Building Resilient, Smart Communities in a Post-COVID Era: Insights From Ireland

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ABSTRACT

The COVID-19 pandemic spread rapidly throughout the world in early 2020. Beyond the substantial health impacts, the crisis has served as a catalyst for a dramatic shift in working practices, a greater reliance on technology, and a subsequent reduction in air pollution and greenhouse gas emissions in the most heavily populated parts of the planet. Indeed, the crisis has highlighted the interconnected nature of society's vulnerabilities while also demonstrating that transformational change is possible. These rapid changes have ignited debate around how to build more resilient societies and the role of planning in promoting equitable and sustainable recovery. This article presents key insights from Ireland, as policymakers grapple with these questions and the role of technology in ensuring ongoing delivery of services and a continuation of democratic processes. Specifically, this short article focuses on the impact of the pandemic on town centres and regional growth in Ireland and the potential interventions which can aid in addressing recently intensified local challenges.

KEYWORDS

Ireland, Regional Development, Rural Areas, Smart Villages, Town Centres

1. INTRODUCTION

The Covid-19 pandemic has spread rapidly throughout the world in 2020, presenting a myriad of complex challenges for the global community. Beyond the significant health impacts and human cost of the crisis, economies and public finances have been put under considerable strain. The pandemic has also significantly altered our way of life, serving as a catalyst for a dramatic shift in remote working practices and a subsequent reduction in air pollution and greenhouse gas emissions in the most heavily populated parts of the planet. Indeed, the crisis has highlighted the interconnected nature of society's vulnerabilities while also demonstrating that radical, transformational change is possible.

Prior to the onset of the pandemic, Ireland had largely recovered from the significant impacts of the 2007/8 global economic crisis. Towards the end of 2019, and despite uncertainties related to

DOI: 10.4018/IJEPR.20210401.oa2

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Brexit, the Irish economy was performing strongly and was forecasted to grow further in 2020. Indeed, in December 2019, the Irish unemployment rate was at a 13 year low of 4.8%. This was nearly three percentage points lower than the euro zone average of 7.5% at the time. However, as of May 2020, the unemployment rate was at a near record high of 26.1% (down from a pandemic peak of 28.3% recorded in April). It has been a swift and profound change in circumstances. These rapid changes have ignited debate around how to build more resilient societies and the role of spatial planning in promoting equitable and sustainable recovery. It has also accelerated existing societal trends and the urgency with which we address challenges stemming from these.

Indeed, recovery from the previous 2007/8 crisis has not been felt evenly across all regions, cities and towns of Ireland. As a traditionally rural country, Ireland has a landscape dotted with small to medium sized settlements, with few major towns or cities. In 2016 (when the last Irish Census of population was carried out), over a third (37%) of the population lived in rural areas or settlements of less than 1,500 people. A further 13% of the population lived in towns with populations of between 1,500 and 10,000. The 2007/8 crisis further sharped existing difficulties faced by many of these settlements. Many town and village centres outside the catchment of Ireland's five main cities -Dublin, Cork, Galway, Limerick and Waterford, have struggled to maintain vibrant regional high streets with increasing vacancy rates impacting their vitality. Of course, these issues are not unique to Ireland. There are a range of global trends which have influenced the difficulties these settlements have faced, as explored within a recent piece of research conducted by Future Analytics Consulting (FAC) entitled 'Rejuvenating Ireland's small town centres - A Call to Action' (2018; commissioned by the Society of Chartered Surveyors Ireland). These include the increasing digitalisation of economic activity (including an exponential rise in online shopping); changing consumer behaviour; increasing broadband availability; and changing demographics (with more people choosing to live in larger urban centres and a subsequent decline of the rural population). Smaller countries like Ireland that have traditionally relied on indigenous retailers are now exposed to a global market.

Commercial vacancy rates are reported quarterly in Ireland through the GeoDirectory¹ and the publication of the 'GeoView Commercial Vacancy Report'. At the end of 2019 (Quarter 4), the national commercial vacancy rate stood at 13.3%, with vacancy rates continuing to rise in most of Ireland's counties (sub regional territories which demarcate areas of local government). The five counties with the highest vacancy rates were all located in Connacht (a region in the west of Ireland), with County Sligo recording the highest vacancy rate at 18.9%. Almost a quarter (23.5%) of all commercial properties in Ireland are located in Dublin (in the east of the country), a sign of the prominent eastwest divide in terms of commercial activity in Ireland. Dublin is also home to 44% of Ireland's urban population (as of April 2016).

