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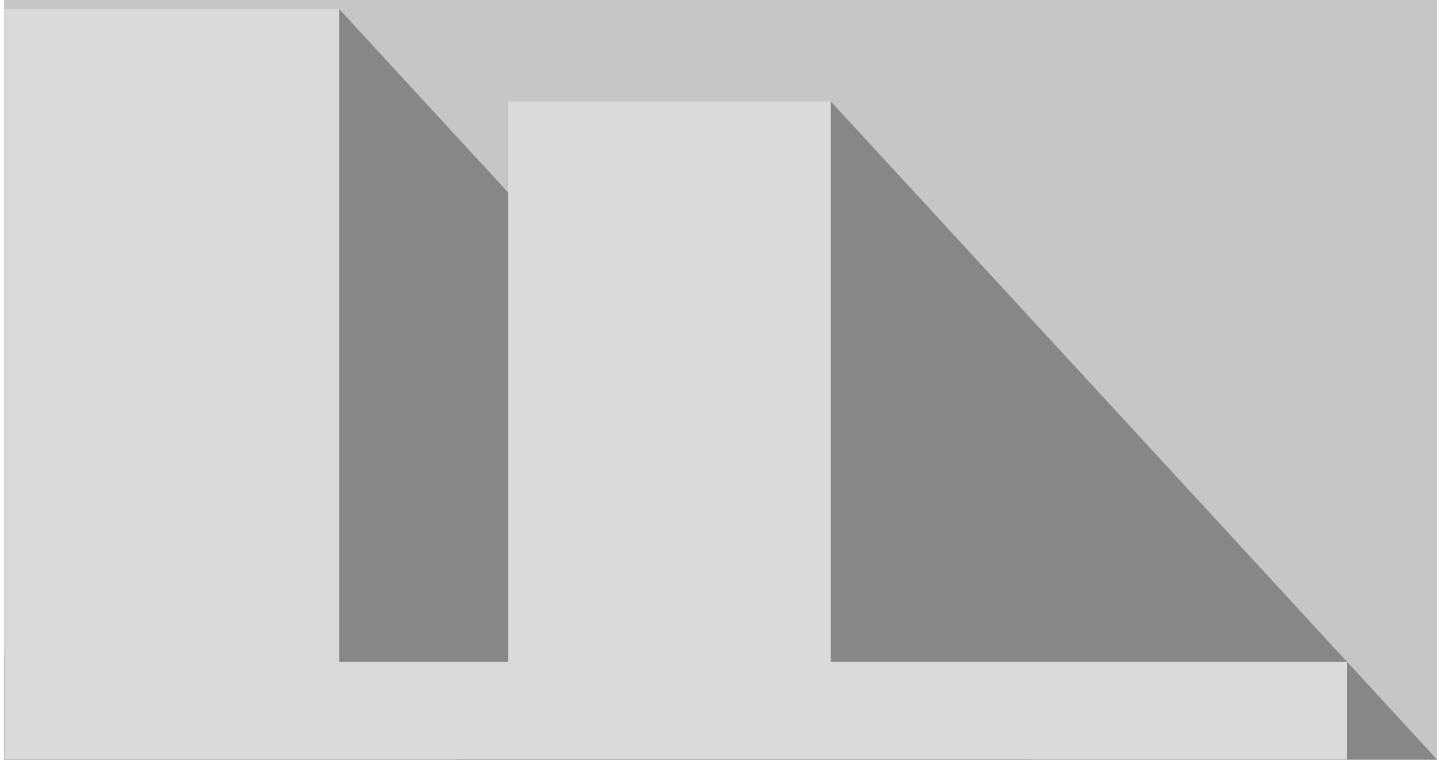
ENERGY JUSTICE THROUGH POLICY

A COMPARISON OF US AND EU APPROACHES

Cordelia Buchanan Ponczek & Marco Siddi



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Policymakers have come to consensus on the need to prioritize the low-carbon energy transition. But this comes with costs and questions of fairness. Therefore, policymakers also see transition initiatives as an opportunity to ensure more just outcomes. This has been dubbed the "just energy transition". But what does a just energy transition mean in practice? How do policymakers bridge the gap between assessed needs – injustices – and policies that correspond to those needs?

This Working Paper evaluates and compares EU and US policies aimed at the energy transition and energy justice. It considers the extent to which the European Green Deal (EGD) and the US Inflation Reduction Act (IRA) attempt to enshrine "energy justice", as well as the various understandings of the term from the distribution, recognition, and procedure points of view. The paper shows that the EGD is more specific in terms of procedural justice, whereas the IRA includes more explicit clauses pertaining to recognition-based justice. Both highlight elements of distributional justice.

CORDELIA BUCHANAN PONCZEK

Research Fellow

The European Union and Strategic Competition

Finnish Institute of International Affairs

MARCO SIDDI

Leading Researcher

The European Union and Strategic Competition

Finnish Institute of International Affairs

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FIIA FINNISH INSTITUTE OF INTERNATIONAL AFFAIRS

Arkadiankatu 23 b
POB 425 / 00101 Helsinki
Telephone +358 (0)9 432 7000
Fax +358 (0)9 432 7799

www.fiia.fi

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INTRODUCTION

The transition to a low-carbon economy and society involves a shift towards investments, technologies, and practices. But this shift requires costs and trade-offs in its implementation that are not evenly distributed. So, while a broad consensus has emerged on the need to divest from hydrocarbons in favour of low-carbon energy sources, this consensus has not prevented scepticism from arising due to the transition.[1] Some actors perceive that they face negative effects of this shift. Workers fear they could lose their jobs. A drawdown of investment in traditional extractives risks leaving some communities behind. Energy prices could rise temporarily during the switch.

