

Feminist Tendencies, Tensions, and Co-Design Practice Hannah Korsmeyer BSc, MA

A thesis submitted for the degree of Doctor of Philosophy at Monash University in 2022 (Monash Art Design and Architecture)

Copyright notice

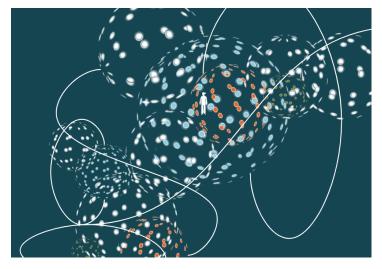
© Hannah Korsmeyer (2022).

Abstract

What does it mean to be both a feminist and a co-design practitioner? As design-based methods of engagement and research are growing in popularity in the public sector, co-design practitioners increasingly find themselves operating at the nexus of a variety of complex social issues, such as gender equity. In principle, co-design and feminism seem to have much in common. Indeed, the links between feminist theory and participatory/co-design processes have been well acknowledged and outlined extensively in the field. However, recent articles have also demonstrated that co-design in the public sector is vulnerable to co-option (e.g. Blomkamp, 2018). As one countermeasure, there are calls for co-design practitioners to be more reflexive about how they enact design methods and attune to the relational aspects of participatory processes (e.g. Light & Akama, 2012). This study contributes to these discourses by closely examining the entangled and reciprocal nature of this work: how the practitioner's feminist perspective both shapes and is shaped by engaging in co-design. Specifically, this study focused on the micro-process of designing collaborative workshops, in order to interrogate how practitioners anticipate, negotiate, and challenge the everyday norms that perpetuate oppression or inequality. Rather than outlining what feminist co-design practitioners should be doing (in terms of frameworks or universal principles), the study explored how feminist co-design practice unfolds and develops across applied project situations.

The first phase of this research followed a project-grounded methodology across a variety of applied research projects in the public sector in Victoria, Australia. This study then used a feminist practical phenomenology to critically interrogate *how one practices and experiences* co-design as a practitioner, in relation to various project situations, materials, and all people involved. In other words, the project resists collapsing or conflating feminist project topics or methods with how one enacts and practices feminism. Following this important distinction, the research found resonance in the works of feminist scholar Sara Ahmed, whose theories provide a lens to better understand how feminism(s) are informed by everyday affective, embodied experiences and actions—and, in this research, how this evolving feminist perspective becomes informed by the experiences of being a co-design practitioner (e.g. Ahmed, 2006, 2012).

This study evolved the method of design research praxis narratives (DRPN), an approach based on auto-ethnographic and creative performative writing techniques. These served as a recursive technique for drawing together the most salient insights derived *from* co-design practice with the most salient feminist concepts from Sara Ahmed *for* co-design practice. The concepts in these stories included: embodiment and affect, 'happiness scripts' and 'sticky objects', inclusion and diversity, performative and non-performative acts, '(queer) orientation' and '(queer) use', feminist 'Killjoys' and 'willful



subjects,' and 'unstable grounds'. The narratives enabled a richer illustration of how feminist-designer 'tendencies' (Ahmed, 2017) evolve and are enacted, made manifest, performed and informed by co-design practice. By 'bracketing' (Ahmed, 2006) off the co-design project and deviating from conventions around sharing practice knowledge, this research shifts attention towards the complex and ethical implications of the socio-material, situated, anticipatory, and tacit decisions practitioners make when they are designing the

materials *for* 'designing with' others. These stories attempt to transcend the specificity of various applied projects, to model another way designers might curate, share, and meaningfully learn from each other's embodied practice experiences.

The contributions of this research includes applying the theories of Sara Ahmed to co-design practice, as well as modelling a recursive method for co-design practitioners who want to engage critically with their own practice. The research culminates in the exhibition website, which houses a series of intimate online workshops with other co-design practitioners. These workshops bring the feminist theory from Ahmed and narrative prompts and praxis questions together to encourage other stories of 'becoming feminist through co-design' beyond my own experience. As the final design outcome of this study, this initiative also marks the beginning of a new outward-facing dissemination and interrogation of the knowledge that has been produced by this research.

Declaration

This thesis is an original work of my research and contains no material which has been accepted for the award of any other degree or diploma at any university or equivalent institution and that, to the best of my knowledge and belief, this thesis contains no material previously published or written by another person, except where due reference is made in the text of the thesis.

Signature: [redacted]

Print Name: Hannah Korsmeyer

Date: 6 March 2022

Publications during enrolment

Select excerpts from earlier drafts of this exegesis-of which I was sole author-also appear in the following paper:

Korsmeyer, H., Light, A., & Grocott, L. (2022). Understanding feminist anticipation through 'back-talk': 3 narratives of willful, deviant, and care-full co-design practices. *Futures*, *136*, https://doi.org/10.1016/j.futures.2021.102874

Acknowledgements

Firstly, thank you to my supervisors, Lisa Grocott and Ricardo Sosa, who provided generous and thoughtful guidance throughout this research. My gratitude also extends to everyone who has been a part of the wider WonderLab community—Dion, Myriam, Alli, Kelly, Kate, Sonali, Ricardo, Kylie, Wendy, Sean, V, Yi, Sarah, Dani, Roby, Anne, Ilya—for helping create a learning culture where moments of disorientation are not relegated to the background, but valued in practice and research.

Thank you to all my mentors and colleagues who supported this research and provided feedback at formal milestone reviews and WonderLab research intensives: Shanti Sumartojo, Stacy Holman-Jones, Jess Berry, Mark Richardson, James Oliver, Kate Coleman, and Shana Agid. A special thank you to Alli Edwards, who has been an incredible friend and collaborator and has helped me become a better co-designer. Thank you to Ann Light for rich conversations and writing experiences. Thank you to Terry Rosenberg and Duncan Fairfax for helping start me down the path to this research. Thank you to Romany Manuell for making sure no publication or library resource was out of reach, even during a global pandemic. Thank you to everyone in and outside academia whose ethical co-design practices inspire me and, especially, those of you who generously contributed to the exhibition website for this study: Lesley-Ann Noel, KA McKercher, Emma Blomkamp, Jo Szczepanska, and Yoko Akama.

Thank you to my mentors and colleagues in the Monash University XYX Lab: (Founding Director) Nicole Kalms, Gene Bawden, Gill Matthewson, and Isabella Webb. Thank you to Jess Ison, Leesa Hooker, Kirsty Forsdike, Angela Taft and Nicola Henry from the Judith Lumley Centre at LaTrobe University and RMIT University. Learning from our projects and collaborations within and across feminist issues in the public sector has been absolutely invaluable for this research.

Thank you to my family in the US and in the UK who supported me throughout the pandemic from the other side of the world. And, above all, thank you Rob for supporting me throughout the pandemic from the other side of the table.

Finally, I would like to dedicate this research to my mom, the first feminist I ever knew.

Acknowledgements - continued

This research was supported by an Australian Government Research Training Program (RTP) Scholarship and Monash Graduate Scholarship (MGS) and Monash International Tuition Scholarships (MITS)

Accredited professional editor Mary-Jo O'Rourke provided copyediting and proofreading services according to the national university-endorsed 'Guidelines for editing research theses' (Institute of Professional Editors, 2019).

Feminist Tendencies, Tensions, and Co-Design Practice

Table of Contents

Copyright notice	ii
Abstract	iii
Declaration	V
Publications	vi
Acknowledgements	vii
List of figures	xii
List of tables	xii
Preface	1
Exegesis structure and summary	10
Chapter 1 Introduction	13
1.01 Chapter summary	14
1.10 Research context	15
1.11 Feminism, gender equality, and the public sector	15
1.111 Specific practice context in Victoria, Australia	16
1.12 Co-design methods and public sector institutions	17
1.121 Practical challenges: different mindsets and processes	19
•	
1.13 Co-design and feminism	21
1.20 Research impetus: calls for more accounts of relational, embodied practice	25
Chapter 2 Theoretical framing	28
2.01 Chapter summary	29
2.10 Queer phenomenology and feminist practical phenomenology	30
2.20 Oblique orientation to co-design practice	31
2.30 Disorientation, transformation, and designer learning	34
Chapter 3 Research program	36
3.01 Chapter summary	37
3.10 Focus, research questions, and scope	38
3.11 Focus: amplifying transformative learning, becoming feminist through designing	38
3.12 Research questions	38
3.13 Research scope	39
3.20 Research phases and key activities	40
3.21 Phase 1 Practice experiences	41
3.211 Defining practice	41
3.212 Project-grounded methodology, 4DRO framework and expanded practice of making	44
3.213 Finding tension: feminist projects versus feminist practice	47
3.22 Phase 2 Personal sensemaking	50
3.221 Finding resonance: immersion and thematic analysis of Ahmed's feminist theories	50
3.222 Finding intention: changing focus from projects to practice	53
3.23 Phase 3 Collective sensemaking Finding tensions, intentions, and resonance: exhibition website	51 51
ringing tensions, intentions, and resonance; exhibition website	7.1

Chapter 4 Methods	61
4.01 Chapter summary	62
4.10 Design research praxis narratives	63
4.11 Details of the approach	67
4.111 Bringing designer-researcher orientations to feminist practical phenomenology	68
Chapter 5 Design research praxis narratives and discussions	72
5.01 Chapter summary	73
5.10 Narrative 1 Happy objects within reach	74
5.11 Narrative 1 Discussion Happy objects within reach	82
5.111 Resonant theories from Ahmed	82
5.112 Praxis questions and sweaty concepts: sticky workshops and the risk of eyeroll	91
5.113 Next: transformation and institutions	93
5.20 Narrative 2 After you have been included	94
5.21 Narrative 2 Discussion After you have been included	99
5.211 Resonant theories from Ahmed	99
5.212 Praxis questions and sweaty concepts: uses and non-performatives of co-design	102
5.30 Narrative 3 Her words found me	103
5.31 Narrative 3 Discussion Her words found me	105
5.311 Praxis questions and sweaty concepts: living a feminist life and collective wilfulness	105
Chapter 6 Conclusion	107
6.01 Chapter summary	108
6.02 Research statement	109
6.03 Connecting to the wider context	109
6.10 Significance and contributions to knowledge	110
6.20 Possible turning points for practitioners	112
6.21 Turning Point 1: the MATERIALS	112
6.22 Turning Point 2: the TENSIONS	113
6.23 Turning point 3: the BACKGROUND	113
6.24 Turning point 4: the SHIFTS	114
6.30 Limitations, further opportunities, and implications for design	115
6.31 Further opportunities beyond the project: infrastructuring	116
6.40 Final Reflections	118
References	120

List of Figures

Figure 1 SHEcity exhibition (2018); images credit: Monash University XYX Lab	3
Figure 2 SHEcity exhibition (2018); images credit: Monash University XYX Lab	4
Figure 3 SHEcity exhibition (2018); images credit: Monash University XYX Lab	5
Figure 4 Parallel problem frames (fixing, de-centring, speculating) online workshop template	6
Figure 5 ASaPP online sector consultation workshops light prototyping activity	7
Figure 6 The wider context of this research: two trends in the public sector	17
Figure 7 Research program phases and key activities at a glance	40
Figure 8 Combined 4DRO framework and expanded practice of making	46
Figure 9 Screenshot of thematic analysis of Ahmed's feminist theories	51
Figure 10 Early iteration of the first activity in the online conversations with practitioners	56
Figure 11 Ahmed conversation cards	57
Figure 12 Example propositional 'figuring' diagram from the final co-analysis activity	58
Figure 13 Tensions, negotiations, and boundaries of DRPNs as a recursive, performative, co-constituted method	66
Figure 14 Screenshot of workshop materials analysis	67
Figure 15 Visualisation of feminist practical phenomenology in relation to the 4DRO framework and expanded	
practice of making	70
Figure 16 Notes from 'Happy objects': 'inside-out' and 'outside-in' models of affect	84
Figure 17 Notes from 'Happy objects': the 'hap' and liveliness of impressions	85
Figure 18 Notes from 'Happy objects': alienation, disappointment, and self-doubt	70
Figure 19 Notes from 'Happy objects': strangers, happy objects, shared orientations toward 'good'	71
List of Tables	
Table 1 Exegesis structure and corresponding writing styles	12
Table 2 Design tactics and corresponding theoretical commitments to feminist technoscience	20
Table 3 Descriptions of media from exhibition website Table 4 Summary of contributions to knowledge	59 111
Table 4 Addition of Communitions to Knowledge	111

Preface

Would you call yourself a feminist?

Many of us who gravitate towards more socially and politically charged methods of collaborative design might say yes. Maybe this yes would come after a slight hesitation; we might know from experience how divisive the word 'feminist' can be. After all, even among self-proclaimed feminists, the definitions and implications of this term are endlessly – and often fiercely – contested. So, if you *do* find yourself aligned with something in this word (or maybe find this word helps align something within you), what does that mean in practice? How does feminism permeate the actions, choices, and things that you do in your life and when you are designing?

When we talk about feminism(s), whether referring to its vast literature, theories, and principles, or its diverse cultural contexts, contemporary connotations, historical movements or iterative waves, we increasingly must talk about it in the plural to avoid misunderstanding each other. I do not remember exactly when I first called myself a feminist. I can recall some, but not all, details about certain people, readings, and life experiences that have contributed to evolutions in my own working definition of feminism. Some of the most foundational shifts have occurred through adopting an intersectional lens and in efforts to avoid reproducing common pitfalls of 'white feminism.' As an American now living and researching in Australia on Wurundjeri land, I have also found that not all my default assumptions about contemporary social issues translate perfectly, despite a shared official language and similarities in our colonial histories. Nor can I assume that the boundaries of different feminist ideas stay neatly mapped in predictable ways along established country or cultural borders. Wherever I have lived, including at home, I have experienced feminism as both a potentially welcoming and a potentially alienating place for some of the topics I am most passionate about, such as gender diversity. Wherever I have lived, I could be welcomed by or alienated from others for identifying myself as a feminist. Many of the personal learning experiences about feminism I have had throughout my life become muddled or blend together. However, I do remember exactly when my inherent sense of being feminist gave way to a new sense of becoming feminist. It happened just before the mid-candidature milestone review of this doctoral research, which I will describe further in Narrative 3 of Chapter 5.

As you will read in this exegesis, in the previous years leading up to this milestone I worked as an embedded participatory designer or design research consultant for a variety of projects on topics related to feminism and gender equality. In this role, I was responsible for designing innovative research methods and workshop materials for co-design events. The purposes of these events varied, but gender was usually a central issue within the overarching project. Some objectives included: establishing a national agenda for the primary prevention of sexual violence and harassment; ensuring safe access to reproductive and sexual health; co-designing solutions to improve safety for women and girls in certain public spaces; generating strategic action plans for organisations related to gender or feminist topics; co-speculating feminist futures; designing critical engagements about gender and technologies; and organising public-facing awareness and activism events about gender and inclusivity.

Many, but not all, of these workshops were conducted in collaboration with the Monash University XYX Lab:

XYX Lab is a team of experienced design researchers exploring gender-sensitive design practices and theory. Our work operates at the intersection of gender, identity, urban space and advocacy. Through our research, we bring together planners, policy makers, local government and stakeholders to make tangible the experiences of underrepresented communities in urban space and planning (XYX Lab, 2021).

Collectively, we developed innovative design research methods for engaging diverse stakeholders in complex conversations about feminism and gender through contract research with organisations in the public sector. This was also the same context for my independent design research consulting practice. The images of workshops where we used bespoke methods and materials for these contract projects are subject to communication embargo, as are the corresponding research findings and reports.

However, alongside these formal research engagements, we also ran occasional public-facing engagement and awareness events about gender and public space. The following images (see Figures 1, 2, and 3) are from an interactive exhibition in 2018 where we showcased some of the methods we had been developing for generating discussion and collective prototyping and modelling with diverse stakeholders. Engaging, eye-catching, hands-on making materials are core to the lab's approach to co-design events and also important in my own individual practice. The following pages show a selection of these materials because the rest of the exegesis refrains from using any images from co-design workshops and events.

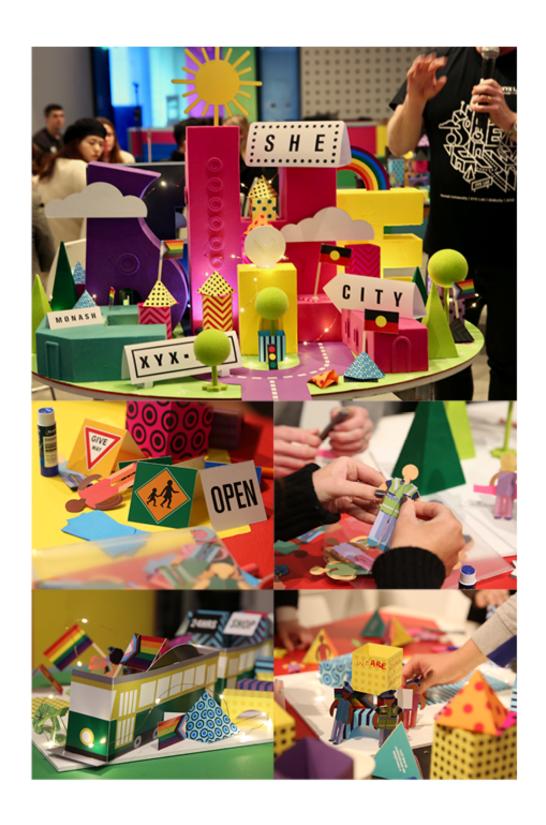


Figure 1 SHEcity exhibition (2018); images credit: Monash University XYX Lab



 $Figure\ 2\quad SHE city\ exhibition\ (2018);\ images\ credit:\ Monash\ University\ XYX\ Lab$



 $Figure \ 3 \quad SHE city\ exhibition\ (2018);\ images\ credit:\ Monash\ University\ XYX\ Lab$

Then, when the COVID-19 pandemic arrived, my practice needed to move online. However, it was still important to me for these online engagements to preserve the making and collaborative modelling aspects that are so useful for in-person workshops. The image below (see Figure 4) shows an example of an early online workshop just after the pandemic began. I used the online collaboration platform Miro so that participants could collage together images of scenarios and city spaces using similar elements that I would have used in an in-person workshop: abstract and ambiguous shapes/blocks, people/human figures, natural elements like plants, animals, etc.



Figure 4 Parallel problem frames (fixing, de-centring, speculating) online workshop template

The disruption of the pandemic also meant that public sector research projects that had relied on more traditional methods of research like focus groups and consultations were suddenly looking for new ways to engage. Although design-led methods were not originally considered at the outset of these projects, it was soon clear that 3 or 4-hour online video calls were now unsustainable in ways that in-person round table discussions had not been.

One such project was the recent Australian Sexual Violence Primary Prevention Project (ASaPP), where I was approached by colleagues at La Trobe University to design and facilitate 12 online workshops with stakeholders, with the aim of establishing a national agenda for the primary prevention of sexual violence and harassment, as well as to generate a theory of change. This project was funded by the Department of Social Services (DSS) and very recently made public in time for the Women's Safety Summit on 6 September 2021. The report and theory of change can be viewed on the website for the National Plan to Reduce Violence against Women and their Children (DSS, 2021; Hooker et al., 2021, 2020).

I worked closely with an excellent team at the Judith Lumley Centre (for public health research) at La Trobe University to design, deliver, analyse, and visualise the outcomes of the participatory research. Although it was not a co-design project, co-design methods were employed to deepen the engagement online. The screenshot below (see Figure 5) is an example of one of the 'light prototyping' visualisation activities that was used to help scaffold these online consultations.

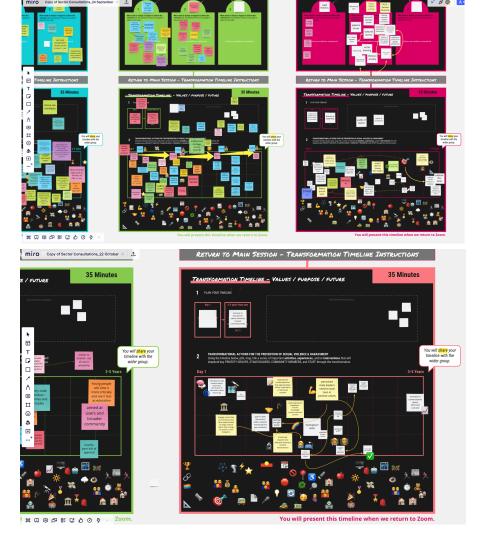


Figure 5 ASaPP online sector consultation workshops: light prototyping activity

I am including this project in the preface because it is situated in the public sector, but it is not a co-design project and not included as part of the analysis of practice experiences within the exegesis. Indeed, beyond the preceding images of the SHEcity exhibition (Kalms et al., 2018) and the screenshots of the online ASaPP sector consultations (Hooker et al., 2021), there will be no other images of identifiable co-design workshops included in this study.

Often you would expect to see photographs and images of co-design workshops and events in a co-design exegesis, but they are not included here for 2 reasons: 1) ongoing communication embargoes for some of the most significant projects of my practice; and 2) the focus of this study is to explore the experience and learning of the designer within project situations, not to share transferable co-design methods and materials.

In my wider practice, I have seen how easily well-intentioned research initiatives using participatory approaches and community consultations can be co-opted. Therefore, this study creates space to examine personal experiences of navigating complex co-design situations. All other public sector projects other than the ones featured above have been completely anonymised to adhere with communication embargoes and to maintain focus on the subject of the study: *becoming feminist* through co-design.

On paper, making the shift from *being feminist* to *becoming feminist* requires just 3 extra letters. But in practice, it took me years to recognise that there could be tensions between these 2 distinctions. This realisation has since marked a monumental change in my orientation to this work. As you will read about in this exegesis, rather than using feminist theory as a tool or lens that can be applied to co-design practice, I now consider how co-design practice can inform a designer's personal understanding of feminism.

So, before we begin, I invite you to take a moment to think about your own participatory practice.

Can you remember a time – even a fleeting moment – when you may have been practising feminism?

Many of us might not be able to pinpoint a heroic memory of clear-cut activism in our everyday work. But if you think about what a more personal version of feminism might mean to you, maybe there are also smaller moments when your sense of feminism shaped an action or a gesture in your practice. For example, maybe there was an underlying sense of feminism in a change you made to your recruitment process. Or maybe it was in your careful framing or phrasing of a key insight for a government report. Maybe it was in the location of a meeting venue or the aesthetic choices of collaborative making materials or in a user persona or activity prompt. Perhaps feminism was present during a tense moment when you needed to negotiate the contradictory interests of important stakeholders. Or perhaps feminism supported you to create a tense moment so that stakeholders would show more interest in important contradictions.

And if you are able to recall a moment when feminism may have been present (or maybe another moment when it was noticeably absent) in your practice, can you also remember how you felt? Where were you? Who else was there? What sounds could you hear around you? Were you doing anything with your hands while sitting or standing or moving through a certain space? How had you come to arrive at that moment and what were you hoping would happen next?

This exegesis intends to create space for practitioners to share these personal stories of practical, iterative, embodied feminisms that are usually relegated to the background of co-design projects. As design-led methods are increasingly extending into the public sector, more and more of us find ourselves at the nexus of complex power dynamics and commitments to positive social impact. In this context, communication of practitioner knowledge beyond discrete projects can be especially difficult, due to both the specific situated nature of the work and the often strict conventions around hierarchical reporting structures.

And yet, these are also the tricky contexts where feminism – and feminists – are tested in practice. As I argue in this study, these projects are rich sites of personal feminist pedagogy. They are where each of us is figuring out how power operates and, often tacitly, tracing and responding to the visible and invisible forces affecting collective efforts to make real change. I am curious about all the personal stories that are happening alongside these projects, in the background. How are we strategising and learning from what we come up against? How are we making shifts and which of these attempts are getting blocked? The influence of personal experiences on our individual and collective practices can be hard to describe but, as I have done many times over the course of this study, we can look to Sara Ahmed to help articulate why they are important contributions:

By using the idea of sweaty concepts, I am also trying to show how descriptive work is conceptual work. A concept is worldly, but it is also a reorientation to a world, a way of turning things around, a different slant on the same thing ... A sweaty concept might come out of a bodily experience that is trying. The task is to stay with the difficulty, to keep exploring and exposing this difficulty ... Not eliminating the effort or labor becomes an academic aim because we have been taught to tidy our texts, not to reveal the struggle we have in getting somewhere. Sweaty concepts are also generated by the practical experience of coming up against a world, or the practical experience of trying to transform a world (2017, pp. 13–14).

In Chapter 2, I will further explain the reasons why I have used a 'bracket' (Ahmed, 2006) to temporarily set aside my focus on the co-design project situations to focus on thick descriptions (Ryle, 1971; Ahmed, 2012) of personal, embodied experiences of co-design practice. From these descriptions, I will be accounting for the feminist tendencies of my practice and impressions from these projects that have generated 'sweaty concepts'. These situations have influenced my evolving, personal understanding of feminist theory and profoundly shifted my orientation and approach to practice. As our field strives to better understand the difficult, complex work of using co-design to help make social transformation in the public sector, I use this study to suggest that we might better understand how to make transformations if we do not overlook how our own transformations are co-evolving with our co-design practices. My hope is that, as you read about my experiences, you also find moments of resonance and tensions in your own practice experiences. By bringing these experiences into the foreground, we might make new concepts about our collective processes of becoming feminists as we try to make transformations in an unequal world.

Exegesis structure and summary

This doctoral exegesis is divided into six chapters and two distinct writing styles (see overview in Table 1 following).

In Chapter 1, I outline the contexts and motivations behind the inquiry. I begin with a broad view of how feminism and gender equality initiatives have taken shape in the public sector at international, national, and local levels over recent decades, with particular focus on Victoria, Australia, where the recent Gender Equality Act 2020 has been implemented. In the context of this increasing obligation for public sector institutions and projects to support wider gender equity objectives, I outline contemporary opportunities and challenges surrounding the increasing prevalence of co-design methods being used to address complex problems in the public sector. I then draw together the implications of these two simultaneous trends for contemporary co-design practice by providing a brief overview of research at the nexus of feminism and design. I highlight that most research in this area positions feminist theory as something that can be applied to critique or improve design practice, but stops short of exploring what knowledge project-grounded co-design practices might contribute back to our understandings of feminisms. I also highlight that much of the feminist theory that is applied to design centres on ideas from feminist technoscience (e.g. Haraway, 1988, 1991; Suchman, 2006). I compare these ideas to the distinct, but closely related, branches of feminism which underpin this study. I conclude by connecting this study to recent wider calls in the field for designers to better attune to and share personal and phenomenological accounts of co-design practice, as opposed to the more common sharing of co-design *methods* in the field.

From there, in **Chapter 2**, I introduce the particular theoretical framing of this research, which draws heavily from Ahmed's books *Queer Phenomenology* (2006) and *On Being Included* (2012) which bring together concepts from phenomenology, intersectional feminist theory, critical theory, cultural studies, queer theory, and affect theory. Then, I introduce my research focus, which makes use of the phenomenological 'bracket' to turn away from familiar, orienting aspects of the co-design *project* in order to better attend to learning and *becoming feminist through co-design practice*. I then circle back to the core guiding values of participatory design, especially ideas of mutual learning, situation-based actions, tools, and techniques, and alternative visions (Kensing and Greenbaum, 2012). I suggest that the often overlooked, varyingly subtle differences among diverse feminist theories has implications for how we practise and enact co-design values. This includes how we might conceptualise and analyse core aspects of the work like lived experience, the relational self, mutual learning, and inclusion of diverse perspectives in collaborative processes for social change or positive social impact. Finally, I outline the research questions and discuss the scope and boundaries of this research.

In **Chapter 3**, I outline and describe the 3 phases of the emergent research program and the corresponding key research activities and approaches that were conducted at each stage. Throughout this chapter, I use a repeating refrain of 'finding tension, finding resonance, finding intention' to describe how these evolved and built upon previous activities over time. Phase 1 Practice experiences (Section 3.1) describes the research I conducted as an embedded design researcher within a variety of interdisciplinary contract research projects for the public sector on topics related to gender equality and feminism. My research practice during this phase centred on designing bespoke materials and innovative research methods for a variety of co-design events to support wider aims and objectives within each of these discrete project situations. I discuss this practice in conversation with the '4 designer researcher orientations' (4DRO) and the 'expanded practice of making' frameworks from Grocott and Sosa (2018) to explore what a design-led, project-grounded participatory practice can contribute to our understandings of feminisms. Phase 2 Personal sensemaking (Section 3.2) describes a shift in the research focus away from project outcomes towards an explicitly phenomenological exploration and thick description of personal experiences of this practice. This was achieved through: 1) immersion and thematic analysis of resonant feminist theories from Ahmed; and 2) writing design research praxis narratives (DRPNs). I describe how the first iteration of the DRPN was co-conceived with my colleagues in WonderLab, before it was adapted for this study. Phase 3 Collective sensemaking (Section 3.3) describes the final phase of the project, where I developed a small series of intimate online workshops to explore themes and insights from the DRPNs with other practitioners and apply personal insights from the study back into a participatory practice. These workshops create a space to attend to the (queer) phenomenology of design practice and feminisms, with support from and in relation to each other. A core aspect of this workshop is the open-ended 'conversation card' prompts I designed based on a selection of theories from Ahmed that had resonated strongly with my own design practice experiences. This documented through exhibition website phase the exegesis: www.designertendencies.space.

In **Chapter 4**, I discuss in detail the DRPN recursive method of analysis that was introduced in the previous chapter. I then describe how I adapted the DRPN to explore and cultivate connections among my embodied design research practice, personal memories, feminist intentions and tendencies, and situated (dis)orientations. The DRPNs serve as both a recursive analytical method and a phenomenological, performative research artefact. In keeping with concepts of the 'relational self' distinctive to feminist phenomenology, I amplify the performative writing aspects of the DRPN, exaggerating the partiality of any written account of co-design practice. Instead of aiming for comprehensive documentation of the project situation, I use the DRPN to attend to details that are normally relegated to the background of practice and rarely included in written documentation or considered for evaluation in co-design projects. I combine aspects of the 4DRO framework with feminist practical phenomenology to illustrate specific intentions for the use of the DRPN method within the present study (see Figure 8).

In **Chapter 5**, I present the 3 DRPNs. The narratives are written in the performative and autoethnographic writing style I outlined in Chapter 4 and are centred on moments of designing workshop materials in the preparation before a co-design event. Each narrative is followed by a short discussion section. The respective discussion sections (5.11, 5.21, 5.31) connect each narrative to salient concepts and feminist theories from Ahmed and draw out possible implications of these concepts for co-design practice. Each discussion concludes with a selection of 'sweaty concepts' and praxis questions that that the feminist theories bring to co-design practice, as well as concepts and questions that co-design practice offers back to our understanding of feminism(s).