2. UNDERSTANDING THE POTENTIAL IMPLICATIONS OF COVID-19 ON REGIONAL ECONOMIES

Within the current context, the Covid-19 pandemic has added another layer of complexity to these existing trends. The three Regional Assemblies of Ireland have recently prepared a "COVID-19 Regional Economic Analysis" (2020) to identify which regions, sub-regions, counties, cities and towns are more likely to be exposed to economic disruption caused by the measures necessary to prevent the spread of Covid-19. The overarching purpose of the document is to ensure that national, regional and local bodies are adequately equipped in designing appropriate policy responses to this unprecedented crisis. Using the GeoDirectory commercial database, and specifically the NACE codes² allocated to commercial units as of September 2019, the report identified each geographical area's reliance on the sectors that are likely to be severely affected by the public health measures needed to curtail the spread of COVID-19.

On foot of this, "COVID-19 Exposure Ratios" have been developed for each of Ireland's regions, sub-regions, counties, cities and for 199 settlements. Specifically, a geographical area's "COVID-19"

Exposure Ratio" represents the total number of its commercial units that were operating in the sectors likely to be worst affected by the COVID-19 outbreak³, as a proportion of its total commercial stock as of September 2019. The higher this ratio is for an area, the more likely this area is exposed to significant economic disruption as a result of the crisis.

These sectors viewed as having likely experienced the greatest disruption had two primary characteristics:

- Commercial units operating within these selected sectors rely completely on human interaction
 and therefore have been forced to either close or downsize their operations dramatically due to
 social distancing measures;
- The nature of their operations largely prevent them from operating remotely, exposing them to a significant decline in revenue.

Overall, the study found that 46% of Ireland's commercial units (of those allocated a NACE code) were operating in the worst affected sectors. However, the study also reports that coastal and rural counties are more likely to be exposed. The county with the lowest "COVID-19 Exposure Ratio" was Dublin, the location of Ireland's capital city. Dublin was the only region to record a "COVID-19 Exposure Ratio" below the State average, with 39.4% of its commercial units operating in the sectors likely to be worst affected. At the local level, the five towns with the highest exposure rate are all rural towns with a strong tourism function. Four out of five of these are located in the west of Ireland. The town deemed to be the most exposed to economic disruption recorded an exposure ratio of 75.1%.

3. ADDRESSING THE CURRENT CRISIS – TOWARDS 'SMART COMMUNITIES'?

Technological change, global consumer trends, and the implications of the Covid-19 pandemic (including related tourism impacts) thus necessitate new and innovative approaches to town centre development. While some of these trends could be perceived as potential threats to smaller urban centres, many of these changes also present important opportunities. Reducing the disparities between and realising the potential of Ireland's regions remains a stated objective of the Government and one which inherent in a range of spatial and economic policies, plans and strategies (including the National Planning Framework⁴). A core component of this is the delivery of future development in a manner which enhances and reinforces the urban and rural structure of the regions and moves towards more self-sustaining, rather than commuter driven activity.

In January 2019, and a year prior to the onset of the Covid-19 crisis, the Government had announced the launch of a pilot 'Smart Communities' Initiative in Ireland. The stated objective of the Initiative is to "bring exposure to digital content and technology into the community and support the discovery of the value of digital technologies in the daily lives of people" (Department of Rural and Community Development, 2019). It aims to minimise the 'digital divide' in Ireland, ensuring both broadband connectivity and the provision of skills training to promote digital literacy; an objective with even greater urgency in 2020. It also intends to highlight the supports available locally and the opportunities provided by embracing technology. The pilot location for the Initiative was Tubbercurry, County Sligo, a town of almost 2,000 people situated in the north west of Ireland.

In launching the Initiative, a Tubbercurry Smart Community committee was established to develop a number of local activities and projects. One strand of the initial work was working with a volunteer movement in Ireland called 'Grow Remote' which is championing the spread of remote working across the regions of Ireland. The stated aim of Grow Remote is to build a community and ecosystem around remote workers and then to grow it so that the organisation can increase the number of employment opportunities available in local communities, particularly more rural ones. In doing so, it also aims to capitalise on the emergence of community workspaces or 'hubs' across Ireland. Grow Remote held their annual conference in Tubbercurry in April 2019 and featured speakers from across

Europe and the US. Central to the discussion was the opportunities that exist for remote working in Ireland and the benefits it can bring to employees, employers and local communities like Tubbercurry.

