also disruptive effects on high-carbon fuels production regions and energy-intensive industries. Such systemic change will have an enormous impact on those social strata, the wellbeing of which has been over the last decades associated with the existence and prosperity of legacy industries. Therefore, the social effects of the transition need to be estimated well in advance, at the planning phase, so that the proper protection mechanisms are developed and the relevant policies preparing the population to the new reality are put in place. Effective “just transition” strategies require local, bottom-up participation of all affected stakeholders and commitment by the governments to guarantee their buy-in and provide planning security.

There is increasing evidence, and recognition, that clean energy transitions require new technologies to serve the energy needs of growing and advancing economies. Coal should not be simply burnt for energy production. To the contrary, its true value lies in its potential to be refined and utilized for high value resources, such as graphene, carbon nanotubes, lithium, Rare Earth Elements, cobalt, and manganese, as well as other materials. Recognizing coal’s hidden potential gives an opportunity to preserve coal extraction and thus save jobs and avoid the majority of the negative environmental impacts caused by the current end use of coal. Furthermore, a new approach to coal extraction and use will create new jobs in industries essential to development of a green economy. As a result of exploiting this unrealized potential, transition of the coal regions will expose communities to less cultural and social shocks. New opportunities for modernization of coalmining will be created by re-orienting the coal mining ecosystem towards development of innovative hi-tech industries organized in clusters around existing but redesigned coal mines that provide new enterprises with valuable feedstock.

**For more information about the event please visit**

<https://unece.org/>



3<sup>rd</sup> Almaty  
Energy Forum

In addition, the proposed approach offers new options for financing the transition. It is because by removing the risk of having certain coal assets stranded, it gives financial institutions an opportunity to preserve them, thus freeing significant resources for investments needed in infrastructural projects, which not only depend on the feedstock provided by coal companies, but make the business case for coal mines continued existence as a crucial element of the new green economy.

Building and maintaining resilient and carbon neutral energy systems in Central Asia and adopting the new approach to coal will require developing new innovative solutions, which will in turn require new skills. Universities will play a key role in that process as it will be to large extent their task to develop human capital necessary to meet the requirements of the green economy and to close the skills gap across the region to deliver on green and just energy transition.

This session will bring together university representatives and policymakers to explore how to overcome the barriers and identify solutions to foster the next generation of energy experts across Central Asia.

Building and maintaining resilient and carbon neutral energy systems in Central Asia and adopting the new approach to coal will require developing new innovative solutions, which will in turn require new skills. Universities will play a key role in that process as it will be to large extent their task to develop human capital necessary to meet the requirements of the green economy and to close the skills gap across the region to deliver on green and just energy transition.

This session will bring together university representatives and policymakers to explore how to overcome the barriers and identify solutions to foster the next generation of energy experts across Central Asia.

**For more information about the event please visit**

<https://unece.org/>

## AGENDA

15:30 – 15:40	<b>Presentation 1</b> <b>Presentation: Concept on just energy transition</b> Raymond Pilcher, Chair of the Group of Experts on Coal Mine Methane and Just Transition
15:40 – 15:50	<b>Presentation 2</b> <b>Presentation: National Human Development Report (NHDR) focusing on energy-driven vulnerabilities in Kyrgyzstan</b> Anna Arkhangelskaia, Expert, UNDP Kyrgyzstan
15:50 – 16:00	<b>Presentation 3</b> <b>Addressing the Gender Gap and Skills Shortage in Central Asia's Energy Transition</b> Emomali Mirzoev, Project Associate, Energy Security, OSCE Secretariat
15:55 – 17:00	<b>Panel discussion</b> <b>Panel discussion on role of universities in building capacity and fostering next generation of regional energy experts</b> <b>Moderator:</b> Raymond Pilcher, Chair of the Group of Experts on Coal Mine Methane and Just Transition <b>Panellists:</b> <ul style="list-style-type: none"><li>• Ismailova Jamilyam, Associate Professor, Kazakh British Technical University, Kazakhstan</li><li>• Sayyora Artikova, Turin Polytechnic University in Tashkent, Uzbekistan</li><li>• Madina Junussova, Professor, University of Central Asia, Kyrgyzstan</li><li>• Abylaykhan Soltanaev, Scientific Coordinator, German-Kazakh University, Kazakhstan</li><li>• Dilyara Urmanova, Head of Inclusive Education Center, Satbayev University, Kazakhstan</li></ul>
17:00	<b>Wrap-up</b>