

Methods for Change

Elliptical Methodologies

Dr Stephen Walker,
Dr Laura Pottinger
and Dr Ulrike Ehgartner,
The University of Manchester

Corresponding author
Prof. Stephen Walker
s.j.walker@manchester.ac.uk

Elliptical Methodologies



An Elliptical Methodology can provide a creative and provocative framing for exploratory research studies. This approach works by taking two very different focal points, which could be based on observations or be theoretical in nature, and using them as a way of shaping a research project. The idea is that these two foci or poles work as opposing centres of gravity, forming an ellipse or path which then acts as a structure for open-ended inquiry.

This approach is particularly useful for studying things that are often left out or overlooked - social issues, subcultures, practices or things that tend to be excluded from existing research. It has been applied to explore phenomena such as mediaeval Breton burial practices, early computer simulation, forensic accident reconstruction, twentieth century ring-roads, failed architectural projects, tablecloths and working surfaces. By encouraging the researcher to look at a topic from a range of different and perhaps unexpected angles, Elliptical Methodologies can provide new insight into things that may otherwise be unseen or disregarded, as well as offering fresh perspectives on more established research topics. Researchers working with an Elliptical Methodology may draw on many different types of methods and sources (e.g. archives, architectural records, participant observation, photography, film, oral histories) depending on the research context and on the two poles chosen to form the ellipse. This is not an approach that can be easily generalised to provide a road-map for application in different contexts. Rather, Elliptical Methodologies provide a device for framing experimental studies, and for thinking about how theories – sets of ideas or principles used to explain something - relate to the phenomena that are studied through research.

Elliptical Methodologies



How do Elliptical Methodologies create or contribute to change?

Elliptical Methodologies can galvanise change in several ways. By generating novel and unusual configurations, this approach can generate new conversations and shift attention towards things that are usually overlooked. They can help to highlight areas and topics that have not yet been researched, including things that may currently be viewed as frivolous, irreverent or unimportant within a particular discipline, sector or field of study, as well as those that would benefit from a fresh perspective. As such, they can begin to expand accepted discourse and practice, by posing a challenge to what is perceived as worthy of study, as well as the types of tools or theories that are seen as appropriate for understanding certain issues. When Elliptical Methodologies are used in research with marginalised communities, groups or practices, they can bring to light and validate aspects of daily life and experience that may otherwise be disregarded or undervalued by academics, policy makers or the general public. In this way, Elliptical Methodologies can raise public awareness of overlooked social problems and perspectives.

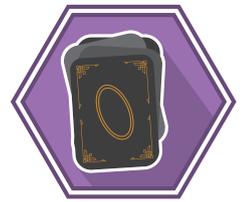
Since research informed by this approach tends to be open-ended and evolving, it is not always possible for the researcher to control processes of change that might take place, and which may not be desirable. For example, research may bring marginalised subcultures or aesthetics to the attention of new audiences. There is potential that this new awareness may then be appropriated or misused in a way that further disempowers disadvantaged groups or trivialises social issues.

What ideas or concepts influence this approach?

This approach originates in architectural theory, and was initially conceived as an attempt to challenge ideas about the types of things that were acceptable to consider within this discipline. However, Elliptical Methodologies are not defined by a specific academic tradition, and instead are characterised by a commitment to interdisciplinary ways of thinking and working. This approach encourages diverse, reactive, exploratory methods of inquiry and processes of trial and error. An Elliptical Methodology provides a guiding structure or framing for a flexible and experimental approach.