While the term 'remote working' still lacks precise definition in policy terms, its ubiquity in practice has grown dramatically in the first half of 2020. Typically, remote work refers to either home working or 'hub' working, where an employee works from a hub or co-working space close to their home. Clear data on the prevalence of remote working in Ireland prior to the onset of the Covid-19 pandemic is currently largely unavailable. However, in 2018 the Irish Central Statistics Office (CSO) undertook a pilot survey to inform the 2021 Census of Population. The results of this pilot found that 18% of respondents worked from home, mostly one or two days per week (no similar data was available around hub working).

The potential of remote working opportunities to revitalise local communities in Ireland was recognised in a report published by the Department of Business, Enterprise and Innovation (DBEI) in December 2019. The report, entitled 'Remote Work in Ireland: Future Jobs 2019' states that in a time characterised by increased digitalisation, remote work is increasingly viewed as an intervention with the potential to widen the talent pool across Ireland, stimulate regional growth, lessen accommodation pressures in cities and support the transition to a greener economy. Moreover, it can also serve to increase participation in the labour force, opening up roles to people with caring responsibilities, older people and those with disabilities (DBEI, 2019).

As with remote working, definitions for hub developments are broadly lacking in both scientific scholarship and policy fields. Indeed, the wider literature refers to a variety of 'hub' type developments – such as digital innovation hubs, enterprise hubs and co-working hubs. While the specific terminology can vary, hubs can be broadly defined by their common objective – to provide a supportive gateway for business establishment, scaling, and acceleration. Acceleration can involve the setting up of second or third site locations or can indeed relate to a business exploring more flexible working solutions (involving the provision of part time or full time co-working spaces in alternative locations). This can also relate to independent workers who are seeking alternatives to working from home. Ultimately, hub developments seek to attract and support entrepreneurial activity at different scales, while also seeking to build more self-sustaining regional economies.

Within the context of regional town centres, hub developments in particular can generate local employment while also serving as a community node where upskilling and networking can take place, potentially stimulating further business and scaling opportunities. With Dublin ranking as the most expensive city in the Eurozone according to the Mercer Cost of Living Report for 2019, lower overall commercial rates in areas outside of the main 5 cities means that businesses in Ireland could utilise hubs to set up locally at a lower cost. In line with this, hub developments can thus also have important 'knock on' benefits for existing businesses as local footfall is increased.

In addition, hub developments help to address and alleviate some of the identified barriers to home working such as social isolation, inadequate home working spaces or poor broadband connectivity. Importantly, hubs can also play a critical role in enhancing quality of life for the inhabitants of smaller settlements, where many face long commutes to work in larger towns and cities. In 2016, the Irish Census results showed that commuting times had risen in every county in Ireland since 2011 and 10% of the population travelled for more than 1 hour to work each day (up 31% since 2011). 65% of all commuters travelled by car in 2016.

However, at present there is no data available on the national infrastructure of hubs in Ireland, according to the December 2019 DBEI report. While an informal estimate puts the number of hubs at approximately 300, no official, national level information exists. This data gap acts as a key barrier to promoting a more strategic approach to their development. The DBEI paper (2019) further highlights the potential benefit of undertaking a national exercise to understand the number of hubs in existence, their classification, offering, occupancy levels and awareness of the supports available to them.

The DBEI report also highlights the work of the Western Development Commission (WDC), who undertook an audit of hubs in the west of Ireland. Indeed, the WDC are engaged in a three year

project – the 'Atlantic Economic Corridor (AEC) Enterprise Hubs Project' which commenced in 2019 and aims to create an interconnected community network from the 101 hubs identified as operation in, or in development, in the AEC region (in the west of Ireland). According to the DBEI report, the WDC found that the majority of hubs in the west offer facilities to remote workers, providing services including office space, hot desks, meeting rooms and networking/event spaces. However, remote work is usually part of a broader remit, with most hubs identifying as community enterprise centres, digital hubs or innovation centres. Moreover, the WDC also propose that many hubs in the region would benefit from becoming part of a larger hub ecosystem for several reasons including; low occupancy rates, no centralised ICT systems, limited use of collaboration technology, limited capacity to promote hubs, access to funding and establishment of best practice in service provision. Participation in a hub network across the region, the WDC asserts, can lead to cross pollination of ideas which drives business development in communities across the region.

