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Measuring the effects of the social rural university campus

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†Tribute to Paul: This article comes from a proposal we were working on with Paul when he died. David and Paul had worked together closely since 1996 when David employed Paul as a research associate and began to supervise his PhD. They worked together closely on many projects at Newcastle University until 2009 when they both moved to other universities, but still collaborated together. Kate first met Paul as a postdoc at the University of Agder in 2014. It was very much an interdisciplinary meeting: their interests overlapped and Paul took on the role of an unofficial mentor. During their collaboration from that time, which shadowed a number of interdisciplinary research projects, he patiently helped her through her first experiences of fieldwork and interviews. (In his calm response to a particularly nasty second review, he parsed what was useful and then stated ‘the rest is patronising tosh, and I don’t respond to patronising tosh’). We both very much miss his creative spirit, his energy, and his friendship.

Abstract

There has been demand in many countries for the establishment of small campuses in more rural locations to spread the benefits of higher education both through the provision of university courses and through the positive economic spill-overs for these communities. Evaluations of the impacts of these universities according to current models show limited effects due to their small scale and specialization. Yet whilst there are clearly spill-over benefits from rural campuses into local communities, these are not only of the traditional (knowledge and economic) variety. Rather, regional campuses create social infrastructure that supports these places’ quality of life. This article seeks to develop a proposal for how such social impacts of regional campuses could be evaluated by creating a conceptual framework that articulates how university-region learning communities contribute to socio-economic development trajectories of rural regions. Our overarching hypothesis is that social rural campuses are places where local learning communities work with globally sourced knowledge to make it useful and usable in particular local contexts. Over time, these activities form the basis of regular contact networks, and the benefits they bring become woven into the provision of place-specific welfare services. As a result, the university’s contributions play a more structural role, and the students are involved in creating more lasting benefits by providing the interaction underpinning these structural collaborations. Our model is exemplified through an exploration of the context of the status of rural university campuses in Norway, and a case study of the Academy of Music, an outpost of the multi-campus University of Tromsø (UiT The Arctic University of Norway).

Key words: rural university; social impact; communities of practice; rural development

formation of CoPs and social benefits, an additional set of benefits are brought into focus, but these can also be connected to wider, long-term regional development processes. It can be argued that such social benefits are more likely to be the main gains in rural areas, although similar processes and benefits may also be seen in urban areas where the same kinds of processes can also take place. This approach does not, however, lend itself to neat standardized quantitative measurement, although as will be seen some numbers can be identified at different stages, however, these are not standardizable across cases. In the discussion, we therefore want to draw out lessons from the case study for the wider operationalization of the model.

As the model has four steps, each presented as a proposition, then each of these can be used to assess the progress of the socialized learning process, the characteristics needed for success, and the kinds of impacts that might be observed.

The first step (P1) is the incorporation of knowledge from global pipelines (Bathelt, Malmberg and Maskell 2004) into the local offering, which we may term a process of **downscaling**. This acknowledges that the presence of a university campus in a region brings in external knowledge, both embedded in the experiences of academic staff, but also continually renewed through their engagement and practice within wider academic epistemic networks (Cohendet et al. 2014). A core characteristic of the academic is the connection both to the local academic institution and to their virtual disciplinary tribes (Becker and Trowler 2001), sometimes formalized through visiting positions in other countries and maintained through conferences and other networks. In this sense there is an enhanced potential where a campus and academic community is internationally oriented, bearing in mind that this is only realized through subsequent local engagement (Benneworth and Hospers 2007). It is assumed that an internationally oriented academic might have more to contribute than one who is very locally focused as they have the potential to bring new ideas and practices into local CoPs. Whilst CoPs are vehicles for learning they can also be stultifying without a flow of new members with new knowledge, entering through what is termed legitimate peripheral participation (Wenger 2000). So, this downscaling process requires the application of new external knowledge alongside the development of, and participation in, CoPs involving the community. Measurement therefore may focus on the international orientation of the campus—origins of staff and students, level of expertise and research engagement of staff, and continual engagement in international knowledge exchange. This must be placed alongside engagement in CoPs, so the campus is not seen as some kind of ivory tower plugged into the global pipelines but not the local buzz. In the Kosen example, the fact that a significant proportion of the performance staff live outside of Tromsø and are engaged part-time at UiT and part-time with professional ensembles or as freelance performers (in addition to the time devoted to artistic research that is part of their university job description) means that there is a continual knowledge exchange on both the regional and national (often international) levels.

To give another example of this from a very different region, Heriot Watt's School of Fashion and Design is based in Galashiels in the Scottish borders but with programmes also in the University's Dubai campus, and the school deliberately encourages collaboration and joint working between staff and students across the two campuses in very different global contexts. So, the work in Galashiels, emerging from a century old tradition of supporting the local woollen industry, but with a strong sense of innovation in a UK context,

is connected with cutting edge fashion from the Middle East as well, in addition to the other national and international connections the school has.