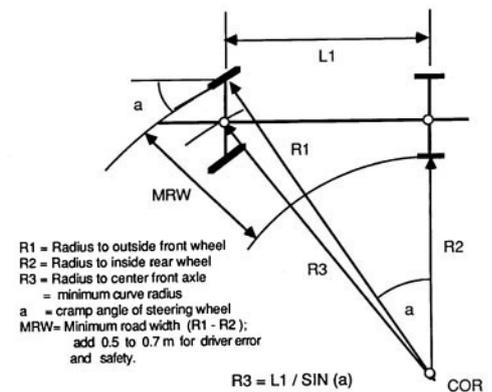
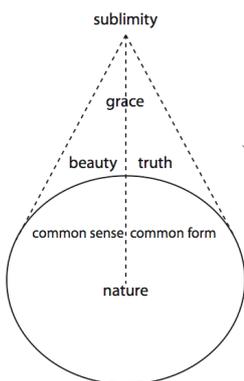
Elliptical Methodologies aim to move beyond disciplinary boundaries and established ways of looking at research problems or theories. This is achieved by exploring new combinations - pairing things that have not been brought together before, or that do not seem to fit with one another. An Elliptical Methodology could involve taking two very different theoretical approaches, and combining them to generate a new theoretical understanding. Equally, one theoretical approach could also be paired with an unlikely real world area of study. Research drawing on Elliptical Methodologies has, for example, used a combination of critical theory and architectural theory to shed light on overlooked and undervalued phenomena, including mediaeval Breton burial sites, ring roads, and travelling street fairs. In the example of ring roads, an Elliptical Methodology brought together eighteenth century theories of sublime experience and contemporary experiences of journeying around ring-roads, and has shown how closely these relate. Pursuing this relationship in more depth revealed surprising similarities in the explanatory techniques of geometry used by sublime theorists, and the geometries deployed by modern highway engineers.

Elliptical Methodologies



Why might I want to use an Elliptical Methodology?

- Research using this approach is fun, playful and creative. An Elliptical Methodology can provide a coherent framing for research that seeks to use many different methods to look at a problem or topic from multiple angles.
- This approach is flexible and malleable, and it can be constantly adapted to fit the research problem that is being studied. It enables the researcher to work opportunistically, by building in different methods and activities in response to new ideas, theories, or possibilities that arise across the duration of a research project.
- Elliptical Methodologies can be particularly useful for researching under-explored topics that do not have an available body of methods attached to them. By shedding light on overlooked phenomena, they can help to persuade varied audiences that a place, topic, community or practice is interesting, valid, and worthy of study.
- They offer multiple possibilities for seeing things differently, by establishing new viewpoints or frames of reference through the structure created by setting up the two opposing poles. As such, this approach can provide novel angles for looking at things that are under-appreciated, that do not seem to fit, or for reinvigorating discussion in academia or professional and public debates.
- This is an approach that can be hard to communicate, however, and it may not always be taken seriously. It involves an element of risk-taking, in that it often draws on ways of working that are as yet untried and untested. But this is often what makes it valuable and enables the researcher to yield surprising results.



Sublime experience: Frances Reynolds's Diagrammatic Representation of the Topology of the Sublime (1785) redrawn by the author; Photograph of Derby Ring Road (A52>A6>A601 >A5250>A601>A516>A52) by author, 2001; Highway Geometry diagram (anon, 1965).

Elliptical Methodologies



Step by step guide to Elliptical Methodologies:

- 1. Identify two key ingredients.** Elliptical Methodologies require two contrasting poles to structure the research inquiry. These two foci could be abstract or tangible, real world or theoretical. This approach works best with things that do not fall neatly into a category, or things that have not been given serious academic attention. Think about unusual practices, subcultures, activities or places. Some potential starting points could include railway journeys, guerrilla knitting, overspill car parks, ad-hoc signage, institutional DIY, how-to-guides, second-hand postcards, professional accreditation criteria, grounded boats, or old rulers. These could then be paired with theories or frameworks that have not yet been used to explore these phenomena. The researcher can then begin to explore the space between these two poles.
- 2. Start in the middle.** This type of research focussing on previously unexplored or underexplored topics does not have an obvious starting point or a set of ordered stages that should be followed. Instead, it is important for the researcher to simply get stuck in - find a starting point that seems interesting, and work outwards from there. Keep an open mind and look out for new opportunities and avenues to explore as the project progresses.
- 3. Try a range of methods.** Think about data collection methods that will enable you to look at the research topic from various different angles. This could involve combining participant observation with archival research, photography and interviews with key stakeholders, for example, or any number of creative methods or approaches that could offer an interesting viewpoint. The idea is to generate data that allows you to put things together that you find interesting on their own terms, and see if there is a way that you can arrange them that is more than the sum of its parts.