In **Chapter 6**, I review the key contributions and significance of the research and how this study has generated knowledge that is transferable beyond my individual practice, to the field of co-design. Then, I discuss the implications of this study for the field by identifying four promising 'turning points' for designers who are interested in reflecting on their practice from an alternative angle. Following these points, I consider the limitations and further opportunities afforded by this research.

Table 1 Exegesis structure and corresponding writing styles.

	Chapter	Writing style
1	Introduction	Conventional academic style (first-person)
2	Theoretical Framing	Conventional academic style (first-person)
3	Research Program	Conventional academic style (first-person)
4	Methods	Conventional academic style (first-person)
5	Narrative 1: HAPPY OBJECTS WITHIN REACH	Performative writing – DRPN
	Discussion 1	Conventional academic style (first-person)
	Narrative 2: AFTER YOU HAVE BEEN INCLUDED	Performative writing – DRPN
	Discussion 2	Conventional academic style (first-person)
	Narrative 3: HER WORDS FOUND ME	Performative writing – DRPN
	Discussion 3	Conventional academic style (first-person)
6	Conclusion	Conventional academic style (first-person)

Chapter 1 Introduction

1.01 Chapter summary

In **Chapter 1**, I outline the contexts and motivations behind the inquiry. I begin with a broad view of how feminism and gender equality initiatives have taken shape in the public sector at international, national, and local levels over recent decades, with particular focus on Victoria, Australia, where the recent Gender Equality Act 2020 has been implemented. In the context of this increasing obligation for public sector organisations and projects to support wider gender equity objectives, I outline contemporary opportunities and challenges surrounding the increasing prevalence of co-design methods being used to address complex problems in the public sector. I then draw together the implications of these two simultaneous trends for contemporary co-design practice by providing a brief overview of research at the nexus of feminism and design. I highlight that most research in this area positions feminist theory as something that can be applied to critique or improve design, but stops short of exploring what knowledge project-grounded collaborative design practices might contribute back to our understandings of feminisms. I also highlight that much of the feminist theory that is applied to design centres on ideas from feminist technoscience (e.g. Haraway, 1988, 1991; Suchman, 2002). I compare these ideas to the distinct, but closely related, branches of feminism which underpin this study. I conclude by connecting this study to recent wider calls in the field for designers to better attune to and share personal and phenomenological accounts of co-design practice, as opposed to the more common sharing of co-design *methods* in the field.

1.10 Research context

1.11 Feminism, gender equality, and the public sector

In 1997, the United Nations (UN) began using an approach called gender mainstreaming to promote greater equality between men and women. The approach was unprecedented in scope: it was to be used in all UN plans, policies, and programs. Rather than a specialised issue, gender became an '…integral dimension of the design, implementation, monitoring and evaluation of policies and programmes in all political, economic and societal spheres…' (Hannan, 2001, p. 2). Shortly after, governments worldwide also began to adopt this strategy, which places gender equality at the centre of policymaking by helping to identify gender bias in policies, programs, and budgets. Measures like concrete changes to services, recruitment processes, and gender-equality targets, alongside new tools like participatory gender safety audits used in city planning, highlight the potential for gender mainstreaming to contribute to transformational change. A popular gender mainstreaming method, gender budgeting, is used by over 80 countries as a means to assess how revenue raising and spending impact on men and women differently. Like safety audits, participatory approaches to gender budgeting are used in many of these countries to ensure that gender safety concerns are not only identified, but also take into account the necessary resources to create impact (Whitzman, 2013).

And yet, while gender mainstreaming has become more pervasive in the public sector, there are challenges in meeting its ideals and proving its effectiveness. While some methods include participation (as mentioned above), many gender mainstreaming methods remain technocratic, making it difficult for policymakers, planners, and practitioners to translate principles into practice (Meer, 2005). Importantly, gender mainstreaming can also fail to create meaningful change by simplifying men and women into homogenous and stable gender groups, rather than providing more nuanced insight into how factors like race, ethnicity, class, age, ability, diverse gender identities, or sexual orientation (and various combinations and intersections) influence equity targets. This lack of nuance is where the plural theories of feminism have significance for policies and projects striving to improve gender equality. It is also important to note that the terms 'feminism' and 'gender equality' are not interchangeable, even if they share similar aims. Through feminism, we understand that gender itself is a very contested topic, with diverse conceptions, lenses, and frameworks. And, like other complex issues, how the problem of gender inequality is framed in the public sector has important implications for how it is then tackled.

To explore these implications, we can look to a theory from policy analysis Carol Bacchi called the 'What's the problem represented to be?' (WPR) approach. This approach appreciates that policies and governments play active roles in constituting problems. In other words, rather than viewing public sector institutions as entities that react and respond to objective existing problems to varying degrees of success, we can instead question how these institutions actively produce and give shape to our collective understanding of social issues.

Policies do not simply 'deal with' the 'problem' of 'gender inequality'. Rather, policies *create* different impressions of what the 'problem' of 'gender equality' entails... (Bacchi & Eveline, 2010, pp. 112).

In Bacchi's extensive review of gender mainstreaming initiatives in Australia and internationally, she has found that the way that issues of gender are framed, do have significant implications for how they are then acted upon. The policies themselves are 'gendering' (Bacchi & Eveline, 2010, p. 112). Bacchi's research is important for this study because gender mainstreaming, where participatory methods of consultation are employed, shares some objectives with a co-design approach, namely, increasing the involvement of communities and stakeholders in order to inform decision-making. However, gender mainstreaming is also distinct from co-design as it does not necessarily include the co-making or the learning-by-doing (UK Government, 2019) that are strengths of the co-design process. Collaboration, engagement, and feedback with communities can take many forms, but co-design in its most essential definition refers specifically to involving participants directly in a designing process. In Chapter 3, Section 3.212, I discuss and interrogate attributes of design practice in more detail through the '4 design research orientations' (4DRO) framework (Grocott & Sosa, 2018). There are many versions of what this might look like, but it often means that participants join together in materially-mediated construction and prototyping of ideas or engage with other 'designerly ways of knowing' (Cross, 1982). However, as I discuss in the next section of this chapter, the term 'co-design' has become diluted and more ambiguous as it gains traction and popularity within contexts and fields both in and outside of design.

And equally important for this study, even for processes that discerning designers would consider robust or appropriate applications of co-design and participatory design methods (e.g. Luck, 2018) are not necessarily immune to perpetuating inequality. For example, while convivial tools have been widely adopted within co-design projects for their ability to help us surface latent or tacit knowledge that is otherwise hard to uncover (Sanders, 2016; Sanders & Stappers, 2008), these methods usually do not explicitly apply a gender-sensitive lens or other critical approaches to consider how the tacit knowledge and abductive decision-making used in design might be shaped or constrained by dominant norms and structural inequality.

1.111 Specific practice context in Victoria, Australia

The project-grounded inquiry that I conducted during Phase 1 of this research was situated in the context of Victoria, Australia (see Chapter 3, Section 3.211 for details). In recent years, the state has seen significant development of two sector-wide trends: increases in gender equality initiatives and increasing adoption and popularity of co-design. For example, we can see how these trends inform each other in the Department of Premier and Cabinet's 10-year *Plan to end family violence* that states 'All of these reforms will be designed and delivered in partnership with the Victorian community' (Department of Premier and Cabinet, 2016). Both the increases in gender equality policies and in more collaborative design and delivery of new policies are promising trends, as the decision-making for policies that affect gender equity have not traditionally been easily accessed by the general public. Even within stakeholder groups responsible for these programs and services, direct engagement and influence in the decision-making process is often very limited within the strictly hierarchical structures of government.

The focus on gender equality in the public sector in Victoria has reached a new peak with the recent ratification of the Gender Equality Act in February 2020. Under this Act, all public organisations in Victoria (including state government agencies, local governments, universities, and hospitals) must develop a gender equality action plan (GEAP). As a part of this process, every organisation will also need to undertake a workplace gender audit to collect data to inform their GEAP. As a sweeping requirement for the entire state, the Gender Equality Act will have reverberations for all public sector projects, even those that traditionally have not had a strong focus on gender.

Alongside increasing pressures in the public sector to be accountable for meeting gender equity targets, we also see the term 'co-design' becoming increasingly popular - even expected - as a method within statewide strategic plans and initiatives. For example, the Department of Premier and Cabinet, which oversees whole-of-government policy and performance, recently delivered a Corporate plan for 2019-2023. On the plan's web page, there are 4 mentions of 'design' and it states that a key strategy for delivering these objectives is to 'Empower citizens to participate in policy making and service design'. In principle, more co-design can help to extend the policymaking process to people who normally would not be able to contribute. The hope is that more co-design and community involvement might allow for a collective rearticulation of what is important, and generate effective policy that reflects a more comprehensive diversity of world views (DiSalvo, 2009). But the plan also lists two expected challenges in delivering on its objectives that are relevant for this study: 1) 'Effectively utilising co-design of policy solutions and place-based approaches to deliver effective outcomes for Victorians'; and 2) 'Providing equitable, engaging, and inclusive services for Victorians' (Vic Gov, 2019). So, although there is a desire and, increasingly, an expectation to engage in co-design methods and processes in the public sector, the first point indicates that there is still much uncertainty about how to use these methods effectively. In practice, this concern from public sector stakeholders is often amplified by the necessity to ensure that the ultimate outcomes of these uncertain processes will be equitable and inclusive. As I discuss in the next section, these tensions of using co-design methods in the public sector are also relevant issues for the field beyond the local context in Victoria.

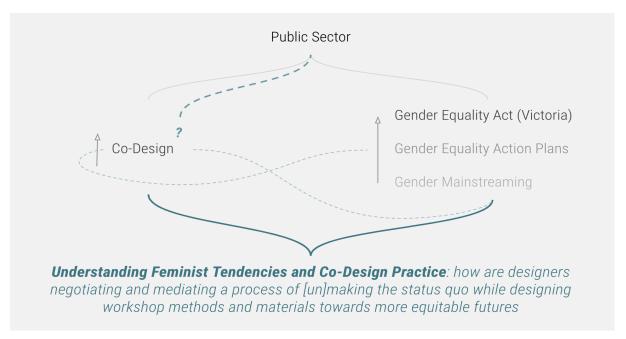


Figure 6 The wider context of this research: two trends in the public sector.

1.12 Co-design methods and public sector institutions

The calls for more use of design-based public engagement methods in the Victorian state government are examples of what is also happening elsewhere, particularly in the United Kingdom and across Europe: Co-design methods and design-led research projects and initiatives are on the rise in the public sector. Whether this is done in-house through government-established service design units and innovation labs (McGann et al., 2018) or external design consultancies, integration of design into government processes and the public sector has been increasing significantly over the past decade (Kimbell, 2015; Kimbell & Bailey,

2013; Kimbell & Vesnić-Alujević, 2020). Rising at the same time as the increasing popularity of 'networked policy' (Bacchi, 2009), the public sector is showing more interest in participatory methods within planning processes, and increasingly gravitating towards co-design methods.

And yet, even though the term is widely used, there is often a lack of consensus about what 'co-design' actually means in practice (for both designers and their public sector counterparts). This may be partially due to the various ways co-design has evolved over the last 50-70 years in Western design discourses. Many co-design practitioners today link the foundations of their practice to the Scandinavian tradition of Participatory Design (PD) originating in the 1960-70s (Bannon & Ehn, 2012). Originally, this practice emerged to support the labour movement for workers whose roles were being rapidly disrupted and changed by the introduction of computers and information technologies in the workplace. The foundation of PD was improving working conditions by empowering users to have a say in designing the systems that would affect them directly. Since then, participation and collaborative practices in design have evolved into many different sub-fields, each with different emphases. Yet today, the terms co-design and participatory design are still often used interchangeably. Co-design might refer to a range of ways to engage many diverse stakeholders in human-centred design methods and processes, while participatory design usually maintains a more politicised connotation and a central concern for the agency of end users in particular (Mattelmäki & Visser, 2011). However, both practices make use of similar mindsets and tools and, broadly speaking, are concerned with 'directly involving people in the co-design of the artefacts, processes, and environments that shape their lives' (Simonsen & Robertson, 2013, p. 2).

This original context for PD was engaged directly and explicitly with its institutional setting. However, since the 1970s, traditional aspects of the public domain (e.g. transport, energy, or communication infrastructure) have become privatised and boundaries of public/private institutions have become increasingly blurred. These conditions have led some of the most politically-engaged contemporary participatory design practices to withdraw from explicitly neoliberal institutional contexts (Huybrechts et al., 2017). These practices most concerned with agency and power of participation now tend to favour working within smaller, grassroots or citizen-led initiatives (DiSalvo et al. in Huybrechts et al., 2017). However, in a special issue of the CoDesign journal 'Co-design and the public realm,' Huybrechts et al. caution that 'public and private entities engaged in participatory work outside of institutional contexts can unintentionally support neoliberal ideals of individualisation and depoliticisation' (2017, pp. 149). So, instead of withdrawing from direct engagement with institutions, they call for a re-engagement and revitalisation of PD and co-design practices in institutional contexts. They introduce the term institutioning to promote efforts to 'find new relations within the complexity of the contemporary public realm' (Huybrechts et al., 2017, 150). In Chapter 4, Section 4.111, I return to the idea of institutioning and demonstrate how interrogation of personal co-design practice experiences can also provide valuable contributions to our understanding of contemporary public institutions.

In principle, using co-design processes to inform policy promises to: help policymakers better understand the root causes of problems; improve collaboration between communities, stakeholders, and government through materially-mediated engagements; and give shape to ideas so they can be articulated in tangible ways (Bason, 2014, p. 5). Creative participatory methods involving 'convivial tools' have been widely heralded in co-design projects for their ability to help us surface latent or tacit knowledge that is otherwise hard to uncover (Sanders, 2016; Sanders & Stappers, 2008). However, in practice, this is not a seamless coupling. For example, tensions between the aspirations of co-design in the public sector and the execution of co-design in the public sector were apparent in recent criticism of the Victorian state government for asking for input

only after the biggest decisions about framing and addressing the problem had already been made yet still claiming to be 'co-designing' solutions (Blomkamp, 2018). It is also worth noting tensions between the aspirations of co-design to help policymakers better understand root causes of problems and the WPR framework approach to gender equality initiatives discussed in the previous section. As Bacchi has demonstrated, there is even complexity in using co-design to tackle gender inequality as an issue framed to have objective 'root' causes. In the next section, I expand on the challenges of different expectations and confusion around the purpose and process of using co-design methods in the public sector. In the narrative and discussion sections of 'After you have been included' (Sections 5.20-5.212) I expand on the particular complexity of doing co-design with/in public sector institutions, and grapple with the varied uses and non-performative aspects of using co-design methods to include diverse stakeholders and communities in research projects.

Early in 2020, the Digital, Design and Innovation branch within the Victorian Department of Premier and Cabinet published a *Human-centred design playbook* which outlines how public sector initiatives are a unique context for design. While not always the case in the private sector, the primary aim of public servants and public sector initiatives is to improve social outcomes. Therefore, public sector co-design projects often: are in service of poorly resourced, diverse, or vulnerable groups; are accountable for outcomes that generate long-term change (yet must be enacted within short-term administrative periods); negotiate multiple stakeholders who may have conflicting interests; require outputs that are more often a complex service rather than a standalone product; must deliver services at scale to communities from the beginning; are required to comply with very high standards for privacy and safeguards (Victorian Government, 2020).

So, while co-design and the public sector may share similar objectives of engaging with communities in order to make meaningful improvements with positive social impact, there are significant factors that make these initiatives a tricky fit for traditional (Western) design processes. Additionally, there are disciplinary and dispositional differences to navigate between the ways that the public sector has historically operated compared to the ways that designers traditionally do co-design.

1.121 Practical challenges: different mindsets and processes

In a recent review article, Blomkamp (2018) outlines several of these significant challenges for applying co-design within the context of policy-driven initiatives and the public sector in Australia and New Zealand. Blomkamp first points to the challenge of navigating diversity, with designers facing increased complexity of projects and conflicting priorities, interests, and objectives of different stakeholders, departments, and other organisations. She goes on to quote from O'Rafferty et al. (2016), who state plainly that 'the competencies and mind-sets required for co-design are not typically found within the public sector organisations' (O'Rafferty et al., cited in Blomkamp, 2018). Furthermore, there are tensions between outcomes and processes of co-design research and conventional forms of data and evidence. This has implications for stakeholders' beliefs in the legitimacy of the practice and for how effectively the uptake of co-design activities can be integrated into existing policymaking processes. Several other papers point to this seemingly ill-fitted context for applying co-design. For example:

Policy officials do not generally respond well to the risks of diminished control and increased complexity, and bureaucratic systems are not designed to be experimental or responsive. Because politicians and government officials typically view themselves as

'sovereign decision-makers' who possess the mandate to rule for the people, rather than with the people, collaborative policy design may be unattractive to them (Ansell et al., 2017, p. 479).

This sentiment about the discomfort of public sector organisations in facing processes of diminished control is widely discussed in the literature internationally (Bason, 2014). However, Blomkamp is careful not to place all of the responsibility for these compatibility challenges onto policymakers. She argues that improving the co-design processes for policy-driven projects is:

not just about upskilling policy workers on designerly methods, but also about bringing other disciplinary knowledge into the design process, and will likely require cultural and structural change to enable different approaches to be applied (Blomkamp, 2018, emphasis added).

While design as a discipline embraces uncertainty and possibilities, the public sector relies more heavily on certainty before implementing change. As a result, designers often see themselves as the creative disruptors and innovators within established structures. Indeed, in the emerging literature that discusses the constraints of using co-design in the public sector, ideas about *who* should feel discomfort in a disruptive co-design process are very one-sided, indicating that many designers feel that this is reserved for the others involved. Instead, I argue that designers should not overlook or avoid our own unsettling and discomfort while resisting structural forms of oppression such as heteropatriarchy, colonialism and white supremacy. The application of creative methods does not remove our own implication within these entangled and complex contexts. In Sections 2.30 and 3.10, I advocate for increasing attention to the transformative learning of the designer during the mutual learning in co-design.

Designers working with the public sector towards creating more gender-equitable futures have especially significant diverse perspectives to reconcile, given the uncertainty in-built to the topic of gender equity itself. Envisioning more feminist futures is especially abstract because there is no agreed-upon, ideal end-state that we are all striving for. To illustrate this complexity, futurists Milojević, Hurley, and Jenkins provide examples of just 3 common conceptions of how different people may imagine an ultimate state of gender equality:

What does the ideal 'preferred future' look like? There may be different ideas guiding how we would understand (1) androgynous, (2) polarised into two separate but equal (male and female) sexes, or (3) composed of the multiplicity of diverse genders (Milojević et al., 2008, p. 316).

Feminism, like design, is inherently a speculative practice in that we have never experienced a truly gender-equitable state. Both practices are also concerned with improving the habitability of the future world (Findeli, 2001) and exploring 'what might be' (Gaver, 2012). We do not have a granular understanding of how it might work or what it looks like, except that it does not resemble what we have now. Importantly, even among designers, participants, and stakeholders who are committed to gender equity, each person will have a different set of ideals shaping their contributions and guiding their decisions within the co-design process. While revealing these kinds of implicit and tacit assumptions is a strength of co-design (and a reason why the approach has the potential to be particularly useful), the lack of predefined consensus creates even more unknowns and uncertainty for a co-design project. Therefore, a commitment to plurality often becomes a guiding force in a feminist frameworks, rather than the democratic drive for consensus that might

normally be targeted in creating change for the public sector. However, if certainty cannot be guaranteed in a feminist co-design process, more clarity in the communication of what we gain from this process *instead* is essential for public sector projects.

As yet, there has not been significant project-grounded inquiry into how these 3 well-established areas of feminism, the public sector, and co-design intersect and inform each other *in practice*, despite rapidly increasing numbers of projects that would benefit from more translational and foundational understanding. For example, at a high level, there is potential for co-design and feminism, within the unique context of the public sector, to inform and amplify each other by:

- 1. deepening the kinds of creative engagement and participation that occur in the public sector through appropriate application of innovative design research methods to assist in unsettling or challenging dominant institutional norms;
- 2. bringing a feminist orientation to co-design methods and practices in order to make underlying or institutional structures of inequality that might go unnoticed more visible; and
- 3. in both, striving to interrogate the representation and framing of the 'problem' of inequality more explicitly, and opening possibilities for alternative frames and deviations.

This research is situated within these emerging potentials; it traces an individual practice within the broad context of gender and the public sector, as co-design methods are gaining momentum in these institutions. This study provides 'thick descriptions' (Ryle, 1968/2009, p. 498; Ahmed, 2012) of the practical challenges that can arise for a practitioner in this context, despite shared commitments across all these areas. While feminism and co-design seem to have much in common and hold promise for creating positive impact in public sector projects, it is important to remember that both of these practices have their own rich, contested, histories. In fact, as I discuss in the following section, focusing only on the shared commitments and similarities between feminism and co-design, while forgetting what makes them distinct, can inadvertently flatten aspects of both approaches rather than deepening practice.

1.13 Co-design and feminism

As mentioned in the opening to this chapter, co-design, and especially in practices stemming from historical foundations in the Scandinavian tradition of participatory design originating in the 1960s-70s, has been values-led (Bannon & Ehn, 2012; Van der Velden & Mörtberg, 2014; Agid & Chin, 2019). Many feel the challenging of hierarchical power dynamics through collaborative approaches has resonance with feminist approaches and aims. In some ways, these foundational overlaps have limited feminist critiques of the specific practices of co-design (on any level – as method, methodology, or field). And while there have been steady gains in women's representation in design, there are still limiting patriarchal norms and gender inequalities within the design tradition itself, in both academic and practice contexts (e.g. Buckley, 1986, 2020; Connory, 2019; Salen & Connory, 2018), which supports the need for these broader critiques. Despite many feminist criticisms of products and outcomes of design practices, there are fewer targeted specifically towards participatory/collaborative design. Instead, many feminist critiques of design and related disciplines involve advocating for a collaborative approach to whatever is being critiqued (e.g. Rosner, 2018). For example, Prochner and Marchand (2018) conducted a large-scale meta-analysis of the relationship between industrial design and feminist critiques and recommendations. This study found that the most common feminist 'resolutions' to systemic problems reflected in industrial design like unequal 'power dynamics', 'presence of power and masculinity', and 'negative situations facing women' were 'typically grass-roots, relying on actor interventions that typically draw on women's perspectives and/or feminist

perspectives' (Prochner & Marchand, 2018, pp. 559–560). A participatory approach is often positioned as the feminist solution, not necessarily its own design practice that requires further or more nuanced feminist interrogation itself.

Recently, in academic contexts, there has been a flurry of visible feminist design initiatives where the focus on collaborative and community-led approaches and methods is core. Notably, the recent Design Research Society conference track on design and feminisms (Lindström et al., 2018) included a collection of papers that all advocate for participatory approaches. A similar call to action is echoed in the conference paper 'Design justice: towards an intersectional feminist framework for design theory and practice' by Costanza-Chock, creator of the MIT Co-Design Studio (Costanza-Chock, 2018). This broad framework for all design practice incorporates a concept Black feminist scholar Collins calls the 'matrix of domination' (2000). The article emphasises that, just like other fields and disciplines, all aspects of various design processes (including problem-framing) are not immune to reproducing the inequalities of this matrix, which includes white supremacy, heteropatriarchy, capitalism, and settler colonialism. If design is being applied to social issues and the public sector with the hope of reducing these forms of oppression, it cannot do so without first evaluating how the practice itself might inadvertently reinforce these norms.

This framework from Costanza-Chock is centred on intersectional feminism. Many of the connections between the field of design and feminism also take place in the context of human-computer interaction (HCI), where feminist science and technology studies (feminist STS) and feminist technoscience theories have a strong presence in academic research (e.g. Bardzell, 2010; Heidaripour & Forlano, 2018). A significant work in this tradition is *Critical fabulations: reworking the methods and margins of design* (Rosner, 2018). In this book, Rosner proposes an alternative set of tactics for contemporary design practice that is based on collaborative methods and seeks to disturb dominant design paradigms. These tactics are based on 'theoretical commitments of feminist technoscience'. Rosner's orientations are not described as comprehensive, but foundations that are useful for guiding practice in interdisciplinary contexts. The 4 orientations and their theoretical commitments to feminist technoscience are listed in Table 2, below.

Table 2 Design tactics and corresponding theoretical commitments to feminist technoscience.

Tactic	Theoretical commitment (Rosner, 2018)	
Alliances	'stems from a feminist critique of <i>individualism</i> '	
Recuperations	'comes out of a feminist critique of objectivism'	
Interferences	'originates from a feminist critique of universalism'	
Extensions	'derives from a feminist critique of solutionism'	

Rosner goes into considerably more detail about relationships between design practice and feminist technoscience theories (e.g. Haraway, 1988, 1991, 2006; Suchman, 2002, 2006) than depicted in the above summary table, however these core orientations are echoed throughout most design literature that engages with feminism and also relevant for this study. In Chapter 2, I situate this work in the post-structural and (queer) feminist phenomenology of Ahmed, rather than feminist technoscience. These branches of feminist thought do not overlap perfectly, but are closely related, with Ahmed's feminist theories sharing core theoretical consistencies with feminist technoscience and feminist new materialisms as listed above.

However, there are also nuanced departures that are core to this exegesis which I want to highlight in relation to Rosner's application.

With her tactic of 'alliances' Rosner highlights that design activities, and certainly collaborative design activities, are not simply clusters of individuals, but that all these engagements are relational. She celebrates how collective experiences of crafting can help us notice shared values and the ways in which we are communicating expertise. This 'relational self' is core to feminist phenomenology, which itself is a diverse branch of feminism, but consistently resists mind/body and body/world dualisms. This idea, combined with related concepts about affect in Ahmed's work, has implications for how we conceive of the purposes and implications of collaborative co-design events and the lived experiences of individual participants. I discuss this in Chapter 5, Section 5.12 in more detail. I also consider the potential for this 'inside-out' conception of relationality to be a constraining force in co-design, rather than purely generative. This study does not follow an objective research paradigm and also shares Rosner's intention to 'recuperate' alternative narratives of design situations that may go unnoticed, which I discuss further in Chapter 2. It also challenges a disembodied, universal approach to design, which Rosner has called a tactic of contingent 'interferences'. This is a core idea in contemporary participatory and co-design practices, founded on bringing diverse perspectives together. However, following the notion of a relational self, I also challenge the stability of a subjective perspective and identity. But in this critique, I do not go so far as to question selfhood and dislocate categorical identities entirely in favour of becomings as a feminist new materialist approach might do (e.g. Braidotti, 2013). This study finds resonance in Ahmed's feminist theories which draw from both of these traditions because bodies as sites of discrimination and conflict matter for collaborative design and mediate our collective and relational becomings throughout the creative process. This co-constituted version of 'the self' is also why I am careful about using the word 'reflexivity' in this research, despite my intention to align with and amplify the recent calls for designers to be more reflexive (e.g. Pihkala & Karasti, 2016; Light & Akama, 2012; Steen, 2013). Reflexivity, as a means of self-referencing, can presume that there is a 'self' or 'subject' that can be separated from context, which reinforces some of the problems of a designer as a subject that can presume to disrupt or transcend the power hierarchies of the system.

Like other frameworks and writings that have been produced in this area, Rosner's book 'shows how designers may productively draw on feminist theoretical traditions to expose key shortcomings of design' (2018, p. 125). As suggested above, feminist theory is vast, contested and diverse. This call offered by Rosner does imply that designers might take it upon themselves to navigate these literatures and apply other, nuanced understandings in personal practice beyond the example tactics presented in the book. Therefore, perhaps the most significant offering that Rosner brings to this discourse in comparison to other frameworks is the translation of feminist commitments into tactics specifically for design practice. Rather than limiting this connection to selecting or curating certain feminist ideas as guiding principles for practice, Rosner begins to push our thinking about how feminist theory might shift and re-form in its application and entanglement with design practice knowledge.

A recent paper by Chivukula and Gray (2020) also begins to extend our conceptualisation of the relationship between design and feminism. In a citational analysis of Bardzell's (2010) foundational paper, 'Feminist HCI: taking stock and outlining an agenda for design,' Chivukula found that most engagement with Bardzell's popular framework had been one-dimensional, with most researchers merely signposting this work as a pioneering paper that established the field of feminist HCI. However, the review found several papers which engaged with and extended the framework extensively in practical application. Chivukula points to these case studies as evidence of the potential of engaging with feminist theory in practice to

advance HCI discourses and make meaningful change through 'disrupt[ing] hegemonic structures, for example, by giving voice to users through participatory approaches' (2020a, p. 38). She then proposes a 'feminisms through design (FtD)' framework for 'more translational work in directly adopting current and past feminist literature through the proposed angles of feminisms in design' (Chivukula, 2020b, p. 39). Like Rosner's orientations, this framework seeks to deepen and extend the application of feminism to design practice.

To develop this potential further, I also want to challenge the instrumentalisation of feminism present in these papers and which Rosner explicitly advocates for in her book. The common factor which seems to characterise the body of research that brings the two fields of feminism and design together (e.g. Bardzell, 2010; Costanza-Chock, 2018; Heidaripour & Forlano, 2018; Pennington, 2018) is that feminist theory is something to be applied to design theory and practice. Following this premise, the relationship between the fields is unidirectional, suggesting that applying feminism to design will improve design practice. However, Ahmed resists this simplified use of feminism, reminding us, 'Even though feminism can be used as a tool that can help us make sense of the world by sharpening the edges of our critique, it is not something that we can put down' (2017, p. 15). In this statement, Ahmed stresses the importance of feminism that is informed by an embodied, everyday approach and orientation to the world; not just a critical lens that can be applied in certain situations or through certain methodologies. Instead, feminism 'goes wherever we go' (2017, p. 15), permeating practice and our personal experiences. Doing feminism, learning about feminism, happens through being in the world and 'coming up against a world', rather than simply through our reflections on a world that appears given. Instead of only looking to theory or theoretical frameworks, we might also consider our embodied design actions and encounters as valuable feminist tools that support and contribute to critical understanding of feminist issues and feminist approaches.

Following a similar line of inquiry, activists Agid and Olander see situated, applied, design engagements focused on concrete, active change-making as valuable means of critique. They ask: 'Given ... socio-political and infrastructural contexts, how do we shape design research engagements with people and institutions in these spaces of critical inquiry and making?' (2017, np.). To answer this question, they sought concrete case studies to trace theoretically-informed critical engagements in applied settings. Following their analysis, at the end of the article, they question how effective or impactful critical approaches can be that come from within institutional systems and structures. They cite practical constraints like delays and postponed participatory engagements as limiting the ability for researchers to conduct critical work. Yet, they also suggest that these embedded challenges are not extraneous constraints to the work, but central. I discuss this further in Chapter 3, Section 3.11, as I think negotiating these practical challenges through embodied practice is a productive nexus where design and feminism can inform each other.

