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Abstract

In 2008, Walker and Devine-Wright published a short article that is now a key way-marker in the field: *'Community renewable energy: what should it mean?'*. A decade on, in this *Perspective* we revisit Walker and Devine-Wright's paper to re-examine its central themes and to identify opportunities for the coming ten years of community renewable energy (CRE) studies. Our *Perspective* takes the form of a series of paired reflections from the authors of the original paper and three early career researchers whose work it has influenced. We present these reflections in three themes. First, despite its title, the 2008 article itself is not centrally concerned with meanings, still less what CRE should mean. CRE is always defined by its context, therefore, we argue for an approach that is alive to these contexts. Second, while the article splits 'process' and 'outcome' when conceptualising interpretations of CRE, research labelling CRE as either 'process' or 'outcome' can obscure CRE's complex and entangled dynamics. Third, the past decade of scholarship emerging in this article's wake has tended to concentrate on the means by which CRE develops, rather than on its ends. There is a need for greater attention on the impacts of CRE, particularly its role in achieving just transitions. We propose that new methodological approaches could further galvanise the study of CRE to help understand what CRE does, for whom and in what contexts.

Keywords

Community; Renewable energy; Meaning; Just transitions.

1. Introduction

A decade has passed since Walker and Devine-Wright (2008) published their highly influential article '*Community renewable energy: What should it mean?'*. Capturing the wide array of initiatives and burgeoning academic work on community renewable energy (CRE), it outlined a nuanced account of the "panoply of different interpretations" of CRE, and what this diversity illuminates and occludes (p.498). Written at a time when the term 'community renewables' had only recently emerged within energy policy, Walker and Devine-Wright pointed to the variety of meanings on offer and the effects of this variety, noting that retaining an openness to what CRE

might mean allows "a flourishing of grassroots activity without restricting this to a particular top-down notion of what a community project had to look like" (p.499).

The intervening decade has firmly established CRE as an academic field: fleshed out with a bulwark of empirical examples, theoretical reflections and methodological tools. The valuable evidence base built up through high quality CRE research conducted to date means we now know much more about what is happening on the ground, including who is involved and their motivations (see Hicks and Ison, 2018 for a review of this literature), as well as the potential economic, social, and environmental benefits of these projects and the observed barriers to success (see Brummer, 2018 for a review of this literature). CRE research is also now an international domain, moving far beyond the UK-focus of Walker and Devine-Wright's article (Becker and Kunze, 2014), beyond even the English language and the particularity and polysemic character of the English word 'community' (Bauman, 2001; Delanty, 2010; Walker, 2011). Across this diverse and rich literature, Walker and Devine-Wright (2008) has been, and remains, one of the most highly cited works, providing a key foundation stone for building this vibrant field. The time is therefore ripe to revisit the paper and consider its ongoing contribution in an evolving academic and political landscape.

In this *Perspective* we present a series of paired reflections from the original authors (Walker and Devine-Wright) and three early career researchers (Creamer, Taylor Aiken, and van Veelen) who each started and completed their doctoral research within the ten years since the paper was published, and have repeatedly returned to the 2008 paper in pursuing various questions of how community relates to renewable energy transitions. Our aim is not to provide a systematic literature review or a 'state of the art' paper; we make no attempt to present a comprehensive summation of the indisputable advancement of knowledge made by CRE research over the last decade. Instead, we present our reflections on how Walker and Devine-Wright's paper has influenced the field over the past ten years and give a view on how we believe it could – or should – continue to have an influence in the next ten years, with the aim of provoking debate and further research.

Our reflections are presented in three sections, each exploring a different way in which the original paper has influenced CRE scholarship, including our own, namely: a search for meaning; the division of 'process' and 'outcome'; and a relative lack of attention on the role of CRE projects in delivering just transitions. Each section begins with a proposition from Creamer, Taylor Aiken, and van Veelen, and is followed in turn by a response from Walker and Devine-Wright, who give their own perspectives on

the issues raised in light of the ten years since their original piece. The paper concludes by drawing these reflections together to argue that, going forward, CRE research should focus on a different framing question: not what should community renewable energy *mean*, but what does community renewable energy *do*?