This approach to research can be compared to a 'cabinet of curiosities' - a display case containing a collection of unusual and interesting objects. The researcher's task is to shuffle things around (phenomena, ideas, theories, materials or narratives), experimenting with different configurations to see how they resonate with one another and what new stories may unfold in this process.

One way of generating multiple viewpoints on a topic is by working at a range of different scales, simultaneously. A longer-term, broad interest may be revisited over many years with material continually collected, and could also be broken down into smaller projects with a specific focus in response to emerging ideas or opportunities. This can take the research in a number of different, perhaps unanticipated directions. It could also be useful to think about different time scales - combining historical archives with time-lapse photography and participant observation 'in the moment' can generate rich data on long-, medium- and short-term phenomena and experience.



Step by step guide to using gentle methodologies:

4. Do not overly worry about the outcome.

It is the process of exploration that is important in this approach, so avoid starting the research with predetermined ideas about what you will discover or what will be created. Projects that use this approach are best thought about as involving a process of trying things out and starting new conversations, rather than identifying what will work straight away. Some experiments will be durable and complex and will grow into something bigger, while others will not. Try not to worry about the ideas that do not work – sometimes thinking about why something hasn't worked can be insightful in itself - and don't be afraid to move onto something new.

5. Communicate your findings. In using an Elliptical Methodology, you will not only have identified an overlooked topic or taken an unprecedented perspective, but you will also have explored it in depth. Think about the organisations and communities that can benefit from insights into this phenomenon, how you can raise awareness about it in wider society, and the tools you might use in order to do this. Communicate your findings to policy makers and the broader research community to demonstrate that this area is worthy of study.

Examples of Elliptical Methodologies in social science research

Fairground Architectures

Researcher: Prof. Stephen Walker, The University of Manchester

Fairground Architectures is an ongoing project that is considering various aspects of travelling street fairs in the UK. Fairground architecture does not normally form part of the canon of architectural history or contemporary practice. With this background, Fairground Architectures sets up a number of elliptical connections around fairground practices and objects, with the broad project aims being to expand how the architectures of the travelling street fair can be understood and valued. Objectives range from: establishing an appropriate framework for studying and interpreting fairground architecture; developing a generous catalogue or guidebook of fairground objects, practices, people and ingredients; and presenting a range of focused studies that expand how fairgrounds

are understood in order to communicate the complexity and sophistication of these environments, and to position them within longer histories of social, cultural, economic, urban and material practices.

In contrast to previous studies, which have focused on individual rides and attractions, their technologies and decoration, and the overall arrangement of these objects in the fair, Fairground Architectures pays more attention to the invisible architectures of the fairground. Invisible architectures refers to hard and soft legislation - laws and established behaviours - and practices that determine how the fairground is laid out and when it takes place, but also how visitors to the fair behave. It also refers to larger scale networks that exist between different fairgrounds,



and the long histories and traditions of fairgrounds and showpeople. The project combines archival study; durational fieldwork (repeated visits year after year), large scale and detailed participant observations, drawing and photographic surveys, time-lapse photography, interviews with showpeople, Local Authority officers, and historians, and collaborative work with local museums, amongst other methods.

Two examples from across this wide range provide more detail. One focused study of the 'Opening Ceremony' set up a simple Elliptical Methodology that combined this short, official event seen at most fairs with Louis Althusser's philosophical reflection on Ideology. Within this structure, the methods listed in the previous paragraph were used. In combination, this established an uncomfortable counter-reading of the pomp and tradition of the ceremony, and established a framework through which the relationships between the fair and the host town can be understood in much more of their complexity. Using this approach revealed more and different aspects to the interdependencies between fairs, fairgrounds and everyday architectures.



Ilkeston Fair: Opening Ceremony adjacent to Ilkeston Town Hall, 2012 (image by author).