Such concerns have sparked discontent, leading to protests – a well-known example being the Yellow Vests in France – or fuelling the popularity of climate change sceptics from Europe to North America.[2] These groups are not wrong: the energy transition brings a wide set of opportunities, but it also brings impacts, which range from CO2 emissions taxes to labour market shifts, and a change in investment priorities. These can have an outsized effect on some of the most vulnerable populations. To give just one example, the transition is estimated to lead to the loss of around 7 million jobs in the coal, oil and gas, and automotive industries. People are understandably worried about this. Yet at the same time, analysis by the International Energy Agency (IEA) shows that adopting the policies required for a net zero transition by 2050 could lead to the creation of almost 30 million new jobs globally, a net gain of 23 million jobs.[3] These costs create a dynamic whereby some governments and policymakers use top-down policies aimed at facilitating a just energy transition through their provisions. To do this, they must consider the various understandings of energy justice and embed those understandings into policies designed to mitigate or offset the effects on populations. Because it is such an unprecedented and rapidly evolving space, knowledge and policy gaps remain.

This paper explores the just energy transition by analysing key policy texts that originate from two government actors that have expressed a need to advance the low-carbon energy transition: the EU's European Green Deal (EGD) and the Just Transition Fund (JTF), and the United States' Inflation Reduction Act (IRA), the largest US policy commitment on climate change and the energy transition. First, the paper provides a policy and conceptual analysis of energy justice and an overview of the literature. It then examines EU policy, with a focus on the EGD and JTF, and the provisions of the IRA. Subsequently, it discusses and compares EU and US approaches to energy justice. The paper concludes with a discussion of policy implications and recommendations.

1. BACKGROUND: DEFINING ENERGY JUSTICE AND RELATED CONCEPTS IN ACADEMIC AND POLICY SPACES

There are two frameworks, academic-oriented and policy-oriented, to keep in mind when discussing energy justice and its associated terms, such as "fairness", "people-centred" transition, and "climate justice".

From an academic perspective, energy justice is based on distribution, recognition, and procedural elements, in line with Jenkins et al. and McCauley et al., who pioneered the conceptual overview.[4] Distributional justice focuses on locating where energy injustices emerge in the world. For example, it studies how new energy production facilities, such as gas power, stations, wind parks and solar parks, or rising energy prices, affect local communities. Recognition-based justice investigates which parts of society are ignored or misrepresented, such as ethnic minorities or Indigenous communities. Procedural justice explores the ways in which decision-makers have sought to engage with communities.

This academic framework echoes the broader policy process established by a range of stakeholders.[5] This Working Paper draws on the work of the IEA's eminent

1 See e.g., UNDP 2011 or World Bank 2020.

2 A. Vihma, G. Reischl, and A. Nonbo Andersen 2021.

3 International Energy Agency 2022.

4 Jenkins et al. 2016 and McCauley et al. 2013.

5 Lowi 1964.

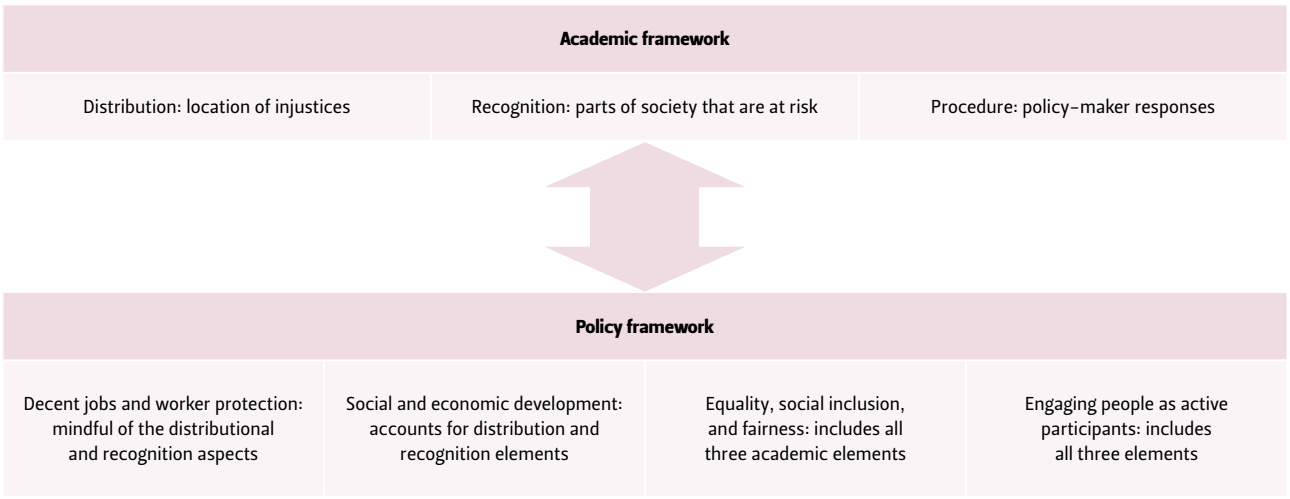

Figure 1. Academic and policy frameworks.
Source: Author

Global Commission on People-Centred Clean Energy Transitions.[6] The Commission has put together four sets of policy recommendations, which can be related to and complement the academic framework.

