UNIVERSITY OF LIVERPOOL
Heseltine Institute for Public Policy, Practice and Place
LIVERPOOL CITY REGION COMBINED AUTHORITY

Future Scenario Planning for local policymaking

Lessons from Lancashire

Professor Radka Newton
Dr Jekaterina Rindt
Dr Mirian Calvo

Series 3 Briefing 21

March 2025

Future Scenario Planning for local policymaking: lessons from Lancashire

Key takeaways

1. Future Scenario Planning (FSP) can help local policymakers address complex challenges, such as achieving net zero targets and preparing for sustainable futures.
2. FSP explores and develops multiple future scenarios, tests them against uncertainties and can help foster improved decision-making. FSP can be particularly useful in encouraging policymakers to think beyond siloed decision-making structures.
3. This briefing presents insights on the use of FSP to collaboratively prepare for changes to transport and mobility in Lancaster and Morecambe District in the context of a planned new leisure destination in the county, Eden Morecambe.
4. FSP emphasises the importance of place-based engagement that considers the unique socio-economic and environmental characteristics of a locality. The human-centred design approach can be effective in prioritising residents' well-being, quality of life, and sustainable development.
5. FSP has proven effective in enhancing the capacity of policymakers to make decisions, fostering innovation, and addressing the interconnectivity of complex issues, providing a "safe space" for exploring unconventional ideas and long-term solutions.

1. Introduction

This policy briefing proposes the application of Future Scenario Planning (FSP) to innovate local policymaking and address complex challenges, such as meeting net zero targets and preparing for resilient futures. Initially used in organisational strategy, FSP has since expanded to environmental science and public policy, where it is valued for its emphasis on stakeholder engagement and potential to help future-proof policy decisions. The briefing details research undertaken by the multidisciplinary Lancaster University research team, I-Connect, to support proposals for a development project in Lancashire, with FSP used as a method to promote innovative thinking and stakeholder engagement.

FSP provides a framework for navigating today's complex, cross-cutting challenges by encouraging interdisciplinary, holistic and place-sensitive discussions. FSP identifies critical uncertainties in a policy area and explores how they might evolve in the future and impact regional development. Instead of assessing probabilities, FSP enables policymakers to anticipate changes, mitigate risks, and develop resilient policies. By exploring future scenarios set decades ahead, this process helps policymakers to deliver future-literate policies that are sensitive to societal changes and potential negative outcomes (The Government Office for Science, 2017).

2. Future scenario planning innovation in local policymaking

The main benefit of FSP lies in its ability to enhance stakeholder engagement and facilitate place-based sense-making through mutual learning. By combining strategic planning with policy design, it creates space for rethinking values and paradigms, addressing complex challenges like climate change and well-being, and enabling transformative change. This briefing builds on the work of Kimbell et al. (2022: 4), who emphasise

the need for policymaking to be "a more reflexive, uncertain and even ambiguous process" that reflects the increased complexity and uncertainty of socio-economic challenges.

The I-Connect team have further developed this method to innovate local policy-making processes that have to date been dominated by:

- *Over-reliance on past data:* Overreliance on past data and legacy paradigms favour decisions that optimise existing strategies at the expense of exploring transformational change (Eppel, 2017; Head and Alford, 2015).
- *Path dependency:* A tendency to follow predefined trajectories, which can limit innovative policy considerations (Hrjela et al., 2013).
- *Alignment with national objectives:* Policies are often mapped to national policy objectives, which may not always translate effectively into locally relevant objectives (Mullagh et al., 2022).

To address these challenges, the following innovations to the Future Scenario Planning method were introduced:

- *Evidence-driven imagination:* Combining analytical rigor with creative foresight to avoid over-reliance on purely speculative approaches.
- Collective scenario development and visualisation: Engaging a broader range of stakeholders in developing and visualising scenarios to draw on broader expertise and generate greater legitimacy for policy proposals.
- Place-centric scenario development: Prioritising unique local assets to generate a meaningful translation of national targets into place-sensitive policy proposals.
- *Human-centred design approach:* Shifting from policy-centred planning to human-centred strategies that emphasise user needs and limitations.
- *Inclusive stakeholder engagement:* Incorporating diverse voices, such as local entrepreneurs, artists, and community groups, to complement policymakers' expertise and foster collaborative sense-making.