2. Against the search for meaning

Creamer, Taylor Aiken and van Veelen: For us, the question Walker and Devine-Wright (2008) ask at the start – What should community renewable energy mean? – is meant to be provocative and is not their research question. Time and again they return to questions of what CRE means by emphasising that the meaning of CRE has become "an object of contestation". The article questions whether diversity in the meaning of CRE is a good thing. This questioning attitude is characteristic of community itself, a term which seems to never go away, fully resolved. The article points to the "evolving and fluid meaning" of 'community' "used for numerous ideological and rhetorical ends" (p.498). It is precisely community's internal difference and capaciousness that requires research on CRE to not ignore or avoid questions of meaning, but to move beyond it, otherwise this research becomes a regressive, conservative pursuit for etymology.

'Meaning' can mean many different things (Ogden & Richards, 1923; Wittgenstein, 1953; *inter alia*), but questions over meaning can be productive questions. Just because we are unsure (or disagree over) what a concept means, does not imply that that this concept is somehow diluted, or blunted, as either an object of analysis or an analytical lens. In this case, just because community can be fuzzy, and is imagined and materialised differently, does not imply community is any less 'real' or unimportant wherever we find its ghostly presence (Joseph, 2002; Gilbert, 2014; Claviez, 2016). Community is internally complex and multifaceted, however under the radar this often flies. Wherever attention is paid to community's meaning and value there results intense dispute, and community is often described with reference to various ideas and ideals, such as place, small-scale, a familiar and positive feeling (Walker, 2011; Taylor Aiken et al., 2017). Debates over what community means, far from indicating its slippery lack of utility and difficulty to readily apply, actually indicate an aliveness; a vibrant, dynamic connection with community's given situation, and not a staid, stale, simple definition.

Understanding the variability of the meaning of words should draw a focus onto the varying contexts in which those meanings make sense: "An analysis that attends closely to the practices associated with such uses in different contexts" (Barnett, 2017, p.45). To describe a situation or arrangement as a community is to call on a host of related values of collectives, similarity, and, crucially, praiseworthiness. It is this evaluative baggage community brings with it that lies at the heart of conflicts over community's meaning and use. The meaning of community, rather than having an essential core, is a context-dependent term, and one that is held together through social arrangements, or 'community norms' (Barnett, 2017). Community (as a word) is therefore held together by community (as a context). We see the task of CRE scholarship to be alive to these contexts, rather than establish precise and 'neutral' definitions. As feminist scholars and others remind us, the establishment of a single encompassing definition is never a neutral process, but one embedded with power relations where some meanings, practices, and actors are recognised while others are not (Young, 1990; Schlosberg, 1999; Lawhon and Murphy, 2012).

Consequently, it is our view that what community means should remain open, and that there is not any one aspect that community, or CRE, *should* mean. We would argue that community is rather what Barnett calls "ethnographically emergent" (2017: 70). By this he infers that the context is all important. This approach requires not searching for a meaning-centred analysis. It is rather sensitive to *why* community matters in any particular situation. It is not what community means that is important, still less what it *should* mean, but why and how community means what it means that matters. By seeing community as ethnographically emergent, we do not want to place ethnography as the only methodology capable of properly getting to grips with community. Instead we see that the meaning of community—if indeed meaning is even the right word—is revealed in community's embedded extensions in various situations, contexts and objects, and that interpreting community's variable meanings requires "a sensitivity to contextual thickness" (Barnett, 2017: 72).

> ***Walker and Devine-Wright:*** There have, over the past 10 years, been times when we felt our 2008 viewpoint paper had been misread or misinterpreted and it is gratifying therefore to see such a clear and careful reassertion of its intent. We indeed never set out to declare what CRE should mean. That would have been to put the words in the title in a different order - 'Community renewable energy: what it should mean' - and to delete the question mark. Rather we were looking to open up a question that had run through an extensive programme of empirical

research at a time when CRE was still a relatively new term and framing for RE project development. Looking back, we focused our attention on meaning and definition for a number of reasons. The reviewers of our research proposal delivered a clear message that we should question how community was being understood, how the term was being deployed and to what ends. In other words, that we should sustain a critical analysis rather than becoming too caught up in the general excitement about CRE that was then in full flow. Members of our project advisory committee also pulled us up at various points when we too easily equated CRE with a particular model of development, emphasising its diversity in practice. And it was hard to ignore definitional questions when they were the source of active argument about the scope of government support programmes at meetings we attended; or at the root of disputes in a particular locality about the legitimacy of a wind farm project (Walker et al. 2010). What community meant to different actors demanded attention and we wrote the short paper at the end of the project to try and capture and summarise what was at stake and why it appeared to matter to those involved as well as to our analysis.