Assisted by these two interrelated tiers, this paper will explore the policies of the EU and the US to highlight how they seek to implement energy justice by creating decent jobs, incorporating social and economic development, and ensuring social inclusion. These two actors were chosen as they are leading energy superpowers and global actors that have taken significant steps to mitigate climate change and inspire other countries to emulate their policies.[7]

Beyond Jenkins et al. and McCauley et al., others have elaborated on the conceptualization of energy justice. Sovacool and Dworkin look at the conceptual and practical applications of energy justice;[8] Hermwille et al. apply the just energy transition narrative to the European coal regions;[9] and Wood argues that energy justice and its dimensions are interlinked.[10] Heffron and McCauley provide a review of the academic understandings of "just transition". They argue that for the concept to have greater weight, applicability, and public understanding, multiple stakeholders need to come together to explore and enforce the topic.[11] International organizations, especially those dealing with energy and the low-carbon transition, have begun to use the term "energy justice" to describe who should have a say on when energy systems are designed and deployed, what the implications are, and for whom. In the context of the energy transition, it also identifies a specific set of policy measures intended to ensure the fairness of the transition in various respects. The concept of "energy justice" existed before and independently of the energy transition – it was not created in response to it. But the transition poses new challenges and adds new aspects to the term's understanding and application by stakeholders, including policymakers, academics, and the populations it is designed to impact.

In the energy transition, as in other spheres, public consultations, elections and other forms of public participation, such as demonstrations and protests, may influence policy documents. Some scholars have argued that these bottom-up mechanisms are essential for a just energy transition and have included them in the "energy democracy" phenomenon. A seminal paper by Szulecki establishes a concept of energy democracy, which is related to energy justice insomuch as it advocates some exercise of power by those impacted by the transition.[12] Szulecki and Overland provide a comprehensive conceptual overview of the impact and implications, including a conceptual framework that indicates three elements: (1) a popular-driven process; (2) an outcome (decarbonization); and (3) a goal to which stakeholders aspire.[13] Importantly, they also highlight disparities between the European and US approaches – something that will

6 For example, several Latin American countries, including Chile (Energy Commune and Energy Community) have drawn inspiration from European initiatives. See IEA: https://www.iea.org/programmes/designing-for-fairness.

7 Prontera 2024.

8 Sovacool and Dworkin 2015.

9 Hermwille et al. 2023.

10 Wood 2023.

11 McCauley and Heffron 2018.

12 Szulecki 2017.

13 Szulecki and Overland 2020.

be explored in this paper. So far, in Europe, "energy communities" have tended to refer to groups that band together to invest in the development of community-led energy investment projects, as in Denmark and Germany, where communities can help plan their country's climate policies, or where they are allowed to jointly invest in, purchase, and reap the benefits of energy infrastructure like wind and solar farms.[14] Despite these initiatives, the community-owned aspect remains underdeveloped and niche – something that policymakers are working to overcome to scale up their implementation.[15] By contrast, in the United States, "energy communities" are those communities and areas impacted by the energy transition.

Van Veelan and van der Horst provide a thorough overview of the energy democracy terminology and literature, including a comprehensive list of sources on the use of the term energy democracy within the competencies of the state and in the specific context of the energy transition.[16] Burke and Stephens evaluate the policy instruments needed for an energy transition and how it relates to energy democracy.[17] Van Veelen evaluates the efficacy of community-level projects.[18] Hess deploys a multi-coalition perspective to evaluate the ability of different groups to meet and achieve policy outcomes, and finds that integration of coalitions can help to facilitate outcomes in energy democracy.[19] However, Delina and Stevenson argue that consumer-based choices move too slowly, and they cast doubt on the ability of communities to influence policy outcomes in a meaningful way – or whether this is necessary.[20] Droubi, Heffron and McCauley offer a critical perspective on the inability of energy democracy to deliver outcomes.[21]

While energy justice is people-focused, the concept tends to be defined and written into policy by policy-making elites. This is why this paper focuses on "top-down" policy documents, the EGD and the IRA. In addition, coordination among countries, organizations, and other stakeholders might be considered necessary. As Aalto et al. point out, the adoption of any policies must overcome the inertia of the cluster

14 For example, Denmark's Citizen's Assembly, Citizen Assembly on the climate area – The Danish Board of Technology (www.tekno.dk), or shared ownership in Germany and Denmark on low-carbon projects, Shared ownership of renewable energy: complex but rewarding – RES (www.res-group.com).

15 Warlenius and Nettelbladt 2023.

16 Van Veelan and van der Horst 2018.

17 Burke and Stephens 2017; see also Jenkins, McCauley, Heffron, Stephan, and Reher 2016; Jenkins, McCauley, and Forman 2017; and Sovacool and Dworkin 2015.