The crucial issue in this application of global pipeline theory is that the university campus has the global connections, is engaged in international collaborative research, and the staff participate in international activities. Reviews of rural campuses suggest that some struggle to attract the best researchers and the complexity of job roles in smaller institutions leaves limited time for research (Wolfe and Strange 2003). The successful social rural university therefore has to have evolved a strategy that reinforces the position of research specialization, which is not always the case in rural branch campuses (Charles 2016).

The second step relates to the use of teaching activities to anchor the CoPs and may be termed **anchoring** (P2). Here the focus is on the use of student-related activities to support and reinforce CoPs and ensure the university is strongly linked with the local society, both directly through the work of locally based students and through their interactions with local community partners. This form of interaction is usually described as service-learning and is relatively common in the USA, less so in Europe, but seems to be increasing. It is a form of pedagogy where the student takes their academic skills into the community where they can be applied for community benefit (Vogelgesang and Astin 2000). In the Kosen case, we see students performing alongside community members or doing supply teaching in local music schools, and students specializing in music education undertake their professional experience in local mainstream schools. Many disciplines have some element of professional practice where students do part-time work in their professional settings and become enculturated in those professional communities. There is a two-way process, however, as students and their teachers introduce new ways and skills into those practices, as well as acquiring existing practices. In disciplines without strong professional associations, the student engagement may take place through student community projects. Here, the experience of the Dutch Science Shops is instructive as students work with community groups in undertaking research projects to address community needs (Wachelder 2003).

The students thus can be seen as boundary spanners, members of the university/academic CoP (Degn et al. 2018), but also as legitimate peripheral participants (Wenger 2000) in the CoPs outside of the institution in a similar manner to the Knowledge Transfer Partnerships examined by Gertner, Roberts and Charles (2011). Through simultaneous membership of both CoPs, the students provide an effective mechanism for two-way knowledge transfer through buzz.

Here, then, the measurement activity may focus on the proportions of students engaged in different forms of community activity either formally within their educational programmes or through voluntary activities. The challenge for the university is to try to connect these activities to areas of expertise within the university as well as to the CoPs within the community.

The third step is the **institutionalization** of CoPs into long-lasting assets (P3), and this might take the shape of some form of association, a regular event such as an annual festival, or the formalization of student placements into an annual programme. This is intended to go beyond the normal reification of knowledge within a CoP: the production of artefacts, stories, and events that reflect the shared experience (Wenger 2000). This could be some kind of formal body or activity as opposed to the informal nature of the CoP. An epistemic community could provide the 'plumbing' or ecology for a series of projects within which learning takes place, in what Grabher (2004)

terms communiality—lasting intense ties, based on common history, with strong trust relationships. The key point here is that, rather than being a one-off event, a commitment develops, which ensures a deepening of the learning and hence impact. In the Kosen case, this is illustrated by the formation of ensembles and founding and/or participating in annual music festivals. This phenomenon has not been extensively studied other than work on projects (such as Grabher 2004) and exhibitions such as Thomas' (2016) work on the Royal Welsh Show and is the most novel aspect of this framework. As Thomas argues, the regular—if only annual—interactions between actors through a shared event can help to sustain a CoP and promote ongoing learning.

Our initial observations of this process in our case study need to be replicated elsewhere to develop the conceptual understanding as well as to develop appropriate indicators. Measurement of such institutionalization is difficult and instead examples should be identified, although once identified the scale of engagement can be monitored—such as how many people from the university and community are involved—the geographical reach in terms of membership can be mapped, and the connectedness through social networks can also be mapped.

Finally, the **upscaling** step of the process takes us back to the conventional macro-level analysis of university impacts by looking at the attraction of external resources and outcomes (P4). If the institutionalized CoPs generate events, for example, we can include the economic impacts of these in conventional university impact studies (Blackwell, Cobb and Weinberg 2002), even though such studies may be criticized as politically manipulable depending on the assumptions made (Crompton 2006). In our examples of cultural networks and events, this can be seen in the form of attracting visitors to the area to participate in a festival, with the concomitant impacts on the travel and hospitality industries, as well as on the external profile for the region through media and personal recommendations (Moscardo 2007). Here, we perhaps need to consider the difference between an event wholly hosted by the university and one hosted in the community with university involvement. Whilst there is no reason why a university might not organize a concert or create a museum or art gallery, and these might attract some visitors from outside the region, the added weight of working with the community and a range of external funders and promoters may create much more impactful events and attractions. Similarly, the university may add value to a community-initiated event and increase its attractiveness. In a highly competitive cultural tourism market, then, the joint endeavour could be considered to have an advantage. In the Kosen context, there is a very simple financial benefit for tourists and locals alike to take into account here: concerts organized by the university are free and those organized by the community with high student involvement are priced as low as possible. In a region that attracts a high number of tourists, often on a tight budget in one of the world's most expensive countries, the chance to attend a free concert by next year's professionals in a venue that usually charges an entry fee often comes as an extremely pleasant surprise. In addition, when students are members of established bands/ensembles with local followings, their (free) exam recitals can be standing room only. This kind of impact is difficult to measure on a financial scale, but monitoring of attendance, as well as more altmetric monitoring such as an overview of social media hashtags and trends (Tahamtan and Bornmann 2020), would give an indication of both local and broader impact.