As such, the WDC work further emphasises the need for a more strategic and integrated approach to regional economic and hub development in Ireland; one which fully exploits the potential of technology and collaborative work across more rural areas in particular. This is also a key stated aim of the Smart Communities Initiative, launched in 2019 with the pilot town of Tubercurry. This Initiative is to yet to be rolled out to other communities across the county and indeed its further potential development is yet to be determined as a new Irish Government was formed in June 2020. However, the new Programme for Government commits to the development of a 'Town Centre First' policy. This will encompass the implementation of 'a strategic approach to town centre regeneration by utilising existing buildings and unused lands for new development and promote residential occupancy in our rural towns and villages'.

Moreover, in July 2020, the Government launched a public consultation process on guidelines for remote working, an action identified in the 2019 DBEI report. In launching the process, DBEI acknowledges that much has changed since the publication of the 2019 report with an 'unprecedented instance of mass homeworking' resulting from the Covid-19 crisis. The longer-term implications of this sudden shift in working practices remains to be seen. However, as Tánaiste (deputy Prime Minister) and Minister for Enterprise Trade and Employment, Leo Varadkar stated, the crisis serves as "an accelerator of change that was coming". If indeed the crisis proves to be a catalyst for longer term change in this regard, critical questions emerge around how this can be strategically facilitated to ensure resilient and equitable recovery across Ireland's regions and indeed whether and how this can connect with the Government's 'Town Centre First' policy.

4. EU ACTION FOR SMART VILLAGES – OPPORTUNITIES FOR OVERCOMING THE DIGITAL DIVIDE

The Smart Communities Initiative, and its further roll-out, appears to be a key potential opportunity in this respect. The intention of the Initiative is closely aligned with that of the EU Action for 'Smart Villages' which was launched by the European Commission in 2017. The background to and rationale for the EU Action document stemmed from a September 2016 event centred around the theme of 'A Better Life in Rural Areas', held in Cork, Ireland. This event led to the 'Cork Declaration 2.0' which sets out expectations and aspirations of rural areas. Among the priorities to be addressed, it urges policy makers across the European Union to:

Improve public awareness of the potential of rural areas and resources to deliver on a wide range of economic, social, and environmental challenges and opportunities benefitting all European citizens. (European Network for Rural Development, 2016)

The subsequent purpose of the EU Action document is to 'launch reflections on villages of the future'. Smart Villages, the document states, is a relatively new concept within the realm of EU policy

making. It broadly refers to rural areas and communities which build on their existing strengths and assets as well as on developing new opportunities. The concept purports that traditional and new rural networks and services are enhanced by means of digital, telecommunication technologies, innovations and the better use of knowledge, for the benefit of inhabitants and businesses. As such, while digitisation is key to the creation of a Smart Village; social innovation is also paramount.

Indeed, the Pilot Project on 'Smart Eco-Social Villages' promoted by the European Parliament and managed by the European Commission has concluded that any definition for the 'Smart Villages' concept should be inclusive and broad due to the diverse challenges and needs of rural areas. Their working definition is as follows:

Smart Villages are communities in rural areas that use innovative solutions to improve their resilience building on local strengths and opportunities They rely on a participatory approach to develop and implement their strategy to improve their economic, social and/or environmental conditions, in particular by mobilising solutions offered by digital technologies. Smart Villages benefit from cooperation and alliances with other communities and actors in rural and urban areas. The initiation and the implementation of Smart Village strategies may build on existing initiatives and can be funded by a variety of public and private sources.

The concept of Smart Villages therefore is not prescriptive and there is an acknowledgment that there is 'no one size fits all' model that can be applied universally. Its operationalisation must be territorially sensitive, based on the specific and varying needs of communities. This in turn allows EU Member States broad discretion on how to plan for and implement this innovative initiative in their respective countries.