18 Van Veelan and van der Horst 2018.

19 Hess 2018.

20 Delina 2018 and Stevenson 2018 in Aalto et al. 2021.

21 Droubi, Heffron, and McCauley 2022.

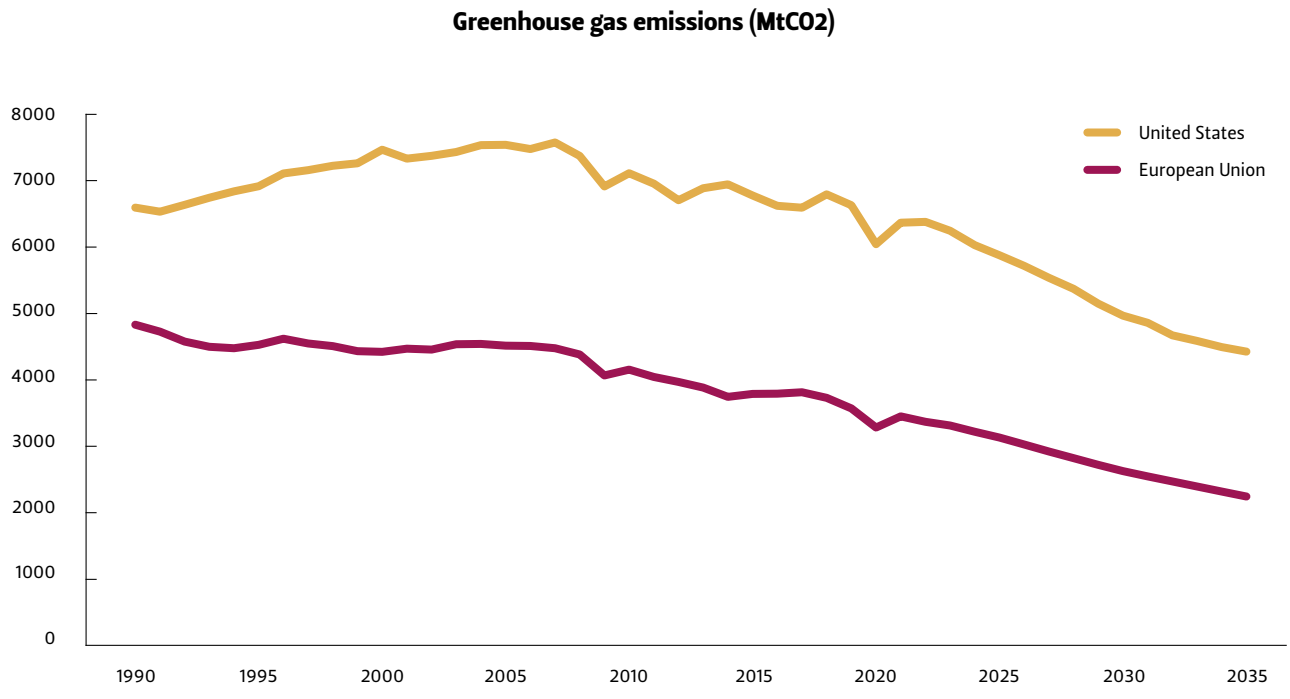

Figure 2. Greenhouse gas emissions (MtCO2). Emission estimates after 2023 are based on modelled trajectories based on currently announced policies.
Source: Climate Action Tracker

of incumbent actors that have been characterized as a "socio-technical regime".[22] This includes path dependencies and their accompanying infrastructure, institutions, and behaviour.[23]

While acknowledging the importance of energy democracy and the bottom-up drivers of energy justice, this discussion focuses on the policymaking and implementation level.[24] Because policymakers hope to achieve normative aims and energy justice within the energy transition, this level is considered the key to shaping dominant understandings and concrete implementation of energy justice (while bearing in mind the intersection of intention with policymaking processes and cycles).

This Working Paper analyses two sets of policy documents from the European Union and the United States that aim to facilitate the energy transition and address the impact of climate change. To this end, the analysis focused on explicit references to "energy justice" or "just energy transition".[25] The context or segment of the policy was examined for links between such references and their relevance to justice (or offsetting certain costs or contributing to benefits for the population). Adjacent documents were also reviewed, especially those tailored funding schemes, groups, or mechanisms that formed a part of the broader legislative initiative, and any enforcement mechanism.

2. THE EUROPEAN UNION

The European Union is one of the world's largest markets and regulatory entities. As a policy actor, the EU faces a number of constraints and it must account for the fact that, for example in energy policy, it shares competence with its member states. Unlike in the US, there is broad agreement among EU countries that climate change is real and driven by human activity, that it poses a threat to EU member states and to other global communities, and that urgent action is needed to achieve carbon neutrality. This provides the motivation to act and implement policies meant to address the challenge. The European Climate Law constitutes a legally binding obligation to reduce emissions with the 2030 reduction target and the 2050 net zero target. But the ways these legally binding targets are enacted have implications for EU member states and their populations.