Looking beyond cultural events and the attraction of tourists, what other forms of upscaling are feasible? Another form of external resource may be investment—funding from government for innovative public services, or private investment in businesses, which emerge from or engage with the CoP. For any such external resource input some estimation of the benefit arising from the university engagement should be possible, although it requires close investigation of the individual cases rather than the inferred assumption of multiplier effects from university spending. Rarely would such impacts emerge from the standard multiplier methods anyway, as they are not usually linked to university spending, or to university income streams such as revenues from licensing technologies or selling stakes in spinoff companies. The social rural campus model is a challenge to conventional university impact assessment not as an exception to the rule, but more to point out that the rule has been developed from exceptional cases of large research-oriented universities in metropolitan centres, and cannot simply be applied to all universities.

Conclusions

The focus of this article has been to look beyond conventional university impact studies to examine how we can identify and measure the 'something else' that universities add to their communities, especially in those smaller rural campuses that lack the scale and big science which it is assumed leads to economic spill-overs. These other kinds of impacts and engagements are often linked with elusive, social relationships, and as such their evaluation may carry some risks—how do we measure their effects without destroying them or getting in the way of the activity? Over-analysis could lead to attempts to change the dynamics of CoPs in ways that are detrimental, yet it is also important to learn from what works in particular situations to pass on the lessons to other places. Studies that continue to focus on economic multipliers and patents will miss a set of other important impacts with the result that they are undervalued and could be inadvertently (or ill-advisedly) closed down by changes in university management.

It is argued that having a better conceptualization of the processes by which positive effects are induced is central to sensitive measurement. In the model of the social rural campus, a central place is given to the social interactions in CoPs. What is important is not knowledge as bits of information passed over an organizational boundary, but socialized and integrated processes of collective learning, often through intensive interaction over time. What information may be needed by the community need not necessarily be identified a priori, but instead discovered through long-term interaction. It is the process of that interaction which is what matters, and impacts are emergent. Measurement thus needs to be part of a self-awareness of the academic participants, but not an iron cage (DiMaggio and Powell 1983) that is imposed from above and might redirect efforts to those things that can be more easily measured.

This presents a challenge for both researchers and policymakers who have traditionally focused on formal measurements of economic value or business engagement as way of valuing the contribution of a university to its community. By the conventional measurement of economic output, small rural campuses have limited local impact, and focusing on patent licences or research contracts might suggest that such campuses have little to contribute as neither they nor the

surrounding community are science intensive. So, impact evaluation studies need to be reframed to focus on the contributions that can be made rather than those that may be easier to measure. It suggests a change of approach from the reliance on a few economic or codifiable indicators to the assessment of a social process and the dynamics of the interactions between academics, students, and community practitioners. Practically, we need more detailed process studies that focus on how to maximize the community benefits of CoPs, where the outcomes may be highly heterogeneous rather than a standardized model of a spinoff firm.

For university managers and policymakers, though, there is a need to recognize that the community benefit is an important aspect of these campuses in addition to the individualized benefit to each student. Whilst each student benefits from their experience of higher education, the model of the social rural campus seeks to identify how the community can benefit alongside the student, where the student becomes an additional route of wider community value creation through knowledge exchange, promoting learning among community members, building social capital and community resilience, and ensuring some continuing benefit even if the student then leaves the region on graduation, as many do. The benefits can be seen through rather more convoluted logic chains than are usually applied in evaluation and impact studies, but policymakers need to make the investment to identify the connections in these logic chains as a counter to the neoliberal emphasis on individualized benefits and costs.

The difficulty in many national HE systems is that university managers have to be aware of and are often driven by competition measured in terms of funding for student numbers, and international performance rankings. This has led to pressure on rural campuses that struggle to match the metrics of the big urban universities. In some cases, rural satellite campuses have been scaled back or even closed as a consequence, with no consideration for the community social impact. Policymakers and university managers together need to take a wider perspective, and we argue that the approach set out in this article can help in that journey.

The social rural campus model thus offers a way to conceptualize a different set of interactions and impacts for universities on their communities, which could be especially helpful in small rural campuses, perhaps especially (though certainly not exclusively) those with a cultural orientation. In this article, we have explored how it might be implemented via a case study from Norway, which has allowed us to exemplify the key processes, but more work is needed to experiment with this approach in other contexts and locations, and working across a range of disciplines.

Notes

1. In this article, we use the terms 'rural', 'remote', and 'peripheral', not exactly interchangeably but rather according to the context, to designate different kinds of locations that are outside of large urban centres.
2. The theoretical underpinnings and model presented in this article were to be submitted as a research project proposal to the Norwegian Research Council in May 2020, with Paul as PI, Kate (co-author here) as deputy manager, and David (also co-author) as part of the project team. As Paul died whilst the proposal was being finalized, the planned project did not take place, so here we present the model and one of the case studies that inspired it.

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