3. Applying the Future Scenario Planning method

To move beyond existing FSP approaches (Schwartz and Ogilvy, 1998), the research detailed in this briefing integrates evidence-driven data related to the locality with the creative imagination of policymakers and wider stakeholders involved in the FSP process (Newton et al., 2024). While 'speculative futuring' relies on radical imagination and pure fiction which is divorced from past or present data (Pollastri et al., 2016; Mintrom et al., 2024), our approach combines data-driven evidence with 'creative foresight.' Unlike speculative futuring, which prioritises imaginative provocation, creative foresight seeks to inform decision-making through evidence-based analysis of possible futures (Heinonen and Hiltunen, 2012). Grounding our approach in data enhances its validity and credibility. Allowing stakeholders creative freedom in developing future scenarios results in greater engagement and a stronger sense of ownership and responsibility.

By following the three steps explained below, the goal is to identify two critical uncertainties that will help develop a matrix of four distinct future scenarios.

1. **Develop a portfolio of evidence:** Define the policy issue (e.g. how to meet net zero targets) and collect data relevant to key aspects of local policymaking, such as decarbonisation targets, urbanisation figures etc. Such data is often published by local councils in strategic reports or can be researched and categorised into PESTEL factors (Political, Economic,

Social, Technological, Environmental and Legal).

2. **Create an Impact/Uncertainty Matrix:** Use the above data to identify and prioritise key drivers of change that will shape the future, focusing on factors that are both highly impactful and highly uncertain. Pinpoint two specific factors identified as 'high impact' and 'high uncertainty'. These serve as the foundation for scenario development.

3. **Build the 2x2 Matrix:** Use the two critical uncertainties to form the axes of the 2x2 matrix, creating four quadrants. Each of the four quadrants represents a distinct future scenario (Schwenker and Wulf, 2013).

4. Future Scenario Planning in action: Lancaster 2050

This project used FSP to support planning for the Eden Morecambe Project, an eco-tourism initiative blending sustainability, education, and entertainment. Inspired by the Eden Project in Cornwall, it aims to boost the local economy and foster environmental stewardship, backed by government funding and community support (Eden Project, 2024).

In early 2023, Lancashire County Council, Lancaster City Council and the I-Connect research team began future planning efforts. Prompted by Eden Morecambe's intended local impact, they launched an initiative to map mobility scenarios, recognising the narrow focus of current policies. We proposed deploying the FSP method to encourage decision-makers to test the resilience of proposed policies against various potential outcomes.

I-Connect facilitated a generative future scenario development workshop with over thirty local stakeholders that ranged from policymakers to local entrepreneurs, representatives of art and culture, and other civic groups.

- Private sector participants from businesses including Atkinsons Coffee Roasters, Ethel & Em Ltd, Groundswell Innovation and Preston Trampower Ltd, among others.
- Public sector participants from Lancashire County Council, Lancaster City Council, and Lancaster University.
- Third sector participants including members of Lancaster Civic Society, The Ethical Small Traders Association and Luneside Studios.