The EU has crafted a wide range of tools to respond to the energy transition, including some that address the issue of energy justice. The EU aims to incentivize investments that offset the costs of the energy transition. Among the most impactful policies in the EU's attempts to facilitate the low-carbon energy transition and respond to energy justice needs is the EGD, a grouping of broad and ambitious policy initiatives. Together, their goal is to achieve climate neutrality by 2050 in a way that is sustainable, competitive, just, and aligned with broader development and competitiveness goals.[26] The EGD was first introduced by the von der Leyen Commission in December 2019 and has been gradually implemented since. An important component of the EGD is the JTF, around €19.3 billion for the period 2021–27, which is part of the Just Transition Mechanism (JTM).[27] The JTM is considered the first pillar of the EGD: it attempts to support those areas most impacted by the energy transition.[28]

The EGD contains policies that are an important part of the EU's goals for a just energy transition. For example, it aims to make the EU's energy supply affordable, with a nod to the high prices that usually accompany the low-carbon energy transition. It also aims to impact areas like housing and development. The EGD Communication mentions "sustainable" or "sustainability" 95 times, sometimes in the context of development goals, specifically those of the UN. For example, it states that "[…] the Commission will refocus the European Semester process of macroeconomic coordination to integrate the United Nations' sustainable development goals, to put sustainability and the well-being of citizens at the centre of economic policy, and the sustainable development goals at the heart of the EU's policymaking and action".[29]

In this vein, the document mentions "just" or "justice" 14 times, stating that "the transition must be just and inclusive. It must put people first, and pay attention to the regions, industries and workers who will

22 Aalto et al. 2021.

23 Knox-Hayes 2012 in Aalto et al. 2021.

24 Dye and Zeigler 1990.

25 On linking justice to other terms, see e.g., Lenzi, D. et al. 2023; Lewis and Hernandex 2021; the World Bank and other organizations also link energy transitions to resilience, e.g., their initiative #ReThinkingEnergy, which mentions "resilience": https://www.worldbank.org/en/what-we-do/rethinking-energy.

26 Fetting 2020.

27 European Commission. Just Transition Fund, Just Transition funding sources – European Commission (www.europa.eu).

28 European Commission 2019: While not proposing specific measures concerning energy justice, the regulation establishing the Recovery and Resilience Facility (RRF), a key component of the EU post-Covid budget, states that member states' RRF plans shall be consistent with the measures envisaged in their just transition territorial plans; see https://eur-lex.europa.eu/legal-content/EN/TXT/HTML/?uri=CELEX:02021R0241-20230301, Article 17.

29 See EUR-Lex - 52019DC0640 - EN - EUR-Lex (www.europa.eu).

face the greatest challenges". To ensure this, it calls for "active public participation" and for a "new pact [...] to bring together citizens in all their diversity, with national, regional, local authorities, civil society and industry working closely with the EU's institutions and consultative bodies".[30] Hence, particular attention is paid to distributional justice, which focuses on people and regions that face the greatest challenges, and to procedural justice, which includes citizens in deliberations concerning the transition.

The document returns to the topic of justice in the section on the budget and green investments. Here, it repeats the idea that "the transition can only succeed if it is conducted in a fair and inclusive way", and that citizens, member states and regions will be affected in different ways "depending on their social and geographical circumstances". Moreover, it recognizes that not all of them "start the transition from the same point or have the same capacity to respond". While remaining vague about practical measures to implement energy justice, the text states that "the Commission will propose a Just Transition Mechanism [JTM], including a Just Transition Fund [JTF], to leave no one behind". The JTM will be funded from the EU budget, expected finance from the European Investment Bank and private funds, and "will focus on the regions and sectors that are most affected by the transition because they depend on fossil fuels or carbon-intensive processes".[31] Distributional justice considerations are also prominent in this section, as reflected in the statement that the JTM "will focus on the regions and sectors that are most affected by the transition because they depend on fossil fuels or carbon-intensive processes". However, some attention is also paid to recognition-based justice, for instance in the claim that support mechanisms will "strive to protect the citizens and workers most vulnerable to the transition".

Further details on the logic and funding mechanisms of the just energy transition envisaged by the Commission are presented in the JTF regulation.[32] Article 2 of the regulation specifies the "single specific objective [of the JTF] of enabling regions and people to address the social, employment, economic and environmental impacts of the transition". Article 8 clarifies that the JTF supports activities that are directly linked to this specific objective. These include, for instance, productive investments in small and medium-sized enterprises leading to economic diversification, modernization, and reconversion; investments in research and innovation activities, renewable and affordable green energy, smart and sustainable local mobility and digitalization; investments in regeneration and decontamination of brownfield sites and land restoration, enhancing the circular economy and upskilling and reskilling of workers and jobseekers.

Co-funding from the JTF is organized based on a progressive logic that addresses distributional justice, meaning that poorer regions get more co-funding. It can reach 85% for "less developed regions", 70% for "transition regions" and 50% for "more developed regions". Member states are required to draft territorial just transition plans, which should identify the territories most negatively affected by the transition in economic terms, and where JTF support should be concentrated. Therefore, the territorial plans also follow a distributional justice logic. They should explain the specific challenges of the most affected regions and detail the initiatives and policies planned to address them. Based on the regulation, and specifically its Article 11 on territorial just transition plans, this process is primarily top-down: it is member states "together with the relevant local and regional authorities" that prepare the plans. There is no mention of consultation with or direct involvement of local communities, which suggests that procedural justice plays a secondary role.

The EGD emphasizes the EU's desire to implement fairness in the transition beyond the EU. It argues that "The EU will work with all partners to increase climate and environmental resilience [...] and support a just transition globally". This is part of the EU's outreach to the "Global South" and other developing countries, which is also reflected in subsequent documents, such as the Global Gateway.[33] In this regard, the EGD also envisages the introduction of a Carbon Border Adjustment Mechanism (CBAM) in 2026, which is a carbon tax on some energy-intensive imports such as steel, cement and fertilizers. Several countries in the Global South see CBAM as an unfair, protectionist measure.[34] The text also makes specific reference to the mechanisms for legal recourse:

30 Ibid. p. 2.

31 Ibid. p. 15.

32 Regulation (EU) 2021/1056 of the European Parliament and the Council of 24 June 2021 establishing the Just Transition Fund, https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:32021R1056.

