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Title:

The 'Just Transition' threat to our Energy & Climate 2030 Targets

Abstract

The term 'just transition' has increased in popularity in academic and policymaking literature over the last few years. This policy perspective tracks its development in policy over the period 2015 to 2020. An assessment of just transition policies to-date reveals staggered plans to phase out the fossil fuel industry and beginning with a coal phase-out. This type of just transition policy will derail the development of low-carbon economies worldwide. These policies through establishing just transition funds in 2019 and 2020 will result in subsidising the fossil fuel industry indefinitely given that coal, oil and gas will have to be phased out in turn. Proactive policy needs to be developed and finance re-allocated to deliver the just transition to a low-carbon economy. In essence a just transition policy overhaul is needed to complete revision if society is to achieve our Energy & Climate 2030 goals and targets.

Key words: just transition; low-carbon economy; societal transition; just transition commissions; just transition funds

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1. Introduction: Just Transition Policy & Concept

The term 'just transition' has increased in popularity in academic and policymaking literature over the last few years. Its core focus has been the societal need to have a just transition to a low-carbon economy. There has been a clear and obvious divergent approach between understanding what the just transition is. For example, academia focuses on the concept while policy literature focuses on what it means in terms of the changes in society. This policy perspective centres on what the outcome of applying just transition policy will be. It is advanced here that just transition policy has a major flaw in its aim of delivering a low-carbon economy.

Just transition policies are still at their formative stages nevertheless it is important to consider their short to medium to long-term impact. The just transition to a low-carbon economy is a system change, it reflects not just an appreciation of a much-needed energy system change (as advocated by Clarke and Wei, 2020) but also the change in impact from the energy sector to the rest of society. The essence of the perspective advanced here is that there is an underlying problem to just transition policy and this will have long-term impact on whether a society can achieve a low-carbon economy. An assessment of just transition policies to-date reveals staggered plans to phase out the fossil fuel industry beginning with a coal phase-out. This is where the medium to long-term impact will potentially inhibit societies reaching the goal of a low-carbon economy. Indeed, is there a question of some sort of 'green-washing' here of just transition policy; for example, green-washing of energy transition policies has been noted in US cities (Pfadt-Trilling and Fortier, 2021).

In making government interventions to support the coal industry in a phase-out, this goes clearly against the practice of competition in energy markets, particularly, in electricity markets; and remains an issue even if countries do not have competitive markets, i.e. there are state-owned enterprises in operation. Nevertheless, the key issue is if there is wide-scale support to transition the coal industry? In some cases there is, for example, until 2038 in Germany (Clean Energy Wire, 2020), and there the question needs to be asked when will similar phase out and/or transition support schemes for oil and gas begin and then be phased out. If coal is circa 2040 for a phase-out, will gas and oil be 2060 and/or 2080? In essence, for how long will society have to fund a fossil fuels transitions in order to have a a low-carbon economy. A reallocation of such financial support should be directed towards towards new low-carbon technology. This would also have the benefit of diversifying the energy source portfolio in many countries.

This policy brief explores the journey of the 'just transition' as a policy goal over the last five years and how it plays a key role in how societies can achieve a societal transition to a low-carbon economy that is centred on achieving more justice. It then explores the policy interventions that see new and continued support for the fossil fuel industry. Finally, it is concluded that there needs to be greater policy re-alignment, transparency and accountability, and policy revision in terms of how just transition policies are funded.

2. The Policy Journey of the Just Transition 2015-2020

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¹ Providing finance for the coal sector to transition and support a reduction of its externalities is a subsidy. A polluting industry sector should pay the cost of addressing its environmental impact, this is referred to as restorative justice which is where any injustice caused by the energy sector should be rectified (Heffron and McCauley, 2017).

There are a range of perspectives of what the just transition is. For different communities of people, it means different things. There is a research, a practitioner (private sector), government and policy-making perspective, justice, technological and the general public perspective. The evolution of the term 'just transition' has been increasingly discussed in the academic literature in recent times (see, Heffron & McCauley, 2018). However, it is its association with the development of a low-carbon economy that has driven its emergence in the last the few years.