'Smart Villages' is the current sub-theme of the broader European Network for Rural Development (ENRD) thematic work on 'Smart and Competitive Rural Areas'. A Thematic Group (TG) is working on this topic between September 2017 and July 2020. The TG contributes to the EU Action for Smart Villages by enabling exchange on innovative ways of creating more vibrant, sustainable and attractive rural areas and by exploring how the Rural Development Programmes (RDPs), the EU's Cohesion policy and other financing instruments can be best used to support this.

The EU Action document and the ENRD recognise that many European policies, tools and instruments are already delivering valuable building blocks for Smart Villages. For example, the development of Smart Villages in Ireland, and indeed across the EU, can be greatly enhanced through the successful delivery of the LEADER Programme 2014-2020, according to the ENRD. LEADER is a European Union initiative to support rural development projects initiated at the local level in order to revitalise rural areas and create jobs. It aims to engage the energy and resources of people and local organisations as development actors rather than beneficiaries, empowering them to contribute to the future development of their rural areas by forming area based Local Action Group (LAG) partnerships between the public, private and civil sectors.

The LEADER approach is based on seven specific principles which define LEADER as a methodology and separate it from being simply a funding programme. These can be summarised as follows (ENRD, n.d):

- An Area-Based Approach: This is based on a small, homogenous, socially cohesive territory,
 often characterised by common traditions, a local identity, a sense of belonging or common
 needs and expectations, as the target area for policy implementation. Having such an area as a
 reference facilitates the recognition of local strengths and weaknesses, threats and opportunities,
 endogenous potential and the identification of major bottlenecks for sustainable development;
- Local Partnership: Setting up a local partnership, known as a 'Local Action Group' (LAG) is an original and important feature of the Leader approach. The LAG has the task of identifying

and implementing a local development strategy, making decisions about the allocation of its financial resources and managing them;

- Integrated and Multi-Sectoral Strategy: LEADER is not a sectoral development programme; the local development strategy must have a multi-sectoral rationale, integrating several sectors of activity. The actions and projects contained in local strategies should be linked and coordinated as a coherent whole;
- Networking: Networking includes the exchange of achievements, experiences and know-how
 between LEADER groups, rural areas, administrations and organisations involved in rural
 development within the EU, whether or not they are direct LEADER beneficiaries. Networking
 is a means of transferring good practice, of disseminating innovation and building on the lessons
 learned from local rural development;
- Innovation: LEADER can play a valuable role in stimulating new and innovative approaches to the development of rural areas. Such innovation is encouraged by allowing LAGs wide margins of freedom and flexibility in making decisions. Innovation in rural areas may imply the transfer and adaptation of innovations developed elsewhere, the modernisation of traditional forms of know-how, or finding new solutions to persistent rural problems which other policy interventions have not been able to solve in a satisfactory and sustainable way;
- Cooperation: Cooperation goes further than networking. It involves a Local Action Group
 undertaking a joint project with another LEADER group, or with a group taking a similar
 approach, in another region, Member State, or even a third country. Co-operation can help
 LEADER groups to boost their local activities. It can allow them to resolve certain problems or
 add value to local resources. For example, it can be a way of achieving the critical mass necessary
 for a specific project to be viable, or of encouraging complementary actions;
- Bottom Up Approach: The bottom-up approach means that local actors participate in decision-making about the strategy and in the selection of the priorities to be pursued in their local area.
 Experience has shown that the bottom-up approach should not be considered as alternative or opposed to top-down approaches from national and/or regional authorities, but rather as combining and interacting with them, in order to achieve better overall results.

For LAGs seeking to embrace this opportunity, the ENRD states, Smart Villages provide an attractive, goal-oriented concept that can help to mobilise support for local communities and other stakeholders organising around a specific challenge or opportunity. In turn, the Smart Villages concept can also strengthen and broaden the scope of intervention of LAGs, while also reinforcing the LEADER principles, which are essential to the Smart Villages concept.

5. CONCLUSION

The Covid-19 pandemic has had devastating impacts, creating new global challenges as well as sharpening pre-existing ones. It has also seen a rapid and unprecedented shift in working patterns across much of the world. The rise of mass remote working in the first half of 2020 has led to a greater reliance on technology as offices (as well as schools and universities) moved largely online. Thus, the specific issues related to potential 'digital divides' across urban and rural regions, as highlighted by the EU Action for Smart Villages, have gained even greater urgency and necessitated a renewed focus. If the crisis proves to be a longer-term catalyst for more transformative societal change, smaller towns must leverage recovery strategies to adapt to a new reality; one which may enable opportunities for more sustainable and resilient growth.