A second example has explored the fairground crowd. This study deliberately set up a study of fairground crowd behaviour and dynamics with accepted Crowd Theory. Although the origin of Crowd Theory can be linked to broad socio-economic concerns about bad behaviour witnessed at fairs and festivals, and although much legislation to control, close or displace fairs from the eighteenth century onwards makes reference to crowd behaviour, neither Crowd Theory nor legislation can be applied to explain the behaviour of the fairground crowd. Again working with the broad palette of methods listed above, this study borrowed detailed terminology from the work of sociologist Erving Goffman, particularly his study of Behaviour in Public Places, to structure a series of drawn accounts that demonstrate the diversity of fairground crowd behaviours. Different points of view and different time-frames were brought together to reveal the wide variety of individual, group and crowd interactions that are lost by simple references to 'the crowd'. This was achieved by deliberately identifying different viewing positions and modes, including time-lapse photography shot from above, from church towers or top-storey windows, street-level views from within the crowd, and the views enjoyed from on or within fairground rides.

While the work from these various examples is relevant to existing academic debate, the findings are also of interest to the organisers of fairs, and to the fair-going and general public. Work on the Opening Ceremony drew out some of the complex interrelationships that exist between the host town, its ceremonial and functional officials and members of the Showmen's Guild. It helped to reveal the differences that exist between the ways that these roles and interrelationships



are believed to operate by those concerned, compared to what actually happens in their negotiations. Similarly, work on fairground crowds revealed the gulf that exists between how these are currently theorised, legislated

for and controlled, compared to how large numbers of fair-goers actually behave and interact.

Where else could Elliptical Methodologies be used?

- This approach is particularly useful for researching topics, subcultures, practices, and material forms that have been overlooked. Collaborating with a researcher using this approach could therefore be useful to organisations and charities working with marginalised social groups or communities, or those interested in minority practices, such as sports, hobbies, or crafts that have yet to receive serious academic attention and societal recognition. Research could feed in to the production of a film, artwork or podcast, for example, that communicates the stories and priorities of those involved.
- This approach could also be useful to organisations, groups, or communities that have been over researched, or where studies tend to follow the same path, and would benefit from fresh thinking.
- A simplified version of this approach could take the form of a game, in which different pairings are randomly generated and then used as a conversation starter or prompt. This could also be used as an icebreaker, a tool for workshops or within design and planning processes. Participants in the game would be asked to suspend disbelief long enough to bring some things together that don't seem to fit, and to see what ideas or

conversations may be generated as a result. This could be useful in teambuilding, agenda setting, and encouraging conversation between diverse individuals, particularly groups interested in generating new ideas or revisiting familiar problems and looking at them through different lenses.

Top tips

1. Start in the middle. Get stuck in, do something, and work from there.
2. Be greedy and be open minded. Don't be afraid to try multiple different approaches.
3. Fail quickly. Try not to be precious about an idea if it doesn't seem to be working. If it is not a good fit, you will know quite quickly - instead of persevering, shuffle the pack and try a different approach!



Further reading

- Anna Tsing et al.'s *Feral Atlas* is an interactive website that enacts aspects of elliptical methodology by encouraging visitors to select and gradually combine entries from the 'more than human' Anthropocene. Through playful navigation, new and deeper understandings emerge.
- *Invisible City* is both a book and a web-based installation that adopts a horizontal structure to tell various stories about invisible networks and infrastructures within and below Paris, building up a more complex picture of the city than is usually presented.
- *Theatrum Mundi* describes itself as 'a centre for research and experimentation in the public culture of cities... developing imaginative responses to shared questions about the staging of urban public life'. Their website hosts a wide range of their projects, sounds, performances and other bits and pieces.
- *Robinson in Space (1997)* and *Robinson in Ruins (2010)*, along with *London (1994)*, form part of an ongoing cinematic and research project directed by Patrick Keiller, which combines wide-ranging research topics across a psycho-geographic filmic narrative. *Robinson in Space* is also reimagined as a [book](#) (Reaktion Books, 1999). This is not just a book-of-the-film, but uses the different media to play with the same core ideas in an alternate format.
- *°Dirty Theory: Troubling Architecture* is a book by H el ene Frichot. A taster is available [here](#).

To reference: Walker, S., Pottinger, L. and Ehgartner, U. (2021). 'Elliptical Methodologies' in Barron, A., Browne, A.L., Ehgartner, U., Hall, S.M., Pottinger, L. and Ritson, J. (eds.) *Methods for Change: Impactful social science methodologies for 21st century problems*. Manchester: Aspect and The University of Manchester.



To read about more exciting social science methods, the full range of *Methods for Change* 'how to' guides can be found here