Initially, much of the literature about the just transition is dominated by discussions around 'jobs' (McCauley & Heffron 2018); and it is acknowledged that has to be a key focus in order to motivate and encourage participation in the Just Transition. However, the issue is more than that, and how countries achieve a low-carbon economy is really the great challenge. To meet this challenge with a 'just' transition adds a layer of complexity that will need a societal shift away from the long reliance on conventional energy sources; alongside the associated transformation of the labour force to new areas and moving all other economic sectors in society away from using fossil fuels.

The just transition policy journey really began in 2015 when it was included in the 2015 Paris Agreement. It was discussed prior to this (in particular, from a jobs perspective) but this really marked its progress in policy terms. The 2015 Paris Agreement is also significant in that never before have so many countries (188) signed and ratified an international agreement so fast (UN, 2020a). It has certainly achieved an impact however, it took several years – with 2016 and 2017 been quiet on the just transition issue - for the policy community to realise that the issue of a 'just transition' was mentioned in the 2015 Paris Agreement; it stated in terms of jobs new and old (UN, 2020b). It was then at the G7 talks in 2018 that momentum began to gather on the just transition where was specifically mentioned as a policy goal in the final communique issued by the Governments (European Council, 2018).

In 2019, some countries began to deliver further on their just transition policies. This encompassed the introduction of the first legislative steps to achieve a just transition. This is through the creation of what can be classified as a 'Just Transition Commission' (JTC). There are a number of different forms but they all involve the establishment of some form of commission. This policy perspective builds on this analysis of these countries that have been the 'first-movers' of introducing law for a just transition. These countries will provide an example of best-practice around advancing a just transition for other countries in the future.

A form of JTC is in place including in: Canada, Germany, Scotland, Australia, Ireland, New Zealand, US (Appalachia), South Africa, and the EU. Such commissions are established to provide expert advice on the ways to achieve a Just Transition and also will monitor the effects of existing laws and policies to ensure they contribute to the delivery of a just transition.

In **2020** the key change in terms of just transition policy has been the discussion and also planned allocation of funding plans for the just transition. This has in essence built on the 2019 legal developments and specifically has begun in the EU, Germany and Scotland. The actions include primarily the following and these are significant amounts:

- EU €57 billion has been allocated to the Just Transition Fund in September 2020 (European Parliament, 2020);
- Germany €40 billion+ allocated to support coal regions in July 2020 (Clean Energy Wire, 2020); and

• Scotland - £62 million fund announced in June 2020 for oil and gas (Scottish Government, 2020).

3. Financing the Just Transition threatens Societies Aim of Achieving a Low-Carbon Economy

The key just transition policy initiative that threatens to derail societies plans to achieve a low-carbon policy is this latter new development in 2020 where finance is being allocated. The problem arises here in terms of the signal this financial support sends to investors. At first instance it sends a signal to investors in coal. For the coal sector in Germany, for example, it highlights how coal will continue in the country for a further 18 years; and as a result there is a subsequent signal to the international community that high-income countries are still supporting coal.

There is then the key signal sent to oil and gas sectors. If coal is to be supported until 2038, will it be after that point or at what stage will oil and gas receive support. It is certain that these oil and gas sectors will seek finance for their transition – and they have been in Scotland. Countries which develop all three of these energy sources, oil, gas and coal will need to develop just transition financing plans and it is very conceivable that these will stretch to from 20 years up to 60 to 80 years. Given that Germany, considered a developed country will take 18 years for its coal transition, what can be expected of some developing countries. Consider Indonesia for example, which produces all three of these energy sources, if they are to adopt a just transition plan it seems certain to stretch some distance into the future. This issue overlaps into decommissioning and waste management policy issue and central to this issue is who should bear the costs. Nuclear energy operators for example, contributes to the cost of decommissioning and waste management from the moment it produces electricity in many countries. Should such a policy be introduced for oil, gas and coal and therefore funds would be available to support the transition of these industries.