This short article has provided an overview of the specific challenges facing regional economies in Ireland – both prior to and in the midst of the current Covid-19 crisis. In doing so, the article has explored some potential interventions which may aid smaller town centres in adapting to a rapidly changing societal and economic context. This includes a brief examination of the pilot 'Smart

Communities' Initiative in Ireland and its potential linkages with the EU Action for 'Smart Villages' Initiative, launched in 2017. Both envisage the exploitation of digital technologies to address locally identified issues and to further community led actions and projects. Crucially, the Smart Villages concept also emphasises a strategic approach to its implementation – including building new forms of cooperation and alliances (aided by programmes such as LEADER). This must also be a key focus of the Irish Smart Communities Initiative if rolled-out further and will require the closing of key data gaps (around hub developments, for example), enabling a more integrated and holistic package of future orientated actions.

REFERENCES

Central Statistics Office. (2018). Report on the public consultation on content of Census 2021 and the Census Pilot Survey 2018. Available at: https://www.cso.ie/en/media/csoie/census/census2021/Census_Pilot_Survey_Report_2018_V1.pdf

Daly, J. (2020). COVID-19 Regional Economic Analysis. Available at: https://www.southernassembly.ie/uploads/general-files/CV19-Regional-Economic-Analysis.pdf

Department of Business, Enterprise and Innovation. (2019). *Remote Work in Ireland*. Available at https://dbei.gov.ie/en/Publications/Remote-Work-in-Ireland.html

Department of Rural and Community Development. (2019). *Minister Canney launches the Smart Community initiative in Tubbercurry*. Available at https://www.gov.ie/en/press-release/03aa8c-minister-canney-launches-the-smart-community-initiative-in-tubbercur/

European Commission. (2017). EU Action for Smart Villages. Available at: https://enrd.ec.europa.eu/news-events/news/eu-action-smart-villages_en

European Network for Rural Development. (2016). *Cork 2.0 Declaration*. Available at: https://enrd.ec.europa.eu/sites/enrd/files/cork-declaration_en.pdf

European Network for Rural Development. (n.d.). *LEADER/CLLD Explained*. Available at: https://enrd.ec.europa.eu/leader-clld/leader-toolkit/leaderclld-explained_en

Future Analytics Consulting Ltd for Society and Chartered Surveyors Ireland. (2018). *Rejuvenating Ireland's Small Town Centres – A Call to Action*. Available at: https://www.scsi.ie/resources/pdf/2018/scsi_rejuvenating_irelands_small_town_centres

GeoDirectory. (2019). *GeoView Commercial Property Report Q4 2019*. Available at: https://www.geodirectory.ie/knowledge-centre/reports-blogs/geoview-commercial-property-report

Mercer. (2019). Annual Cost of Living Survey 2019. Available at: https://www.mercer.ie/newsroom/mercers-25th-annual-cost-of-living-survey-finds-cities-in-asia-most-expensive-locations-for-employees-working-abroad.html

Western Development Commission. (n.d.). Atlantic Economic Corridor (AEC) Hubs Project. Available at: https://www.atlanticeconomiccorridor.ie/aec-hubs-project/

ENDNOTES

- GeoDirectory is Ireland's most authoritative electronic register of addresses matched precisely to their geographical locations.
- NACE Coder is a pan-European classification system that groups organisations according to their business activities.
- NACE Code B "Mining and Quarrying"; NACE Code F "Construction"; NACE Code G "Wholesale and Retail Services" excluding commercial units classified as "essential services" as per the government Guidelines; NACE Code I "Accommodation and Food Services"; NACE Code R "Arts, Entertainment and Recreation Services"; NACE Code Q.88.91 "Child Day-Care Activities"; NACE Codes S.96.02 "Hairdressing and other beauty treatment", S.96.04 "Activities of physical wellbeing institutes" and S.96.09 "Other personal service activities".
- 4 http://npf.ie/wp-content/uploads/Project-Ireland-2040-NPF.pdf
- 5 https://growremote.ie/
- 6 www.atlanticeconomiccorridor.ie/aec-hubs-project/
- http://pilotproject-smartvillages.eu/

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