Supporting this point, Ahmed refers to feminism as 'sensational,' stressing that feminist understanding can begin with an impression or an embodied sense that 'things don't seem right' (Ahmed, 2017, p. 20-21). Rather than applying feminism as an analytical tool to shift design practice as Rosner does, I am interested in reversing this relationship while sharing and preserving a similar intent. I am interested in how design practice generates and shifts personal understandings of feminism through our senses of coming up against problem and projects situated in unequal worlds. In Chapter 5, Sections 5.20-5.212, I discuss this point further as well as the precarity and possible non-performativity of theoretical commitments drawn from broad social ideals rather than stemming from practice.

The literature, although varied and comprised of research spanning decades, consistently positions knowledge of feminism(s) and feminist critique as something to be applied to design methods, not as something that we can learn about and acquire through doing design. This framing (and the resulting frameworks) is useful for initiating connections across these areas for our field, but is also limiting in several ways. Fundamentally, and perhaps most importantly, this positioning implicitly characterises feminism as something stable that can be applied by designers. But, like design, feminism is dynamic, diverse, contested, and controversial. Presenting feminism in short form as a usable set of principles is certainly helpful to begin disrupting patriarchal norms or approaches, but it also limits designers' depth of engagement with feminism. By making feminism into a tool that can be used by designers, there is also the risk of turning feminism into something that designers are not questioning or reflecting on in an iterative, ongoing way. Similarly, in having it ready and available as a usable tool, designers may be less likely to question the limits of their own knowledge of a huge and complex discipline. If we think of feminism as an instrument designers can apply, we may be less likely to actively seek out collaborations with feminist experts who could bring depth and complementary skills to an applied project.

While this disciplinary humility is one motivating force behind this study, I am also interested in exploring what co-design research and co-design practice might be able to offer back to our understanding of feminism. I argue that, if we position co-design practice as a valid and worthwhile approach to uncovering feminist knowledge, the relationship between these two fields becomes energised and lively, amplifying the potential contributions for both to co-constitute each other, rather than one appropriating the other. Furthermore, as Blomkamp cautions, if co-design – an approach grounded in overlapping feminist principles like challenging hierarchy – can be easily co-opted, there is reason not just to investigate which feminist values are most appropriate or relevant to apply to co-design, but also to more closely interrogate how we are enacting these principles and also, in turn, deriving principles and values while engaging in co-design.

1.20 Research impetus: calls for more accounts of relational, embodied practice

I am not alone in wanting to push beyond participation as a feminist solution, in wanting to know more detail about how designers are personally interpreting and navigating socially complex co-design project situations. Other researchers including Agid (2018), Agid and Akama (2020), Akama, Hagen and Whaanga-Schollum (2019), Akama and Prendiville (2014), Light (2010), Light and Akama (2012), and Pihkala and Karasti (2016) have been calling for participatory designers to be more reflexive in this work. Like this study, they also advocate for more engagement with the wider social conditions and inequalities that might constrain and limit possibilities for change within our projects. For example, Akama and Prendiville advocate for a phenomenological approach to 'entangle histories and relations to place and people', allowing us to 'see co-designing as a journey and process of transformation in how we design our world, and ourselves, with others' (2014, p. 31). These articles emphasise that co-design projects, although participatory, still exist within unequal conditions like heteropatriarchy, systemic racism, settler colonialism, etc. Participation may seek to unsettle these conditions, yet these issues are pervasive and insidious, often making it difficult to know where to start (or stop) and difficult to know exactly how these forces may be affecting projects.

One pragmatic approach is to consider the conventions around knowledge-sharing within our field that may contribute to constraining our engagement with these wider social conditions. For example, Light (2010) states that most analysis of participatory design practice takes place at a mid-scale level of methodology. She suggests that we also consider ways to share and improve our practices at other scales, from the broadest tier of beliefs and values to the smallest micro-tier of moments of contact with participants. All these aspects are crucial parts of participatory practices and yet there is limited research about the micro and macro levels:

What is under-reported is who is executing these techniques and how what they bring that would have been different in another's hands. The research community seems a little squeamish about this relationship. Perhaps it involves too much speculation, too much specificity, so much detail that there is not space to explain it in journal papers. It seems to lack the repeatability that makes a practice scientific. It offers a nightmare web of causes and effects to untangle before anything can be said. However, when we work with people who have no compulsion to join us, and who may have intensely political feelings about their location, their lives and the issues to be tackled together, micro-scale aspects may be more important than methodological ones (Light, 2010, p. 185).

Shying away from the creative and personal enactment of design research methods not only obscures important aspects of designer positionality, but can also create misinterpretations about what these methodologies are and are not doing (Lee, 2012, p. 69). These methods are not scientific, and yet designers often employ co-design methods as if they are objective, but in ways that neglect or sidestep important protocols routinely used in the sciences that attempt to control or account for personal influence of the researcher. Confusion about the subjective, phenomenological, and creative nature of how co-design knowledge is generated also curtails the potential of these methods to provide a different, yet equally important, kind of data than scientific methods would. This can be particularly confusing for designer-researchers and their collaborators in the public sector, where conventional forms of evidence are especially important within risk-averse, hierarchical reporting structures built on certainty.

In keeping with critical points about the role of designer-researchers working within complex projects to help examine assumptions and beliefs in order to reassess, question, and trouble co-design project situations, I also advocate for explicit transparency in the subjective role that designers are playing in these projects. I am especially interested in extending these calls through a particular focus not just on how designers are seeking to enact transformation at a variety of scales, but also on how we are mutually implicated within these transformations. What is being asked of the designer-as-learner when asked to embrace a *becoming with* practice? What does it mean for the mutual learning on our end to extend beyond a project topic and situation towards our own deeply held beliefs and values, just as we might expect of other participants joining a design process for the first time?

In the next chapter, I discuss how I build upon the recent calls to engage with the embodied and phenomenological conditions of designing by adopting Ahmed's 'queer phenomenology'. With these theories, I also question how the materials and methods we design 'arrive' for use in collaboration and co-design events. With a focus on materials, the interrogation is a re-turn towards the objects of co-design. As I discuss in the Conclusion, this re-turn is not a return to a fetishisation of the designed methods or designed outcomes at the exclusion of the relational. Critiques of design practices focused only on objects and solutions at the expense of process and participation has been important for progressing the field and

my own practice. Instead, I look to the materials as a targeted site for helping interrogate the labour and entangled histories of 'how they came to be' and their role in mediating the situated and relational aspects of co-design and feminism, and our own becoming.

Chapter 2 Theoretical Framing

2.01 Chapter summary

In **Chapter 2** I introduce the particular theoretical framing of this research, which draws heavily from Ahmed's books *Queer phenomenology* (2006) and *On being included* (2012), which draw together concepts from phenomenology, intersectional feminist theory, critical theory, cultural studies, queer theory, and affect theory. I then introduce my research focus, which makes use of the phenomenological 'bracket' to turn away from familiar, orienting aspects of the co-design *project* to better attend to learning and *becoming feminist through co-design practice*. I then circle back to the core guiding values of participatory design, especially ideas of mutual learning, situation-based actions, tools, and techniques, and alternative visions (Kensing & Greenbaum, 2012). I suggest that the often overlooked, varyingly subtle differences among diverse feminist theories has implications for how we practise and enact co-design values. This includes how we might conceptualise and analyse core aspects of the work like lived experience, the relational self, mutual learning, and inclusion of diverse perspectives in collaborative processes for social change or positive social impact. Finally, I outline the research questions and discuss the scope and boundaries of this research.

2.10 Queer phenomenology and feminist practical phenomenology

Early in her book Queer phenomenology Ahmed brings us into an imagined scene: we join the famed phenomenologist Husserl at home, at his writing table. This is the place where he wrote foundational texts to establish the philosophy of phenomenology. Here, she recaps foundational concepts from the phenomenological tradition, including key ideas from Husserl, Heidegger, Merleau-Ponty. Immediately following this, she troubles this view of a universal perception of our relation to objects, citing subsequent important ideas from feminist, queer, and critical race writers and philosophers (e.g. Collins, 2000; Haraway, 1991; Lorde, 1984). She underscores the important contributions of these thinkers to our contemporary understanding of how social differences are shaped by the ways that bodies inhabit and occupy space with others, and their articulations of how intersecting forces of race, gender, sexuality, and ability create diverse 'standpoints' of situated bodily experiences. These themes are echoed throughout the book and throughout her other books. For example, six years later in her book On being included: racism and diversity in institutional life (2012), Ahmed refers to the contribution of Haraway's well-known model of situated knowledges (1988) and the emphasis on the located and embodied nature of knowledge practice as a foundation for her own feminist practical phenomenology. A feminist practical phenomenology also builds upon feminist work like the 'politics of location' (Rich, 1986). Ahmed also draws on cultural studies and affect theory (e.g. Berlant, 2011, 2019) to queer the foundational concepts of the philosophical tradition.

Like the universal observations of the foundational phenomenology texts, queer phenomenology asks us to question our experiences of objects within our 'bodily horizon' -- which objects we notice and which objects fade from view into the background. However, it also asks us how we come to perceive objects in this way; and how these background objects themselves might have a background. What labour went into the conditions of their arrival to appear to us in this way?

Drawing from foundational theories between participatory design and queer phenomenology (later feminist practical phenomenology) I suggest that the feminist writings of Ahmed offer a valuable lens through which to deepen our understanding of this practice in several ways. Broadly, adopting a feminist phenomenological framing allows us to thicken our descriptions of how we experience and relate to 'objects', 'others' and cultural difference when we design with diverse stakeholders and communities. Attending to the 'queer' aspects of Ahmed's phenomenology also provokes us to consider our own orientations to this work and to the co-constitutive role of the objects in co-design. These aspects of practising participatory design are core to the work, yet often remain implicit while we are busily crafting the materially-mediated methods we sense will be the most effective and appropriate for the situation. Through the works of Ahmed, we can take up the calls from Agid (2018), Agid and Akama (2020), Akama and Prendiville (2014), Light (2010), Light and Akama (2012), and Pihkala and Karasti (2016) to better account for reflexive practices and practices of engaging with the conditions that constrain and limit possibilities for imagining change. Instead of relegating practitioner experiences to the background in favour of foregrounding a detached version of the methods we use, we can share valuable insights from our embodied experiences as practitioners.

2.20 Oblique orientation to co-design practice

In this study, I contribute to Design by applying Ahmed's diverse feminist theories towards a more nuanced understanding of the phenomenological and embodied conditions surrounding the emergence and design of materials for participatory engagement. Specifically, I examine the situated experiences of the practitioner in crafting bespoke, haptic, visual, speculative, and reflective materials for co-design events and workshops. In turn, I contribute back to feminist theory by investigating how reflective practice with the 'back-talk' (Schön, 1983) of designing materials and objects for use in co-design can amplify experiential and transformative learning and the personal, situated becoming feminist of a designer as we come up against and collaborate with public sector institutions. Developed through anticipating what will be needed to foster and imbue feminism within lively co-design engagements, workshop materials can become become 'queer objects' in their impressions of stability and giveness within a situation that is otherwise perceived to be totally changeable and in constant flux (Ahmed, 2006). We might also view the materials that are created in preparation for co-design as both an extension and a temporary, partial concretising of a designer's entanglement and intentions within evolving project situations. In this sense, the materials that are prepared for use in co-design engagements are not only the result of the reflective and negotiative back-talk between materials and an ever-shifting external context (e.g. Grocott, 2012; Schön, 1983), but as significantly reflective of the personal histories and embodied experiences of the designer. Therefore, attending to how the personal is also in conversation with the preparation of co-design materials and methods contributes to the inquiry into the role and implications of practice in co-design engagements. Acknowledging this facet of the work might allow us to deeply consider how we are contributing to co-design processes beyond disembodied 'methods' as offered by Akama and Light (2012) or even participatory and feminist methodologies and frameworks.

Although aligned in purpose with the calls to share more accounts of personal practice, I also draw a distinction and extend the scope of the kind of descriptions that might be pertinent to share with the field. The personal in this study does not only refer to the qualities described by Light as attributes one 'has' such as being 'open, listening, patient, honest, co-creating, non-directive, and accountable' (2010, p. 186), but also refers to personal histories, interpretations, and sensemaking and learning from our embodied practice experiences. Light advocates for the importance of sharing personal practices over methods by contending that 'After all, the message transmitted is in the encounter, not the planning ... there is no method until it is enacted' (ibid.). However, in contrast to focusing on the moment of enactment of a method at a co-design event, I also advocate for sharing details about the personal anticipatory practices of making the methods themselves, in advance of the encounter. Ahmed's phenomenological perspective of 'arrival' and 'how we arrive' to our practice (and how objects, in turn, arrive for us) suggests that our personal enactment of a method starts well before our physical encounter with participants. Following this view, we can also consider how we are entangled with participants in the leadup to our mutual enactment of a participatory method at a co-design event. While we are designing these methods, we keep participants in view and in focus. However, this view is limited and partial. While designing, we perceive participants, but only through the representations and speculative impressions we imagine of them before we meet for the first time, or through the representations and impressions that linger after a previous encounter. And yet these impressions are a crucial part of situated participatory design practice and in making sense of how to navigate and negotiate complex, unequal, worlds.

For example, in Chapter 1, I highlighted the unique challenges of designing within the public sector from design discourse. In the course of this research, I have experienced many of these challenges firsthand. For example, the majority of my co-design practice took place in the context of contract research and became subject to strict communication embargoes. Also, in working across varied research teams and institutions, significant bureaucratic complications emerged about who owned and who had access to the intellectual property that stemmed from the collaborative nature of the projects I was embedded within. As a result, years into this research, I unexpectedly was unable to share important information about the major public sector projects I had been working on. I was not able to disclose anything about the funders, collaborators, stakeholders, or participants, nor the bespoke methods, participatory data, participant-generated artefacts, secondary research findings, project findings, or design outcomes. In short, all the familiar objects of co-design I had used to situate and orient the wider contribution of this work were no longer 'in reach' (Ahmed, 2006; 2010):

Disorientation could be described here as the 'becoming oblique' of the world, a becoming that is at once interior and exterior, as that which is given or as that which gives what is given its new angle. Whether the strangeness is in the object or the body that is near the object remains a crucial question ... If objects are the extensions of bodies, just as bodies are the incorporations of objects, how can we locate the queer moment in one or the other? (Ahmed, 2006, p. 162).

I was disoriented. Prior to this point in the research, I had been following a project-grounded methodology in my practice (see Chapter 3, Section 3.212) and all my research activities were oriented towards developing and documenting situation-specific methods, findings, and outcomes for the projects (all of which were focused on important matters of concern for feminism and/or gender equality). Without being able to describe my work according to these familiar aspects of co-design research contribution, I suddenly felt far flung from the projects in which I had been deeply embedded and situated. Without these details, what valuable contributions of this work could be left to share with the field? Was there anything I could salvage? However, it was soon clear that finding myself in this oblique relationship to the research offered a new, promising orientation. I realised that the value (and the privilege) of conducting this research as a PhD candidate lay in noticing and tracing what could come back into view when I was suddenly turned away from the aims and objectives of the project. Instead of project outcomes, I was left facing only the bespoke templates and workshop materials I had designed for use in collaborative workshops. It has been demonstrated that designers are largely unable to perceive design tools they use outside the competing requirements of the design activity (Self et al., 2013). But I was now looking at these materials as queer objects, forcefully removed from their various project contexts, in the same state they had been in before they were used by participants, before they had become participatory data vessels for their projects:

Seeing such objects as if for the first time ... *involves wonder*, it allows the object to breathe not through a forgetting of its history but by allowing this history to come alive: How did you get here? How did I come to have you in my hand? How did we arrive at this place where such a handling is possible? How do you feel now that you are near? What does it do when I do this with you? Such wonder directed at the objects that we face, as well as those that are behind us, does not involve bracketing out the familiar, but rather allows the familiar to dance again with life (Ahmed, 2006, p. 164, emphasis added).

By 'bracketing' the familiar objectives and aspects of the co-design *project*, I could wonder about the personal, relational, and embodied aspects of *practice* that were usually relegated to the background. Unable to share data about how the workshop materials I created may have affected participants and the participatory process, I could instead deeply interrogate how my evolving feminist 'tendencies' and intentions were implicitly and explicitly manifested in and through an anticipatory, materially mediated collaborative practice. In other words, I could question how I, too, had been implicated within and affected by these material engagements, not only the participants and stakeholders. As Ahmed suggests, I could also wonder about how *these feminist tendencies and the materials themselves might 'have a background'* (2006, p. 37). I could wonder about the relational conditions for how these objects of co-design arrive. More broadly, I could question the possibilities and constraints in the agency of designers to effect change and how personal, politicised perspectives (like a commitment to feminism) are manifested in and through collaborative, material practice.

In noticing how the arrival of co-design objects (including those we design) is in conversation with our personal history and our impressions of others, we necessarily embrace an ethic of *becoming* with practice, which has wider implications for our field. It is well-documented that the situation-specific nature of design research is often a defining aspect of our work. Practitioners adopt participatory approaches in efforts to create positive change and tailored outcomes for those who will be directly affected by the outcomes. But this situated commitment is also an ongoing conundrum for sharing knowledge more widely in the field, as findings are rarely generalisable or reproducible in the same ways that we might expect from other paradigms (Haseman, 2006; Mahoney & Goertz, 2006). To work around this constraint, designers commonly default to sharing methods in the hope that they might be useful beyond a specific project context. In other words, when designer-practitioner-researchers use a method to successfully make change in a particular situated context, the hope is that sharing a similar *process* could be useful in other contexts even when the outcomes are not generalisable.

In contrast, this study advocates for reframing and extending what information might be useful beyond a project context. Importantly, this reframing suggests that usefulness does not come only from transferable methods or generalisable findings, but also from embodied and personal insights. Following a phenomenological approach, we could consider this tendency to share a transferable method as an implicit choice to bracket all the other situationally specific details we experience on a personal level. But, rather than putting these details aside, we can bring our embodied experiences of a situation, and the rich learning that occurs through our iterative micro-efforts to transform a situation, into the foreground. In practice, transformative learning is not limited to success stories of how we successfully made change or designed transformative encounters for 'others'. In fact, the most transformative learning often occurs in our moments of disorientation (e.g. Mezirow, 1978) such as when our efforts to make change are blocked. We can share detailed, implicated accounts of personal transformations that occur as our evolving implicit understanding of what it takes to make transformation through trial and error and designing-with becoming-with practice. While the artefacts of bespoke methods may have been designed to capture participant data, these same artefacts can also point towards evidence of our own transformations and evolving perspectives. To avoid splicing the designer from the embodied design and enactment of design methods, we might instead bracket the usual generalisable details we think are worth sharing with others about a co-design project. Instead of sharing our methods like 'fetishized commodities' (Marx, 1887/2000) that obscure the labour and relational aspects of where they came from, we might look at our materials and methods differently: as 'queer objects' that have emerged through intertwined histories of arrival to illuminate and enliven the specific, strategic, persistent, and affective aspects of practice.

Through following these theoretical concepts from queer phenomenology, this research has created space to make sense of how our own participation as designers emerges, unfolds, and temporarily solidifies through the materials we create for use in co-design. Moreover, as a promise for the field, this theoretical orientation suggests how we might further develop our understanding of *how* to design for transformative encounters *through* paying attention to the often overlooked entanglement of our personal and situated histories in setting the 'conditions of arrival' for how design encounters take shape and *shape us in return*.

2.30 Disorientation, transformation, and designer learning

Design, as a diverse field and occupation, trades on transformation and change, though, not all design practices strive for or claim to create transformative change. Indeed, more and more commonly, dominant design narratives about its transformative potential have been critiqued, suggesting that design can be just as instrumental in maintaining the status quo as disrupting it (e.g. Bonsiepe, 2006). And yet, most design practices centre on creating change. Beyond changing material form, contemporary design practices also seek to change thinking and frames (Dorst, 2015), often marketing these unique disciplinary skills to others outside the field by offering trainings, bootcamps, coaching, mentorship, and design thinking programs.

Within wicked social problems (such as gender inequity or other complex intersections within public sector research and public sector social innovation projects), transformative learning is required of all stakeholders – from the minister through to the co-designer facilitating the event, despite how difficult this may be to measure and evaluate. Every participatory designer has anecdotes of transformative changes that they have witnessed that would not be captured by these measures. Often it is the more elusive, implicit, or 'felt' evidence of transformative change that guides our everyday practice. There might even be an inverse relationship between what practitioners feel has been the most impactful part of the project and the impact they have been able to evidence from the project. For example, the Design and Social Innovation in Asia-Pacific (DESIAP), recently reviewed over 32 social impact frameworks and confirmed that most were biased towards quantitative evidence, such as financial measures and resource utilisation (Akama et al., 2019). These transformations-in-progress can be difficult to describe, let alone measure.

In response to the bias to quantitative measures in assessing social impact Yee, Raijmakers, and Ichikawa (2019) analysed case studies of design-based programs to reframe how social innovation projects might create social value. In their paper 'Transformative learning as impact in social innovation' they apply transformative learning theories from four perspectives in Western adult education, including: Paulo Freire's 'emancipatory' 'transformation as consciousness-raising' (1970) and Mezirow's 'transformation as critical reflection' which requires 'disorientation dilemmas' (1991). Yee et al. identify transformative learning as a promising new framing for analysing, evidencing and understanding the impact of social innovation projects. Following this finding, the current study investigates how conceptions of transformative learning might shape the way we evaluate and measure this impact of the work going forward. In the next section, I explore the transformative learning that takes place in project-grounded research projects, especially for the designer as a learner in these collaborative processes. This includes how we might conceptualise and analyse

core aspects of the work like 'lived experience,' the 'relational self,' 'mutual learning,' and 'inclusion of diverse perspectives' in collaborative processes for social change or positive social impact.

Before moving on, it is interesting to consider transformative learning through Sara Ahmed's ideas about feminism and orientations. Her theories intersect with the above two learning theorists, Mezirow (indirectly) and Friere (directly). Like Mezirow, Ahmed writes about the importance of 'disorientation.' However, her focus is on dominant social scripts and norms, in order to show how 'orientations are organised, rather than causal.' In other words, it is not just that an individual has a certain worldview that is directed in certain ways, or through a certain orientation toward the world, but that the world is also shaped by the paths that some bodies follow more than others. Of course, the implication here is that some bodies experience disorientation more than others simply through existing in the world that does not accommodate them as easily (Ahmed, 2006, p. 158-159). Therefore, 'disorientation' should not be expected of everyone equally, in some cases it might demand too much for those who are already not oriented along dominant paths. While we can draw connections between Ahmed's theories of orientation, and Mezirow's disorienting dilemma, Ahmed herself has connected her work directly to the emancipatory approach of Freire. As Agid describes, Friere's approach to reflection and action (praxis) creates capacities for doing and changing things 'by first seeing or perceiving them' (Agid, 2019). However, Ahmed offers a supplemental concept in the form of a reversal of this idea:

Transformation as a form of practical labor, leads to knowledge. The very labor of transforming institutions, or at least aiming for transformation, is how we learn about institutions as formations ... It is not simply that [practitioners] are philosophers--in the sense of being reflexive and critical--in their attitude toward institutions...it is not simply that they become conscious of what recedes from view. Rather, [they] acquire a critical orientation to institutions in the process of coming up against them. They become conscious of "the brick wall," as that which keeps its place...Only the practical labor of "coming up against" the institution allows this wall to become apparent. To those who do not come up against it, the wall does not appear (Ahmed, 2012, pp. 173-174).

She describes a slight variation for the relationship between critical understanding and transformation. She reminds us that the practical and applied actions and efforts to create transformation (as a feminist or other practitioner) also leads to critical understanding, not simply reflecting on the world. The doing of feminism is how your understanding of feminism evolves and transforms. Thinking of Ahmed's notion of 'coming up against a world' reminds us that transformative learning also occurs through active orientation toward change, not only experiences of disorientation. The learning that happens through this practice might offer a new direction or new orientation as well. In the conclusion, I revisit this idea of actively seeking alternative and queer orientations through discussing 4 possible 'turning points' (see also Ahmed, 2006, pp. 15) that practitioners might consider to amplify embodied learning through practice.

Chapter 3 Research Program

3.01 Chapter summary

In Chapter 3, I outline and describe the 3 phases of the emergent research program and the corresponding key research activities and approaches that were conducted at each stage. Throughout this chapter, I use a repeating refrain of 'finding tension, finding resonance, finding intention' to describe how these evolved and built upon previous activities over time. Phase 1 Practice experiences (Section 3.1) describes the research I conducted as an embedded participatory design researcher within a variety of interdisciplinary contract research projects for the public sector on topics related to gender equality and feminism. My research practice during this phase centred on designing bespoke materials and innovative research methods for a variety of co-design events to support wider aims and objectives within each of these discrete project situations. I discuss this practice in conversation with the '4 designer researcher orientations' (4DRO) and the 'expanded practice of making' frameworks from Grocott and Sosa (2018) to explore what a design-led, project-grounded participatory practice can contribute to our understandings of feminisms. Phase 2 Personal sensemaking (Section 3.2) describes a shift in the research focus away from project outcomes towards an explicitly phenomenological exploration and thick description of personal experiences of this practice. This was achieved through: 1) immersion and thematic analysis of resonant feminist theories from Ahmed; and 2) writing design research praxis narratives (DRPNs). I describe how the first iteration of the DRPN was co-conceived with members of WonderLab, before it was adapted for this study. Phase 3 Collective sensemaking (Section 3.3) describes the final phase of the project, where I developed a small series of intimate online workshops to explore themes and insights from the DRPNs with other practitioners and apply personal insights from the study back into a participatory practice. These workshops create a space to attend to the (queer) phenomenology of design practice and feminisms, with support from and in relation to each other. A core aspect of this workshop is the open-ended 'conversation card' prompts I designed based on a selection of theories from Ahmed that had resonated strongly with my own design practice experiences. This phase is documented through the exhibition website accompanying this exegesis: www.designertendencies.space.

3.10 Focus, research questions, and scope

3.11 Focus: amplifying transformative learning, becoming feminist through designing

This study offers different accounts and thicker descriptions of transformative learning through co-design practice in two ways:

- 1) It begins with trying to better understand, trace, and account for disorientation and transformative learning experiences on a personal scale.
- 2) A feminist practical phenomenology also accounts for the difficulty of transformation. It seeks to notice and describe the micro-efforts and strategies that a designer might employ when navigating blockages and restrictions within institutional worlds. It attends to and accounts for how designers come to understand transformation in practice: not just through critical dialogue and theory that requires some withdrawal from our immersion in the world, but through worldly impressions and embodied actions. Rather than only looking to feminist theory to show designers what needs to changed, this study also explores what designers' embodied experiences of making change allow us to see. In addition to theory, the practical experience of 'coming up against something' while trying to make transformation, can also be what allows us to perceive what is required to make transformation.

3.12 Research questions

This study does not seek to definitively answer these questions, but instead uses these guiding research questions as a way to set a trajectory for diverging and converging paths of inquiry:

A feminist movement thus requires that we acquire feminist tendencies, a willingness to keep going despite or even because of what we come up against. We could think of this process as practicing feminism. If we tend toward the world in a feminist way, if we repeat that tending, again and again, we acquire feminist tendencies (Ahmed, 2017, p. 6).

How does a designer 'tend toward the world in a feminist way' through practice? In turn, how do transformative learning experiences of co-design practice contribute back to our evolving personal feminist tendencies? How are designers negotiating and making sense of feminist tensions, blockages, and transformation through situated project contexts?

Deviation is hard, deviation is made hard (Ahmed, 2020, p. 42).

Inspired by Ahmed, the research seeks to both answer and provoke the question: in crafting the right context for co-designing more equitable futures, how are practitioners *unmaking* how hard it is (for all of us) to deviate from norms that support and perpetuate inequality?

At the same time, this research also explores how this difficult work of trying to make change and transformation in the public sector through co-design generates valuable 'sweaty concepts' that, in turn, shape and extend personal understanding of feminism, especially what feminism is 'up against'.

3.13 Research scope

The contribution of this research is to provide a 'thick description' (Ryle, 1968/2009, p. 501; Ahmed, 2012, p. 8) of designer learning through practice and how navigating complex challenges in practice generates 'sweaty concepts' (Ahmed, 2017, p. 13-14). This study closely examines often-overlooked aspects and critical reflections on designer intentions, and how these intentions are formed by and take shape within collaborative project situations and public institutions. This reflexive and personal focus is not to distract from the wider effects and impacts of these projects. As principle 3 of the Design Justice Network clearly states, we need to prioritise design's impact over the intentions of the designer. I also argue that in contemporary shifts away from the designer-as-expert towards the designer-as-facilitator (e.g. Sanders, 2002), our 'designer intentions' can often become obscured, poorly scrutinised, or even insidious aspects within a collaborative process. Failing to engage deeply with our own orientations (or attune to how we are shifting as the project evolves) makes it difficult to evaluate or even understand whether our involvement is meaningfully contributing to, detracting from, or perhaps ultimately inconsequential for the outcomes and impacts of these collaborative processes. In this study, the focus on designer intentions is not at the expense of accountability for the impact of the work at a larger scale. Rather, this focus contributes to these important critiques by advocating for increasing our nuanced understanding of the scale and scope of our personal accountability for the impact of collaborative and participatory practices.

I use the term 'thick description' in a similar way to Ahmed, who draws from the original term coined by philosopher Gilbert Ryle in 1968. This term refers not to 'thin descriptions' of what a person is doing, but seeks to understand 'what the person is trying to accomplish' (Ryle, 1968/2009, p. 501-504). Ahmed premises her book 'On Being Included' (2012) on the idea that we can understand institutions better by providing a thicker description behind the actions of people tasked with doing diversity and inclusion work (I discuss this and how it relates to co-design practice further in Chapter 5, Section 5.211). I am providing this clarification because Ryle's term 'thick description' would later go on to be popularised by Clifford Geertz (1973) in anthropology, where it was extended and to become a particular research method.

Ahmed's practical phenomenology approach led her to the idea of 'sweaty concepts,' which she defines as concepts that arise from bodily experiences in the world and descriptions of bodily experiences in the world. These concepts can come from the bodily experiences of those who don't feel 'at home' or who are not accommodated in a world, or 'a bodily experience that is trying', or 'the practical experience of trying to transform a world' (Ahmed, 2017, p. 12-14). Throughout the exegesis, I use the term 'sweaty concepts' to explore how the practical, applied efforts of trying to make change through co-design practice contribute back to our understanding of feminism (especially in situations when this practice is difficult).