Leadership is not quite clear from developing countries on the issue of this just transition policy. Indeed, one of the hurdles in the development of renewable energy across the world was that it was not cost competitive. The EU is a classic case of this and where subsidies given to renewable energy were withdrawn in multiple EU countries (IISD, 2019). There was a worry that renewable energy companies were receiving too much subsidies, however, the development of a renewable energy was over-looked in favour of looking specifically at short-term gains by these renewable energy companies. Renewable energy was asked to compete without subsidy in electricity markets.

Society in essence had reached a point it refused to subsidise renewable energy which would enable the just transition to a low-carbon economy happen in a faster way. Now in the same timeframe society now supports just transition policy which will subsidise the fossil fuel industry. A serious question has to be asked as to why market forces are not applied to the fossil fuel industry? Should this industry not realise its in decline in terms of the market for two reasons which are: (1) renewable energy technology is reducing in cost; and (2) because public policy towards the product it produces is overwhelmingly negative and hence new legislation is driving up costs further and making it additionally uncompetitive. There are other aspects to be considered too such as regional development (see section 5), new data, corporate strategy too, wll which are fruitful future research areas. The just transition needs to speed up the exit of fossil fuels but at the moment it is slowing it down.

4. The EU Just Transition Platform: A Recipe for More of the Same

The EU is the first multi nation region to bring together a focused just transition system of both policy and financial commitments. Most attention on the EU has been reserved for its flagship Green Deal initiative. A closer look at the just transition system reveals a detailed view into the issues outlined above. As part of the Green Deal, the EU just transition platform was established (European Commission 2020). This structure involved a comprehensive dedicated just transition fund, invest EU and the EIB public sector loan facility. The territorial just transition plans are the strategic pathways designed to drive a European approach to decarbonisation. Rather than empowering new renewable green growth sectors, these plans are dominated by investments in carbon intensive regions within each nation.

These plans demonstrate the structural flaws in achieving long-term decarbonisation through a prioritisation of fossil fuel dominated communities. There is an inbuilt assumption that mining regions are geographically located in areas of high renewable potential. The so-called just transition mechanism which delivers the financial investments are therefore targeted at existing fossil fuel interests rather than identifying where new areas of green growth and employment are found. The Commissioner for Energy, Kadri Simson, at the time of launch commented,

"The Just Transition Platform will...bring together expertise from all relevant Commission services to make sure that fossil fuel and carbon intensive regions have all the information, tools and assistance they need to transform their economies in a fair way." (European Commission 2020)

The EU just transition platform and associated mechanism reveal the inherent geographical bias towards propping up carbon intensive interests rather than backing the players of the future who may be located elsewhere in the nation in question.

A representative example of the pervasive nature of the just transition platform and mechanism is embodied by the most significant recipient of support, namely Poland. In following the logic, the most carbon intensive regions of Poland are, from the EU's perspective, the most in need of just transition investment. Regions that have been dominated by a coal-based economy must, in its view, be supported if we are to roll back supply chains and infrastructure, as well as to re-skill the population. The scale of the challenge is evident. The share of coal in installed capacity in the Polish energy system is 70%, while the quickest emerging renewable, solar energy, has only 3.2% (EPP 2018). Renewable energy projections suggest that solar energy is dramatically under delivering on potential capacity.

And yet, this potential is not located in the same regions where we find carbon intensive industries, with the notable exception of the Lublin Basin; the energy policy context of Poland as projected to 2030 shows that regions in the north, for example, have sufficient potential for solar deployment (IRENA 2015). This could dovetail with growing offshore wind potential in the Baltic Sea. And yet, targeting coal mining areas mean that the south is prioritized. We must question whether investing in fossil fuel regions of the past is the best choice for delivering the transition of tomorrow. This example reveals that financing fossil fuel companies and interests to refocus is a mistake. The EU should refocus on investing in, in the case of Poland, solar-wind energy regions and new private players.

