



Economic and Social Council

Distr.: General
10 March 2023

English only

Economic Commission for Europe

Committee on Sustainable Energy

Group of Experts on Coal Mine Methane and Just Transition

Eighteenth session

Geneva, 20-21 March 2023

Item 5 of the provisional agenda

Report on implementation of the work plan for 2022-2023

Just Transition – the check list

Note by the Secretariat

I. Introduction

1. The commitment to keep global warming to well below two degrees Celsius compared to pre-industrial levels requires decarbonization in all economic sectors and the reduction of emissions of all potent greenhouse gases.
2. In practice, this means modernization of the energy sector with a focus on the phasing down of coal and finding innovative solutions for industries that rely on it and constitute its “ecosystem”, e.g., steel, or cement.
3. 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 regions and energy-intensive industries.
4. Energy sectors subject to the decarbonization process are likely to experience a significant systemic change resulting in the loss of many jobs linked to conventional energy production and the creation of others in the domain of clean energy.
5. Such a shift 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.
6. It is the duty of governments, but also of organizations such as the United Nations, to make sure that no one is left behind and the transition is just for all.
7. To ensure the social acceptance of the transition and the fairness of the process itself as well as its outcome, which is necessary for assuring the sustainability of the proposed environmentally-oriented reconstruction strategies, policies focused on alleviating the expected social shocks and providing protective measures for the affected communities must be developed in an inclusive manner and implemented gradually as the transition progresses.

II. Just Transition

8. A “just transition” is an integrated approach to sustainable development which brings together social progress, environmental protection and economic success into a framework of democratic governance.

9. Effective just transition strategies require the local, bottom-up participation of all affected stakeholders and the commitment of governments to guarantee their buy-in and provide planning security.

III. United Nations Economic Commission for Europe’s approach to Just Transition

10. Energy transformation has more than the two dimensions of technology and finance.

11. Adapting to a decarbonizing world is a deep structural shift not only for the involved industries and installations, but also for their workers, their communities, and their regions.

12. People’s non-economic needs such as those related to their pride and social status, sense of identity and belonging to a given community, and adherence to a given culture and heritage should also be taken into consideration.

13. Ensuring a just transition shares activities that are key to twelve of the seventeen Sustainable Development Goals (SDGs) adopted by UN Member States as part of the 2030 Agenda for Sustainable Development.

14. United Nations Economic Commission for Europe (ECE) seeks to support its member States in their efforts to achieve climate goals and simultaneously ensure quality of life and decent jobs for their citizens, as well as prosperity and good perspectives for the legacy industry-oriented regions undergoing the transition.

15. To prevent civil unrest and ensure the sustainability of the proposed solutions a holistic strategy aimed at long-term development of a region and encompassing all aspects of transition, i.e., social, economic, and environmental, is necessary.

16. A good strategy should lead to the development of a robust plan and business model for the efficient transition of a region. It should include proposals for developing a new economic profile and identity that are aligned with the needs and aspiration of the population.

17. The proposed new economic profile of a region should correspond to local capabilities, the resource base and needs, and take into account such matters as the existing and the desired educational and professional training directions, regional transportation patterns, the existing infrastructure, as well as the applicable regulatory and legal frameworks.

IV. Group of Experts’ work on Just Transition

18. Over the last years, the Group of Experts on Coal Mine Methane and Just Transition has worked on various aspects of the profound change that many of the coal mining localities across the ECE region have been subjected to, and in that context it:

(a) organized a number of capacity-building events on coal mine closure and proper management of abandoned mines;

(b) contributed to the World Bank’s work on developing mine closure standards;

(c) worked on a study on mine closure in Albania and Serbia;

(d) worked on a study evaluating available energy pathways alternative to coal in Tajikistan;

(e) organized and participated in a number of sessions (at various events ranging from the Group’s annual meetings to local capacity-building workshops and to international conferences such as e.g., Global Clean Energy Action Forum) on just transition, focusing on:

- (i) social and cultural aspects, including gender issues related to coal mine closure and transition of the coal industry;
 - (ii) coal phase out and energy transition pathways;
 - (iii) rehabilitation and repurposing of post-mining areas.
- (f) developed a project proposal on Modernization of the Coal Mining Regions;
- (g) developed a project proposal on Modernization of the Legacy Industrial Sites;
- and
- (h) developed, jointly with Boston University, a project proposal on Accelerating Clean Energy Transitions Worldwide.