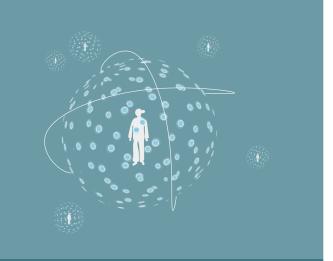
3.20 Research phases and key activities

PHASE 1 Practice experiences

Project-grounded research as an embedded participatory designer on feminist projects in the public sector

Activities

 designing bespoke innovative research methods, activities, and materials for co-design events

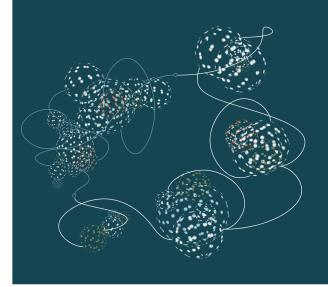


PHASE 2 Personal sensemaking

Phenomenological inquiry into my practice experiences with feminist theories from Ahmed

Activities

- immersion in and thematic analysis of Ahmed's feminist theories
- writing of design research praxis narratives



PHASE 3 Collective sensemaking

Phenomenological exploration with other designers into our practice experiences with feminist theories from Ahmed

Activities

- generative workshops with co-design practitioners
- exhibition website

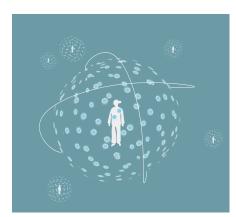
Figure 7 Research program phases and key activities at a glance

The following sections summarise the research activities that took place in each phase through a process of *finding tensions* in the research, *finding resonance in tensions* in the work of others, towards *finding focus and intention* (repeat).

3.21 Phase 1 Practice experiences

3.211 Defining practice

Over the course of this PhD, my design research practice has been applied across a wide variety of projects in the public sector. This contract research was funded by several government entities in Australia at a variety of scales (including national departments, state departments, and local councils), as well as non-government



organisations. The project aims varied from co-designing action plans and strategic visions to co-creating theories of change, co-design and research consultation with communities and stakeholders, and generative workshop engagements and events. These workshops were often related to the project topics and might be centred on implementation of gender-sensitive policies or gender-sensitive design of public spaces, services, or infrastructure.

In Chapter 1, I discussed related terms 'participatory design' and 'co-design', in relation to feminism, gender equality and the public sector. While these terms are not interchangeable, my own practice draws on aspects of all these approaches and does not sit neatly in any

one of these categories. Most importantly, when I use the term 'co-design' in this exegesis, I am referring specifically to collaborative, participatory, design-led research methods (e.g. 'innovative design methods,' Keinonen, 2009) not co-design or participatory design as a wider methodology, although these methods are often used within a wider co-design methodology. In the next section, I discuss the '4 design research orientations' (4DRO) framework to discuss how this 'designerly' approach to research unfolds in interdisciplinary projects, and what core attributes of design inform the 'design-led' methods used in my practice. It is also important to acknowledge that my practice is situated in the research context of a university, but has been executed through applied contract research for the public sector. I rarely approach design projects from a purely practice perspective and most commonly assume the hybrid role of a designer-researcher (Findeli, 1999; Grocott, 2012; Haseman, 2006) within applied interdisciplinary research projects. As I discuss in the next section (3.212) the approach and methodologies of these projects varied to suit the central challenge that was being addressed, so my practice drew from a variety of different sub-fields of design. This includes design thinking, human-centred design, participatory design, co-creation, or reflective design (Sengers et al., 2005; Loi, 2007), or empathic design (Mattelmäki et al., 2014). I am using the term 'co-design' for this study for two reasons: 1) my research practice centres on designing methods and bespoke materials to enable diverse stakeholders and participants to engage collectively in designerly approaches; and 2) this is the term that was used most frequently among collaborators and public sector organisations in practice.

Specifically, I specialise in designing participatory engagements and bespoke workshop activities, materials, and methods for use during 'co-design events' (Brandt, 2001; Eriksen, 2012). In the next section, I discuss how my participatory research practice unfolds from within a project-grounded methodology (Grocott & Sosa, 2018). It is important to note that I am never the sole investigator on any of these projects. However, during the course of this study, I was often the sole *participatory* designer (Sanders, 2002) within a team of design researchers (for example, given the title 'Lead Workshop Designer'). Or, more often, I was the only designer on an interdisciplinary or multidisciplinary team of researchers from other fields outside design (for example, given the title 'Sector Consultation Adviser').

Being responsible for translating emerging findings from the team research into participatory engagements with communities and stakeholders meant that I also needed to be deeply involved within and across multiple aspects of the situated projects as research progressed around and through scheduled co-design events. This ranged from contributing to literature reviews, to internal presentations and meetings across different groups within the research team itself, staying up-to-date on findings from other groups (for example, results of interviews conducted by other members of the team), delivering presentations and having meetings with different stakeholders, immersion and observations within the applied context of the research (e.g. certain typologies of public space), and sensemaking/reconciling all this diverse primary and secondary data.

As an independent consultant or member of larger research teams, I often had input or could make recommendations about participatory methodologies, but ultimately I had very little autonomy over other design decisions within a given project context, such as who to involve, the number of participants, or number of touchpoints with those participants, or overall objectives or final deliverables of the research, etc. The choices over which I did have the most autonomy centred on what Lee et al. (2018) identify as only one of 10 key design decisions within a co-creative process: the decision about the 'types of co-creation activities' (p. 23). Although designing, facilitating, and analysing outcomes of activities were not my only responsibilities within a given project, I consider this to be the most consistent aspect of my practice across varied project contexts. This small aspect of co-design is the focus of the current study: investigating the embodied practice of designing bespoke methods and materials 'for fostering people's collective creativity' (Lee et al., 2018, p. 16) at co-design events. More specifically, this research explores how this situated practice might inform and enact designer 'feminist tendencies,' which, in turn, has wider implications for how designers are conceiving and convening creative processes with others.

While it may be impossible to craft a perfect context guaranteed to foster every participant's creativity, participatory design practitioners and researchers claim to be driven by these implicit considerations in the leadup to co-design events. We see this in the design decisions made for the priming and icebreaker activities, booking the right venue, the workshop introduction scripts and framing, instructions, timing, and tools for each activity. At the most mundane, from a Western design perspective, this includes the unspoken decisions about things like the 'right' kind and quantities of pens for the specific tasks that are planned, choosing a kickoff date and time that will likely work for everyone, choosing between pre-printed name tags or handwritten ones, wayfinding signage, accessible meeting spaces, media waivers or consent forms, carefully considered seating charts, meetings, updates, and check-ins with partner organisations, carefully worded emails to funders and stakeholders, etc. Even planning to have adequate snacks, breaks, accessible toilets, and coffee all contribute towards a context that the designers perceive will best support the participants to contribute to the task at hand. These tasks of coordinating and preparing the optimal conditions for co-design are important for generating appropriate data for the project objectives, of course. But these (often

tacit) considerations are also intriguing for what they reveal about how designers anticipate the explicit and implicit needs of projects and participants so as to effectively engage them in collaborative creative activities.

Mundane, anticipatory, practical, strategic, and negotiative decisions are all made in the development of co-design events, including the preparation of bespoke co-design methods and materials, which is the focus of this study. Yet, this lead up work is not adequately discussed in co-design literature. Instead, the primary focus and documentation are on the finished tools or 'methods' for surfacing and capturing the solutions (Akama & Prendiville, 2016; Sanders & Stappers, 2016), with some exceptions (e.g. Akama & Light, 2018; Akama, Hagen, & Whaanga-Schollum, 2019; Akama & Light, 2020). Unfortunately, the lack of documentation about these choices-in-action, which are often positioned as insignificant within Western design discourse, not only contributes to erasing potentially important implications for how the abductive reasoning of the designer (along with their positionality, biases, personal preferences, agendas) might be entangled within the process and outcomes, but also forecloses opportunities for valuable knowledge sharing in the field. This point was observed by Hyysalo and Hyysalo in a large-scale collaborative design project of building a new library in Helsinki:

Mundane practicalities, strategizing work ... permeated the conduct, the relative merits, and the shortcomings of collaborative design activities. Thus, instead of viewing these factors as external ones that either aid or complicate collaborative design, they should be recognized as internal design issues, inherent in the work of collaborative design – this is work that designers (have to) do even though it goes beyond what has been thought of traditionally as designing. For public sector organizations, interactive design engagements with citizens can provide valuable new resources, but making the most of this potential requires skill in handling all the intertwined normative, strategic, and practical aspects of user participation (Hyysalo & Hyysalo, 2019, 58, emphasis added).

Refining this skill can be sweaty work. For example, in government-funded projects it is not uncommon for there to be hierarchical oversight of the project by the funding body or communication embargo requirements. As discussed in Chapter 1, Section 1.121, these requirements, and others—both spoken and unspoken—can place significant constraints on the design decisions surrounding public engagements with co-design participants. However, these practical constraints should not be considered external hindrances that interfere with what would otherwise be a successful co-design process, but integral aspects of doing this work within and with public sector institutions. It is these seemingly mundane choices, pivots, and adaptations that directly contribute to how co-designers come to deeply understand the complex circumstances and institutional norms that surround any design project. As Ahmed would say:

A sweaty concept might come out of a bodily experience that is trying. The task is to stay with the difficulty, to keep exploring and exposing this difficulty... Sweaty concepts are also generated by the practical experience of coming up against a world, or the practical experience of trying to transform a world (2017, pp. 13–14).

This embodied understanding informs the careful considerations involved in crafting workshop methods and materials that designers believe will be the optimal conditions for participants to explore the unknown or welcome new perspectives towards making positive change. Lee's (2014) research into 'designing design methods' demonstrates that the value of design research methods lies not only in the data they ultimately generate, but also in what designers are learning and sensitising to as they conceptualise and produce these

methods (see also Chapter 5, Section 5.111 where I further discuss implications of Lee's findings for this research). Of course, the important negotiation of the normative, strategic, and practical is not unique to participatory design practice, but is also an inherent part of strategic feminist activism (McCammon, 2012) and any other organisational practice seeking to change existing situations into preferred ones (Simon, 1969). For example, sociologist and legal scholar McCammon investigated reasons why activists strategically adopt more moderate and traditional frames in some circumstances, while in other circumstances they use more radical frames to challenge existing beliefs. Examining data from early 20th-century women's jury movements in the United States, she found that while the identities and beliefs of the activists and activist organisations themselves played a role in framing, the broader political and cultural contexts also shaped how activists framed their core issues, with activists choosing frames they thought would resonate with key audiences (McCammon, 2012).

So while co-design practice is certainly relational, requiring negotiation across diverse perspectives and stakeholders, we also see similar relational considerations for how social issues are tactically framed and developed in other fields and projects seeking to make a positive social impact. In this study, I am interested in specifically looking at designerly orientations to making change and how designers might humbly learn from reflexive and relational practices in other fields like social work, education, Indigenous research, and community organising (Martin & Mirraboopa, 2003; Perry, 2021) without presuming to fully appropriate or consume these diverse areas of expertise. As designers are learning from and incorporating these well-established practices, we also need to articulate what the expertise of designer-researchers might be contributing differently (e.g. Haseman, 2006; Mahoney & Goertz, 2006; Donaldson et al., 2017). In the next section (3.212), I focus and amplify these differences through following the research orientations that designers tend to use within an applied, interdisciplinary, research context.

3.212 Project-grounded methodology, 4DRO framework and expanded practice of making

In efforts to tackle complex problems and grand challenges, there is increasing appreciation for the necessity of interdisciplinary projects that can bring different knowledge paradigms together. In the first phase of this study, I followed a project-grounded methodology, often working within teams of interdisciplinary researchers and collaborators on applied challenges related to feminism and gender equity. In a project-grounded approach to research, decisions about how to proceed are based less on disciplinary conventions. Instead, researchers are required to translate across and operate at the intersection of different research paradigms in primary service of the project over the discipline (Findeli, 1999). As discussed in the previous section, my own practice largely centred on iteratively developing participatory engagements by synthesising findings across research paradigms as they emerged. I then translated these findings into co-design events that would be most appropriate and effective for advancing the objectives of a given project, rather than following a pre-determined design research methodology or design research question.

It has been demonstrated that, compared to colleagues operating from within more dominant quantitative or qualitative paradigms, the responsibility of the translation required of a project-grounded approach may fall more heavily on designers and other creative practice researchers operating from a performative research standpoint (Haseman, 2006; Mahoney & Goertz, 2006). In addition to the relative dominance of quantitative and qualitative methods over creative research methods, another reason for this extra burden of translation is that the knowledge contribution of a designer-researcher within interdisciplinary teams (beyond the utility of a design artefact) can be difficult to articulate. To help amplify the agency of the distinctive attributes of design, academic designer-researchers Grocott and Sosa (2018) propose a framework

that highlights 4 key 'design research orientations' (4RDO). This framework is unique because, instead of focusing on design methods or methodology, it highlights the dispositions and core contributions of a designer-researcher to interdisciplinary collaborations.

As I mentioned in Chapter 1, this study explores 'designerly ways of knowing' in two ways. In practice, I focus on creating co-design events where stakeholders can engage with 'designerly' modes of inquiry. I am also interested in how experiences of applied design practice might inform and influence what a designer comes to know about feminism. So while the 4DRO framework does not claim to articulate an exhaustive list of all possible designer-researcher orientations, nor does it claim that these orientations exist only within design, it is useful for this study because it highlights fundamental ways of thinking, making, and questioning that are common to formally trained designers. Grocott and Sosa (2018) suggest that these orientations become particularly relevant when designer-researchers join interdisciplinary teams in applied project-grounded research, like the research that I conducted in the first phase of this study.

Unlike a feminist framework like Rosner's (2018) orienting tactics, outlined in Chapter 1, which seeks to re-orient design practice by applying feminist theory, the 4DRO framework starts with dominant design practice. It highlights how designers might arrive 'already oriented' in certain ways that were shaped by their disciplinary training. Following the premise that these design orientations can provide valuable contributions to knowledge in interdisciplinary projects, how might these orientations contribute to knowledge of feminism?

Grocott and Sosa (2018) derive the 4 orientations from design theory (e.g. Cross, 1982) and core competencies of formal design training, which I summarise below:

- human-centred: oriented towards improving the human condition; identifying the 'right' need
- solution-focused: bias to action and final implementation; co-evolution of problem and solution
- speculation-driven: oriented towards divergent thinking; seeking preferred futures (Simon, 1969)
- *experiential*: oriented towards material representation; iterative experiential learning through reflective conversation with materials of a situation (Schön, 1983); this orientation is positioned as a culmination of the others

Of course these design orientations overlap and are interrelated. The solution-oriented nature of design involves analysis of the present situation, in order to transform it. This requires asking 'what if?' and the speculation of new possibilities (e.g. Schön, 1983; Mattelmäki, 2006; Gaver, 2012) and also 'how?' to materialise and implement new ideas in the 'right'—or most appropriate—way (Cross, 1982). The 4DRO framework assumes a participatory mindset (Sanders, 2002) in its human-centred orientation, making it especially useful for this study.

Each of the above broad orientations are also actioned through designerly modes of inquiry like **need-finding**, **sense-making**, **prototyping**, and **ideating**; all of which are also common modes of inquiry used in co-design workshops with participants. Together, these designer orientations and modes of inquiry can be understood through what Grocott (2017) has called an 'expanded making' practice (see Figure 7):

Beyond the making of the creative artifact, this framework encompasses the ways in which the designer sets out to *make* things *right* for the intended audiences, to *make* new futures *possible*, to *make* conceptual ideas *tangible* and *make* patterns *visible*. This expansive list of making

capacities is at the core of how the four orientations are played out in practice (Grocott & Sosa, 2018, pp. 46–47, emphasis added).

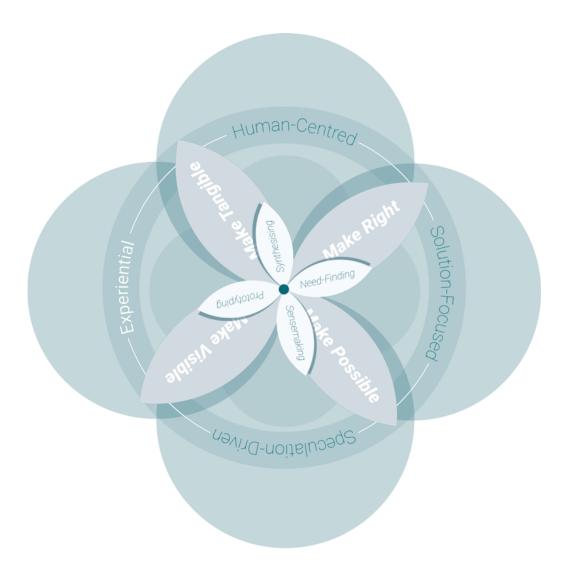


Figure 8 Combined 4DRO framework and expanded practice of making (adapted from Grocott, 2017; Grocott & Sosa, 2018)

The figure above has been adapted from Grocott & Sosa (2018) to combine the 4DRO framework and an 'expanded making' practice into one diagram. It is structured, but dynamic. Each of the various ways that designers are 'making' can spin against the overlapping 4 designer-researcher orientations. In the examples provided by Grocott and Sosa, 'making possible' is closely tied to both the 'speculation-driven' and 'solution-focused' design orientations through the elliptical relationship between imagining alternatives and solving for their application. However, they also emphasise that all these aspects of the framework are interdependent. This interdependence is demonstrated by my own practice, where, for example, I am very interested in how the affective quality of experiential learning encounters might influence what becomes possible, particularly for contested or emotionally charged topics like gender equity and feminism. (See Narrative 1, where I explore affect and material practice more closely and also Chapter 4 where I return to and extend this diagram). While feminism has much to offer design practice, we can also posit the value of what design can offer back to feminism; or how these fields might shape each other. For example, we might

immediately see the use of 'making conceptual ideas tangible' or 'making patterns visible' for feminism, given the complexity of most feminist theoretical concepts and how slippery or insidious patterns of gendered thinking and implicit bias can be. We can also posit that it is just these elusive, intangible, aspects of feminist issues that might make a designer's orientation towards abductive *sensemaking* (Kolko, 2010) both particularly well-suited to address this area *and* particularly vulnerable to reproducing gender inequality or ingrained heteropatriarchal norms.

And so how does an embodied feminist sensemaking relate to the expanded practice of making and a designer-researcher's inclination to 'make right' in applied projects?

In the next section, I discuss the background tensions that have emerged from my project-grounded practice in Phase 1 of this study. The transformative learning that occurred in my embedded experiences contributed to what I have come to realise was a conflation and flattening of the distinction between feminist projects (centred on [feminist] wicked problems) and feminist practice. Arriving at this distinction led to a significant shift in the research program: a turn away from the project-grounded orientation towards the phenomenological investigation of what I had been relegating to the background to sustain momentum in one direction.

3.213 Finding tension: feminist projects versus feminist practice

Returning to Ahmed's conception of 'orientations' in *Queer Phenomenology* would prompt us to interrogate *the background* of the objects we are oriented towards. As discussed above, the primary object, or objective, of most applied interdisciplinary research projects involves researchers from different disciplines adopting a shared orientation towards a 'problem'. In other words, the project serves as an orientation device, allowing researchers from diverse standpoints to turn towards something that has been deemed to be 'not right'. When applied interdisciplinary research is required, the project is often centred around complex 'wicked' problems (Buchanan, 1992; Rittel & Webber, 1973). In these contexts, research questions might be framed, tackled, and resolved in ways that are more similar to design briefs than other kinds of pure research located within just one discipline (Grocott & Sosa, 2018).

By reviewing the design research orientations of the 4DRO framework, we can easily see how personal experiences of designers are significant as they engage in performative, abductive, rhizomatic and situated project-grounded research. How are these personal experiences influencing abductive choices about 'appropriate' actions made by designers and how problems are being framed? In Chapter 1, Section 1.11, I discussed Bacchi's (WPR) approach. Bacchi's extensive research about the intersections of feminisms, gender equality, and policy demonstrates that the framing and representation of these problems by the public sector are consequential: 'how "problems" are represented has important effects for what can be seen as problematic, for what is silenced, and for *how people think about these issues and about their place in the world*' (Bacchi & Eveline, 2010, p. 112, emphasis added; see also Bacchi, 2009). So, rather than only exploring how personal experiences of designers are influencing projects, we also need to ask: How are the ways problems are being framed at the highest levels influencing the personal experiences and abductive choices about 'appropriate' actions made by designers?

In Chapter 5, Section 5.10, I discuss the complex implications of problem representation, perceptions of the representation of the problem, and 'happiness scripts' in relation to the quote above and co-design and

participant lived experience. Here, I am interested in how the WPR approach might resonate with and trouble the 4DRO framework and feminist critiques of individualism, notions of self and reflexivity, and embodiment (including the speculation-driven, human-centred, and experiential orientations of designer-researcher contributions). Both WPR and 4DRO frameworks view the representation of problems as a generative and consequential aspect of making change, although problem-framing in design may often overlook the political dimensions of problem identification (Agid, 2014, 2019). In the 4DRO framework, for example, the inclusion of the problematic design thinking term 'need-finding' as a core design contribution is fundamentally antithetical with the WPR framework. While need-finding positions problems as something that exist 'out there' waiting to be located so they can be solved, the socially/discursively produced and constitutive conceptualisation of problems is the foundational premise for the WPR approach. By comparing these two frameworks, we might caution that a need-finding approach could fail to engage with the situated history of how a problem came to be. However, in both the 4DRO and WPR frameworks there are shared dispositions to produce and explore problem frames, rather than to accept these frames as given.

Additionally, we can look to Ahmed's queer phenomenology to further extend our understanding of how *perception* and representation of problems are entangled within applied project and policy situations. Ahmed proposes that we not only ask 'how did this [problem] arrive'? but also *how did I arrive* at this problem *in order to be able to perceive it in this way*?.

Ahmed's theory also draws from Heidegger's foundational phenomenological concepts of the 'characteristic of being' and the 'in order to' of objects, to emphasise that the object comes to matter not only through our intertwining histories of arrival, but *also through what this object allows us to do.* Through orienting towards 'the *project* as the frame of inquiry by which we can advance design knowing' (Grocott & Sosa, 2018, p. 40, emphasis added), designer-researchers are allowed to do several things, such as: better integrate and negotiate the complexity of applied interdisciplinary research; '[deepen] a mutual respect for the orientations of researchers' across epistemologies and paradigms; and 'become liberated from being [either] a conventional researcher or a conventional designer' (pp. 49–50). On this final point, Sosa (2021) contends that this switching or choosing between conventional research methods and conventional design/artistic methods is often expected among 'practice' methodologies and the project-grounded research approach allows designer-researchers to operate at the nexus in between.

So, while a project-grounded approach increases our capacity to act as designer-researchers, there are always limits on how many things a body can perceive at once. Rather than what this orientation to projects allows us to do, Ahmed's theories ask us to consider what a strong orientation towards external projects might also obscure. She draws our attention back to the 'intertwining histories of arrival' of both the objects we perceive and how we came to perceive them this way (Ahmed, 2006a, p. 549). Through the focus on transformative actions for 'making things right' and 'making new futures possible' for an external project, what are the internal shifts and transformations that are also taking place? Often, these personal transformations that designers are experiencing while embedded within complex project situations are relegated to the background.

The 4DRO framework is useful for articulating how designers contribute to projects and noticing that designer-researchers are oriented along certain paths is important, as it can be difficult to recognise: 'we might not even think to think about this point' (Ahmed, 2006, p. 6). Ahmed's theories about orientation, objects, and others provide us with ways for further exploring the implications of the 4DRO framework.

Using these theories, I contend that we might think of the framework itself as an orientation device which enables us to take and sustain actions that amplify designer-research contributions to applied projects and disciplinary knowledge. Of course, now that we have this device in sight, we are also better able to perceive a queering of this perspective: how are designers not only contributing to projects, but also entangled with and *becoming with* projects in ways that inform practice beyond a specific project situation?

A feminist movement thus requires that we acquire feminist tendencies, a willingness to keep going despite or even because of what we come up against. We could think of this process as practicing feminism. If we tend toward the world in a feminist way, if we repeat that tending, again and again, we acquire feminist tendencies (Ahmed, 2017, p. 6).

Adopting Ahmed's 'philosophy of wonder' and this conceptualisation of the relationship between tending, tendencies, and practice, I wonder what it might mean to reconsider the orientations provided by the original 4DRO framework. We could think of these as designer-researcher tendencies rather than inherent, stable dispositions. Although the formal training of a designer might mean that we arrive at a project orientated along the paths identified by the 4DRO framework, what would it mean for us to view this positioning as relational, evolving, and co-constituted by project situations? Or how might it shift our understanding of personal practice to remember that we acquire our designer-researcher orientations through what we are tending to in any given project? But, like feminist tendencies, our orientations might shift in ways we do not intend, too. Sometimes we acquire critical orientations through practice, whether we want to or not, because of what we come up against. Perhaps the expanded practice of making could also expand our understanding of how we are *both shaping and being shaped through* personal and embodied practice at scales that are not bounded by the time frames of discrete projects:

There is no guarantee that in struggling for justice we ourselves will be just. We have to hesitate, to temper the strength of our tendencies with doubt; to waver when we are sure, or even because we are sure. A feminist movement that proceeds with too much confidence has cost us too much already. I explore the necessity of wavering with our convictions ... If a feminist tendency is what we work for, that tendency does not give us stable ground (Ahmed, 2017, pp. 6–7).

Within an expanded making practice, how do our efforts to transform problem/project situations (to 'make right') also shift and transform our embodied sense and perspective of what 'right' might be? How does this internal shift then become part of the intertwined conditions of arrival for the next project?

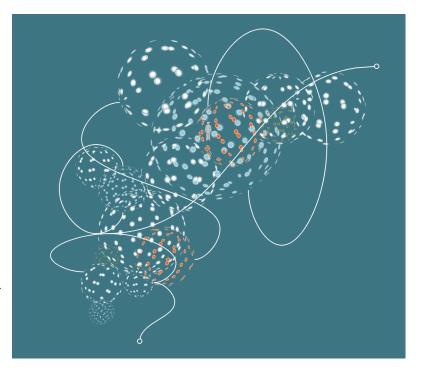
In my practice experiences during Phase 1 of this research, tensions began to surface between the feminist objectives of the projects I was working on and my evolving understanding and sense of what it meant to 'be' a feminist. In Section 5.30, I give a detailed account of the moment when these tensions that had been steadily building in the background of the projects I was working on shifted to the foreground. In this moment, my sense of *being a feminist designer* gave way to a new sense of *becoming feminist through designing*. In short, I discovered that by following the primacy of the project and focusing on the real-world impact we hoped to create, I had overlooked the significance of how the pragmatic negotiations, iterations, and compromises, anticipatory and strategic work was also, in turn, impacting on my own understanding of what it means to be a feminist.

3.22 Phase 2 Personal sensemaking

3.221 Finding resonance: immersion and thematic analysis of Ahmed's feminist theories

As discussed in the preface, I came to a turning point in this study following Phase 1, where tensions had surfaced from my practice experiences of working on co-design projects in the public sector. While seeking to make sense of the tensions I was experiencing, I came across the works of Ahmed. I describe this first encounter in narrative 3 (Chapter 5, Section 5.30).

Following my first encounter with the book *Living a Feminist Life* (2017), I began a voracious period of reading and immersion in her major works, collecting hundreds of quotes that resonated strongly with my design practice experiences. One



approach to try to understand why reading these texts was such a visceral experience involved inputting the quotes I had collected for thematic analysis. Though all of the quotes in the analysis were generated from theoretical texts, I used an emic primary-cycle coding process (Tracy, 2019) Ultimately, this method did not prove to generate many useful findings or insights beyond what I had already gleaned from reading the books. Rather than finding useful themes I could apply to design practice, it felt like finding words to put to the tacit understanding I had already gained through practice. My hope had been that conducting a thematic analysis on these quotes would reveal more generalisable insights into the nature of the relationship between co-design and feminism in the public sector. (At the time, I was considering developing another feminist framework for designers working in this context.) However, my analysis revealed that the quotes that resonated the most with me centred on ideas of practice and becoming a feminist through practice: that our understanding of feminism can be generated by what we come up against in the world.

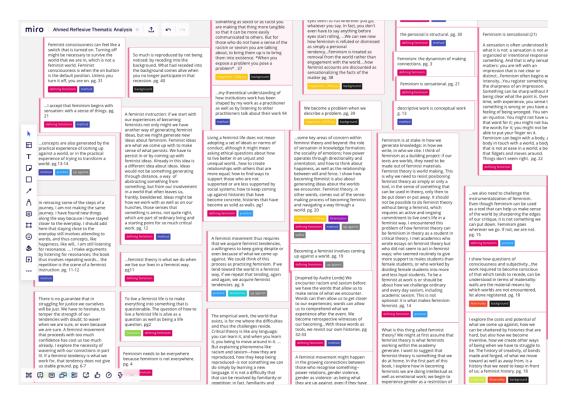


Figure 9 Screenshot of thematic analysis of Ahmed's feminist theories

I was not used to reading feminist theory that did not list aspirational principles, values, or other guidelines for how to implement feminism. The answers I was looking for about feminism were not in these books, but these books helped me realise where I should have been looking. In this study, I argue that the phenomenological emphasis of Ahmed's theories are particularly relevant for the field of design, as they share an emphasis on learning-through-doing and learning through trying to make change in the world.

These connection points between the works of Sara Ahmed and co-design practice are a key contribution of this research. As discussed in more detail in Chapter 2, Ahmed's phenomenological approach to theorising also provides a useful lens for deepening and thickening our understanding of embodied experience and our own experiences of embodied practice. This study has generated a selection of themes that are particularly relevant to co-design practice that underpin and permeate all her works. A small selection of these key themes are briefly summarised below. More detailed engagements with these concepts are explicated in-depth in Chapter 5.

- *Practice* is *Sensational* | Ahmed's work draws attention to our everyday experiences as the site of generating our feminist theory. She argues that our practical experiences of coming up against a world (a world we seek to transform) is how we come to know it. In keeping with this, she acknowledges that feminism often begins with a 'sense' of things, perhaps a feeling or impression that something is not right. Our practice is how we continuously tend towards the world in a feminist way.
- The Background | In Ahmed's Queer Phenomenology, she refers to the background of our embodied experience as the out-of-focus space where histories become hard, where the 'familiar' is reproduced through receding from view. She also offers a twist on this phenomenology, pointing out that some bodies have a different *orientation* to the background, that the background can

assume and extend the shape of some bodies (i.e. 'white bodies do not have to face their whiteness') more than others.