Over the past 10 years the substantial internationally-situated research base that has emerged demonstrates a continued expansiveness to what CRE constitutes and we would still resist any attempt to pin down 'one' meaning for both ethical and analytical reasons. On the other hand, it is surely a legitimate role for researchers to 'call out' very shallow appropriations of community by those seeking to give a rosy glow to otherwise standard development projects; and to give voice to the battles that citizens on the ground can have with those retaining definitional power, for example, over the direction of resources for 'community' project support. So being attentive to meaning but asking more centrally what does CRE do in practice – what does it enable, empower, inspire, include, exclude, obscure or obstruct – in specific situations, as proposed here by Creamer, Taylor Aiken, and van Veelen is a useful reframing and way forward. Their own work, along with that of other early career researchers in the field, is already doing much excellent analysis in this space.

3. (Re)entangling process and outcome

Creamer, Taylor Aiken and van Veelen: Arguably, the most influential element of Walker and Devine-Wright (2008) has been the identification of two key dimensions

underlying different interpretations of CRE projects – 'process' (who a project is run *by*) and 'outcome' (who a project is run *for*). By plotting these against each other in a two-dimensional schematic, the authors created "an indicative abstract space in which different combinations of 'process' and 'outcome', as exemplified in different projects, can be positioned and represented" (p.498). At the bottom left of the diagram, the development process is "closed and institutional" and the project outcomes are "distant and private". At the top right, Walker and Devine-Wright position "an 'ideal' community project", in which the process is "open and participatory" and the outcomes "local and collective". This analysis and associated diagram have been widely cited and continue to provide a useful framework for studies of CRE (e.g. Musall and Kuik, 2011; Seyfang et al, 2013; Ruggiero et al, 2014) and we have three observations relating to the way that it has been taken up in subsequent scholarship.

First, following previous discussions of meaning, we query the use of Walker and Devine-Wright's positioning of the 'ideal' project in the top right corner as a means of defining a CRE project. A typical example is Seyfang et al. who (in another important and influential paper in this field) state: "we follow Walker and Devine-Wright's (2008) lead and consider community energy to refer to those projects where communities (of place or interest) exhibit a high degree of ownership and control, as well as benefiting collectively from the outcomes" (2013: 978). Whilst the diagram has proved useful and popular in this context, we understand 'ideal' to be used here in the sense of Max Weber's 'ideal type', rather than denoting the attributes of the 'perfect' CRE project. The positioning of the ideal project in the top right therefore serves to anchor the analytical framing, providing an exaggerated project archetype, or "purposely created fiction", against which observations of CRE can be interrogated (Hendricks and Peters, 1973: 32) - rather than as a normative statement on where all CRE projects should be positioned.

Second, the separation of 'process' and 'outcome' along different axes implies that at least one of these variables is independent of the other. Yet, for us, these dimensions are often symbiotic, or 'sympoietic': they are made by and with each other (Haraway, 2016). Whilst some of the outcomes of CRE (such as the contribution to renewable energy generation capacity) are not dependent on the process through which they are delivered, much of the expected value of *community* RE projects (compared to non-community RE projects) lies in the shared social outcomes they generate for communities: empowerment, capacity building, energy democracy and justice (Hicks and Ison, 2011; Callaghan and Williams, 2014; Forman, 2017; van Veelen, 2018), which