V. Current situation in the ECE Region

19. Energy transitions are occurring throughout the ECE region at different rates depending on the subregional economic and political response to the need to decarbonize.
20. These localized responses range from mine closures and the end of coal production to consolidation of older mining enterprises coupled with modernization of coal extraction and power production.
21. In some parts of the ECE region, coal extraction and use is for the time being expected to continue as member States have to balance their environmental efforts with the need to secure reliable and affordable energy supply and the necessity to maintain social peace.
22. However, despite the fact that extraction of coal and other fossil fuels in the ECE region is not forecast to stop in the foreseeable future, the transition is already taking place and that process is likely to become more widespread as alternative modes of energy production are introduced, industrial consumption of coal diminishes, and substitutes for coal in chemical and industrial processes are developed.

VI. Mapping

A. Statement of the problem

23. Just transition is a complex, complicated and long-term process. It needs a starting point and its progress is determined by the interplay of various factors that either push it forward or hold it back.
24. Even though nowadays just transition has become a subject that is at the centre of hundreds of projects and publications produced by countless organizations and activists, the concept still remains relatively vague, as the process of socially-sensitive, environmentally-friendly, and economically-viable systemic transformation towards green economy has not been yet structured to the extent that would allow for its repeated successful application in varying circumstances.
25. Conditions that need to be fulfilled to launch the transformation still need to be defined and the issues that must be addressed throughout the process in order to achieve satisfactory results also need to be specified.
26. In that context, the Group of Experts proposes a project on mapping just transition efforts around the world to identify factors that either support, disturb, or prevent the beginning of the process or its progress.

B. Project proposal

27. The goal of the project is to assess the situation in various coal mining regions across the world and identify the elements that are necessary to enable the start and progress of transition. It aims to build an understanding of why in certain places just transition is not

advancing at all and identify the conditions that are either inhibiting or could foster such change.

28. The project would focus on selected coal mining regions around the world and collect data from each one of them. It would seek to develop detailed economic, energy, environmental, and social characteristics of the selected regions.¹

29. The project would explore what transformative steps towards green energy (whether regulatory, technological, organizational, economic, or political) have already taken place in the selected localities. It will analyse:

- (a) What exactly has happened;
- (b) How it happened and over what time period;
- (c) What the (economic, social, political, and environmental) costs and benefits of undertaking those steps were;
- (d) What enabled those steps and how were they financed; and
- (e) What those undertaken transformative initiatives ultimately led to (i.e., what their sustainable outcomes are).

30. The project would also focus on the transformative activities currently ongoing in the selected regions, paying attention to:

- (a) What initiatives are being undertaken;
- (b) What are their goals;
- (c) What enabled undertaking the ongoing efforts (what were the incentives, and how the barriers were overcome);
- (d) How they are financed;
- (e) What challenges they face; and
- (f) What results have they produced so far.

31. The project would aim to identify:

- (a) Examples of successful transition steps that took place in selected regions and which could be replicated elsewhere;
- (b) Missing gaps, as well as opportunities for the transition to take place in selected regions that lag behind, and provide an understanding of factors that hold back those regions, as well as guidance on the specific policies that they should implement to overcome the barriers constraining them;
- (c) The universally applicable list of issues, which planners and policymakers should focus on while engaging in the process of preparing transformation of the local legacy industries;
- (d) Key universally applicable (economic, social, political, and regulatory) characteristics of a region's readiness for a transition;
- (e) Key universally applicable criteria for transition projects to pick up and be successful in a region; and
- (f) The universally applicable set of human, financial and natural resources required to enable just transition in a region.

32. In terms of the outcomes, the project aims to:

- (a) Improve capacity of the selected regions that lag behind to plan and execute the transition;
- (b) Provide policy and regulatory recommendations for targeted regions;

¹ Please see Annex I to learn about the indicators that the project will seek to collect.

(c) Develop a GIS (geographic information system) map characterising the selected regions in terms of their readiness and potential for just transition.

VII. Next steps

33. The Group of Experts encourages its members to help the secretariat to identify potential sources of funding for the project and to provide any possible assistance in mobilizing them.

34. The Group of Experts on Coal Mine Methane and Just Transition invites partners and sponsors to provide feedback on the presented concept, as well as to engage with the Group on refining it, developing a full-scale fundable project proposal, and executing the project in the selected beneficiary countries.