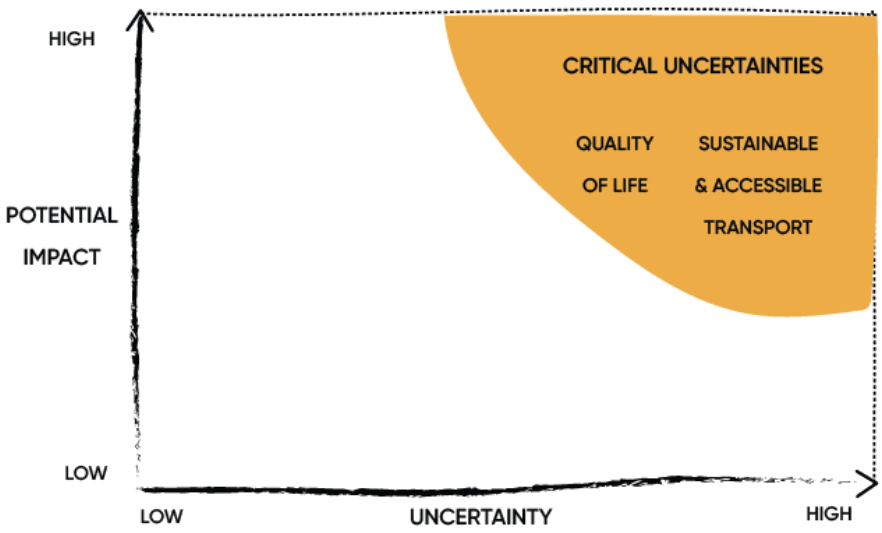
Participants drew on the evidence presented in the Lancashire 2050 strategic framework, a collaborative strategic plan initiated by Lancashire's 15 local authorities that sets a shared vision for the county's future. The framework focuses on the reduction of carbon emissions to achieve a net zero county and explains how Lancashire aims to enhance connectivity and accessibility with infrastructure that offers safe, inclusive, affordable, and low-carbon travel choices.

The Lancashire 2050 strategic framework highlights eight distinct development priorities that provided the portfolio of evidence informing the first step of the FSP approach:

- Economic prosperity
- Transport and infrastructure
- Environment and climate
- Housing
- Education
- Employment and skills
- Health and well-being
- Communities and place

In addition, each participant brought a piece of evidence (e.g. data on workforce mobility, demographic trends, planned changes to land use) to share with the group, which they then plotted onto an

Figure 1: Lancaster 2050 Impact/Uncertainty Matrix



uncertainty/impact matrix. This exercise aimed to surface the stakeholders' 'expertise by experience', which contributed to a more comprehensive understanding of the challenges facing the county. The matrix mapping highlighted the strong interconnectivity of the county's challenges and exposed the siloed nature of policy decision-making, over-reliance on past data and neglect of human-centred approaches. For instance, discussions on multi-modal transport revealed a gap in infrastructure planning to support active and sustainable travel.

Each piece of evidence was discussed in stakeholder groups of five participants and plotted on the impact/uncertainty matrix. This resulted in the final identification of two critical uncertainties that formed the baseline for the future scenario matrix:

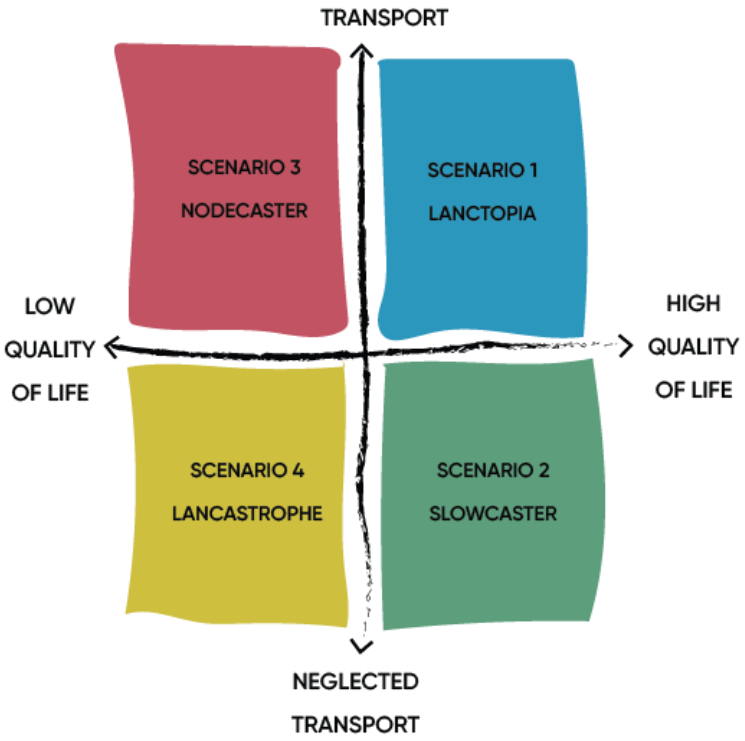
1. The future of **transport planning**

2. The potential changes to **quality of life** (as defined by the World Health Organisation) due to factors such as technology, economy and climate change.