- Feminist Tendencies | Ahmed's work draws attention to our everyday experiences as the site of generating our feminist theory. Indeed, she emphasizes that a feminist movement requires that we tend towards the world in a feminist way. And through tending to feminism, we acquire our feminist tendencies.
- Happiness Scripts and Sticky Objects | how affect and the promise of happiness become ways of
 orienting people and institutions the 'right' way. Affect can stick to certain objects (e.g. 'happy
 objects') whether or not those objects are experienced that way.
- Feminist Killjoy | Sara Ahmed also provides us with a lens with which to understand the possible roles we may play as feminist designers working within the complex power dynamics of co-design projects. How and when do we assume the role of a feminist killjoy? Or, one who is willing to 'become a problem' through pointing out the problematic, even where others might not sense it or are not affected. This role is also inextricable from our identity. As Ahmed points out, certain bodies may be perceived as problematic simply by existing in a space where their presence challenges the status quo.
- [Queer] Use and Deviation | Ahmed questions and expands ideas about the very nature of 'use' by documenting examples of how things can be used in ways that were not intended or by those for whom they were not intended.
- *Willfulness* | Closely related to the recurring figure of the feminist killjoy, Ahmed discusses the idea of the 'willful subject' and draws connections between ideas of the directionality of power and the relationship between will and force. However, unlike the singular figure of the feminist killjoy, Ahmed also calls for the necessity of a collective willfulness, even if we are not in agreement.
- *Life Questions, Principles*, & *Unstable Grounds* | For Ahmed, feminist practice is about making everything into something that is questionable. Principles represent a starting point but do not dictate where we end up, developing our feminist tendencies may be our perogative but in developing them, we do not acquire a stable ground.

As I will discuss in Chapter 4, shorthand thematics like those listed in the selection above were helpful in my initial review of the workshop materials from the project-grounded research I conducted during Phase 1. Using these themes in the analysis of the workshop materials helped me notice which materials might be useful sites for interrogating how my practitioner tendencies and feminist principles—both implicit and explicit—evolved and became entangled within project contexts. Through focusing on how the personal manifests in relation to co-design workshop materials, this study begins to explore wider ethical implications about the role of designers in shaping the transformative possibilities of collaborative and generative workshop engagements.

3.222 Finding intention: changing focus from projects to practice

While my project-grounded practice was located in applied contexts in partnership with other research teams and institutions, my doctoral study was situated within the WonderLab cohort of the Emerging Technologies research lab at Monash University. WonderLab is a diverse community of researchers and designers, but with a core focus on deepening learning experiences and interrogating mindsets, beliefs, assumptions, privileges, and biases. This lab is focused on participatory methods and co-design engagements that strive to amplify lifelong learning. We are especially interested in interrogating participatory practices and intermediate designs for co-design events.

With the guidance of Stacy Holman-Jones and Lisa Grocott, several colleagues in WonderLab and I began developing 'design research practice narratives' (DRPNs) as a form of auto-ethnographic inquiry (e.g. Harris & Holman-Jones, 2016). This method draws from foundations in critical creative and performative writing (e.g. Pollock 1998, 2009), affect theory (e.g. Berlant, 2019), and feminist writing (e.g. Lorde, 1984; hooks, 2000). We all have our own approaches for using this method and the following chapter (Section 4.10) provides in-depth detail about the particular DRPN approach I adapted for use in this study. My discussions with colleagues in WonderLab and using DRPNs were integral in the transition from following a project-grounded methodology, towards feminist phenomenological interrogation of my practice experiences.

3.23 Phase 3 Collective sensemaking

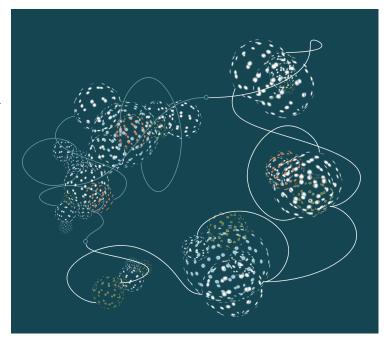
3.231 Finding tensions, intentions, and resonance: exhibition website

I am still listening for resonance (Ahmed, 2017, p. 12).

In addition to investigating a feminist practical phenomenology at the scale of an individual practitioner, there is also further opportunity to extend this work by sharing it with other co-design practitioners. As the exhibition outcome of this study, I have conducted a series of intimate online workshops with other practitioners. These conversations are documented via a website (**designertendencies.space**) and were

designed to hold space for group reflection on evolving practices and to collect more phenomenological accounts of 'becoming feminist through co-design'. In addition to serving as the design outcome of this study, this initiative also serves as the beginning of a new outward-facing dissemination and interrogation of the knowledge that has been produced by the research. In keeping with my objective of bracketing the project, this series of workshops will continue beyond this doctoral study. So, more than a conclusion, I consider it the first phase of following a new orientation.

Why a website: The increases in gender equity targets alongside increases in public sector adoption of design processes (see the



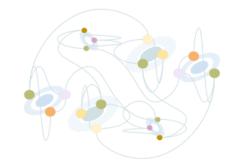
Victorian government's recently published *Human-centred design playbook*) underscore the need for more knowledge exchange among co-design practitioners working in these areas. This research explores modes of generating knowledge that is entangled within and produced by the messiness of practice. While designers are able to learn from each other through case studies in similar project contexts or through adapting our work to be more aligned with high-level principles or frameworks, the situation-specific constraints of any given project can limit the translation and knowledge exchange in the field. How can we learn from each other in ways that acknowledge how our intentions and principles shift when applied to the complex work of designing more just outcomes? How do we better learn how to persist in practice, together?

The techniques and analysis developed during this study have both surfaced and helped articulate my own feminist tendencies in practice. Following this precedent, the website builds on this analysis to create space for continuing to deepen this knowledge for/with other practitioners. Importantly, this knowledge that we generate from engaging in participatory practice will also be extended *through* the practice of collaborative workshops and storytelling.

The exhibition website serves as an oblique space to surface and name our evolving feminist tendencies. It is a space of 'consciousness-raising' to compare our perspectives about what we consider 'background' to this

work and the orientations we share collectively as a field and/or do not share as individual bodies. In building upon reflective practice towards becoming with practice, this space models what it looks like for co-design practitioners to embrace and interrogate how we, like participants and stakeholders, are also influenced and transformed by our experiences with co-design.

While there are many other related theories that are applied to the work of co-design (such as critical theory, critical race theory, critical pedagogy, decolonial theory, social justice, etc.), the highly contested theories of feminism with its ever-evolving waves and factions and contradictions are



Consciousness-raising was also about this: reaching a feminist account, an an account for oneself with and through others, connecting my experience to the experience of others (Ahmed 2017, 30)

especially apt. Feminism is useful to discuss in relation to collaborative practice *because* it is contested: our contributions to these spaces matter when we know there is no universal consensus on how we should construct a 'preferred' feminist future. Therefore, how much of ourselves do we willfully assert within these collaborative processes for transformation? Or how much are we ourselves willing to be transformed by these processes? Particularly in the context of the public sector, exploration of these questions and better understanding of how we are all implicated in collectively making and unmaking norms are essential to co-designing more just futures.

In a practice that is concerned with emergent, iterative, reflexive, and collaborative *process*, rather than designed outcome, it is necessary to exhibit the work in a way that preserves and demonstrates these qualities of the practice, yet communicates the contributions to knowledge. Following the analysis of my own evolving feminist co-design practice, I am bringing these findings into conversation (and 'use') with other practitioners as an important form of triangulation. For the exhibition website, I have begun work on a series of small online workshops with other practitioners I admire, where we:

- 1. discuss our feminist tendencies; and
- 2. discover what emerges from bringing our own practice-based knowledges and experiences into relation with a curated selection of concepts from Ahmed's feminist theory.

The online conversations embrace and put into practice several feminist ideas that have emerged from the study. At the most fundamental level, these conversations take the form of online workshops with bespoke materials, allowing for knowledge to continue to be created and disseminated through my practice, rather than existing as a separate empirical inquiry or outcome detached from this work.

Another principle¹ that permeates the workshop series is a questioning of research power relations through designing for more reciprocity, more participant choice, and more researcher uncertainty. However, it also grapples with the tensions that have emerged in my feminist co-design practice related to the level of autonomy of the participants and how much creative/emotional labour researchers expect from participants, alongside the participant experience of the workshop itself. In an effort to negotiate this tension, this workshop follows a 3-part structure with clear prompts, but the activities are playful and open-ended, and participants are explicitly invited to deviate from or modify the structure (see Figure below). In the main workshop activity, participants choose from a selection of questions and topics which they most want to discuss, or bring in their own inquiries to the discussion, so that the knowledge exchange is multi-directional and more reciprocal.

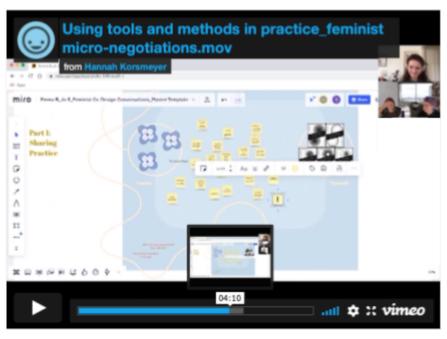


Figure 10 Early iteration of the first activity in the online conversations with practitioners.

The principle of reciprocity begins even earlier in the process by inviting each participant to *bring another* person of their choosing to the conversation:

I would like to make sure this conversation is as interesting and worthwhile for you as it will be for me. With that in mind, I encourage you to invite another person to join us. This could be someone you've worked with on a project before, someone whose work you admire, someone who shares your perspective, or offers an alternative or intersectional view. Or, just someone you think would be keen to set aside a bit of time to speak with us and reflect on this topic. (excerpt from the ethics-approved email invitation to participants).

56

¹ The word 'principle' is used here in the way that Ahmed uses it: 'There are principles in what we craft. How we begin does not determine where we end up, but principles do give shape or direction. Feminist principles are articulated in unfeminist worlds. Living a life with feminist principles is thus not living smoothly; we bump into the world that does not live in accordance with the principles we try to live' (Ahmed, 2017, 256). I would also argue that feminist principles are articulated in our own missteps, failures, and imperfections in practice that may also 'bump' up against the principles we are starting to articulate for ourselves, in moments when we feel we are negotiating, compromising, or not practising 'in accordance' with what feels right; these principles evolve through practice, they are not simply learned first and then applied to practice.

This invitation is designed to help stage a collaborative 3-person knowledge exchange where I also participate in sharing examples and insights from my practice rather than assuming the role of a detached observer.

In the second activity, I bring in theory from Ahmed in the form of conversation cards (see Figure 11 below) as another form of reciprocity and knowledge-exchange. The cards make it possible for us to engage with her work and ideas, which have been most influential in my research, without necessarily also having to dedicate time reading her works (this time and the expectation to have read theory is something I consider a privilege as a PhD student and something that I can offer to the conversation). Additionally, which topics we discuss is co-decided with participants based on their own interests and personal interpretations for how these ideas relate to co-design practice experiences.

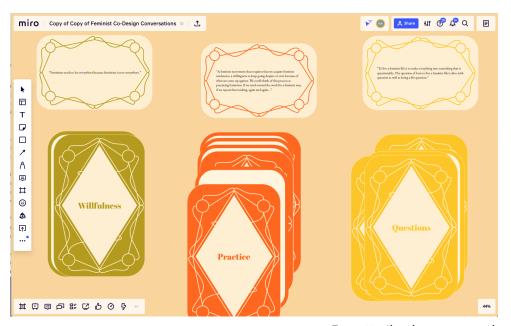


Figure 11 Ahmed conversation cards.

Another key feminist tendency underpinning the workshop is acknowledgement of participant contributions and co-analysis. Rather than separating participants from their contributions to my research by anonymising their efforts, each person is invited to be included and acknowledged on the public-facing website to their level of comfort (this may range from a headshot, bio, and links to their practice to an anonymous contribution). The final activity of the workshop is a co-analysis figuring activity where we all reflect on what was just discussed and share our own interpretations. Following the workshops, I curate this information for the public-facing content on the website. All practitioners are able to preview how their contributions will show up on the website for approval before anything is uploaded.

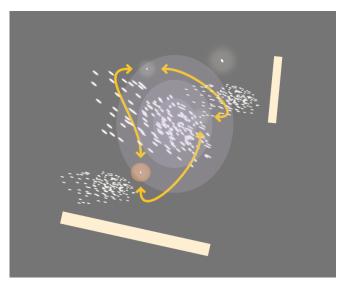


Figure 12 Example propositional 'figuring' diagram (Grocott, 2012) from the final co-analysis activity.

Practitioners are invited to participate based on a few broad criteria: 1) They have their own established practice that entails designing collaborative workshops (i.e. co-design or design thinking) and experience in public sector contexts; 2) They have demonstrated consideration for the social impact of this work (social justice, decolonising design, equity-centred design, critical/speculative approach, etc.). While not every practitioner would refer to their work as feminist or perhaps even refer to themselves as a feminist, these workshops are used to consider and reflect on the principles and tendencies that are enacted through their practice, as well as an opportunity to consider together how our experiences with co-design practice might influence our own personal feminist perspectives (including conflicting or contested points of view). The emphasis is not on labelling what feminist co-design is, but on identifying how practice shapes our understanding of complex social issues and ways of practising that are attuned to questioning universals and shifting these conditions. The method privileges practice knowledge in order to embrace both the plurality and the diversity of existing feminist thought and in order to contribute new perspectives back to socially responsive design and feminist theory.

The exhibition website includes the curated outputs of these conversations, alongside original diagrams, clips, quotes, and questions that are generated with other practitioners. These materials are designed to be experienced via the website (**designertendencies.space**), but I have included a table of short content descriptions from selected media below, to demonstrate the triangulation of knowledge that occurred during the online workshops and conversations with other practitioners.

Table 3 Descriptions of media from exhibition website

AUDIO CLIP 10m 02s Sharing materials and stories from practice: the role of family and 'invisible' support networks	This clip takes place at the very beginning of our conversation, where we started by sharing images from our co-design practices that we thought were related to feminism, revealing themes around plurality, accessibility, and taking the time to connect. Quickly, the conversation turned to other aspects operating in the background of our work. We considered how our families and upbringing might shape implicit foundations in our feminist perspectives and KA and Lesley discuss the vital importance of finding informal networks and communities to support you in facing and navigating everyday challenges within oppressive systems, institutions, and structures.
AUDIO CLIP 12m 45s Challenging the status quo: embodied experiences of coming up against norms within and around co-design	In this clip, we discuss our lived experiences of challenging the status quo. Lesley talks about how the ways that the status quo is reinforced within institutions can be felt, but sometimes hard to describe. However, after encountering 3 incarnations of 'Karen' in different settings, the repetition becomes an embodied form of feminist pedagogy. We talk about how an embodied understanding of belonging and power also shapes co-design processes. KA questions how this influences people's willingness to engage with tools like the model of care. Considering the various things that might induce 'eyeroll' (Ahmed, 2017) in a co-design context, I remember a time where I felt confronted by perspectives that challenged my own world view. We finish by considering how the project-oriented norms within co-design itself can undermine feminist and anti-oppressive aspects of the work. Instead of focusing on being a certain 'type' of designer, or on just the outcomes of design, I esley discusses design as a process for deepening thinking about important
AUDIO CLIP 05m 27s Sensing where the system can flex: composting experiences into creative actions	Lesley discusses design as a process for deepening thinking about important social issues, but also for stopping and really 'seeing people.' In this clip, Lesley shares that she has been dismissed for using critical utopian action research (CUAR) because this approach can be seen as 'escapist,' despite being useful for setting different priorities. Instead of escapist, we discuss how this kind of radical thinking can be a deep engagement and interrogation of current conditions. KA suggests that there is scope for co-design processes to engage more explicitly with 'what's already known' and—crucially—'who knows it.' At the end of the clip, KA also summarises a key takeaway from our conversation: that, somehow, all these embodied experiences we have as designers navigating complex systems become 'composted' into a variety of creative actions towards making change.
VIDEO CLIP 06m 27s Using tools and methods in practice: what we learn through feminist micro-negotiations	In this clip, Emma starts our conversation by sharing 'the power flower' a method she has used to draw attention to power and intersectional aspects of identity in co-design processes. We discuss how the use of different methods becomes complicated in practice and acknowledge the feminism within the micro-negotiations of enacting (or failing to enact) these methods in an applied context. In situations where feminist methods are hard to enact, paying attention to the tensions we feel as practitioners helps reveal details about how power operates and what exactly feminism is 'up against.'

VIDEO CLIP 07m 29s Sensing when, how, and if it's right to be a 'feminist killjoy' in co-design	We consider Sara Ahmed's recurring feminist figure of the 'killjoy' and question the conditions that allow or require this figure to show up in our practices. We discuss the embodied sensations of moments that might drive us to step into this role, even when it feels difficult. We acknowledge the designerly impulse to intervene, but how little support there is for this aspect of the work. We also consider these complex and ever-shifting power dynamics and responsibilities of a co-design practitioner working across project timelines and other, longer, scales.
VIDEO CLIP 06m 58s Reflecting through figuring: considering the relational self, looking at joy and killjoy as a shared horizon, and personal transformations	In this clip, we reflect on the high-level takeaways from our conversation through a visual 'figuring' (Grocott, 2012) exercise. Emma shares a diagram where she visualises herself in relation to the different contexts and people she encounters, and what it means to embrace the parts that might be 'in the shadows'. Jo thinks through the non-linear, intertwined, and important relationship between Joy and Killjoy. I reflect on how my practice has been shaped across different project contexts, and how reviewing these personal transformations has inspired a new orientation. We finish by considering how lived experiences are entangled in professional practice and what it might mean to engage with—or even shift—the various tensions and forces operating in the background of co-design.
AUDIO CLIP 31m 46s Oozing willfulness and feminist expectations	In this clip, Yoko takes a walk with her dog Bento and we begin our conversation by discussing the role of identity, positionality, and historicity in any situated co-design encounter. Soon, this conversation shifts to consider how feminism is enacted through embodied practice and mediated by the cumulative history of our experiences and expectations. Whether we anticipate being met with eyerolls or crossed arms, Yoko suggests that each co-design encounter is an opportunity to imbue—or 'ooze'—feminism and practice alternative ways of being and relating together. We finish the discussion by considering the impact of this relational approach as a form of long-term and collective wilfulness.

The above conversations reveal moments of resonance in our collective sensemaking with theories from Ahmed and reflections on our embodied experiences across our diverse co-design practices. The conversations provided thicker descriptions of our practices and revealed the 'sweaty concepts' generated from trying to make transformation with/in public sector institutions. As a form of feminist consciousness-raising, these conversations promoted and extended our sense of collective willfulness that Ahmed advocates for in her works. In the next chapter, I describe the methods I used to analyse my own practice experiences in-depth to prepare for these conversations.

Chapter 4 Methods

4.01 Chapter summary

In **Chapter 4**, I discuss in detail the DRPN recursive method of analysis that was introduced in the previous chapter. I then describe how I adapted the DRPN to explore and cultivate connections among my embodied design research practice, personal memories, feminist intentions and tendencies, and situated (dis)orientations. The DRPNs serve as both a recursive analytical method and a phenomenological, performative research artefact. In keeping with concepts of the 'relational self' distinctive to feminist phenomenology, I amplify the performative writing aspects of the DRPN, exaggerating the partiality of any written account of co-design practice. Instead of aiming for comprehensive documentation of the project situation, I use the DRPN to attend to details that are normally relegated to the background of practice and rarely included in written documentation or considered for evaluation in co-design projects. I combine aspects of the 4DRO framework with feminist practical phenomenology to illustrate specific intentions for the use of the DRPN method within the present study (see Figure 15).

4.10 Design research praxis narratives

Ahmed's theories bridge the gap between histories that are not over and a speculative wondering of what alternative possibilities we can make happen. She emphasises that practicing feminism, like design, is iterative and worldly. We gain knowledge of transformation through the everyday actions and labour of trying to make transformation. So, if we look at how we might acquire feminist tendencies, it is not useful to bracket this inquiry into discrete projects. The repetition is the feminist pedagogy—parsing the knowing into projects risks interrupting this process of *becoming with feminist/design practice* and forecloses aspects of our ability to share and compare accounts in the field at other scales. This is where a DRPN becomes a very useful reflective technique.

Following the work with WonderLab to establish this method (see Chapter 3, Section 3.222), my own approach involved refining this method for further investigating how feminist tendencies evolved, materialised, and were enacted through co-design practice. In the following chapter (Chapter 5), I present 3 narratives and vignettes that resulted from this approach. These DRPNs serve to condense the practice knowing from Phase 1 of the research into 3 carefully considered first-person narratives. The narratives are a recursive technique of analysis for drawing together the most salient insights derived *from* co-design practice with the most salient feminist concepts from Sara Ahmed *for* co-design practice. For example, concepts within these narratives include: embodiment and affect, 'happiness scripts' and 'sticky objects', inclusion and diversity, performative and non-performative acts, '(queer) orientation' and '(queer) use', feminist 'Killjoys' and 'willful subjects,' and 'unstable grounds'. Each narrative is followed by a discussion chapter that concludes with generative questions that centre on 'sweaty concepts' and the reciprocal relationship between design practice and feminism:

- questions that Ahmed's feminist theory open up for co-design practitioners, and
- questions co-design experience contributes back to feminism through 'sweaty concepts' forged in practice

As discussed in the previous chapter, these detailed first-person practitioner narratives emerged as a mode to analyse embodied experiences of the project-grounded research that took place in the first phase of this study. The narratives served as a reflective technique to better understand the entangled process of making co-design workshop materials and how these experiences inform and influence ongoing co-design practice and feminist concepts. Departing from conventional project descriptions and comprehensive workshop documentation, the narratives aim to provide a thicker description of how feminist-designer 'tendencies' (Ahmed, 2017) evolve and are enacted, made manifest, performed and informed by co-design practice. They focus and deepen the material 'back-talk' of reflective practice, allowing for more critical interrogation of what might begin as a 'general reflexive orientation' (Pihkala & Karasti, 2016). This method also shares some foundational ideas with the reflective writing method of 'mind scripting' which has been used by practitioners to become aware of and question implicit assumptions behind the decisions they make in practice and the possible wider impact this may have. The method of mind scripting is a useful precedent for this study focused on the reciprocal relationship between practice and a practitioner's evolving understanding of feminism, as participants were reported to learn more about how their 'implicit assumptions may influence their future work and general belief systems in society' (Rommes et al., 2012, pp. 658). The DRPN method also shares intentions with the 'method stories' approach developed by Lee (2012), who advocates for designers to reveal and share stories of the valuable learning that occurs while they are in the process of crafting appropriate innovative design research methods, rather than simply publishing and sharing the finalised versions (see also Chapter 5, Section 5.111).

The DRPNs are intentionally distinct from detailed project case studies or broad theoretical frameworks, and aim to highlight a subjective, meso-level, messy, ongoing space of becoming. By 'bracketing' (Ahmed, 2006b) off and deviating from conventions around sharing co-design knowledge, this research introduces another scale of storytelling that is not bounded by discrete projects. At this scale, the narratives allow greater attention to explore the complex and ethical implications of the socio-material, situated, anticipatory, and tacit decisions practitioners make when they are designing the materials *for* 'designing with' others. These stories attempt to transcend the specificity of various applied projects, to model another way designers might curate, share, and meaningfully learn from each other's reflective practices.

In my approach to the DRPN, I was interested in grappling with the feminist tensions around 'self' and 'subjectivity', therefore it made sense for me to spend more time with the theoretical framings of the original performative writing methods of Pollock (1998, 2007, 2009). The narratives are meant to be evocative, inspired by the performative writing methods of Della Pollock to evoke 'worlds that are otherwise intangible, unlocatable: worlds of memory, pleasure, sensation, imagination, affect, and in-sight' and begin to collapse a formal distinction between creative and critical writing. This writing does not aim to comprehensively document or represent 'an objectively verifiable event or process, but uses language like paint to create what is self-evidently a version of what was, what is, and/or what might be' (Pollock, 1998, pg. 80). This method does not attempt to convey comprehensive descriptions of a co-design method or project or case study. Rather, the narratives are intentionally incomplete tellings to necessitate co-production of meaning with the reader. The writing serves as both a reflective and speculative means for sharing how we act upon and evolve our embodied knowledge and experiences as practitioners.

I did not set out to follow a uniform procedure or protocol for using narrative to explore the phenomenological experiences in the background of my practice, yet all the narratives developed to share some consistent qualities. The final 3 narratives:

- provide accounts of actively designing workshop materials to explore how these materials
 might 'talk-back' to my position as a designer-researcher and the project situation, to help
 notice and amplify orientations, intentions, and tendencies that may be operating in the
 background of project situations
- follow, deepen, trace, and transform moments of resonance between co-design practice experiences and theoretical concepts from Ahmed
- reveal the *relational* aspects of practice, such as meaningful moments that arise from ever-evolving relationships among people, perspectives, places and things
- explore a sense of movement and/or stasis in practice; consider personal shifts, drifts, and blockages in a practice that seeks to make change

The above aspects of practice are discussed through performative writing techniques. Therefore, the writing of the final 3 narratives is also:

- intentionally *partial* tellings to amplify *ambiguity*, to invite reader *interpretation* and *co-construction* of meaning, and to preserve *anonymity* where necessary
- interspersed with short stories, vignettes, and anecdotes about *memories* and moments in my *life outside design practice*, as either juxtapositions or reinforcements of the feminist concepts that influence co-design practice
- *embodied, affective,* and *situated* to ground the account in details of the sensory, or atmospheric aspects of the context.
- are primarily told in the *present-tense* to place myself and the reader into a story that is still *emerging* and open to multiple interpretations, rather than something that is complete.

In the diagram below, I illustrate the theoretical tensions about reflective and performative writing techniques that are being negotiated through the DRPN: namely how to open subjective, personal experiences to wider critique; how to avoid both complete clarity and deliberate obfuscation; and how to balance providing accurate accounts of material events and their consequences in the world with creative writing and metaphorical techniques that can provide a different kind of knowing and meaning. In this wrestling and balancing of different accountabilities, the DRPN method also holds space for performing a more 'uncomfortable reflexivity' (Pillow, 2003).

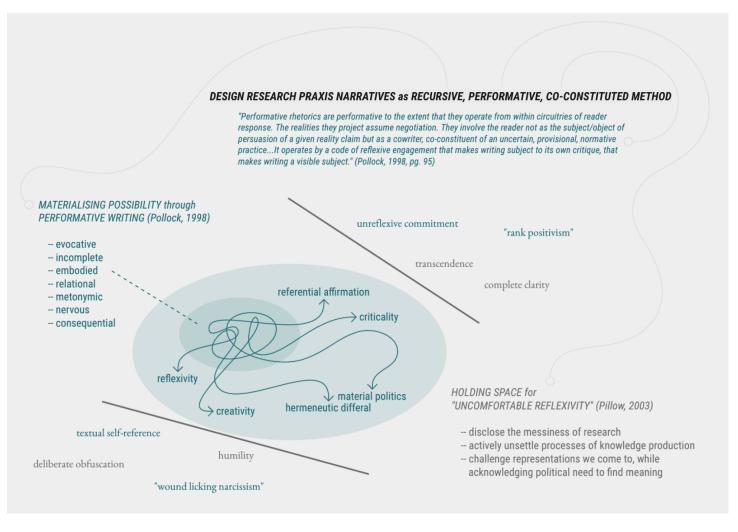


Figure 13 Tensions, negotiations, and boundaries of DRPNs as a recursive, performative, co-constituted method.

In summary, to ensure this approach aligns with the valence of the research, each narrative is told in the first person, and offers conflicting, subjective, critical positions within and between accounts. In other words, this approach seeks to enact, rather than simply illustrate, a feminist, phenomenological, pluralistic, and relational approach. The praxis narratives are used to interrogate lived experiences of co-design practice and better reveal my own participation and evolving orientations in this practice. This approach is an inquisitive engagement that resists tidy frameworks, and instead aims to hold space for evolving and plural perspectives, both within myself and for the readers. The narratives are told as first-person vignettes to share the embodied and materially-mediated knowledge that comes from practice in a way that more closely mimics how this knowledge might continually evolve iteratively and abductively in practice. However, the narratives are also intentionally partial and metonymic, so that other practitioners must interpret and find their own meaning. By weaving my experiences in conversation with Ahmed's queer and feminist theories, the process of writing the narratives served to deepen understanding of my position and intentions in this work. In their final versions, the DRPNs serve as recursive research artefacts that demonstrate a more reciprocal relationship between design practice and feminisms that can be interpreted by others.

4.11 Details of the approach

As I discussed in Section 3.221, following a period of immersion in Ahmed's theories, I did a light thematic analysis of the dozens of quotes that had resonated the most with me. However, this analysis did not significantly deepen the sense of resonance I had experienced while reading the books and immersing myself in her original words. Instead, some of the high-level coding provided a shorthand form of key concepts in her theories which was useful in the sensemaking process of reviewing workshop materials from my practice as 'queer objects.' By reviewing these materials beyond and across their different project situations, I was able to select those that seemed to resonate most strongly with Ahmed's theories or might contain salient stories. As shown in the following image, I first arranged a selection of workshop materials from my practice in chronological order by project. Then I re-arranged and shifted their order according to the shorthand thematic codes like 'tendencies' or 'affect' to see how this might also shift my impressions of them, or shift different aspects of their wider context from the background into the foreground.

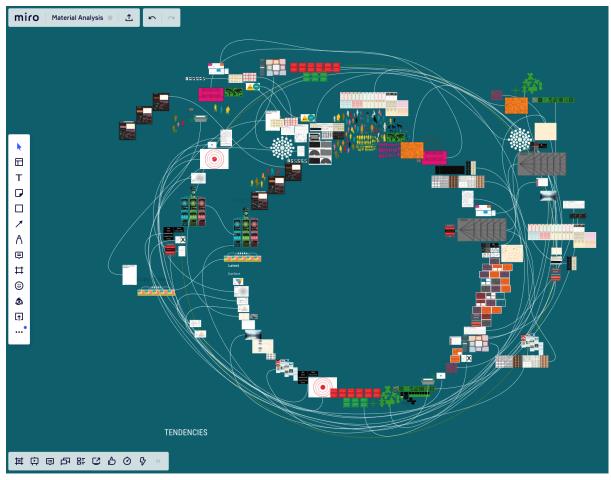


Figure 14 Screenshot of workshop materials analysis.

Once I had selected some of these 'resonant' materials, I began to write. In the following chapter (Chapter 5), I include three DRPNs that have been carefully selected for their relevance and salience for illustrating and extending feminist theories from Sarah Ahmed. Interestingly, I had already written these narratives when I came across a passage from Ahmed describing a PhD writing experience of her own:

I was writing a chapter of my PhD thesis on subjectivity. I needed an example. I remember looking around the room as if something lying around might provide me with inspiration...As

I was glancing around, it came back to me. A memory intruded into the present as if by its own will. *I was ready for the intrusion* (2017, pp. 33)

Yet again, Ahmed had the words for something I had experienced but struggled to articulate. Being 'ready for the intrusion' of memories was a core aspect of the DRPN method. In my case, instead of looking around the room for objects, I looked at my materials from practice to let details and related memories begin to rise up and connect across themes. The timeframe for the memories of practice experiences was limited to projects I worked on during the course of the doctoral study (6 months-2.5 years prior to writing DRPNs). However, I did not constrain the timeframe for personal memories outside design practice experiences, allowing even vignettes from childhood and early adulthood to intermingle with the phenomenological inquiry. The performative writing technique of using memory allowed the focus of the DRPN to be on the aspects I found most meaningful within these practice experiences, and the meaning that has endured while other details of the project context may have faded. Rather than a fully comprehensive documentation of a co-design event or project, the narratives curate and present the experiential moments that continue to be consequential for my ongoing practice. Beyond just individual reflective practice, the following section argues that DRPNs have potential to help share valuable knowledge that comes from practice more widely in the field. By combining the designerly ways of knowing from the 4DRO framework with what we can come to know through feminist phenomenology, I explore how meanings communicated through DRPNs can also become consequential for other co-design practitioners and feminists (especially those working within the context of public sector institutions).