Annex

Examples of indicators to be collected

I. Demographic

1. Population size
2. Population growth
3. Scale of migration flows
 - (a) to the region
 - (b) from the region
4. Average life expectancy
 - (a) for women
 - (b) for men
5. Children mortality rate
6. Average age
 - (a) in the region in general
 - (b) in the areas where local legacy industries are located
7. Age distribution
 - (a) in the region in general
 - (b) in the areas where local legacy industries are located
8. Gender distribution
 - (a) in the region in general
 - (b) in the areas where local legacy industries are located
9. Marital status (percentage of married citizens)
10. Average size of a household
11. Literacy rate
12. Locally spoken languages
13. Addictions
 - (a) alcohol use
 - (b) drugs use

II. Economic and Social

1. Region's GDP
 - (a) Nominal
 - (b) Adjusted by purchasing power parity (PPP)
2. Region's GDP per capita
 - (a) Nominal
 - (b) Adjusted by purchasing power parity (PPP)
3. Region's GDP's structure

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4. GDP annual growth rate
 5. Average income per capita
 - (a) in the region in general
 - (b) in the areas where local legacy industries are located
 6. Average income per household
 - (a) in the region in general
 - (b) in the areas where local legacy industries are located
 7. Regional Gini coefficient
 8. Households spending structure (plus trends)
 9. Inflation rate
 10. Interest rates
 11. Tax rates
 - (a) personal income tax
 - (b) corporate tax
 - (c) VAT
 - (d) sales tax
 - (e) excise tax
 12. Tax revenues
 - (a) by sector
 - (b) from legacy industries
 13. Trade
 - (a) main regional trade partners
 - (b) regional trade balance
 14. Export
 - (a) scale
 - (b) structure
 - (c) key importers of goods
 15. Import
 - (a) scale
 - (b) structure
 - (c) key exporters of goods
 16. Investments
 - (a) scale
 - (i) overall
 - (ii) green investments
 - (b) main investors
 - (i) local
 - (ii) domestic
 - (iii) foreign
 17. Available skill sets (by education/profession)

- (a) annual number of graduates by various types of schools and trainings
- 18. Employment structure
 - (a) the scale of the professionally active population (workforce)
 - (b) unemployment rate
 - (c) employment structure by the size of the employer
 - (i) Number of start-ups in the region
 - (d) number of employees by sector
 - (e) number of jobs in the legacy industries
 - (f) number of vacancies
 - (i) overall
 - (ii) in the local legacy industries
- 19. Large local employers
 - (a) in the region in general
 - (b) in the areas where local legacy industries are located
- 20. Financial performance of the biggest local employers
 - (a) in the region in general
 - (b) in the areas where local legacy industries are located
- 21. Most important local investors
 - (a) in the region in general
 - (b) in the areas where local legacy industries are located
- 22. Agriculture
 - (a) scale of contribution to the regional GDP
 - (b) number of employees
 - (c) type of production
- 23. Existing subsidies
 - (a) in general
 - (b) for the local legacy industries
- 24. Density and quality of the local transport infrastructure
 - (a) road density
 - (b) rail density
 - (c) number of airports in the region
 - (d) number of ports in the region
 - (i) seaports
 - (ii) river ports
- 25. Existing and planned transition programmes
 - (a) national
 - (i) ongoing
 - (ii) planned
 - (b) regional
 - (i) ongoing

- (ii) planned
- 26. Existing social protection programmes and mechanisms
 - (a) Scale
 - (b) objectives
 - (c) number of beneficiaries

III. Energy

1. Regional energy demand
 - (a) overall
 - (b) by recipients
2. Regional energy supply
 - (a) by source
 - (b) by fuel
3. Local energy production
 - (a) overall
 - (b) by fuel
4. Locally available fossil fuels
 - (a) available resources
 - (b) annual production
5. Energy exports
 - (a) scale
 - (b) by recipient
6. Energy imports
 - (a) scale
 - (b) by exporter
7. Energy intensity
 - (a) overall
 - (b) by industry
8. Energy access in the region
9. Average energy consumption by household

IV. Geographic and Environmental

1. Surface area of the region
2. Average temperature
3. Number of sunny days per year
4. Regional wind resource potential
5. Local soil by class
6. Available natural resources in the region
 - (a) in general

- (b) fossil fuels
 - (c) minerals
 - 7. Air quality
 - (a) main pollutants
 - 8. Hydro-geological information
 - (a) drinking water resources
 - (b) water quality
 - (c) annual rainfall
 - (d) number and size of the local rivers and lakes
 - (e) access to the sea
 - 9. Main local polluters
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