Following on from identification of the two critical uncertainties, four future scenarios for Lancaster and Morecambe District 2050 were co-created by the participants and plotted on a 2x2 matrix, using the critical uncertainties to create four distinct narratives. The researchers identified the four future scenarios as Lanctopia, Slowcaster, Nodecaster and Lancastrophe and then assigned one group of participants to each scenario to bring this future to life. The participants were asked to develop and present the scenario using a creative format. These included a TV broadcast, a selection of postcards from the future, collage with a mindmap and a poster.

The creation of the future scenarios encouraged open, intuitive, and creative thinking, focusing on non-prescriptive storytelling with access to various visual materials. Departing from evidence-driven analysis, participants engaged deeply with the future of Lancaster and Morecambe District (Table 1). The four scenarios reflected high levels of creativity, abductive thinking, and human-centricity, emphasising the strong connection between socio-economic development, environmental changes and transport. This approach also underscored the interrelated nature of socio-economic and

Figure 2: Lancaster 2050 – Four future scenarios



environmental factors affecting quality of life and the urgency of addressing these challenges through innovative, integrated policymaking.

In the final step, visual Generative AI was applied to transform each future world presentation into a short, immersive video that integrated local imagery an animation (Lancaster 2050, I-Connect). This step condensed the presentation of each world to a few minutes, and presented a comprehensive, immersive picture of each world to policymakers. These vivid visuals, as seen on this video, (I-Connect, 2024) were used in planning meetings to enrich and inform policy discussions, providing benchmarks for "sense-checking" current policy proposals. When following-up with local policymakers in thirteen one-to-one interviews, the policymakers reported that the visuals were most impactful in influencing agenda setting and policy formulation. For example, the visuals were used to inform the rewriting of the Lancaster Local Plan in 2024 and informed Lancaster City Council's climate action planning. The visuals surfaced the need to consider how policymakers can establish greater cross-departmental synergies to develop more integrated policy proposals and heightened the policymakers sense of urgency to address long-term policy.

5. Policy implications

This briefing highlights the value and use of the FSP method in policymaking. The use of participatory FSP can increase the legitimacy of policy proposals and ensures relevance to local needs through expertise derived from a wide range of external stakeholders (Wahlin and Blomkamp, 2022). Blending data-driven evidence with creative foresight enhances policy discussions about complex and uncertain issues by linking long-term objectives on issues such as climate change and mobility with present-day decision-making, through vivid, future scenarios.

Table 1: Lancaster 2050 – outline of the four future scenarios

Future scenario	Transport implications	Quality of life implications
Lanctopia: This future world fosters a collective aspiration for an ideal environment where humans, nature and infrastructure seamlessly coexist.	Accessible, inclusive, and sustainable multi-modal transport system driven by data and smart timetabling. Emission-free and safe technology integrates transport services, even reaching remote areas. Private car ownership is socially unacceptable and unnecessary, with active and accessible transport supported by thoughtful infrastructure.	High quality of life is maintained through flexible working arrangements, clean environments, and access to communal spaces. Health and well-being have significantly improved across all generations. Community-centred governance empowers local neighbourhoods with self-governance and accountability. A strong communal spirit fosters a sense of belonging, with cities focused on communal spaces and collective well-being.
Slowcaster: This future world emphasises the potential collapse of transport, leading to isolation and the emergence of self-sufficient communities.	Neglected and poorly planned transport leads to its abandonment by communities. People rely on walking, horses, and manually powered transport. Tourism ambitions fail due to inadequate infrastructure.	Life slows down, with people growing their own food and relying on localized, regenerative economies. Technology supports connections, economic activity, and healthcare services. Self-governance emerges through self-sufficient communities organized by expertise and skill (e.g., Coastal Community, Artisan Community). Strong local networks and reliance on foraging and community greenhouses strengthen resilience.
Nodecaster: This future world overemphasises investment in a wide variety of transport options with significant neglect of the environment, health and sense of community.	Transport is technologically advanced and highly efficient but overly focused on economic connectivity, reducing towns and villages to mere commuter hubs. Environmental damage from non-recyclable resources like lithium is ignored.	Quality of life declines due to a lack of holistic planning. Health deteriorates as people turn to unhealthy lifestyle habits like smoking and drinking. Community spirit disintegrates as cities, towns and villages lose their sense of purpose and identity. There is minimal focus on smaller rural areas, exacerbating social and economic divides.
Lancastrophe: This future world is characterised by dramatic decline in transport investment and quality of life. Greed and total environmental neglect significantly affect the diminishing natural resources like clean air, water and energy, leading to crime and the widening gap between the rich and poor.	Transport infrastructure is insufficient, inefficient, and unaffordable. Fuel scarcity limits services, and transport becomes a luxury available only to the wealthy.	Quality of life plummets due to resource scarcity, environmental degradation, and widespread health crises. Addiction and chronic health issues overwhelm healthcare systems. Communities fragment under extreme social divides and resource competition. Crime rates surge, and religious sects and cults gain influence in the absence of effective governance and social cohesion.