4.111 Bringing designer-researcher orientations to feminist practical phenomenology

This is also where feminist practical phenomenology offered by Ahmed creates opportunity to open up how we better reflect and understand the processes by which we generate concepts and acquire our orientations in practice. In Narrative 2, I relate co-design practice in the public sector to the practices of diversity workers within institutions. These practitioners are the subjects of Ahmed's research in her book *On Being Included* (2012). Like diversity workers, co-design practitioners are working for the inclusion of those who would normally be excluded or simply not included. Like those hired to do diversity work, designers are often placed at an oblique angle to the institutions and projects they are situated within. Even as an embedded designer within the public sector, the purpose of the role is often seen as innovative or creative in nature, and aims to transform the organisation to some degree.

When you don't quite inhabit the norms, or you aim to transform them, you notice them as you come up against them. The wall is what we come up against: the sedimentation of history into a barrier that is solid and *tangible* in the present, a barrier to change as well as the mobility of some, a barrier that remains *invisible* to those who can flow into the spaces created by institutions (Ahmed, 2012, p. 175, emphasis added).

In Chapter 2, Section 2.30, I discussed how practice, not just critique and dialogue, can be the means by which we perceive this wall and come to understand how power operates. In this section, I return to the 4 designer-researcher orientations (4DRO) framework offered by Grocott and Sosa (2018) to help identify what we are learning through our disciplinary orientations as designer-researchers. In Figure 15, I adjust and amplify aspects of the 4DRO framework in relation to Ahmed's feminist practical phenomenology. This visualisation about how these practices might come together highlight the focus and purposes underpinning the thick descriptions included study. Drawing on tensions and parallels between these two concepts (e.g.

make tangible, *make visible*), the figure shows how we might be able to use DRPNs to amplify the embodied learning from our co-design practice experiences as well as share accounts of feminist practical phenomenology more widely. These descriptions reveal that co-design practice in the context of the public sector can be a site of rich feminist pedagogy.

From a feminist practical phenomenology standpoint, we know that 'blockages' we encounter though design-research practice may only uniquely appear to us (see Chapter 2, Section 2.30 and Chapter 5, Sections 5.20-5.212). We also know that these blockages help us notice institutional norms and what might recede from view through becoming familiar. Therefore, a feminist practical phenomenology approach combined with the 4DRO framework, invites us to amplify and prioritise practices that help make personal and institutional practices more visible and more tangible. As shown in the figure, the primary purpose of the DRPN is to make background aspects of personal practice more tangible and visible so that background aspects of institutional practices may also become more tangible and visible. So, at this nexus between these two concepts, the expanded practice of making also expands again. To make deviations and alternatives possible, we also need to provide descriptions of where we are blocked: accounting for what institutional and practice norms are *not making* possible as well. To challenge oppressive social norms and conventions, the process of making 'right' also involves *unmaking* social scripts that are exclusionary, and making possible other kinds of being and relating that challenge what might be considered the most 'appropriate' solution within the current conditions. Of course, rather than seeing the role of design as purely generating possibilities, we can also amplify awareness of the oppressive practices our own work is *not making possible*.

The DRPN also provides a reflective space to help us review unsuccessful past efforts to make change and to speculate and make sense of why those intentions were not made possible. It also provides reflective space to question and wonder about what possibilities our practice creates, as well as what possibilities we may be helping to foreclose. The following diagram illustrates these dynamics and orientations.

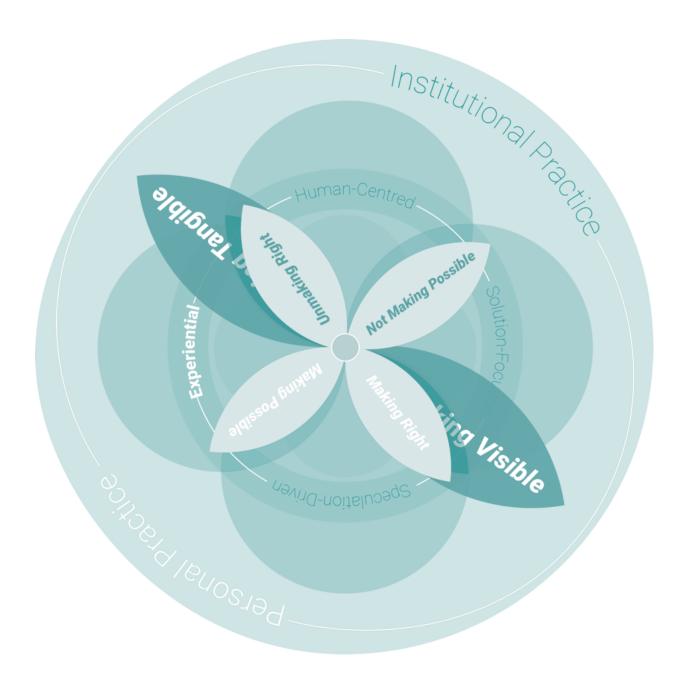


Figure 15 Visualisation of feminist practical phenomenology in relation to the 4DRO framework (Grocott & Sosa, 2018) and expanded practice of making (Grocott, 2017).

In the above diagram, the designerly tendencies to process and engage situations in ways that make ephemeral, implicit, or complex ideas and knowledge *tangible* and *visible* remains an important contribution. This is where a phenomenological inquiry into personal co-design practice experiences also provides valuable insight into embodied understanding of institutional practices. Returning to the call from Huybrechts et al. (2017)I for more *institutioning* in co-design, I advocate that DRPNs provide one way to amplify and share the embodied knowledge of institutions that designers gain through negotiating conflicting priorities and unspoken institutional norms in the public realm.

However, the DRPNs in the following chapter are not meant to generate generalizable findings that reveal universal truths about what is 'best practice' for any practitioner working in a similar context. As Ahmed says of her own phenomenological research with diversity practitioners:

I cannot generalise my findings. The research was never intended to generate the kind of findings that can be generalized. The desire for findings can even reduce or limit what can be found. Practitioners across the public sectors repeatedly said to our diversity team that too much research in this field is premised on findings that *institutions want found*: from toolboxes to good practice. Too much research thus becomes translated into mission speech ... There is much less research describing the complicated and messy situations in which ... workers often find themselves. When description gets hard, we need description (Ahmed, 2012, p. 10, emphasis added).

Instead, like Ahmed, I hope to provide a description of personal practices and experiences that can often be difficult to describe. I hope to draw attention to designer contributions within these complex spaces and to demonstrate that sweaty concepts about how to make change in the public sector can be generated through applied design practice experiences.

I also want to note that the memories interspersed with accounts of design practice in these narratives were not necessarily the most significant, emotional, or impactful experiences in my life that have shaped my views about feminism. Of course, some of those experiences are deeply personal to a degree that I would not want to share publicly. Instead the anecdotes in the upcoming narratives have been curated to illustrate how the mundane, overlooked everyday practices of doing co-design might also influence our personal understanding of feminism, whether or not these findings are generalisable. The narratives trace and make connections among different embodied memories, and are not meant to portray comprehensive documentation of an objective event, but convey one possible interpretation of a subjective experience.

As co-design practitioners, we often take on the labour of holding many perspectives at once, but we pay less attention to how our own perspective contains multitudes, contradictions, and complexity. Heightening this awareness may also be a helpful empathic reminder that the 'others' we encounter through co-design are becoming with us. They are just as complex, contradictory and multitudinous, even if we perceive them as a single individual. Through using performative writing techniques, the narratives in the next chapter allow me to trace how my own subjectivity is relational and, importantly, changeable over time. Through the active process of recalling past memories within the affective, embodied, current situation, it becomes difficult to present these accounts as demonstrable, stagnant, 'facts.' Instead, the narratives focus attention towards what meanings have persisted from these experiences and influence my current understanding. On a concrete level, the narratives share possible explanations as to why I may have designed methods and materials in particular ways, but also embodied insights about the project situations which would never be included in other modes of dissemination, like a government report of the work, or a toolkit or case study of the design methods.

My hope is that, like Ahmed's research has done for me, the following DRPN stories will provide moments of resonance—or dissonance—with your own practice and prompt you to notice or reflect upon aspects that may have become background. They will not necessarily prompt transformative turning points or entirely new orientations in your practice, but will suggest possible queer angles you may want to explore to reflect on the value and meaning of personal experiences in your own work.

Chapter 5

Design Research Praxis Narratives and Discussions

5.01 Chapter summary

In **Chapter 5**, I present the 3 DRPNs. The narratives are written in the performative writing style I outlined in Chapter 4 and are centred on moments of designing workshop materials in the preparation before a co-design event. Each narrative is followed by a short discussion section. The respective discussion sections (5.11, 5.21, 5.31) connect each narrative to salient concepts and feminist theories from Ahmed and draw out possible implications of these concepts for co-design practice. Each discussion concludes with a selection of 'sweaty concepts' and praxis questions that that the feminist theories bring to co-design practice, as well as concepts and questions that co-design practice offers back to our understanding of feminism(s) in return.

Table 3 DRPN titles and related feminist concepts from Ahmed

Title Related feminist concepts from Ahmed

Narrative 1 | Happy Objects within Reach Happy objects and happiness scripts

Stickiness of affect Points of conversion 'Hap' and possibility

Eyeroll as feminist pedagogy

Narrative 2 | After You Have Been Included Power as directionality

Deviation

Institutions as straightening devices Doing diversity vs. being diversity

Non-performativity and the 'uses' of participation

Narrative 3 | *Her Words Found Me* Becoming feminist

Collective willfulness Consciousness-raising A philosophy of wonder

Wavering in convictions, life questions, and transformations

5.10 Narrative 1 | Happy objects within reach



Two figures – perhaps a young man and young woman – walk along briskly, rounding the street corner. They seem to be engaged in the kind of happy and easy conversation shared between friends on a favourite topic. I don't know what they are talking about, but while looking at them I notice that the young woman's foot kicks out as she walks. A light breeze seems to catch her ponytail just as she is about to step off the curb. There is something about both these details that reminds me of my childhood friend, Allison. But, of course, it isn't her. It could be someone like her,

though. At the same corner, a car has stopped and another pedestrian begins to cross the road. Or is it a road? There's only one vehicle in sight, so maybe this part of the city has been designed around foot traffic. It might be one of those streets that becomes pedestrianised on weekends. Across from me, I can see someone else who is also overlooking the scene from above. This person is sitting alone, bringing something up to their face with their hand. Maybe they are getting some fresh air during a lunch break, feeling content to let their mind wander as they watch the hustle and bustle below. But from where I sit, it is harder to guess what the rest of the people in this scene are doing. Are those two friends being followed by the person behind them, or no? A bit further in the distance, it would be easy to miss the shadowy figure leaning over, reaching for something that is obscured from my view. Should I be concerned for the person on the right, the one with her hair tied back in a bun? The way the light hits her silhouette, I cannot tell whether she is coming towards the brightness of the busy corner or heading away from me, towards that shadowed area behind.

I press a small pinch of sticky tack under the foot of another paper figurine, then gently fold it at the knees and elbows. My quick experiment seems to be working: in what must be less than 2 minutes, I have a tiny cityscape of laser-cut shapes and paper people built on my desk. I think these materials will work well to help participant ideas and speculative scenarios come alive at the workshop, even for those who might not arrive feeling confident in their own creativity. Even now, when everything in this scene is made of purple construction paper, there seems to be enough detail in the blocky shapes to trigger some associations and ideas, once placed in relation to each other. I'll be interested to see whether introducing more colours feels more inspirational or takes away from the cohesiveness. In any case, the final version won't be purple, which is a colour that has not been included in the branding identity for this project. I have to be careful not to waste the good paper on early tests because there definitely won't be time to go purchase more before the event.

Lisa had shared some pictures of model-making kits by the Japanese architect Terada Naoki when we were brainstorming materials for a previous workshop on another project, but we had gone in another direction. I have the website up on my computer screen again now. The kits are beautifully simple, yet so specific and situated in a context. In the version I'm looking at, the styles of things like street signage and vendor carts seem to immediately place you in Tokyo, with visual details that somehow evoke the other senses too. They are captivating. I have been wondering if I could create something similar for this workshop. At the end of the event, we will be making models of public spaces, focused on designing them to be safer for women and girls. I wonder what details I will need to include to make these modelling materials feel like they are specifically for Melbourne; how they might add a particular excitement for the people who know this city so well. I have only been here for a few years, so most of the participants will know it in an intimate way better than I do. But maybe some of the unique features of this place stand out to me more as a newcomer because they seem unfamiliar.

Chasing this potential, I already spent too much time re-creating the details of a Melbourne tram carriage in Illustrator last night. I settled on the small Z3-class model, more distinctive than the modern D-class or E-class

series. I was drawn to its boxy structure and angled display screen. While looking up reference images, I learned it debuted in Melbourne in the mid 1970s and 80s. Apparently the original designers had been inspired by the trams in Scandinavia, liking their European look. Half a century later, their inspiration has reverberated into my own mental image of the Melbourne cityscape. The Z3 is also the tram model that runs from my apartment to the university and I know it best. Almost before I can see it in my mind, I can hear the sounds of the bell and tracks rumbling along. I can feel my shoulders draw up slightly in response to the painful screech of ageing double doors flying open and slamming shut at each stop. A smell that is both distinctive but also indistinct enough that I wouldn't be able to describe it. To me, this tram is an iconic and visceral part of my experience of this city. It is also one of the urban spatial typologies of central interest in this research project, so it is, in fact, relevant to include in the materials for the collaborative model-making. I hope the details in my rendering will help evoke these senses for participants, to prompt their own embodied memories of how it really feels, sounds, smells for each of them to travel through this specific place. That seems like it might make a difference to the conversation, albeit a very tiny difference. In actuality, it would probably do just as well to summon a general notion of public transport using a rectangle and some wheels, but that risks being a bit uninspiring too. But since I was working late last night anyway, I gave in to the temptation to customise. I feel less guilty about wasting time on trivial things like this outside business hours.

Business hours have come back around again and now I am the first to arrive in the digital fabrication lab this morning. It's a sunny day and I am feeling refreshed. I flip a switch on the wall and the fume exhaust system whirrs to life, promising to take any toxic contaminants released by my experiments elsewhere. The first laser cutter I ever used was an old finicky model. Combined with my inexperience back then, I usually set whatever I was cutting on fire at least once. So I learned to stand by vigilantly with my fingers poised above the emergency stop button. It hasn't happened again in the years I have been using these newer machines. But I still strike that stance. Rather than entering a state of hyper-awareness, I let myself be mesmerised by the stream of light slicing intricate patterns, listening to the soft thumping sound as it changes direction on the axle. In fact, during these fast-paced projects I really enjoy these moments of standing still, getting surrounded by the now-familiar smoky smell of an idea becoming something I can hold in my hands, something tangible I can hand over to someone else.

But I do not have endless time to spare. Since this pattern is more intricate than the other workshop materials and will take longer to cut, I go straight to a colour we will be using at the actual event, forgoing the test run in purple. I spread the construction paper into a fan shape on the counter to pick out a colour from within our project branding palette. For some reason, my hand settles on the hot pink. It is a deep, vibrant hue, almost fluorescent. It feels ... radical.

I surprise myself – I would normally never consider 'making something pink' a meaningful feminist tactic. In fact, the use of pink in an event about women, girls, and gender equality is a design choice that would probably send my eyes rolling if someone else did it. Feminism does not have to be feminine, after all. That is the least important part, if even relevant at all. But now, holding this paper, I am wondering why I think the workshop materials should *not* be overtly, explicitly feminine. Or at least why my knee-jerk reaction is that pink materials will mean these issues will be taken less seriously or that pink materials might somehow detract from this workshop. Or worse, somehow detract from the crucially important real-world implications of this project.



My little sister was watching me and waiting patiently for her turn at the piano when her eyes widened. She had just noticed something seriously amiss which the rest of us seemed to have overlooked: a pink ribbon in my hair. She grasped my mom's arm, but my mom just smiled down at her and put a finger to her lips. They looked at each other, forming a quiet agreement. My sister's deep concern on my behalf gave way to mischievous delight and she smiled too. Her wait became a nervous but exciting period of suspense. What would happen when she finds out?

Still unaware, I looked up and down between the keys and the sheet music in front of me. My sister watched, tensing and squirming in her seat each time my braid fell back and forth over my shoulder, sometimes dangerously swinging into the periphery of my view. Yet for me, the ribbon remained in the background, dangling nearby or lightly pressing against my back, but somehow never catching my attention. I was focused on practising the right notes.

Supposedly it was not until we were back home, getting ready for bed that night, that I finally found the ribbon. I do not recall how I reacted at the time, but years later my mom told us this story and by then we could all laugh like the two of them did that day. She insisted she had only forced me to wear pink that one time. I imagine retaliating by wearing my favourite outfit to school the next day – green sweatpants and a black hockey jersey – to try to counteract the reputational damage caused by my proximity to that girly bow. I am sure my tomboy commitment to never wearing pink would only have been strengthened by once having to wear it against my will. From then on, I know I kept myself as far from that ribbon as possible. However, it still got plenty of use as part of my sister's favourite dress-up outfit: a purple leotard and pink tutu. After any given day, the ribbon was put away in the same drawer in the bathroom. That is where it was always kept, even long after my sister outgrew playing dress-up, even over years as we both came back home for visits as young adults.

Maybe if I could go visit my mom today, it would still be there. Alzheimer's is quickly eroding most of her memories, even her happiest ones. But perhaps if she held the ribbon, and all it contains, it could help her tell that story again. Or at least help her access some fleeting sense of experiences we had shared. I used to want this distance between me and the ribbon, but now I wish we could be closer together again.



With a mechanical flourish, the laser twirls around the final cut in the template and returns to its resting position at the top left-hand corner of the cutting bed. I open the lid and reach into this space, carefully peeling up the masking tape that held the paper steady while it transformed from a simple sheet into an intricate design. It flutters in my hand as I carry it to a tabletop nearby. The moment of truth: will it support itself as a stable 3D form? Amazingly, all the notches seem to line up on this first go, so it already looks

promising. One by one, I fold and guide various paper tabs and they lightly snap into place. On the last one, I feel a little surge of excitement. It looks great. Whatever you might be busy doing, whoever you are, this hot pink tram cannot go unnoticed in the background: it demands your attention.

The details are a spot-on miniature depiction of the trams I see every day from my apartment and from the office, but the colour hints at an alternative possibility. What else would need to change for something so feminised like this to make it into our infrastructure? I'm holding it in my hand, but I am imagining what it would be like to actually see this tram, life size, rumbling down the street, announcing that we are doing things differently now. The intricacies of the laser-cut model – its tiny side mirrors, functional doors, iconic silhouette – make this little daydream feel somehow less outlandish. I almost want it to be a real thing.

I place it on top of the pile of leftover construction paper, gather my things, and march upstairs to our shared office. As always in the final weeks leading up to one of our events, I am walking quickly, but now I am also more aware of my movements, careful not to let the breeze whipping through the doorway send the tram tumbling off the stack of paper.

'Look at this!' (or maybe it was 'Look at her!') I exclaim as I walk in, holding it proudly out in front of me. Obligingly, the pink tram is met with small cheers and tiny applause from my teammates, who look up from their desks for a moment to share in my excitement.



I think there were about 70 of us in the room, but I remember it being quiet. The tone was formal; there were black tablecloths on all the tables and a team of support staff in matching black uniforms. The space was cavernous, with beige walls, high ceilings, and an audience of mostly white men. There were no windows. Even though we were seated at round tables in groups, we would not directly interact with the people around us. In fact, at least half the people at each table spent the day with their backs turned to the others, in order to face the presentations from sector experts on stage at the front of the room.

The conference had begun promptly at 8:30am with a larger-than-life, booming video call from a British expert in the field. He was the keynote because his work represents the highest standard for counterterrorism, security, and surveillance for the kind of public spaces I have been researching. I was impressed with the amazing feats of engineering and counterterrorism measures he presented, especially those that you would never notice as a passenger, like windows and lights made of shatter-resistant glass. But soon I found myself trailing off, wondering if it was more straightforward to make a space shatter-resistant than it was to make it harassment-resistant.

Going into a coffee break before our presentation on safety for women and girls, my colleague and I started to distribute some eye-catching folders with more information and supplemental material about our research. This conference could be a good networking opportunity. It was clear that our research was a bit of an outlier on the agenda. Most of the tables were empty as everyone headed to the lobby for a final cup of coffee and refreshments. But at one table a stocky man with a fully shaved head looked up from his phone to ask me about the catering. Unfortunately, I did not know any more than he did. Maybe he had mistaken me for a member of the event staff. I had also been asked a similar question earlier in the day by another conference attendee, which was an odd coincidence. I wondered if it was because my outfit was mostly black. I glanced around at the staff from the conference centre quietly rushing around in the background in black uniforms, ensuring all the conference attendees could present their work without a hitch.

We finished handing out the folders as the break was ending, but I went out to the lobby to get a quick coffee and write a last-minute note on the script for my part of our presentation. Everyone else was filing back in when I saw an older man approaching from across the hall. He was walking with the elevated energy of someone rushing between important commitments. His demeanour was friendly as he too asked me something about event logistics and it was clear that, for the third time, I had been perceived as event staff instead of a speaker at the conference. Again, I found myself explaining politely that I did not know. We were both swept up in the inertia of his late arrival and somehow speaking at the same time, so he may not have had heard my answer to his question, but he spotted my nametag and interrupted himself:

'Ah, Hannah! Will you be distributing kisses to everyone in the next session?'

I had been glancing down to gather my papers before heading back into the conference, but my eyes snapped upwards to meet his. I saw a twinkling smile. *Kisses?* It was such a bizarre question, yet exclaimed with such a happy delivery that I was not offended or even uncomfortable, just baffled. Before I could respond 'No, I am presenting research about sexual harassment', a real member of the conference centre staff, wearing all black like me, gently let us know that the next session was starting and ushered us inside.

The man had not introduced himself, but as he addressed the audience for his presentation, I realised that I knew his name. He was a senior researcher, a full professor, and the only other academic at this industry conference. In the end, he was also the only other person at the conference to bring up gender as a risk factor in his presentation. It was a small bullet point, but I was happy he mentioned it. Perhaps it gave us more credibility with this audience. We were the last to present and although the other talks had led to short but lively Q&A sessions, our presentation was met with tired silence. But it was the end of the day. It wasn't long before the quiet pause was broken by the footsteps of the conference convenor joining us on stage. He relayed a thank you on behalf of everyone before wrapping up the program. We all gathered our things from the tables and filed out to the lobby for drinks.

Later, some seemed to have made plans with each other to carry on their networking at the casino nearby. I had accidentally walked out behind them in the same direction and worried for a moment they thought I was trying to tag along uninvited. But no one seemed to notice when we passed by the tram stop and I broke off from the back of the group. When the tram arrived, I found a seat by the window. It was getting dark outside, making it hard to see through my own reflection in the glass. I noticed that I was still wearing my nametag, which reminded me of the strange encounter in the lobby earlier. Still baffled, I found myself forensically piecing together what could have prompted the joke about me kissing the other conference attendees. I looked more closely at the sticker on my chest. Maybe, if he were glancing quickly at my messy handwriting, he could have interpreted 'XX' to be written in the smaller letters under Hannah. That was not what I had written there, but I decided to give him the benefit of the doubt. I was just as happy to let the joke go as he had been to tell it. After all, I had enjoyed the conference and I wasn't willing to make something small into a bigger deal than it needed to be. I peeled off my nametag, crumpled it into a tiny ball, and dropped it into my bag. The last thing I needed at that moment was for a stranger to see my

name and use it as an excuse for a forced conversation or to follow me off the tram. This had happened before with forgotten name tags on public transport. But this time, thankfully, it was just a guiet ride back.

I used the quiet to remember another day I had spent at the very same conference centre about 6 months prior. That day, I had been forewarned that I was entering a contentious space. I had been hired to conduct a large-scale workshop with a sexual and reproductive health organisation. The organisation had closed operations for the day to enable everyone to come together to co-create their strategic vision for the next 5 years. This contract came with warnings by the new CEO that tensions were high and the organisation had become extremely siloed. I had braced myself for a difficult day. And yet once we were in the space together, doing the activities and using the materials provided, the energy had shifted. The materials invited us to perform another side of ourselves (during the icebreaker, participants were invited to try out different collaboration roles and mindsets, through 'try it on' lanyards that they could take on and off throughout the day such as active listening, vulnerability, optimism, etc.). They were invited to disagree. As I sat there remembering the difference in how it felt to deal with contention in the same setting, I was glad that my practice involved more workshops than research presentations. Workshop encounters were different.



With the pink tram temporarily placed on the shelf behind me, it is time to develop and iterate on the other participatory model-making materials I have started. Unlike the gorgeous model kits by Takedo that had served as inspiration, the goal of this workshop is not to try to reproduce the city spaces of Melbourne just as they are now. I am aware that these materials also have to do something more: we want to evoke but also re-imagine the possibilities of these spaces. We want to re-make and unmake these spaces to be less exclusionary, to be safer for more people. A hot pink paper tram will not change the city, but in combination with more materials, I hope everyone will be well-equipped to chase a promise of something else or at least become open to wondering where a promise of something else could take us. Glancing around at the other things on my desk, I see the sticky notes reminding me to check on the other crucial aspects of the upcoming workshop:

'Therapist' – this is a new role we are trialling at the workshop, someone who will participate alongside everyone else but also be on standby if anyone needs more support. It is out of an abundance of caution (we have been making many other efforts to try to create a safe space), but topics about gender, safety, and public spaces can affect people in ways they do not necessarily expect. Also, the people and things you encounter at the workshop can also affect you in ways you do not expect.

'Coffee cart/catering' – another member of the team is tasked with securing our caffeine for the day. We know how important coffee is for a successful workshop. We are expecting between 60 and 90 participants and we will be spending a full day together. Maintaining energy and momentum is a big part of our approach.

'Voucher' – for those who will be joining the workshop outside of their paid work capacity, we want to make sure we find a way to reimburse them for their time. Thankfully, the details of this are sorted out by the project coordinator. With all the coordination I am doing for this event, I am very glad not to be doing that paperwork. Most people will be joining us in their paid capacity. There will be public servants, engineers, designers, activists, and various public service providers, alongside youth activists and community members with lived experience.

All of these 'to do' items are essential for hosting and taking care of the participants. But tonight my focus is on the *making* materials we will use when we finally all come together. I am reworking some of the methods our lab has used before, a bit of a twist on an architectural charrette. Some topics on the agenda will also require new approaches. For those who are new to designing, what will they need in order to construct, rethink, and envision safer futures? Many of them will also be new to the gender lens, so there is a lot to consider for this event to be meaningful and productive.



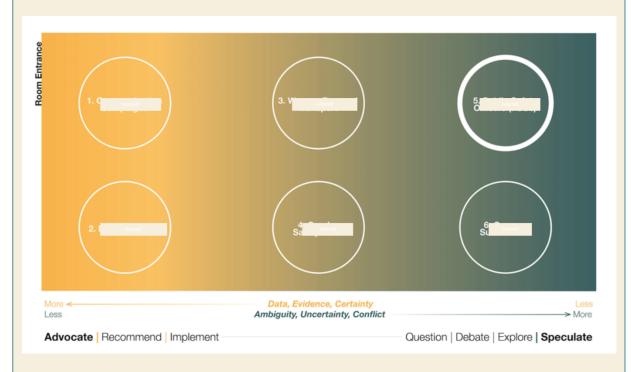
I pushed the bathroom door open and hustled into a stall where I could hide for a moment. Research methods and processes was a core requirement, but I had to step out. Already about a month into my Master's degree program in critical design, I now knew beyond a shadow of a doubt that I had made a grave mistake. Before this, I had felt more bemused than anything. I had explained to myself that the lecturers were probably just catering to other students who did not have a research background, they wouldn't want to overwhelm anyone brand new to this area. I could understand that. But then it felt serious. That was not research. Disturbingly, it also did not seem to be design, which made the situation all the more dire. I wasn't confused by these 'research methods' we were learning, I was horrified. None of these methods could possibly produce any verifiable evidence. If you followed these approaches, you would have no way of backing up your claims. This 'research' wouldn't stand a chance against the lightest scrutiny in the real world. All my prior training in neuroscience research had taught me how to scan reports, case studies, and articles to spot possible tiny infractions from the most robust application and execution of the scientific method. Similarly, I had been taught that any deviations or oversights in your own procedures could invalidate the results and you would have nothing. Or worse, you would have produced research that was misleading or inaccurate.

And the methods being described in this class were not tiny infractions. Another wave of incredulity struck me as I thought about what was still happening in the lecture hall just beyond the door. I had escaped temporarily because I thought I might become visibly upset. It was too late. I had already left my job and moved to another country to pursue this degree. I had been so excited to learn the fundamental drawing and rendering skills I would need to develop new products and devices that could make a demonstrable positive impact on other people's lives. I could take this leap because at the end, I would have the concrete skills to get straight back to work again. Not all design was about trivial things like home decorating, after all. But somehow, instead of learning these core skills, I seemed to have stumbled into a degree that was just going to be a useless and unaffordable waste of time. I leaned against the sickly, pale-green stall and looked up at a small, flaking spot of water damage that was developing on the ceiling. I wondered how I could walk away, cut my losses, and withdraw. But as I weighed up the options, it was clear that leaving the degree early was the only choice that could possibly be worse for my career and my savings than staying to finish it. I would have to.



I am both excited and a bit overwhelmed by the diversity of participants we are expecting at this workshop. I imagine everyone will be arriving with different expectations of the day: some are drawn to co-design for its promise of concrete outcomes. Others for amplifying voices that would normally be missing in decision-making processes. Some will be outspoken feminist activists, others will be considering how gender inequity relates to their work for the first time. Some participants will be cis women or trans women, some will be non-binary, some will be cis men, some will be young, some disabled...I have not been leading the recruitment process for this workshop, but I have been worried about who we might be forgetting to include. I have also been worried about tokenistic inclusion.

But at the moment, one of the things I am preoccupied by is thinking about participants who will be new to creative methods. I have heard horror stories from other design-led projects where public sector employees felt so alienated by the creative methods introduced by embedded designers that they took sick leave to avoid the distress caused by unwelcome design approaches. This is not the kind of disruption I want to cause through this workshop. Instead I want all participants, regardless of design experience, to be positively affected by the workshop materials. I want them to feel excited to build something together and to feel proud of the result: to feel compelled to follow the promise of the successful physical manifestation of their collective ideas. If they are willing to take on the risk of challenging conversations, I at least want them to feel happy about their contribution to what we create together. Deviating from institutional norms is hard enough without also questioning your own creativity, or the value of creativity, along the way.