33 European Commission 2021.

34 For details, see Grimm et al. 2021/2.

The Commission will consider revising the Aarhus Regulation to improve access to administrative and judicial review at EU level for citizens and NGOs who have concerns about the legality of decisions with effects on the environment. The Commission will also take action to improve their access to justice before national courts in all Member States. The Commission will also promote action by the EU, its Member States and the international community to step up efforts against environmental crime.

While job losses are expected from the phase-out of the fossil fuel industry, IEA data points to even greater opportunities for job growth from the low-carbon energy transition. In line with these findings, the EGD aims to create 2.5 million new jobs in the EU by 2030.[35] These are anticipated to be linked to the low-carbon energy sector and adjacent or supporting industries. Part of the funding for the new skills needed for such jobs will come from a different pillar, the Social Rights Action Plan, but the JTF is also expected to contribute to skills training. As a part of this, the European Union has also established the RES-SKILL project, with the goal of increasing the skills needed for new jobs in the low-carbon energy sectors.[36]

The European Union can leverage its other funding and support mechanisms, such as the Social Climate Fund, to facilitate a more just energy transition by providing jobs and skills training, offsetting CO2 costs, ensuring the security and resilience of the energy supply, and encouraging community investments in low-carbon projects.[37] Additional funding for this could come from the REPowerEU Plan, which lists the acceleration of workforce requalification among its goals, and the Recovery and Resilience Facility, which is explicitly linked to the European Green Deal.[38] It is beyond the scope of this paper to consider the potential of these policies in the current EU political climate, but it is an interesting place to take research forward – as mentioned above, there is more consensus on climate policy in the EU than in the US. That said, the re-election of Donald Trump to the US presidency could have implications for the way this discussion is advanced in the European Union. The emergence of Trump and his overt climate-change denialism could empower the EU's climate-change sceptics and begin to shift the consensus and discourse. Trump could fan the flames of opposition to the European Green Deal. The overall effect could be to put the energy transition debate, which has been moot in Europe for some time now, back on the table.

3. THE UNITED STATES

The United States is a large and influential policy actor. On energy and climate, it drives change within its own borders and at the international level, and can incentivize other actors to pursue energy transition paths. Under the Biden administration, this influence grew as the federal government took on a larger role, particularly within the realm of climate, energy, and industrial policy.

The largest and most influential piece of climate legislation in the US in the last decade is the Inflation Reduction Act (IRA). Passed during the Biden administration, the policy contains initiatives to facilitate energy justice and to offset impacts on communities, including states, municipalities, nonprofit groups, and Native American tribes. The IRA touches on all elements of energy justice, including distributional aspects, such as policies and funding that focus on US regions that suffer from the low-carbon transition; recognition, such as identifying parts of the US, including Indigenous peoples, Black and Latino communities, and impoverished Americans, as vulnerable populations at high risk; and procedural elements, which include specific policymaker responses that integrate these other aspects.

The IRA uses the term "environmental justice" rather than "energy justice". An overview of this terminology shows how close it is to the EU's use of "energy justice". For example, environmental justice aims to "combat climate change and promote climate resilience and investing in the green economy in a way that creates good, well-paying jobs, with a focus on combatting inequality and the disproportionate impacts of pollution and climate change on disadvantaged communities".[39] Hence, while the terminology varies, as Van Veelan and van der Horst point out in their 2018

35 International Energy Agency 2023.
36 RES-SKILL Project page.
37 The European Commission's Social Climate Fund 2024.
38 On the REPowerEU Plan, see Siddi 2022.
39 Skylar Bluestein 2023.

review, it is notable how the goals align with both the academic and the policy frameworks. This is highlighted in adjacent policy documents, which provide an overview of the IRA and its efforts to redress injustice in the energy transition.[40]

One of the trade-offs and costs of the energy transition is the need to pivot away from traditional hydrocarbon sources – the default in some communities – towards low-carbon sources. This involves, on the one hand, the development, investment, and incentives to transfer to new ways of producing and energy; and on the other hand, accounting for the shock that can come from removing an old way of doing things and its impact on pocketbooks as well as culture and community.[41]

The energy justice literature frequently mentions "energy democracy" and "energy communities". The IRA refers to "energy communities" at length. One definition of an "energy community" is a brownfield site – essentially an industrial area.[42] The definition goes on to include those areas with high levels of direct employment (over 17%) or tax revenues (25% or greater) from the extraction, processing, transport, or storage of coal, oil, or natural gas. The IRA also includes those areas where a coal mine has closed or been retired. It also refers to low-income communities below a certain poverty line, with an emphasis on policies designed to improve the economic situation of Indian and Indigenous communities, for example, by earmarking specific funding that is only for such communities to use. Within the IRA, the policies to alleviate this are aimed at residential buildings, in which the IRA is drafted to incentivize low-carbon electricity installations. The text links low-income communities to the energy justice initiative, as exemplified in section 13103, entitled "Increase in energy credit for solar and wind facilities placed in service in connection with low-income communities". It provides definitions for key terms related to the communities in question and states that "the Secretary shall establish a program to allocate amounts of environmental justice solar and wind capacity [...]".