The benefits realised from employing our FSP method were confirmed through one-to-one follow-up interviews with policymakers, and are summarised below:

Capacity building:

- Transferable skills gained by policymakers in understanding and applying participatory FSP.
- Appreciation for the method's applicability to other complex policy issues.

Creating a safe space for innovation:

- Freedom to experiment and propose ideas without being constrained by established compliance requirements, legacy investments, or hierarchical structures.
- The opportunity to experiment with learning and decision-making that is informed by a novel type of evidence that rests outside the conventional repertoire of 'evidence-driven policy'.

Interdependency and complexity:

- Recognition of the interconnected nature of policy decisions and the limitations imposed by siloed and compartmentalized structures.

Collaboration across departments:

- Novelty of cross-departmental interaction, highlighting the siloed structure and lack of existing collaboration in local councils.

Stakeholder engagement:

- The approach brings together diverse perspectives and fosters a shared understanding among stakeholders.

The future scenarios shaped the policies and strategies of the Eden Morecambe Project stakeholders by aligning planning for the project with operations with climate objectives, integrating sustainable transport options into proposals. FSP informed policy agenda setting and specific proposals in local planning meetings addressing long-term climate and transport objectives that surfaced the need to invest in active and public transport. This collaborative, design-led approach provided actionable pathways for future-proofing operations and engaging the community in sustainable transport solutions.

6. References

Chermack, Thomas J., Susan A. Lynham, and Wendy E. A. Ruona. 2001. 'A Review of Scenario Planning Literature.' *Futures Research Quarterly*, 7–31.

Eden Project. nd. 'Eden Project.' https://www.edenproject.com/.

Eppel, Elizabeth. 2017. 'Complexity Thinking in Public Administration's Theories-in-Use.' *Public Management Review*. 19 (6), 845–61.

Government Office for Science. *Futures Toolkit for Policymakers and Analysts*. 2017. https://www.gov.uk/government/publications/futures-toolkit-for-policy-makers-and-analysts.

Head, Brian W., and John Alford. 2015. 'Wicked Problems: Implications for Public Policy and Management.' *Administration & Society*. 47 (6), 711–39.

Heinonen, Sirkka, and Elina Hiltunen. 2012. 'Creative Foresight Space and the Futures Window: Using Visual Weak Signals to Enhance Anticipation and Innovation.' *Futures.* 44 (3), 248–256.

Hrelja, Robert, Karolina Isaksson, and Tim Richardson. 2013. 'Choosing Conflict on the Road to Sustainable Mobility: A Risky Strategy for Breaking Path Dependency in Urban Policy Making.' *Transportation Research Part A: Policy and Practice.* 49, 195–205.

I-Connect. 2024. 'Four Future World Scenarios: Lancaster 2050'. AI-animation produced by I-Connect, available on: https://www.youtube.com/watch?v=jNEHCggWJ70

I-Connect. nd. ‘Project Website.’ https://wp.lancs.ac.uk/i-connect.

Kimbell, Lucy, Catherine Durose, Ramia Mazé, and Liz Richardson. 2022. ‘Design for Public Policy: Embracing Uncertainty and Hybridity in Mapping Future Research.’ *Annual Review of Policy Design*. 10 (1), 1–20.