cannot be delivered without the involvement of people. There is a nod to this within the framework itself via the combination of 'local and collective' on the outcome axis. Setting aside the argument that community is not necessarily 'local' (Amin, 2005; Walker, 2009; Taylor Aiken, 2014), the notion that outcomes are shared *collectively* requires some sort of local process through which they are acquired and/or distributed. Findings from CRE case studies over the past decade have indicated that it is not only that outcomes are dependent upon the nature of the process through which the project is developed and managed, but the processes of collaboration and negotiation that occur at the local level can themselves be seen as an outcome, characterising a more inclusive and democratic society (Berka and Creamer, 2018). Consequently, the means of CRE are not only productive of the intended ends, but the processes that exist on the ground produce or foreclose different outcomes. This relation also works in reverse: the pursuit of particular outcomes can also produce or foreclose different processes. For example, van Veelen (2018) shows how the desire to produce certain CRE outcomes within specific periods of time can prevent more participatory processes. There is a need to further explore the nuances of this co-dependency *between* process and outcome in CRE.

Finally, we wonder about the consequences of the absence of time from the framework. Whilst serving as an effective means of representing the plurality of interpretations of CRE, locating these interpretations on a two-dimensional grid erases the "evolving and fluid" nature of CRE projects, and how they are perceived. Not only are there "diverse forms that 'process' and 'outcome' can take in different projects" (Walker and Devine-Wright, 2008: 499), individual projects themselves evolve and transform temporally. Consequently, the same project may be positioned at very different locations within the framework at different points in time. We therefore see this third dimension as essential to understanding CRE.

> ***Walker and Devine-Wright:*** Diagrams are an effective form of communication and can come to represent key outcomes of research in a usefully compact way. Diagrams also travel easily, as ours has done, for example, into a call for evidence to inform the development of the UK Government's Community Energy Strategy (DECC 2013). However, particular diagram formats – such as the two by two quadrant – insist on simplification and, given the diversity we had found in our research, it wasn't easy to define the two axes for our 'space' for positioning different meanings of CRE. Having decided on 'process' and 'outcome', the ends of the axes ended up being slightly clumsy combinations of different terms

encompassing involvement (participation/closed), proximity (nearby/distant) and distribution (collective/private), after trying out various alternatives.

Whether scale (or size) should figure somewhere was also a question we grappled with but concluded that we should listen to the voices that at the time were saying there was no intrinsic reason why CRE had to mean small-scale. Subsequent trends towards examples of bigger community onshore and offshore wind farms and solar PV installations have vindicated this caution. However, seeing CRE as generally meso-sized, sitting somewhere between the micro and the macro in terms of a categorisation of different modes of renewable energy implementation (Walker and Cass 2007) does now make sense for most cases.

While the diagram has, for good reason, been seen as being about *community* RE, it is important to note that it defines a conceptual space in which any RE project can notionally be positioned, not just community labelled ones – hence the lone 'utility wind farm' we positioned in the bottom left quadrant. It is interesting to therefore reflect on what can be placed in the empty top left and bottom right quadrants. Are there hybrid variants of RE projects in which processes are to some degree 'open and participatory' but outcomes are 'distant and private'? Or where processes are 'closed and institutional' but outcomes are 'local and collective'? Goedkoop and Devine-Wright (2016) focus on shared ownership cases falling into the latter, 'bottom right' quadrant (with some adaptation to the diagram) and conclude that CRE practitioners are divided as to whether or not the meaning of community can be reasonably stretched that far. Such observations play to the insightful points made by Creamer, Taylor Aiken and van Veelen about the interdependence between process and outcome which does merit further reflection and investigation.

In respect of the 'absence of time from the framework' we are prompted to remember another version of the diagram (Figure 1) that featured in project reports but not in fully published form, in which specific case studies we studied occupied not a single point on the diagram but an area or range (see Walker, et al. (2010) for more detail on these case studies). This made clear that there was not an agreement, amongst the stakeholders we spoke to, as to exactly how participatory or how locally beneficial a specific project had been. Rather there were sometimes significant divergences in perspective between stakeholders that the diagram was then used to represent. Similarly, therefore, we agree that the diagram could be deployed to show how projects, or rather stakeholders'