The IRA is supported by specific funding schemes and supporting measures. An important analytical dimension is the bridge that US policy builds between "environmental justice" and "energy justice". The US has a variety of associated projects and funding mechanisms that were created or financed by the IRA and that are housed under federal agencies. Indeed, the US federal system has an impact on the distribution of the policy implementation. For example, many primary components of the IRA are overseen by the central Internal Revenue Service, which includes tax breaks, incentives, and grants. US federal agencies are also well positioned to carry out initiatives independently of the legislature.

In 2024, the US Department of Energy allocated $5 million to launch the Regional Energy Democracy Initiative (REDI) to support local groups and those tailored to assisting minorities, NGOs, and community organizations in facilitating fair climate project funding.[43] The REDI project was part of the Biden administration's Investing in America agenda, which worked to strike a balance between broader development and specific local benefits on jobs, training, and engagement. Adjacent projects include the Justice40 Initiative, which is based on Biden's executive Order 140008 (Tackling the Climate Crisis at Home and Abroad), which directs 40% of Federal investments to disadvantaged communities.[44] Similarly, the Community Benefits Plans (CBPs) requirement aims to foster deeper ties between labour, inclusion, and access, and it tasks project developers to demonstrate how a project will serve the community.[45] These are funded through the Bipartisan Infrastructure Law (BIL) and the IRA.

The relationship between the federal agency – including the oversight capabilities of the Department of Energy vested by the presidential administration (executive) and policy (the legislative branch) – and efforts to empower local leaders and project developers creates a multi-tiered, horizontal policy integration among stakeholders. The Environmental Protection Agency (EPA) houses the Environmental and Climate Justice Program (ECJ Program), which provides funding to assist vulnerable communities, as identified by the Disadvantaged Communities map.[46] The IRA also has a designated fund with over $722 million earmarked for Tribal and Indigenous communities, and it has a further $46 billion for which such communities can apply.[47]

For the US under the Biden administration, climate change presented a pivotal moment to make a change

40 For example, this policy brief released by the Democratic Party in the US Senate, https://www.democrats.senate.gov/imo/media/doc/environmental_justice_in_the_inflation_reduction_act.pdf.

41 Consider the argument put forward in Kideckel 2004.

42 See "a brownfield site" as defined in subparagraphs (A), (B) and (D)(ii)(III) of section 101(39) of the Comprehensive Environmental Response, Compensation, and Liability Act of 1980 (42 U.S.C. 9601(39))).

43 U.S. Department of Energy 2024a, which is aimed at a specific geographic region in the US, the Gulf South, which is classically impoverished and a minority area.

44 White House 2021.

45 U.S. Department of Energy 2024b.

46 EPA 2024.

47 The White House 2023a.

from "business as usual" to a new way of doing things. While there is potential to shape the direction of policy, US policymakers remain constrained by the need for popular voter approval. Within the US two-party system, the Republican Party is usually reluctant to use government intervention to affect outcomes. In addition, although it may be remarkable to a European audience, there is still strong climate-change denialism in the Republican Party. There are generally several categories of approaches to climate change among Republicans: those who deny climate change and think it is a hoax to extend government overreach and encroach on citizen autonomy; those who believe climate change is real but think that the government should not intervene and that the private sector should be trusted to make the appropriate responses; and those who think that climate change is real and think that the government could have a small, limited role in order to galvanize the private sector. There are also those who use climate change denialism as a political tool to appeal to a certain voter audience. Finally, climate-change relativists argue that the climate may have warmed or cooled, and that human activity may or may not have had an impact, but for them, it is simply not an important policy issue.

The energy transition is unlikely to remain a priority for the US, especially with the re-election of Donald Trump, a climate change denier who has argued that alternative energy is a waste of money.

4. COMPARING EU AND US FRAMINGS AND POLICIES ON ENERGY JUSTICE

Discrepancies exist between EU and US policy documents. While they could be attributed to the nature of the actors, they present some points to gauge where just energy policy mechanisms could be improved to be more comprehensive within the distribution, recognition, and procedural elements.

In the case of distributional justice, the EU's JTF allocates funds to member states,[48] which are responsible for identifying the regions most heavily affected by the energy transition in their territorial just transition plans. These regions are given priority in funding allocation. The EGD refers to the need for a just transition on a global scale, and not as something that is exclusively for European Union member countries and their populations. The United States, by contrast, focuses most of its policy documents on domestic impact. There is some reference to "regions" within the US, such as the south, but individual states are not named. This is despite the fact that funding is often spearheaded at the state or regional level, and that the effects of the energy transition, and therefore the IRA, can vary by state or region.

Both the EU and the US refer to those impacted by climate change or the energy transition, and both use the term "energy communities". However, the IRA's understanding of the term appears to focus more on the distributional aspects of the energy transition, namely on the communities most affected by the phaseout of carbon-intensive industries. By contrast, the EU uses the term to emphasize the potential social and economic benefits of creating, for instance, a green energy community that pools individual resources to produce and efficiently distribute renewable energy. Both the US and the EU are moving towards language that focuses on the security of energy supply and opportunities for economic growth, while also mentioning the risks and problems posed by climate change.