For this event, I have planned an ambitious 6-in-1 workshop structure, almost like a trade show. It is taking place mid-way through the project, building on findings from previous phases of the research. We have a sense of the wide variety of stakeholders, many of whom hold contrasting ideas about how to frame the problem as well as conflicting ideologies on how best to move forward. The issues at the core of this feminist work exist on multiple levels: collective action needs to urgently address problems that are the products of gender inequity, while also addressing the wider drivers and aspects of gender inequity itself. Some participants will be seeking to do one more than the other. Both these orientations require different approaches and methods. So I will be leaving the choice to them. Well, at least a bounded choice. There will be a variety of topics and approaches, and they can choose to join the one that most intuitively aligns with their own motivations for participating. The tables are arranged on a spectrum: topics where we think we have the most data, evidence, and certainty for how to proceed are positioned near the entrance. But, as you move to the back of the room, the topics become increasingly shrouded in ambiguity, uncertainty and conflict about what we should do next. My hope is this will welcome a more diverse range of perspectives to the discussion, while exposing participants to other frames and approaches without demanding that everyone embrace all of them. Half of the conversation topics make use of a charrette-style model-making method we have been perfecting as a lab, so I am tweaking the materials to suit this project.

In previous iterations, I had been adamant that the human paper figurines we made available for this model-making needed to reflect a diversity of real skin tones. I did not want racial and ethnic diversity to be something that was not addressed explicitly in the visions of futures. However, in looking over images of previous workshops, the shiny, happy, visions of diverse and inclusive futures took on a saccharine tone – it seemed that through making these images, we had enabled the discussion about the real-world complexity of inclusion to be bypassed. This was an unexpected downside. The happiness and almost magic-like quality of

these materials could affect us in ways that were distracting. Photogenic materials could prevent us from engaging deeply with the harder, unhappier topics. By offering symbols of diversity like the PRIDE flag and the Aboriginal flag into the model-making materials, were participants just making their visions based on what they thought was the 'right' answer? Or were they genuinely prompted to think inclusively or to shift their assumptions and expectations about safe public spaces?

I am not sure. So this time I am aiming for ambiguity. I search online for reference imagery and cringe to myself as I go down the same list of demographic intersections as last time, trying to make sure I have not missed anybody: there needs to be a mix of feminine, masculine, and androgenous forms. Silhouettes need to reflect a variety of clothing attire and uniforms; different hairstyles and textures; diverse ages and abilities, sizes, and shapes. I am especially careful to make sure that participants I know will be joining us on the day will feel represented in the materials. But this is exactly the tokenistic process I do not want for the participants. So, I also try to deliberately obscure or recombine these features as I go.

Instead of combining simplified geometric shapes, I opt to hand-draw the silhouettes, so that the paper people look more like individuals you might encounter as you move through the city, maybe a crooked or wobbly line will remind someone of a certain person they really know. I carry over the hand-drawn quality to the patterns and shapes of the non-human materials as well. I need diurnal and nocturnal animals (gendered safety concerns are amplified at night). Plants are always important in safe public spaces, but they need to be the right height and density to not obstruct sight lines. I like that the imperfect aesthetic does not obscure the human labour which goes into producing these model-making materials. These elements clearly came from somewhere, which maybe means their origin is more open to critique.

All of the human figures are drawn as individuals, except for one. I have outlined a silhouette of a large man conjoined and holding hands with a small child. This is subtle, but I know why I am doing it. Earlier phases of the project consistently associated women's concerns about navigating public space with parenting and caregiving responsibilities and it bothered me. While it is objectively true that women are still disproportionately responsible for caregiving, I feel like I now need to gently trouble this stereotype. Anyone unhappy with my choice can simply snip the man and child apart with a pair of scissors on the day. I'm not sure I can identify the emotion I feel about this possible participant rebellion. On the one hand, the unexpected aspects of workshop encounters are what I look forward to the most — when the materials get used in ways I never intended. As much time as I spend carefully curating and bringing ideas, research findings, and materials into reach, my intentions do not dictate actual use. Participants will always be drawn towards or away from these materials differently than I am. There is a small element of risk in overtly bringing my personal touch to this practice. Someone might be outraged that we would focus on fathers or male caregivers when the majority of caregiving responsibilities fall on women. Someone else might see that pairing and be prompted to worry for the child's safety. And yet, I know that there is no way to fully remove my perspective from these materials, so it almost seems more ethical to make their connection to me more obvious.

After drawing dozens and dozens of different people, animals, plants, and other things found in public spaces. I pause to consider what else I can bring to the table. Or rather, what else I will be leaving on the tables for everyone to use. I cannot be at all 6 tables at once on the day. Purposefully, they won't be watching me at the front of the room, as I present my expert opinion. They'll be turned towards each other, oriented towards their shared visions. I hope I have struck the right balance of ambiguity so that the models they make will challenge the orientation I bring to this work. I also hope the ambiguity in the materials is evocative or provocative enough to trigger their creativity and inspiration, but also open-ended and spacious enough that they can easily forge a path I would not expect. I will have to wait to find out how my feminist intentions extend into the actual event.

5.11 Narrative 1 Discussion | Happy objects within reach

The above narrative is presented with the expectation that all parts of it are open to personal interpretations and co-constructions of meaning with you, the reader. However, the following sections bring forward some of the resonant concepts and theories from Ahmed that I had in mind while writing. These ideas offer one means of interpretation and connect the life and practice experiences described within the narrative to wider feminist theories and concepts, while also demonstrating how these concepts are equally generated by design practice.

When writing this narrative, I was especially interested in the complex, sometimes ambiguous or contradictory way designers might be implicitly working with affect while shaping the methods and materials for co-design workshops. In the narrative, I attempt to illustrate my anticipation of how I hoped that certain workshop materials might affect participants in the workshop. I also bring my own affective experiences to the foreground, so that they become possible to critique. The following discussion draws heavily from Ahmed's theories of affect, and her critiques of 'happiness', 'happiness scripts' and 'happy objects.' I use these theories to illustrate the complexity and highlight possible opportunities within our collective efforts to co-design visions of 'preferred futures.'

5.111 Resonant theories from Ahmed | The promise of happiness

Happiness becomes a form of being directed or oriented, of following 'the right way' (Ahmed, 2010c, p. 9).

In Ahmed's book The Promise of Happiness (2010), she is not concerned with defining what constitutes happiness or what it means to be happy, but rather asks what does happiness do? She is curious about how some objects become associated with happiness and how ideas of happiness influence and enforce power relations. She explores how we are compelled to move towards certain objects that we think will make us happy and, equally, how we are compelled to recoil or move away from objects that do not promise the same affect. These 'happy objects' range from everyday things that affect us positively, like a favourite food or a treasured gift from a loved one, to much larger societal principles, values, and constructs which we judge to be good or to hold the promise of 'the good life' (e.g. Rai, 2018). For example, Ahmed, a queer woman, wants to better understand how certain social conventions become associated with happiness (e.g. marriage and the nuclear family, heteronormativity) and how this 'promise' of happiness means that entire institutions and infrastructures are created to support people to follow this happiness 'script'. She sees happiness as both a motivating and exclusionary force: our conceptions of happiness can foreclose on possibilities of other ways of being and prohibit those who are not oriented along dominant paths from pursuing happiness in alternative ways. She points to a common, tangible example of this exclusion for LGBTIQ+ children, who may experience the promise of happiness as a devastating pressure from their parents or family members to conform to heterosexual norms. Family members might, from a place of concern about a possible life at risk of facing more difficulty, obstacles, and unhappiness, insist: 'I just want you to be happy'. Ahmed talks about affect as being 'sticky' in this way. Happiness 'sticks' to some objects and not others, regardless of how these objects might affect people differently.

Rather than seeing affect as only an individual's interior feeling state or a collective atmosphere, she is concerned with how the stickiness of affect sustains or breaks connections between ideas, values, and objects. She cites Hemmings (2005, cited in Ahmed, 2010) and Tyler (2008, cited in Ahmed, 2010) for critiques of

the individual autonomy of affect and questions how both objects and those who are near to us affect us. This 'relational self' is core to feminist phenomenology and resists mind/body and body/world dualisms. This idea, combined with the critique and concepts about affect in Ahmed's work, has implications for how we conceive of the purpose and effects of collaborative co-design events and working with the lived experiences of participants.

While her book goes into considerably more detail, in short Ahmed (2010a, p.29) summarises that the phenomenological experience of 'happiness' involves 3 major components:

- 1) affect (to be affected by something)
- 2) intentionality (to be happy about something)
- 3) evaluation or judgement (to be happy about something makes something good)

And yet, of course, it is not so simple in social and lively contexts. Our feelings of happiness can be both unique to us as individuals, and socially mediated. We might both influence the happiness of others and be influenced by the happiness of others. Co-design practitioners are often preoccupied with the affective qualities of co-design events. The atmosphere of a workshop often feels integral to whether or not the event is successful. However, Ahmed describes several ways that these 3 components of happiness come together that have implications for how co-design practitioners might think about the impact of this affect. She begins with common conceptions about happiness in group spaces – as either 'outside-in' or 'inside-out,' which will likely resonate with most co-design practitioners. From there, she deepens these ideas through connecting affect to wider dominant 'happiness scripts.' As I was reading this work, her ideas seemed to challenge basic assumptions about the causal relationships between affect, empowerment, and oppression as usually discussed in co-design literature. It seemed to challenge the unspoken expectations of these practices that get reinforced in every workshop documentation photo of smiling participants collaborating. I have included screenshots of the notes and illustrations I made while reading this piece and making sense of these alternative ideas. They are presented here in their first iteration as imperfect prompts for reflection, similar to a 'figuring' diagram (Grocott, 2012).

If we were to say that happiness was passed around, we could be suggesting that happiness is contagious. Thinking of affects as contagious does help us to challenge an "inside out" model of affect by showing how affects pass between bodies, affecting bodily surfaces or even how bodies surface. However, I think the concept of affective contagion tends to underestimate the extent to which affects are contingent (involving the hap of a happening): to be affected by another does not mean that an affect simply passes or "leaps" from one body to another. The affect becomes an object only given the contingency of how we are affected, or only as an effect of how objects are given.

Consider the opening sentence of Teresa Brennan's book, The Transmission of Affect: "Is there anyone who has not, at least once, walked into a room and 'felt the atmosphere'?" (2004, 1). Brennan writes very beautifully about the atmosphere "getting into the individual," using what I have called an "outside in" model, which is also very much part of the intellectual history of crowd psychology and the sociology of emotion (Ahmed 2004a, 9).



However, later in the introduction she makes an observation that involves a quite different model... If bodies do not arrive in neutral, if we are always in some way or another moody, then what we will receive as an impression will depend on our affective situation. This second argument challenges for me Brennan's first argument about the atmosphere being what is "out there" getting "in": it suggests that how we arrive, how we enter this room or that room, will affect what impressions we receive. After all, to receive is to act. To receive an impression is to make an impression.

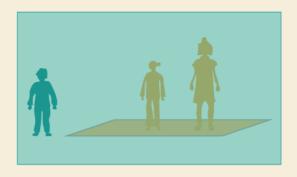


Figure 16 Notes from 'Happy objects': 'inside out' and 'outside-in' models (Ahmed, 2010a, p. 35-37)

So we may walk into the room and "feel the atmosphere," but what we may feel depends on the angle of our arrival. Or we might say that the atmosphere is already angled; it is always felt from a specific point. The pedagogic encounter is full of angles....Having read the atmosphere, one can become tense, which in turn affects what happens, how things move along. The moods we arrive with do affect what happens: which is not to say we always keep our moods.



Sometimes I arrive heavy with anxiety, and everything that happens makes me feel more anxious, while at other times, things happen that ease the anxiety, making the space itself seem light and energetic. We do not know in advance what will happen given this contingency, given the hap of what happens; we do not know "exactly" what makes things happen in this way and that. Situations are affective given the gap between the impressions we have of others, and the impressions we make on others, all of which are lively.

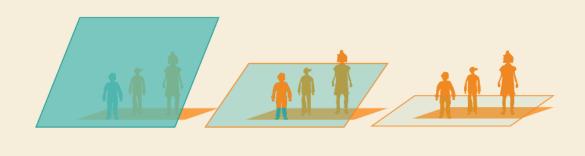


Figure 17 Notes from 'Happy objects': the 'hap' and liveliness of impressions (Ahmed, 2010a, p. 37)

Think too of experiences of alienation. I have suggested that happiness is attributed to certain objects that circulate as social goods. When we feel pleasure from such objects, we are aligned; we are facing the right way. We become alienated—out of line with an affective community—when we do not experience pleasure from proximity to objects that are already attributed as being good.



The gap between the affective value of an object and how we experience an object can involve a range of affects, which are directed by the modes of explanation we offer to fill this gap. If we are disappointed by something that we expected would make us happy, then we generate explanations of why that thing is disappointing. Such explanations can involve an anxious narrative of self-doubt (why am I not made happy by this, what is wrong with me?)...

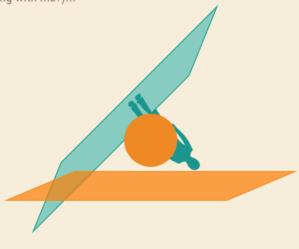
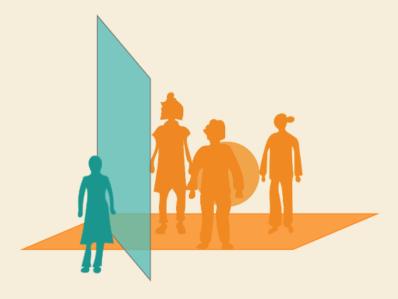


Figure 18 Notes from 'Happy objects': alienation, disappointment, and self-doubt (Ahmed, 2010a, p. 37)

...or a narrative of rage, where the object that is "supposed" to make us happy is attributed as the cause of disappointment, which can lead to a rage directed toward those that promised us happiness through the elevation of this or that object as being good. We become strangers, or affect aliens, in such moments.



So when happy objects are passed around, it is not necessarily the feeling that passes. To share such objects (or have a share in such objects) would simply mean you would share an orientation toward those objects as being good. Take for instance the happy family. The family would be happy not because it causes happiness, and not even because it affects us in a good way, but because we share an orientation toward the family as being good, as being what promises happiness in return for loyalty. Such an orientation shapes what we do; you have to "make" and "keep" the family, which directs how you spend your time, energy, and resources.

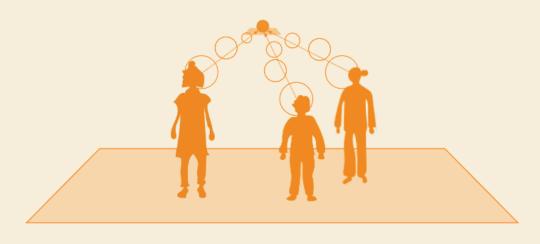


Figure 19 Notes from 'Happy objects': strangers, happy objects, shared orientations toward 'good' (Ahmed, 2010a, p. 37-38)

These ideas about affect are important for co-design workshops. Many articles in participatory design literature grapple with power and emotional safety. In the public sector, making change might also depend on changing what feels 'risky' for an institution. Ahmed pushes this complexity further, detailing the way that affect is implicated within intention and action, and our hopes. The 'lively,' element of affect and its role in reinforcing dominant, sometimes, oppressive or exclusionary, happiness scripts is a twist on the design literature that tends to take a more functionalist view of emotion. In these articles, there might be extensive discussion about how social-emotional factors influence our capacities to reach various co-design objectives, such as decision-making or relationship-building. Many of these do not claim an exact science, and yet there is an implicit causal relationship that is implied. In crafting co-design events, designers are considering what methods and materials will be most appropriate for the participants and the situation to support effective participation.

For example, there is a recent, excellent, review paper by Zamenopoulos et al. (2021) about the role of workshop materials in helping to facilitate or hinder empowerment. This paper is specific about this term and interrogates a variety of different kinds of empowerment, including: 'power over', 'power to', 'power with' and 'power within' in the analysis. Emotional factors are considered important for most of these conceptions of power. The authors also speak to the role of materials in mediating these affective spaces, contending that they are also integral to mediating power dynamics in diverse groups. The paper's focus is on the power dynamics in groups with diverse representation of professional identities and does not speak directly to intersectional social issues such as white supremacy, gender bias, or sexism. There is only one mention of 'stereotypes' within the paper, which is included in the excerpt below as a useful comparison point with the current discussion about how co-design practitioners might attune to and mediate entrenched power hierarchies through material engagement:

alternative ways of expressing ideas, which were used by participants in order to break the boundaries and stereotypes that come with their professional background or their identity as a NHS practitioner, a community member or academic. Some participants thought that this diversity and multi-modal way of expression enabled a multiplicity of interpretations or meanings to emerge, which in turn was an important step for developing views about the key issues that matter for them and frame issues and possible solutions around healthy communities (Zamenopoulos et al., 2021, pp. 150).

In this quote, the workshop materials were an important part in the diverse group's ability to overcome obstacles. But this conception of enabling empowerment and participation through material engagement is predicated on diverse participants overcoming barriers by finding common values across fixed identities through use of co-design tools. However, Ahmed's writing on affect asks us to consider how values and tendencies might shift and become with these encounters. She also asks us to consider the limitations of this shifting – what objects might be too sticky with either positive or negative affect to allow new associations to occur.

In the story of the ribbon in the above narrative, we see how our relationships with others also effect how we respond to and value the objects around us: something I hated in the past becomes a sentimental object because it once made my mom happy, even if it was initially at my expense. So it is not just that fixed, diverse perspectives are more easily negotiated and overcome through the help of workshop materials and tools, but that materials might serve as points of conversion that influence our perspectives as they become entangled with new meanings and affective experiences. We cannot predict with any certainty how people will be affected by certain objects and materials in workshops. For example, Ahmed also writes about 'nostalgia' as

an affective form of conversion in this way. It requires either a happy object to be no longer or for something to register as a happy object *insofar* as it is no longer. So the promise of happy objects does not only exist as something guiding us towards a certain future, but can also as 'imaginings of what has been lost' (Ahmed, 2010, p. 241). Though it made me unhappy at the time, the ribbon was able to become a happy memory because of the relationships that surround it. This memory was not part of a recurring pattern of deceit or coercion, which would have changed how this small prank affected me and the affective experience of recalling it together years later. In this anecdote, the security of knowing that we were fundamentally aligned with each other, allowed our different 'affect angles' to be overcome. In fact, acknowledging these differences did not cause me to feel alienated, but affirmed: we were all gathered around the same object, but I was affected by it differently. Conversely, my sister loved pink and the ribbon normally affected her positively, except for the brief moment when she first noticed it in my hair and she worried how it would affect me. The ribbon also offers a metaphor for what can go unnoticed in the background while we are focused on doing the 'right' thing or doing a good job. We might compare this singular focus to following established methods or 'best practice' over attuning to our learning-in-action, embodied practice—even if starting with methods is an important step for us to begin practising.

And this prompts us to ask: why was I affected differently? Particularly with objects that are tangled up in ideas about gender, we can question how objects can become imbued with meaning. With the lasercut paper tram, we see my relationship to 'pink' and social scripts around femininity also shifting as I find myself drawn to it, causing me to question why the colour normally affects me differently. Sara Ahmed refers to the potential of objects to become 'points of conversion' in this way. For example, by focusing on just a tiny detail in a larger project, the narrative shows how I experienced the hot pink tram as a literal happy object. It reflects my different relationships to public transport: my connection to place, moving through a city I love. But it also represents a space of potential danger and of memories of lived dangerous situations. My momentary worry that using pink could negatively affect how seriously people engage with the feminist workshop, or reinforce gender stereotypes rather than resist them, speaks to the implicit small margin of error for affecting change in the project. The object represents how difficult it can be to cultivate momentum for feminist issues. Ahmed writes about how easily feminist issues can be dismissed, which I have experienced in practice and at industry events, like conferences.

rolling eyes = feminist pedagogy (Ahmed, 2017, pp. 38; 99).

The narrative helped me identify how strongly my practice is driven by an implicit worry that those in decision-making roles will not take these issues seriously. Material considerations are such small moments in co-design practice, but demonstrate how designers sensitise to relationships and affects within these contested and complex spaces. Detailing the phenomenological micro-considerations that give rise to the methods and materials used in co-design workshops are rarely foregrounded in the literature. In one exception, Lee (2014) advocates for sharing the learning and sensemaking that happens during the designing of innovative design research methods through writing 'method stories,' Lee (2014):

Considering font sizes or colours that would be suitable for users might be considered a peripheral issue. Yet, by orienting their actions towards such peripheral, physical details, the students became more and more sensitive to the users and their contexts (pp. 5.8).

There is valuable learning happening as designers sensitise to institutional contexts, which can help answer recent calls in the field for more engagement with *institutioning* to occur in the fields of participatory design and co-design as applied to the complex context of projects in the public realm (e.g. Huybrechts, et al., 2017).

The narrative also speaks to the exhilaration in the 'hap' and possibility of affecting change. Happiness is unpredictable, yet socially-constructed. My unusually strong sense of happiness and enthusiasm about the pink tram not only affects me, but affects my colleagues. I designed it that way because I also hoped it would positively affect those attending the workshop: I had hoped that they would be drawn towards the sense of alternative possibility in this object, rather than pushed further away from a difficult and complex topic. Co-design workshops, as affective encounters involving active construction, framing, and reframing across different perspectives, objects, and materials present a unique space for affective conversion.

5.112 Praxis questions and sweaty concepts | sticky workshops

In reviewing the above narrative and theories from Ahmed, co-designing more feminist futures might be considered a process of carefully making 'hap' happen. To make 'hap' happen, we attend to what our methods might foreclose as well as what they might make possible, whose shape is not being extended in our imagined futures and how happiness scripts might be orienting us the 'right' way. Even more importantly, feminist designers might seek 'hap' for their own orientation within this collective process. Are we open to noticing, even interrogating, how project situations are affecting us? To what extent are our affective experiences influencing abductive decisions or judgments about how we craft co-design events and how these events affect others? The following questions seek to encourage reflection on the learning and 'sweaty concepts' that emerge through co-design practice:

Consider a moment when you were at your happiest in your practice. What makes this a good moment? Does this moment seem to align or deviate from implicit 'happiness script' or expectations of the project? Does it seem to align with other 'happiness scripts' you might negotiate in your practice? What does this tell you about what you think needs to be challenged or reinforced through your work?

How are you affected by the 'objects' within your project situation? What do you find yourself moving towards and away from? Have you ever spent 'extra' time on a detail that is not so important? What do you most look forward to? Why?

If 'rolling eyes = feminist pedagogy', what do you feel you have learned from rolling eyes? Have you ever felt the risk of an eye roll in your practice (from you, or others?)? How has this risk influenced the way you designed or facilitated a co-design event? What tactics have you used to avoid being dismissed?

How have you fostered the 'hap' of happiness in your practice? How have you encouraged or created space for deviation?

What happy 'objects' or 'scripts' seem to be most sticky in your practice? How do you think they became 'sticky'? How do you work with this stickiness? Could they become points of conversion?

What default happiness scripts might be embedded within your projects? How has orientation towards certain objects of happiness contributed to defining matters of concern? What alternative possibilities have happiness scripts foreclosed in your practice?

What are the happiness scripts you are oriented around? Particularly when targeting positive social impact, what script are you following? Why? Can you identify what personal experiences and encounters have shaped your point of view?

In changing current situations into 'preferred' ones, how have various social problems been defined and framed by failures to conform to dominant happiness scripts? Does your practice ever reinforce dominant ideas about happiness?

How do you expect others to be 'affected' by your practice? How do you hope that people will feel when they engage with your co-design methods and workshop materials? What does that tell you about your values in this practice? How do you make sense of the affective experiences of others?

Is there a method or material that has affected you differently at different times or in different contexts? Why do you think you may have felt differently?

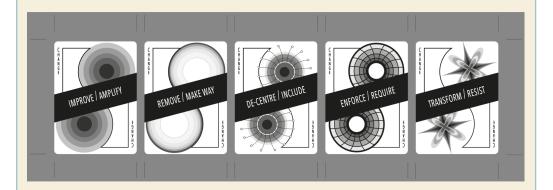
When has something made you happy in practice, but not others? When has something seemed to make others happy, but not you?

5.113 Next | transformation and institutions

While there are many researchers dedicated to navigating the complexity of co-design practices and power dynamics in relation to engagement events (e.g. Zamenopoulos et al., 2021), there are fewer detailed accounts around the complexities of what happens next, when a workshop has ended. Often the data can be cross-checked, co-analysed, or co-written with participants in the form of summaries (e.g. McKercher, 2020). Still, synthesising and translating the data from participant-built prototypes into the formal and informal written reports and then further translating these findings again into creative design outputs remain highly interpretive endeavours. Even when care has been taken to position co-design participants as experts in their lived experience, there remains an under-discussed transition point where this expertise shifts back to the formally trained designers/researchers to execute the final design. What then? What happens to participant ideas that do not seem viable or contradict 'expert' knowledge? Outlandish ideas that defy conventions or happiness scripts? What about ideas that might contradict the funding body's expectation of the project? In following through on the transformative potential of creative and participatory engagements, how do designers navigate public sector expectations about data, evidencing, and the constraints imposed by hierarchical reporting structures? How do we, as designers and researchers, make an effort to *stay with the trouble* of participation?

The following narrative interrogates the tensions of using co-design methods as an inclusive approach for contract research in the public sector. An earlier version of this narrative was also published in (Korsmeyer et al., 2022).

5.20 Narrative 2 | After you have been included



I am shifting uncomfortably in a broken deck chair-turned-desk chair and trying not to distract everyone else on screen. There are already enough obstacles in the way of what we're trying to do. The threat of a possible pandemic is looming and our city has taken precautions by going into full lockdown. We suddenly find ourselves meeting remotely from makeshift home offices instead of working side by side in a shared space. The frustrations in the team over our patchy internet connections are growing more audible each time one of us drops out of the call. Someone with a choppy, robotic voice is already 'over it'.

Fortunately, we already have the data we need after wrapping up the latest and largest of our co-design events for this project. Your insights have already been condensed, quantified, and digitised for the latest progress report. And while the representative from the funding body is not present at this particular meeting, their expectations remain a close presence as we are deciding how to proceed. We need to move ahead at pace.

Someone tries to keep us all on track for this transition by reminding us what we are doing. The final phase of the project is up next and we are scheduled to use your ideas to generate a series of speculative design scenarios for the final report. Luckily for us (given the current uncertainty) we can do this part without you. She lists off a few example scenarios, just 'like we talked about' before, in the original proposal that we put together over a year ago. My hand reaches out to unmute: 'Could I help with that?'

I don't know exactly what I am planning to offer. But I am thinking about you and I sense a small opening. With the project coming to a close, this moment feels urgent, like a last chance.

Later, the meeting is over but I am shifting quietly in the same lopsided chair while preparing some materials for the internal workshop/design sprint I ended up suggesting as my helpful contribution to the team. This extra step will just be to support an efficient transition between the data analysis and final design outcomes. We will use this sprint to incorporate your insights into the final 'co-designed' speculative scenarios of existing city sites. Unlike the hand-made prototypes you created during the workshops, these scenarios will be professionally rendered to help reimagine certain target sites in ways that would make them safer spaces for women and girls.

This extra workshop is not part of the project timeline, so it needs to come together quickly if it's going to happen. Instead of starting from scratch, I look for inspiration from existing speculative scenario-building activities and methods, and settle on: 'The Thing from the Future' (Candy, 2018). I download the open-source template, which includes a deck of cards with four categories. These are the ingredients the team can combine to rapidly envision speculative scenarios: 'Arc', 'Terrain', 'Object', 'Mood.' I just need a smaller, more bespoke and targeted deck to use this game for our sprint.

I feel confident in this choice as I start to curate from the provided list of Objects. Even as I am quickly pasting the words into my own version of the template, each one brings a little glimmer of a possibility to my mind. I can imagine certain people on our team sprinting off with their own inspiration, sparked by words like 'box' or 'poster' or 'clothing' or 'wall'. For now, I resist following my own ideas beyond a fuzzy impression, but I cannot wait to see details; how the team will transform these everyday objects into concrete signifiers of wider social change. This is fun.

I pause to consider how the cards should look.

Again, I don't need to start from scratch. There is already a gorgeous, striking brand identity for this project. The branding had felt important at the beginning. We wanted every bit of excitement we could muster around this feminist issue to help the conversation spread more widely. Maybe the branding could still end up being helpful, if the communication embargo on this contract research is ever lifted. As the months have gone by, this has seemed less and less likely. At this point, it will probably depend on what they think of the final report.

I play around with these graphic elements and make intricate patterns reminiscent of a deck of playing cards. This is probably not essential. But I want the cards to look good and I want our team to *want to use them*. This has been a recurring concern across the workshops with the participants and stakeholders as well. Maybe, by compensating with beautiful workshop materials, I can help make it more possible to have hard conversations about ugly topics.

I shift my attention to the Moods category and scan across the original cards template, curating a relevant selection for the future scenarios for our project:

Happiness – yes, obviously.

Excitement – of course.

Sorrow – Interesting. I think of recent news stories and faces of family members with loved ones who did not make it home one night. I wonder what our speculative scenarios would look like if the sites were redesigned to hold some of that sorrow? Though there are several recent stories that share this kind of grief, I am really thinking about one woman's family in particular – a father and sister – who I know are aware of this project despite the communication embargo. I have heard about their hopes for what this project could achieve in her memory. As part of this research, I have gone to where it happened. I have gone to see if there are ways that we could somehow prevent it happening there, and in places like it, again. I went there to see if there was something we could learn about how to design our public spaces differently to be more safe ... Alongside these thoughts, I accidentally think, just for a second, about some of the situations I have been in myself as a user of designed public spaces, but quickly move on.

Outrage – Yes, that belongs.

Disgust – I bristle, reminded of how many hours we have spent considering how to make this project palatable, how many times we have been explicitly reminded that this project 'will

need to be palatable'. I copy and paste this word into my own curated version of the deck. Disgust is a part of this, but I do not expect this card to be used.

I finish off the shortlist of Moods and move on to Terrain. This is one of the more significant adaptations I need to make to the template. Instead of using the provided Terrain cards, I will replace all these cards with your themes and ideas that came from earlier phases of the project. It is an easy swap. This data has already either been neatly arranged in bullet points or relegated to footnotes in the progress report. I feel the same sense of urgency I felt during the meeting return as I picture all your ideas back on the table again. I imagine us picking them up, holding them in our hands, and considering them at least one more time before we make our final decisions.

I start to realise that the point of the game – and perhaps why I have settled on this particular method – is that we will *have* to use the ideas you gave us. By putting your contributions to this project back on the table, we will have to acknowledge them, even the ideas that contradict what we had expected to find.