views of them, have evolved over time, although adding a temporal dimension isn't inherently essential to its utility. More generally though and given the scale of accumulated experience, it would certainly be productive to pursue longitudinal research designs examining how CRE is open to change, evolution and development, and sometimes to erosion and collapse (the latter being tricky, but just as important, to research).
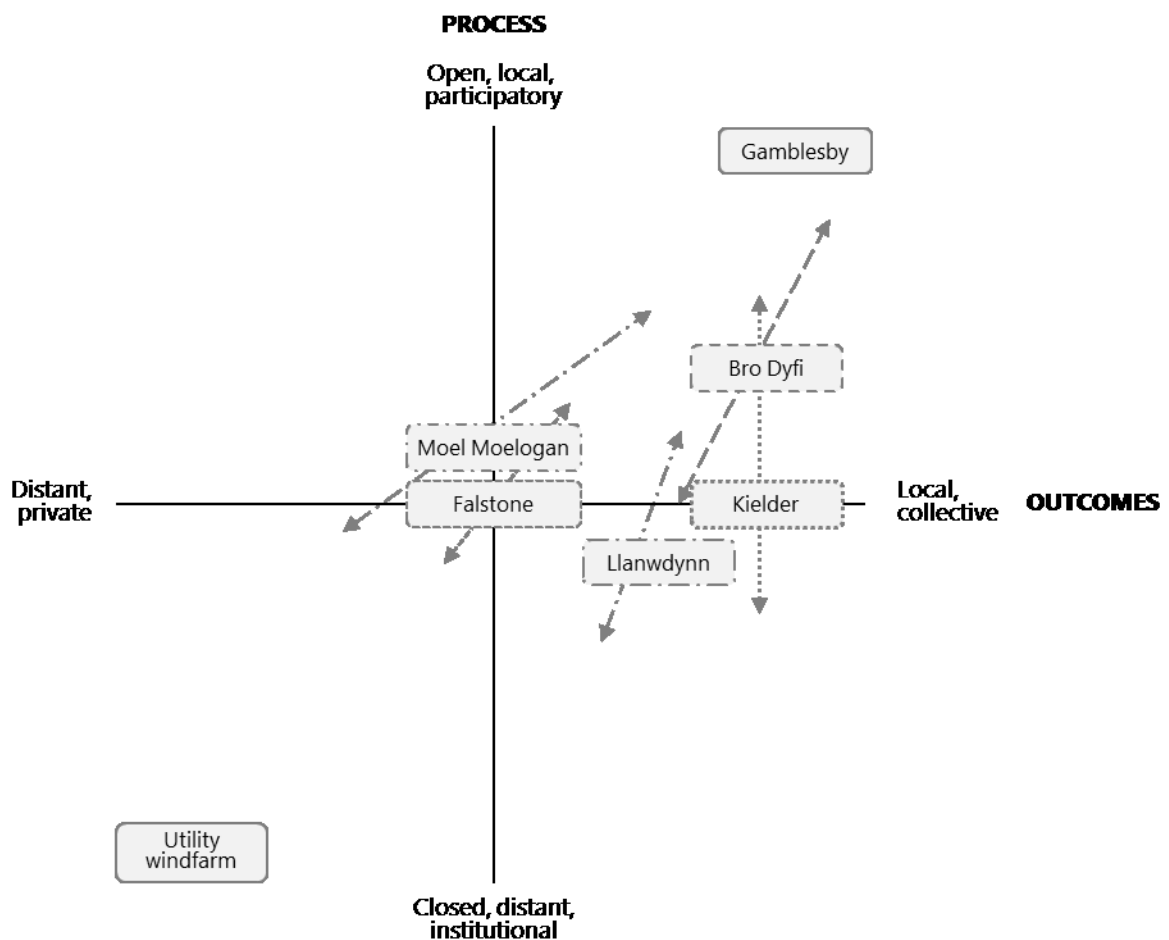

Figure 1 Earlier version of 'process-outcome' diagram with case studies occupying an area rather than a specific point on the diagram

4. Implications for just transitions

Creamer, Taylor Aiken & van Veelen: There is a large body of high quality empirical research on CRE that has explored the factors 'driving' or 'motivating' the development of projects (e.g. Walker, 2008a; Hoffman and High-Pippert, 2010; Allen et al, 2012; Bomberg and McEwen, 2012; Rogers et al, 2012; Wiersma and Devine-Wright, 2014; Wirth, 2014; Doci and Vasileiadou, 2015; Bauwens, 2016; Holstenkamp and Kahla, 2016;

Kalkbrenner and Roosen, 2016). This scholarship has elucidated barriers to participation in CRE projects (Bauwens and Devine-Wright, 2018), and laid the foundations for recent work examining the concept of (energy) justice with respect to participation in CRE projects (Simcock, 2016; Forman, 2017). Using Walker and Devine-Wright's framing, much of this body of justice-related research has been primarily concerned with exploring the 'process' dimension: who does and does not (or cannot) participate. Comparatively little empirical attention has been given to "who the project is for; who it is that benefits particularly in economic or social terms" – and *how* they benefit.