Lancashire 2050. nd. *Lancashire Strategic Framework*. https://www.lancashire2050.co.uk/.

Mintrom, Michael, Sarah Sumartojo, Leah Grocott, Hans Korsmeyer, and Megan Doughty. 2024. ‘Policy Design, Lived Experience, and Speculative Futures.’ in *DRS2024: Boston, 23–28 June*, edited by Carole Gray, Eduardo Ciliotta Chehade, Paul Hekkert, Laura Forlano, Paolo Ciuccarelli, and Peter Lloyd. Boston, USA. https://doi.org/10.21606/drs.2024.192.

Mullagh, Louise, Rachel Cooper, and Nuri Kwon. 2022. *Design in Place-Based Policy.* Imagination Lancaster Report, 2022. https://imagination.lancaster.ac.uk/wp-content/uploads/2022/09/Designforplacebasedpolicy.pdf.

Newton, Radka, Jekaterina Rindt, and Mirian Calvo. 2024. ‘Future in Place: Participatory Future Scenario Planning for Place-Based Local Policymaking’ in *DRS2024: Boston, 23–28 June*, edited by Carole Gray, Eduardo Ciliotta Chehade, Paul Hekkert, Laura Forlano, Paolo Ciuccarelli, and Peter Lloyd. Boston, USA. https://doi.org/10.21606/drs.2024.294.

Pollastri, Stefano, Rachel Cooper, Nick Dunn, and Christopher Boyko. 2016. ‘Visual Conversations on Urban Futures: Participatory Methods to Design Scenarios of Liveable Cities’ In *Future Focused Thinking: DRS International Conference 2016, 27–30 June*, edited by Peter Lloyd and Erik Bohemia. Brighton, UK. https://doi.org/10.21606/drs.2016.436.

Schwartz, Peter, and James A. Ogilvy. 1998. ‘Plotting Your Scenarios’ in *Learning from the Future*, edited by Liam Fahey and Robert M. Randall, 57–80. New York: John Wiley & Sons.

Schwenker, Burkhard, and Torsten Wulf. 2013. *Scenario-Based Strategic Planning.* Wiesbaden: Springer Fachmedien Wiesbaden, 2013. https://doi.org/10.1007/978-3-658-03476-5.

Wahlin, Willhemina, and Emma Blomkamp. 2022. ‘Making global local: Global methods, local planning, and the importance of genuine community engagement in Australia.’ *Policy Design and Practice* 5 (4), 483-503.

The Heseltine Institute for Public Policy, Practice and Place is an interdisciplinary public policy research institute which brings together academic expertise from across the University of Liverpool with policy-makers and practitioners to support the development of sustainable and inclusive cities and city regions.

Our policy briefings aim to promote and disseminate creative and innovative contributions from academics, policymakers and practitioners on a range of challenges facing the UK, particularly those which affect our cities and city regions.

About the authors

Professor Radka Newton is a Personal Chair in Management Education and Innovation and a Principal investigator of the I-Connect Project at Lancaster University. Her research focuses on the value and applicability of human-centred design in policymaking. Radka is an active member of local civic groups such as Future Morecambe promoting place-based innovation.

Dr Jekaterina Rindt is Lecturer in Marketing at Lancaster University. Her research focuses on examining and optimising governance and regulation processes in complex innovation ecosystems. Her British Academy research grant facilitated the development of her work on design-led innovation in local policymaking.

Dr Mirian Calvo is a Lecturer in Participatory Architecture at Lancaster School of Architecture, Imagination Lancaster, Lancaster University. Her research delves into the ways individuals engage in design processes of the built environment, employing placemaking principles to inform decision-making and facilitating collaboration between stakeholders.

To cite this briefing, use: Newton, Radka., Jekaterina Rindt and Mirian Calvo. 2025. 'Future Scenario Planning for local policymakingL lessons from Lancashire'. Heseltine Institute Policy Briefings 3 (21).

DOI: https://doi.org/10.17638/03172472

Heseltine Institute for Public Policy, Practice and Place
University of Liverpool
1-7 Abercromby Square
Liverpool L69 7WY
Follow us @livuniheseltine