Recognition-based justice policies in the EU and the US differ in their specific provisions for vulnerable groups. The US implements explicit policies aimed at offsetting sub-optimal situations for marginalized groups, including Tribes, Indigenous people on reservations, and impoverished urban and rural communities. In the European Union, this recognition aspect is less present, and it is something that could be improved upon. At the same time, the EGD refers more to the global transition and global communities, which widens the scope of recognition beyond its own borders, unlike the US. This special recognition is an important aspect of the pursuit of energy justice, as governments can seek to implement policies that reach beyond their own borders. Indeed, the effects of climate change and the energy transition are not limited to state demarcations.[49]

On procedural justice, in EU policies are comprehensive and far-reaching in their language. Yet, the incorporation of myriad stakeholders in the consultative process, and therefore the ultimate procedure

48 See Annex 1 of the Regulation establishing the Just Transition Fund, https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX%3A32021R1056.

49 Konrad Gürtler 2023.

and implementation across the Union, is quite diffuse and up to the member state countries. Still, the EGD includes a Climate Pact that highlights citizen involvement and procedural justice.[50] In the United States, the setup is centralized.[51] For example, the Office of Insular Affairs is responsible for grants, loans, and financial assistance for areas in terms of technical assistance for climate change planning, mitigation, adaptation, and resilience. But there are security, economic, and political implications for the energy transition, so ultimately the US could expand the number of US agencies involved in facilitating the transition – as could the EU.

There are also differences between the EU and the US in terms of mechanisms to incentivize or compel policy follow-through. The European Union has fewer mechanisms – legal or otherwise – to ensure the enforcement of top-down policies or to integrate feedback from local populations. As a more general observation, the US federal government has much more power in many of the domains relevant to the transition: there are federal agencies like the Department of Energy, the Internal Revenue Service, and the Department of Agriculture to oversee and coordinate mechanisms such as grants, tax breaks, and incentive schemes. In the EU, Brussels arguably has limited competence over these matters vis-à-vis national governments.

CONCLUSIONS AND POLICY CONSIDERATIONS

This paper has examined and compared the policies of the European Union and the United States that aim to address energy justice in the energy transition. It has considered the extent to which the policies attempt to enshrine energy justice, as well as the various understandings of the term from the distribution, recognition, and procedure points of view. Moreover, it has contributed to the comparison of EU and US approaches to policy implementation.

There are some policy implications that could be drawn from this research. For example, it is possible to see the shortcomings that the EU faces in its lack of a central body, such as the IRA, to oversee the tax and grant systems. While there are national courts of auditors and an EU Court of Auditors, these are agencies that can only inspect and provide feedback on the policy implementation after it has happened, rather than during the process. The Commission has supervisory powers through the mechanisms and reporting system set up by the Regulation on the Governance of the Energy Union, but it does not have clear legally binding instruments or enforcement powers.[52] However, the EU would have other options to provide relief and promote energy justice, for instance through a tool like state aid exemptions, which could provide direct means for a state to intervene in the economy and compensate specific communities for the losses caused by the energy transition.

The evaluation of energy justice policies raises a number of questions about several issues, including:

- Information on whether or how the policymaker (EU/US) considered definitions of "energy justice", "just energy transition" or all definitions of "justice", and how they arrived at their working definition.
- A lack of consistency in terms such as "energy transition", "decarbonization", "energy community" or the impact of climate change across US and EU documents, and in cooperation with other potential stakeholders. The US and EU could consider clarification, particularly in international spaces where there are opportunities to work together or learn from each other's initiatives.
- Lack of clarity, especially on the EU side, about the backstops for accountability, audit, or incentives to take up the programme.
- Lack of clear feedback mechanisms for the community to respond to the policies or alter them to become more effective, which is part of the "procedural" aspect of justice.
- Lack of optics and knowledge of those impacted by the energy transition. Perhaps most importantly, these policies are intended to help facilitate a just energy transition, but the people most affected might not know that the assistance exists or that it applies to them. This is a problem especially for marginalized or disadvantaged communities that might already be wary or sceptical of government action.

To continue to shape policy ends to meet energy justice needs, policymakers and the corresponding policies should ensure that they consider a wide

50 European Commission 2019.

51 Congressional Research Services 2023. See also White House 2023b and US Department of Energy 2022.

52 European Commission 2018.

variety of understandings of "energy justice" and "energy transition". This means drawing on a variety of sources and data, including quantitative data such as energy prices and reductions in "energy poverty", as well as qualitative data such as public satisfaction, for example by adopting best practices from the IEA's People-Centred Clean Energy Transition Commission. Second, policymakers should consider the interoperability and continuity of policies across the spectrum of national, supranational, and international organizations. This is particularly important in international fora and gatherings among stakeholders, during which gaps in the policy framework can be jointly identified and addressed. Finally, policymakers should consider whether the energy justice policies are achieving what they set out to do. They should look for a mechanism – an audit of sorts – to collect and provide feedback from the local community, thereby strengthening energy democracy. The feedback mechanism could also lend resilience and long-term sustainability to the policy.

These policy observations and shortcomings are areas for future research, discussion, and comparison. Another direction for future research could be a closer examination of the enforcement mechanisms of the policies; for example, to identify case studies in which US or EU policies are successfully applied. Finally, future research must assess the impact of Donald Trump's re-election on the IRA and US climate policy. At the time of writing, only speculative forecasts are possible. Within this realm, some aspects of the IRA pertaining to energy justice – such as recognition-based justice concerning tribal and Indigenous communities – are at risk of not being implemented. /

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