The original intention of the EU just transition mechanism and platform was firmly on supporting renewable projects. An analysis of its policy objectives shows a unitary drive towards bringing together local stakeholders in unison to support local renewable projects. Commission documents must be understood within the process of decision-making in the EU. On 16 September 2020, for example, the EU Parliament in its revision of the just transition fund explicitly backed a series of amendments which move this renewable only focus to also include natural gas projects. Kate Treadwell from the World Wide Fund for Nature comments:

"Its simple: MEPs just agreed that taxpayers money can be used to pay for fossil gas, risking locking us in to stranded assets and climate pollution, and ramping up the costs of the transition" (WWF 2020)

This means that applicants to the fund could now propose new gas initiatives in, for example Poland, as eligible as part of the Just Transition Platform in light of these changes.

This move allowed the inclusion of natural gas as a transitionary fuel. On the same day, the Commission president Ursula von der Leyen announced an increase in the EU's carbon emission targets to 55% by 2030. The Commission seeks to promote a renewable transformation of national energy policies but in this case must tackle the national interests which are driving towards the retention of fossil fuel interests in the just transition. Changes in the policy show how difficult this will be. The Polish case above suggest that regional financial investments are misplaced. The actions of the European Parliament point to the intractable hold that fossil fuel interests have over national parties and interests.

This recent amendment to the just transition fund bill by the European Parliament signifies the extensive nature of this problem. These funds should not be targeted towards fossil fuel polluting regions. They should be re-targeted towards renewable technologies, decarbonisation community initiatives or areas of future renewable potential. Applicants to the fund should fulfil these criteria. Such a change would promote the financing of new interests. The complexity of the tripartite funding structure of the just transition platform which we touch upon here requires more cross-regional integration. It appears more as a laundering facility for existing fossil fuel funds through EU structures with carbon intensive goals left intact. Financing structures represent more than monetary choices. The reveal the principles driving our collective actions. This is even more concerning when faced with the level of recovery needed from the pandemic. The EU needs to urgently reconnect the original principles of the just transition mechanism and platform with a decarbonisation strategy driven by the technologies, regions, and communities of the future.

5. Further Potential Reforms to Realise a Just Transition

5.1 Utilising Existing Legal Frameworks to Achieve a Just Transition

Not all countries are creating these JTCs but they are utilising other methods to achieve a just transition. In essence they involve a similar set of actions but may take longer to materialise as they are not all coordinated under the same 'umbrella' action of a JTC. These actions involve utilising existing legal frameworks which are mainly:

- (i) national and regional development plans;
- (ii) strategic environmental assessments; and

(iii) national industrial strategies.

Collectively actions under these three interrelated frameworks can also enable the implementation of a just transition. It is certain that national and regional development plans and national industrial strategies will focus on job creation while strategic environmental assessments will cover energy, environmental and climate policy issues. All three legal frameworks will have justice as an additional outcome to ensure a just transition.

Significantly, for policy-makers, these three steps may involve less opposition since they are existing frameworks in many countries already. A JTC may take several years to establish and another few years to deliver its results. Further the effectiveness of its results will be dependent on the powers of the JTC. In contrast, amendments can begin on national and regional development plans, strategic environmental assessments and national industrial strategies can begin immediately, and hence these frameworks may deliver a just transition faster than a JTC. These amendments however, all need to have outcomes of a just transition such as more fairness, equality, equity and inclusiveness at their core.

5.2 A Role for Data

Today, society is characterised by data. It is no surprise therefore that data on the energy sector is on rise. The availability of this data, the transferability of this data and the accuracy of this data is informing energy decision-making. In policy analysis, in legal courtrooms and in company boardrooms there is a need to accurately assess the data as it is becoming easier to demonstrate the socio-economic, environmental and climate change, and general societal (inc. health impacts) impacts of an energy project. Accountability in decision-making will increase as it will be harder to avoid doing more comprehensive data analysis.