As Walker and Devine-Wright (2008) argued, "labelling a project as community and then local people feeling they are getting nothing out of it will itself simply increase the scope for resentment and objection". Whilst the importance of ensuring CRE projects deliver distributional, as well as procedural justice has been recognised (e.g. Catney et al, 2014; Adams and Bell, 2015; Haf and Parkhill, 2017), for us, this issue would benefit from greater academic attention. There has been a broad tendency – in academia as well as policy and practice – towards an uncritical assumption that CRE projects will inevitably lead to positive outcomes for the communities in which they are located (in addition to a material contribution to renewable energy generation capacity). We believe more research exploring the long-term local impacts of CRE, beyond the experiences of the relatively small number of people who lead or participate in these projects would add substantial value to our understandings of CRE. Only small pockets of data on the social impacts of CRE projects have been collected by community practitioners themselves, due in part to "a tendency within the community sector to focus on 'getting on and doing' rather than on measuring" (Bere, et al, 2015: 30). As such, the academic literature remains largely reliant on anecdotal evidence from a small number of case studies (see Berka and Creamer, 2018 for a review of evidence of the local social impacts of CRE).

In addition to studies assessing the impact of CRE at a local level, we also see a role for social science research to assess the costs and benefits of these projects to society as a whole. Opportunities and barriers to participate in the establishment of CRE projects are not uniformly distributed within and between societies. Participants' age (Park, 2012; Seyfang et al., 2012), gender (Fraune, 2015), income (Walker, 2008b; Catney et al., 2014), education (Harnmeijer, 2012), housing tenure (Rogers et al., 2008; Walker, 2008b) and remoteness of the area (Murphy, 2010; Bomberg and McEwen, 2012; Harnmeijer, 2012) have all been suggested as factors that can help explain

participation in and/or the establishment of, CRE projects. This raises the question, however, of what the possible distributional outcomes are for those communities who do not engage, and do not have access to, for example, the clean energy or income provided by CRE projects. While aspects of the literature on energy democracy have made some progress with conceptualising the possible role(s) of the state in enabling just transitions beyond active and engaged communities (Park, 2012; Chavez, 2015; Angel, 2017), the evidence base for this to date is both theoretically and empirically rather limited.

We see the current gap in evidence on the broader impacts of CRE as partly linked to the way in which CRE has been researched. The field has been founded upon, and significantly benefited from, a wealth of detailed case studies that continue to generate important insights about the nuances of CRE project development, including contextual factors that appear to enable 'successful' projects. At the other end of the methodological spectrum, much has been learned from large-scale surveys and statistical overviews, which have given us an idea of the size and diversity of the sector, and the associated additional renewable energy capacity (see Community Energy England (2018) and Energy Savings Trust (2018) for recent reports on the state of the sector in the UK). Where there has been relatively little work is in the space between these two approaches. We see scope for more research making useful connections *between* cases, understanding the ways in which projects build on or respond to each other, how they 'travel' and impact beyond their immediate instantiation, and the broader social consequences of this activity. The academic attention that has been given to these type of intermediary dynamics in this context has often applied a 'multi-level perspective' (Geels, 2002), examining processes of 'strategic niche management' in the context of socio-technical transitions (e.g. Ruggerio et al, 2018; Doci et al, 2015; Seyfang et al, 2014; Hargreaves et al., 2013). This work has pushed forward our understanding of the role of community energy within broader low carbon transitions. However, we would also welcome more research applying alternative theoretical framings and perspectives that take greater account of questions of social justice, to better understand what CRE does, for whom, and in what contexts.