A just energy transition will need all stakeholders to work together, and that includes those who are overly reliant on FF today. For the research community, there is an opportunity and need to work collaboratively like never before. To deliver just outcomes post this pandemic and given the climate change emergency more innovative and interdisciplinary methods of ensuring society meets its energy and climate targets of 2030 are necessary. Data will form the cornerstone of much of the interdisciplinary and collaborative research and strategically it can be utilised to deliver a just energy transition.

5.3 Post COP26: A Human Rights & Corporate Strategy Issue

It is my anticipation that human rights in the energy sector and then more broadly within the just transition to a low-carbon economy will be an area that will increase in professional and research practice post COP26. Already this is evident as highlighted in terms of challenges to multinational energy companies (Heffron, 2021a). The protection of these human rights through court rooms will add a more systematic approach to ensuring a just energy transition for 2030 under the 2015 Paris Agreement and also in terms of net-zero targets (Heffron, 2021b).

Policymakers will become accountable for how they meet their commitments under the 2015 Paris Agreement. They will have to account for how they have adjusted, revised or added to their plans for COP26 and then later again when it is required for 2025 at COP30. Both these time periods increase the likelihood of a wave of legal action, as different stakeholders take action on Governments or other key stakeholders and seek out more demanding energy and

climate goals for COP26 and then subsequently for COP30. And at the heart of this legal action will be how did the policymakers aim to ensure the entire list of human rights were protected within these energy transition and climate plans.

The evidence to support the continuation of fossil fuel investments is becoming harder to obtain and also harder to demonstrate successfully. Already the savvy investors must be looking at the proposed bans on coal and fossil fuel-based cars and planning exit strategies for the next fossil fuel activities that are under threat as they would be valued at a peak price at the moment (and therefore it is the opportune time to sell).

6. Conclusion - Policy Redirection needed to ensure a 'Just' Transition

It is clear that one of the main challenges to achieving the just transition to a low-carbon economy is how society finances the required activities (Muller and Robbins, 2021; Robbins et al. 2021). This is an area that needs further research. As societies around the world face certain financing decisions in the economy (and particularly so, in light of COVID-19), there will be calls for low-cost ways of achieving energy policy. Unfortunately, the debate remains globally that oil, gas and coal are cheap, beneficial to the economy and now today there is a need to further support them in a just transition. However, this perspective needs to change and there needs to be more supportive action for low-carbon activities and a switch of financial capital from fossil fuels to low-carbon energy.

The impact of the global pandemic on fossil fuel price drops has been widely covered. The fall in renewable energy investments continue to be muffled. Wood Mackenzie (2020) estimates that solar and energy storage facilities are set to fall by 20% in 2020 compared to 2019, with similar declines observable in wind turbine installations and loss of 106,000 energy efficiency measure jobs in the US as one example. And yet, the OECD (2020) found on a country-by-country analysis of Green Recovery packages that investment in renewable energy was dwarfed by the facilitation of fossil fuels. In the most optimistic study, 47% of Green Recovery packages are targeting fossil fuel support while only 39% for clear energy. The Rhodium Group (2020) found that only 20% of the EUs green recovery plans directly supported renewable energy.

If society is to continue to send 'supportive' signals to oil, gas and coal industries there will be less willingness to support investment in the low-carbon transformation. A re-directed effort in the allocation of investment in the just transition is needed. More research is needed on how the social transformation will happen including issues such as envisaging what society will look like, how the business-as-usual approach will change and how the law will ensure the process is inclusive (i.e. just, fair and equitable). More work is needed on presenting different pathways/scenarios of what a just transition to a low-carbon economy can look like. There are distinct trade-offs that will need to happen and these need to enter the debate rather than be avoided.

Fossil fuels must be allowed to suffer the fate of the market and not be protected indefinitely. If society and the international community is serious about achieving a just transition to a low-carbon economy in stages by 2030, 2040 and 2050, then action is needed now. Just transition policies around the world need to rethink their plans for subsidy support to these technologies that belong in the past.

Finally, in looking forward to a post COVID-19 world should society not consider a widespread massive distribution of clean energy technology and dramatically cut deaths and associated damage and costs due to climate change. Is that not where the next global societal action be?

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