> ***Walker and Devine-Wright:*** The links to justice concerns are indeed very clear and looking back the process-outcome axes we emphasised were implicitly informed by a distinction made in (some) moral theory between deontological (process-oriented) and consequentialist (outcome-oriented) approaches to determining what is right and wrong, just and unjust. Exploring both dimensions

through an (energy) justice lens is important and we would agree that the distribution of the benefits and disbenefits of CRE are in relative terms under-examined. This in part reflects the challenges of establishing and tracking meaningful outcomes over time and of not reducing these only to outcomes that can be readily quantified. Justice frameworks that are open to seeing well-being and flourishing in multidimensional and potentially multi-scaled terms – such as the capability approach being increasingly applied to energy poverty questions – may prove fruitful in this respect.

In terms of the larger or longer scale dynamics of CRE, we did 10 years ago attempt to find points of articulation with strategic niche management and transition theory (Walker et al 2006), but struggled both to conceive of CRE as occupying a niche or of it having the potential to significantly disrupt the incumbent energy regime. Others have since done much better analysis using these concepts than we were able to (e.g. Seyfang et al 2014), but there are certainly alternative theoretical frameworks to be creatively explored, including for example those deployed within work on political ecology, sustainable materialism, and social practice as collective action.

The question remains though as to how far CRE can be expected to go, or how disruptive to the established profile of energy-making it could become. Our view is that it has a significant but contingent role to play, and that energy policies, market and access regulations need to be both open to and supportive of CRE projects. They are part of an increasingly hybridised, localised, patchwork or mosaic energy system future, and embody important principles and lessons for low carbon transitions processes in general (particularly regarding democratic involvement). Keeping the space for community action open will be a challenge though, as political shifts over the past 10 years, in the UK and European Union, towards consumer/customer focused individualism in energy and related policy, do not inherently chime with a meaningful and practical, rather than rhetorical and fanciful, engagement with the hard work of making CRE happen. Examples of where research engagement has led through to, and been combined with, committed political and practical action – such as in Australia through the Community Power Agency (see http://cpagency.org.au/) – are therefore particularly vital, as is understanding the very different political and cultural contexts that can promote or hold back CRE action around the world (Simcock et al, 2016).

5. Conclusions

Just as community is defined and only makes sense contextually, we wish to see Walker and Devine-Wright (2008) in its context. It is not for nothing that this piece has become so influential, but neither, we argue, is it perfect, or the final word to be said on CRE. Exploring the meaning of CRE was important to an emergent academic field; defining terms, setting parameters, and discerning what this capacious concept described. It will always be important for researchers to remain sensitive to the meaning of CRE. We also strive to be critically alert to the risk of strategic misappropriation of 'community' to manipulate or sugar-coat decisions and impacts relating to energy developments. Walker and Devine-Wright's simple framework has been remarkably powerful for prompting scholars to consider renewable energy projects according to the core dimensions of (procedural and distributional) justice. Ten years on, much is now known about how CRE is manifested and who participates and why (or why not), which challenges conceptions of CRE as singular in form or motivation. However, in delivering powerful simplicity, the process-outcome framework inevitably omits much of the complexity and contingency of CRE. The framework is therefore at risk of being picked up and applied uncritically as a tool for defining CRE or categorising projects by pinning them to a precise point within this space. Ironically, using it in this way contradicts the message in Walker and Devine-Wright's discussion surrounding the diagram: that meanings of CRE – and of specific CRE projects – are plural and contested.

The need for rapid and far-reaching energy transitions is starker than ever. Transitions need to occur in every sector of society on a scale that has never been experienced in human history (IPCC, 2018). Productive questions remain about what CRE can and does contribute to this process – and what it cannot. Researchers and policymakers are increasingly well versed in what CRE should mean; looking forward, we argue that it is important to understand what CRE does in practice. What material changes has CRE produced, and to what consequence? Is there evidence that CRE can meaningfully contribute to just energy transitions, and in what contexts and under what conditions? We believe answering these questions requires a change of tack; not only in framing, but also in methodology. As CRE researchers, we need to be bold and innovative, going beyond single, snapshot case studies, to find ways of understanding what CRE does – or can do – over a longer term and a broader scale.

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