Copying and pasting the data from our progress report feels redundant, but there is something so important about bringing your thoughts back into use, back into reach. There is something so important about seeing the choices on which of your ideas we decide to leave behind solidified into material form. Material surrogates. Material objects. You. Useful. But without the Human Ethics Committee approval to engage with you directly again, this will have to do. Maybe changing the form of your ideas can change their function.

After all of your insights have been entered into the bespoke deck, I return to the original template from 'The Thing from the Future'. The final suit in the deck is a list of four possible Arcs that guide how the future might evolve and take shape from now. I linger on the one labelled 'Discipline'. This Arc describes a future where 'order is imposed'. Reading this description, I can hear the last year of working on this project echoed in a single word.

I'm sitting in the same broken chair, but now I know exactly why I unmuted during the meeting earlier. I felt that tension rise up in my chest because those off-hand example scenarios 'like we talked about' in the proposal had not shifted. Our 'expert' opinion had not shifted even after everything you shared and co-created with us. And though it was a casual remark, more to remind us where we were in the project timeline than to confirm the final outcomes, it signalled something other than project logistics. Those speculative scenarios were what we came in looking for, well-aligned with what the funding body was expecting. They were well-aligned with the usual interventions that get funded to mitigate gender-based violence and harassment. They did not deviate from expectations about the role of security and surveillance to help solve this issue.

And yet you had raised concerns about these usual solutions. You had raised concerns about the disproportionate risk we could create for some of you. We had designed your participation so we could hold space for your concerns. We had designed the opportunity for us both to collectively imagine possibilities beyond these potential unintentional consequences. We had used these spaces to rehearse alternative ways of being, doing, and relating together. I thought we *had* deviated from the usual solutions. I left those workshops with shifts in my perspective. I left with a quiet confidence in the shifts I had witnessed in you too. Now, I am worried about settling back into place.

But as only one of several possible arcs, 'Discipline' looks small. As part of a selection, it's easier to see that it is just one version of how things could unfold. In fact, all four original Arcs seem to be relevant for this project, so I just adapt the descriptions slightly. I call them Change cards to directly speak to the active role of making changes to existing city spaces.

Original <i>The thing from the future</i> 'arc' cards (Candy, 2015).	Makeshift feminist 'change' cards
'Growth – a future in which "progress" has continued'	Improve/amplify – a future in which something is added to improve the space <i>or</i> something that is already good/unique about this space is amplified
'Collapse – a future in which society as we know it has come apart'	Remove/make way – a future in which something in/about this space has been removed to make room for something else
n/a	De-centre/include – a future that de-centres users who reflect a dominant status quo; universal access design principles of inclusion* are applied; the space actively encourages and supports the public lives of diverse women and girls Note: inclusion is not assimilation.
'Discipline – a future in which order is deliberately coordinated or imposed'	Enforce/require – a future in which order is deliberately coordinated or imposed (e.g. perpetrators are held accountable; gender-based violence is taken seriously/not tolerated by authorities and communities)
'Transformation – a future in which a profound historical evolution has occurred'	Transform/resist – a future that encourages a shift in relations and norms about gender and/or conventional gender roles; resists rigid conceptions of gender

I look at these Change card translations I have made by adapting the Arc cards and they are not perfect. Nor are they comprehensive. They reflect conflicting and inconsistent feminist ideologies. Apparently, my feminism in practice does not look exactly like my feminism in theory. I am thinking back over this project, comparing it to what Light and Akama (2012) describe as the 'holy grail' of participatory design: endogenous and community-led actions to develop solutions...

This work is distinctly not like that. It feels rushed, like I have to make do more than make change. As the only participatory designer and the least senior member of the team, I hope these cards will help justify your inclusion and your efforts to have an affect on the outcomes of this project. I wonder how much these cards may have become material surrogates not just for you, but for tensions I had sensed but I could not voice. Surrogates for tensions I had been muting. I wonder how self-righteous I am to suggest this method and about my sense that there is something big at risk in this project. I wonder why I think I can make shifts, why I think I am entitled to do so. In any case, these cards are not neutral tools for ideating.

Willfulness is striking; it is in the way of what is on the way (Ahmed, 2014, p. 76).

I think again about the close management from the funding body representative and the constraints that were placed on our process. She knows what is on the way. She knows how the institution works. In this case, her feminism is not about a moral high ground, but a calculated negotiation. She *knows* what we are up against.

Deviation is hard. Deviation is made hard (Ahmed, 2020, p. 42).

The funding body representative knows that the 'use' of participation might be something other than participation. When the word 'co-design' gets used so often, it becomes useful in other ways too. I imagine that, unlike me, she sees resistance to the status quo through participation as the *non-performative* (Ahmed, 2018) and a more palatable and predictable participation as what ultimately enables real outcomes to incrementally make their way into existence. To make feminist futures actually possible, she needs to make sure that your ideas

have a fighting chance of consideration. Even though I'm the one speculating the future scenarios, I realise she is operating on a longer practical time scale. She is working beyond the obstacles she knows are on the way, towards a vision of what could happen next if the project gets through those immediate barriers. Maybe she can see this vision because she is able to pass through. This is the first time I've wondered if she might be thinking about you too.

It is strange to see her this way. We have different orientations to this work, but I now notice a shared privilege to decide just how much our own participation will disrupt the status quo. We can design the affects of our participation and decide just how much, and in what way, the participation we designed for you affects change. I feel confronted by this sudden alignment. In our work, we are not the ultimate decision-makers, but the structures we are both working within already *extend our shape* (Ahmed, 2012), so coming up against or trying to shift these structures is our choice. *How* we make shifts, *despite what we come up against*, is our practice (Ahmed, 2017).

It is late now and the only light in the room is coming from my monitor. I have lost momentum and I am staring past the screen. I'm thinking about Audre Lorde (1984) addressing white feminists, famously pointing out that we will never dismantle the master's house using the master's tools. My eyes are gazing blankly into the darkness, where they can see a toolbox, larger than the room I am in. It is heavy, creaking, already overflowing with methods and materials from other design sprints and social innovation projects. Is my makeshift 'feminist' card game in there?

This project has been about making shifts, about carefully questioning dominant norms and assumptions. And I am left wondering: at what point do these playful materials I'm designing become a shifty move, rather than a move that helps shift power? Maybe while sitting here, I am just shifting in this broken chair: putting myself in a more comfortable position, but not shifting the situation:

To live a feminist life is to make everything into something that is questionable. The question of how to live a feminist life is alive with question as well as being a life question (Ahmed 2017, p. 2).

I export my cards template and send it off with the instructions. I hope I can get the approval to use it. I head to bed wanting to know more about how others navigate this practice, how others adapt and make changes to get around all the large and small obstacles they come up against. I want to know how they might have done it differently. Feminist frameworks for design and feminist theories have been helpful for orienting me in this work, but less helpful in moments when following this orientation creates clashes with forces from opposing directions. Knowing about feminism does not seem to make it easier to decide when and where to make-do to make change possible. Or whether I need to make/do something differently to make change possible. I have learned so much from co-design methods and activities shared by other practitioners. But I wonder about the personal experiences and forces that shaped how these methods came to be. What are all the tiny ways we're trying to make shifts and make change possible? What are others coming up against?

And when deviation is so hard, what about everything we come to understand through *not* making change possible? What about these moments when you and I have been invited to help make change, but we still come up against something that *will not shift*? What does it mean for you if it turns out that part of what *will not shift* is me?

5.21 Narrative 2 Discussion | *After you have been included*

5.211 Resonant theories from Ahmed | On being included

In the book, On Being Included: Racism and Diversity in Institutional Life (2012), Ahmed conducts a phenomenological study of diversity workers within a range of public institutions, including universities. Of all Ahmed's works, this book resonated the most with my own practice experiences of working to include diverse stakeholders and diverse communities within co-design projects in the public sector.

Ahmed covers ideas that are likely to be familiar to other co-design practitioners in the public sector, such as audit culture and the box-ticking approaches to compliance.² But, as always, she also adds a unique lens of 'orientation' to these ideas: how power becomes a mode of directionality that shapes intentions and actions towards certain ends. Throughout the book she refers to institutions as 'straightening devices', with a strong 'institutional inertia.' In her contexts of the UK and Australia, this inertia is also associated with a background 'institutional whiteness' that can go unnoticed by those who often represent the majority of the institution. She points out that within this institutional context, inequality is reproduced through going unnoticed. This invisible reproduction of the status quo is also why ideas like gender or diversity mainstreaming in institutions often do not work. Diversity and inclusion requires effort to counteract institutional inertia. The book is a phenomenological account of the effort, strategies and labour that diversity workers put into challenging unspoken norms:

If the tendency when we are involved in the world is to look over what is around us, then the task of the phenomenologist is to attend to what is looked over, to allow what is 'overed' to 'surface'...diversity work could be described as a phenomenological practice: a way of attending to what gets passed over as routine or an ordinary feature of institutional life. (2012, pp. 22)

She also notes that within many public sector institutions, ideas of 'diversity and inclusion' are usually a shorthand term for visual signifiers of difference (skin tone, visible disability, etc.). But within these institutions, there are those who do and those who do not easily inhabit the norms. For some, their very existence can be experienced as disorienting. She refers to the idea of *Space Invaders* (2004) put forth by Puwar to describe how white bodies can become the norm within institutions, which can make non-white bodies feel 'out of place.' This is both a feeling of being out of place for those who do not take the form of somatic norms in an institution, as well as how the mere existence of a body can cause feelings of disorientation about a place upon their arrival. This embodied experience of *being diversity* does not pose the same challenges as the experiences of those who are *doing* diversity, by nature of their official appointment. However, Ahmed suggests that people in both these positions (and often a single individual can occupy both these positions) are put into an 'oblique' relation to the institution.

For those that are being or doing diversity, everyday actions become strategies and ways of producing knowledge about how to make change. For example, when to smile, when not to smile. Ahmed identified that there were individual differences in ways that practitioners approached these strategies: some distance themselves from words with a sticky negative affect, like 'racism', opting instead to embrace the happier

² see also recent article from (Salmi & Mattelmäki, 2021) about working within organisations to make change.

language of words like 'diversity'. Others refused to use the word diversity for this reason. They knew that the word could be used as a tool to avoid grappling with the most challenging aspects of inclusion.

In this work, Ahmed suggests that 'inclusion' and 'diversity' are happy objects for institutions. Therefore, a commitment to diversity also becomes a way of cultivating and managing the perceptions of the institution as being diverse and inclusive, as 'good'. However, Ahmed points out, stating that diversity is what an institution is already about, can be a means of covering over or avoiding making real change to become more inclusive. A statement of its commitment to diversity can even enable an institution *not* to change because it is already defined by that ideal. An institution does not need to transform to become what it already is. In this case, diversity and inclusion efforts become about managing and maintaining the perception of an institution as committed to diversity, rather than taking meaningful action to change and evolve to be more accommodating to diverse existences:

The organization can be committed to a new policy without anything happening... commitments must be understood as non-performatives: as not bringing into effect what they name (Ahmed, 2012, pp. 126, emphasis added).

This gap between everyday practices and commitments to values like inclusion, can serve as the 'invisible wall' that practitioners can come up against when we attempt to make changes according to commitments that institutions have named. Naming commitments does not guarantee that the institution has already gotten behind this commitment, in terms of everyday actions and habits (see also my critique of the instrumentalisation of applying feminist 'commitments' to design in Chapter 1, Section 1.13):

They are all so interested. We are very committed to diversity, the director says. She talks about her personal commitment, over and over again. Sometimes the repetition of a good sentiment feels oppressive. What are they trying to convince us of, I wonder? Enthusiasm can be oppressive, I learn... Commitment can even be a strictly monetary device: the amount they spend on us becomes a sign of their commitment; if they have funded us, we rely on their commitment. Each expression of enthusiasm becomes a reminder of a debt. We are good objects at this point, but it is precarious. We know it is conditional on returning their commitment in the right way... Their commitment comes with conditions, but the conditions are not made explicit... a condition of commitment becomes a demand to use happy words and a prohibition of unhappy words... Prohibitions do not have to be made official; they can even function under the veil of permission. (Ahmed, 2012, pp. 154)

The above statement resonated very strongly with my experience across various co-design projects in the public sector, especially in instances where participant contributions did not reinforce what a funding body considered to be viable solutions. As Ahmed states in the quote above, these 'conditions' were never made explicit. And, indeed, my interpretation could have been incorrect. And yet, through writing the above narrative, it was undeniable that my perception of these expectations (usually corroborated by interpretations and actions of others I was working with) influenced my practice and design decisions as projects progressed in a variety of ways.

As I illustrated in the narrative above, these unspoken tensions would often become more noticeable when a formal report was due. In the public sector, many actions, initiatives and efforts culminate in report writing. Research projects can often become about generating 'friendly' reports for institutions (Ahmed, 2012). It becomes about generating a good report because there is a risk that a report that is not 'good' enough might not get used. Just as I have experienced in practice, Ahmed describes experiences where unhappy reports

were put under lock and key, never released. However, she has found a way to discuss these issues through phenomenological practice. This workaround to knowledge-sharing is important because it is through our efforts to make transformation in situations where making transformation is made difficult, that we learn the most about what is required to make transformation and what, exactly, needs to be transformed.

5.212 Praxis questions and sweaty concepts | the varied uses and non-performatives of co-design

In the narrative, I wrote about some of the sweaty concepts that were generated by my personal practice experiences. While the findings of this phenomenological inquiry are not generalizable to all co-design practice experiences, I have used some of the language and theories from Ahmed to help articulate a selection of sweaty concepts and praxis questions that may be transferable to other contexts. Rather than using the theories from Ahmed to generate questions for design, I have grounded these questions in reflective design practice to further contribute to our collective understanding of how we come to understand and practice feminism:

Consider a moment when you felt you were compromising your participatory practice. What tensions were you negotiating? Were these tensions or conditions made explicit or were they sensed?

In what ways are co-design research methods well-suited to enable change compared to other methods? What are the ways that co-design is well-suited to enable an institution *not* to change?

What are the affective factors involved in shifting institutional norms and practices? For example, what is the role of making participatory practices 'look good' or feel good? When do affective factors help create change and when do they enable stasis? What expectations might be hidden behind a veil of permission or behind the happy language of feedback reports?

How have you distinguished between the will to change and non-performative commitments to change in practice? How does this distinction influence your co-design approach?

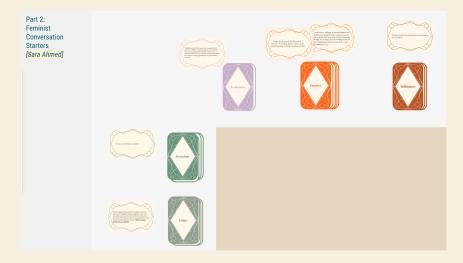
Have you ever sensed that the term 'co-design', like diversity, was getting used more in order to do less?

If co-design has a solution-focused orientation, what might be a queer use of co-design? How else can these processes be used to help cultivate institutional will to change?

When and how do you decide to pose a problem [become a problem] versus making a choice to adopt happier language? How do these strategies relate to your identity? Have you ever felt that your very existence was perceived as a problem or that you could not raise a problem? What does this tell you about what feminism is up against in practice?

If a commitment to inclusion and participation is what our co-design practice is about, what might be going unnoticed through becoming familiar in our work? What have we come to expect in these project situations? Is it possible that a commitment to inclusive practice has enabled you to avoid transforming your practice to be more inclusive?

5.30 Narrative 3 | Her words found me



I am somehow hurriedly making cards again. Only this time, it is the middle of the day and I cannot spend any extra time finessing when I should be sleeping. It's a different kind of stress. These cards really matter to me, and I hope they will work. But this time their use is not desperate, but generative and exciting.

In about an hour, I am meeting with two other co-design practitioners who I really admire. They don't explicitly call themselves feminists, but I think they are. Or, at least according to my new ideas about what this means. It turns out that I had been looking for feminism in the wrong places. I am now in the process of cultivating a new collective and a new orientation. I'm still in a pandemic and working remotely, but it is so much less lonely already.

I'm blinking through tears when I hear my partner ask 'are you ok?'

I look up across the table surprised out of my reverie and quickly laugh: yes! sorry, this writing is just so good.

I am chuckling because it must look ridiculous, but inside there is still an unexpected, cathartic, rush of emotions flooding out of me. This is exactly it. I am reading the words of someone else, but it is as if she is pulling words out of me. The writing grasps at a loose thread coming from my chest, each page drawing out and relaxing a tension that has been winding more and more tightly over the last year.

Whatever scaffolding had been holding that tangled spool in place finally gave out earlier today. It happened while I was reviewing my previous two years of work -- of feminist work -- in the preparation for an upcoming PhD milestone. Vibrant photos of beautiful workshop materials and diverse, smiling participants are still buried under the new layers of browser windows I have been opening and closing in a search for answers since this morning's snap. In the background, these images clutter the space on my screen, overshadowing my favourite articles on methods like design activism, feminist participatory action research, and other community-led practices. I agree so strongly with the values and principles contained in these documents and in the participatory design literature I've been reading. I have poured over manifestos and toolkits so I could adapt and apply these values in my own work.

And yet, when I look at the juxtaposition of these case studies against the happy images of my own practice, the contrast cannot be reconciled. These workshops had not empowered participants to make change, but they had empowered our funders to claim inclusive approaches.

Maybe I am not a feminist afterall, I had thought. The idea was unsettling, but also felt a bit matter of fact. Detached. I knew I had tried to be, but the hard evidence seemed to confirm it. I had never questioned this before.

My hand guided the mouse to the library search bar where I typed:

becoming feminist

Surely, there must be others who have wondered.

I clicked on the first result: Part 1 Becoming Feminist, Living a Feminist Life, by Sara Ahmed....

5.31 Narrative 3 Discussion | Her words found me

5.311 Praxis questions and sweaty concepts | Living a feminist life and collective willfulness

In the narrative, I wrote about a tiny moment that represented a monumental shift in my orientation to practising co-design. Unlike the first two narratives, which I wrote slowly, this narrative was generated as a quick reflection exercise to identify a turning point in my practice. The concepts generated in this moment are less sweaty in the moment, but could only have happened through my experiences of trying to practice feminism and my trying experiences of feminism.

Some of effort has now been redirected towards finding other practitioners who are tending toward the world in a feminist way. Rather than declaring commitments to feminist issues, I have been connecting with others who are also becoming feminist through engagement with practice in unequal, unfeminist worlds.

Ahmed writes in her introduction to *Living a Feminist Life:*

I will come out with it: I enjoy and appreciate much of the work that is taught and read as critical theory. There were reasons I went there first...But I still remember in the second year of my PhD reading texts by [Black] feminists and feminists of color including Audre Lorde, bell hooks, and Gloria Anzaldúa. I had not read their work before. This work shook me up...When I first read Audre Lorde's work, I felt like a lifeline was being thrown to me. The words, coming out of her description of her own experience...found me where I was; a different place from her, yet her words found me (Ahmed, 2017, pp. 8-12).

Similarly, Ahmed's words found me just before the second milestone of this PhD. In the third phase of the research, I used conversation cards to help these words locate more feminist practitioners where they are now. Though Ahmed returns to the figure of the feminist 'killjoy' and 'willful' subjects throughout her books, she is adament that willfulness must be a collective process.

As I discussed in Chapter 3, Section 3.221, figuring out how to keep living a feminist life is a life question and, though we might gain confidence through practice, we need to be ready to waver in our feminist convictions as the world and social issues continues to evolve and take shape. Working collectively is one means of continuing to question what it means to be a feminist and to wonder together how else we can be working towards becoming feminist.

Consider a moment when you have felt most supported in your feminist practice. Who was there? What were you doing?

Are moments of support rare or frequent in your practice? How does this affect your willingness to keep going, despite what you come up against?

Have you ever felt unsupported in your practice? What led to this moment and what happened as a result?

How have you found others to join you in collective, distributed, willfulness?

Has someone else ever helped you articulate an invisible wall that you have come up against?

What is your personal understanding of feminism? How would you describe the way that feminism feels?

How are youas an individual, and with others, tending toward the world in a feminist way? How do you repeat that tending again and again...

Chapter 6 Conclusion

6.01 Chapter summary

The concluding chapter reviews the key contributions and significance of the research, and how this study has generated knowledge that is transferable beyond my individual practice, to the field of co-design. Then, I discuss the implications of this study for the field by identifying four promising 'turning points' for designers who are interested in reflecting on their practice from an alternative angle. Following these points, I consider the limitations and further opportunities afforded by this research.

...if we start with our experiences of becoming feminists not only might we have another way of generating feminist ideas, but we might generate new ideas about feminism. Feminist ideas are what we come up with to make sense of what persists. We have to persist in or by coming up with feminist ideas...Ideas would not be something generating through distance, a way of abstracting something from something, but from our involvement in a world that often leaves us, frankly, bewildered. Ideas might be how we work with as well as on our hunches, those senses that something is amiss, not quite right, which are part of ordinary living and a starting point for so much critical work (Ahmed, 2017, 12).

6.02 Research statement

This study has traced how feminism of the designer becomes informed by and enacted through embodied co-design practice within public sector projects.

6.03 Connecting to the wider context

As I discussed when positioning this work in Chapter 1, I have conducted this research in Melbourne, Australia, in the context of the recent growing popularity of 'co-design' as a method of engagement and knowledge creation in the public sector (Blomkamp 2018). At the same time, there has also been increasingly visible institutional commitment to promote gender equality within these same organisations (e.g., the recent ratification of the Gender Equality Act 2020). Within this wider context, this study has explored how these three areas – co-design, feminisms, and the public sector – are co-implicated, with particular emphasis on what we can learn from the embodied practice experiences that are usually relegated to the background of projects. Following a brief overview of the relationship between collaborative and participatory design practices and feminisms in academic literature (see Chapter 1), I then focused the inquiry on providing a thick description of how an individual practitioner's 'feminist tendencies' (Ahmed, 2017) might be informed by and become manifested in bespoke co-design materials and through a range of small—and often, tacit—efforts to shift and challenge the status quo in everyday aspects of co-design practice.

6.10 Significance and contributions to knowledge

Many advocates of co-design believe that this process creates unique opportunities to invite diverse participants to come together in critical exploration and collective questioning of established norms (e.g. Light et al, 2018). As discussed in Chapter 1, the theoretical compatibility of feminist theory and the values-driven practice of participatory design have been well acknowledged and outlined (e.g. Heidaripour & Forlano, 2018; Kensing and Greenbaum, 2012). There have also been recent calls for co-design practitioners to be more reflexive in their work (e.g. Pihkala & Karasti, 2016) through attuning to the relational aspects of participatory processes. This study contributes to these discourses by closely examining the entangled and reciprocal nature of designing and feminism: how the practitioner's feminist perspective shapes and *is also shaped by* engaging in co-design. Rather than outlining *what* feminist co-design practitioners *should* be doing (in terms of project topics / matters of concern or developing theoretical frameworks / manifestos), this work has uncovered examples of personal aspects operating in the background practice with implications for *how this abductive practice unfolds* within applied projects (Korsmeyer et al., 2022). Furthermore, this study has identified specific techniques for which a design practitioner can focus and deepen their analysis of embodied practice, allowing for more interrogation of what might often begin as a 'general reflexive orientation' in practice (Pihkala & Karasti, 2016).

As indicated above, there are many other researchers concerned with interrogating the ethics and accountability of co-design practitioners working at the nexus of complex social issues. This research makes humble contributions to this wider discourse in the field through the targeted focus on personal, micro, experiences of embodied practice. The study aims to describe and draw attention to these experiences that are usually relegated to the background of co-design projects. By drawing these experiences into the foreground, this study seeks to assist designers in tracing and attuning to their own processes of *becoming feminist* through design practice.

Table 4 Summary of contributions to knowledge

Kind of contribution	Short description
Theoretical	 Salient feminist theories, concepts and ideas from Ahmed were brought into relation to co-design practice-research. These concepts serve as generative starting points for reflecting on personal practice and have not been flattened or reduced to a simplified feminist tool or framework. Demonstration of a more reciprocal relationship between design practice and feminist theory (design practice experiences can also deepen our understandings of feminist concepts; not just that feminist concepts can be applied to deepen our design practices).
Methodological	 This research has brought a queer, feminist phenomenology to the study of project-grounded design research and practice. This methodology has been used to generate thicker descriptions of how personal experiences are significant, intertwined, and often overlooked in this work. Consistent with the theoretical reciprocity between design and feminisms mentioned above, this study has also extended conventional forms of phenomenological research methods (like analysis of personal writing texts and interviews) through the creative approaches of performative writing and materially-mediated online workshops, both of which are ethically engaged and appropriate modes of inquiry stemming from feminist phenomenological concepts of the co-constituted, 'relational self.'
Method/technique	1) This study has helped co-conceive and evolve the design research praxis narrative (DRPN) method. The DRPN was adapted in this study for use within practical feminist phenomenology by amplifying the aspects of performative writing (e.g. Pollock, 1998) and uncomfortable reflexivity (e.g. Pillow, 2003).
Practical/artefact	 The findings from this study are communicated through 3 design outcomes: The 3 DRPN narratives: In addition to a method for personal sensemaking, the narratives also serve as design artefacts that can be subject to future inquiry and analysis. The method and materials for the online workshops with other practitioners, including open-ended Ahmed conversation cards. This is published as an adaptable Miro template, to encourage interpretation, modification, personalisation, and ongoing reflection rather than uncritical use as a feminist tool for design. The exhibition website which documents the first 3 sessions of the online workshops with other practitioners and houses the above two artefacts.

6.20 Possible turning points for practitioners

As I discussed in the introduction to this research (Chapter 1), there are increasing calls for more reflexivity in participatory design processes. Often these calls advocate for more self-reflection about designer/researcher relations with others and more consideration for how designers enact choices and values in practices relating to others (e.g. Pihkala & Karasti, 2016). Rather than reflexive practices that rely on a stable sense of self or that we be locked into certain, absolute positionalities in relation to each other and project situations, I propose 4 'turning points' for which designers can use as reflective [dis][re] orientations for reflecting on the political and ethical implications of their personal roles and contributions to co-design.

6.21 Turning Point 1: the MATERIALS | wondering how the relational – and the relational self – might be manifested in and by the artefacts we design for collaborative use in workshops

In contemporary fields like Design Thinking, Service Design, and Strategic Design, we have seen a turn away from a purely material practice towards an expanded practice that recognises how designer mindsets and ideation processes can help create new services, systems and other non-artefact design outputs. Furthermore, Scandinavian Participatory Design movements from the 1970s and more recent movements like Design Justice and Decolonising Design have articulated the importance of immaterial aspects of participation, including: power, oppression, customs, norms, identity, relationships, etc. These movements – one turning away from the material to elevate 'thinking' and another to attend to the complexities of 'participation' – have been critical for advancing the field of Design and crucial for developing more ethical practices of working with people in collaborative processes.

This study builds upon these foundations through advocating for a re-turn towards and re-elevation of the significance of materials in co-design, for their effects in mediating the immaterial, lively, and relational. In other words: how do workshop materials reinforce, support, or curtail the relational aspects of co-design processes and, ultimately, the possible outcomes? This site recognises how much Design has to learn from other disciplines in the social sciences with longer histories dedicated to understanding the nuances and ethics of working with others (such as community organizing, trauma-informed approaches, ethnography, activism and social movement studies, therapy and support groups, etc.). Therefore, my research has explored what a design expertise in making contributes differently to collaborative and participatory projects. The creation (or curation) of the materials we bring to workshops is a skill that is refined through relational practice and worthy of more interrogation. I have already remarked that norms and values become palpable things through being formed from the entangled histories that precede them (see Chapter 2). Yet, in the micro-process of designing workshop materials, this becomes a very condensed timeline and a more contained entanglement. The central story of the production of these materials can be filtered through the singular lens of the embodied experience of the designer who makes them. Therefore, materials (and the ethical implications of putting them to use in workshops) become a rich site for analysis when we recognise that they are not neutral or fully external objects, but partial reflections and extensions of our relational selves. When looking at materials as 'queer objects' separated from their use, how do they appear to you?

I would also like to note that this retrospective *analysis* of workshop materials as 'queer objects' is not a replacement for a more general reflexive *orientation* in practice as projects evolve in context, and are enacted

with others. Instead, material analysis is a supportive reflective technique that can be used to better articulate the tacit decision-making based on knowledge gained through practice. This site is intentionally listed first, as my research has demonstrated that a critical reflection of the materials we generate in co-design can be an entry point for surfacing and exploring the remaining three sites.

6.22 Turning Point 2: the TENSIONS | attuning to our affective experiences of complex power entanglements in co-design

Ahmed calls for willfulness to be a collective approach, but does not expand to describe how this might happen beyond Killjoys finding each other and banding together. Yet, in co-design, practitioners are mediating between institutions and publics and acting as stewards and advocates for others' ideas (Elsbach & Flynn, 2013). So, it becomes essential to understand how we are mitigating power imbalances, while encouraging exploration of alternatives, without inadvertently forcing our own values upon participants through the materials and framing we craft for these spaces.

This study embraced a plurality of participatory practices, and advocates that feminism can be enacted in any project context, not only community-led projects. In any project there is a possibility for an array of small moves that are actively dismantling/transforming/questioning the structures we are operating within. For example, in addition to killing joy that is dependent on an inequitable status quo, co-design can be a collective means of widening 'the happiness script' (2010) through creating spaces for more people to re-define joy on their own terms. However, as the ones tasked with crafting these spaces, designers might find themselves negotiating both a sense of power and subjugation within the same project. Ahmed reminds us that willfulness is intentional and embodied (2014) and that attuning to and describing the affect and sensations of these tensions—or our sense that something is not right—is the conceptual work. When we encounter resistance to the positive social change we are intending, it makes a strong impression. In co-design, there is also an important flip-side to this sensemaking: when does co-design feel easy or right? When is the project 'extending your shape'? Or, when might you have assumed a certain shape to create less resistance?

6.23 Turning point 3: the BACKGROUND | attuning to what usually 'recedes from view' in projects, institutions, and our own everyday practices

A queer or feminist approach can be both experienced as 'being out of tune' and more attuned to noticing what normally recedes from view within co-design projects and their institutional contexts (Ahmed, 2017, p. 40). You might notice how the process better accommodates certain kinds of bodies and reinforces certain values and possibilities over others. In a queer orientation towards the background, we are better able to see that even the 'possible futures' we are ideating might arrive pre-oriented to better accommodate certain kinds of bodies and reinforce certain values and possibilities over others. It is a skilled practice to hold space for deviation, and a practice that can only be made better by recognising our own orientation within the entanglement, with openness to tracing our position and how we look for what recedes from our view. Importantly, assuming an oblique orientation to the institutions we work within is an intentional process for those who more easily inhabit the norms. *Doing* the work of diversity in an institution is not the same work as *being* the diversity of an institution, but both these roles can involve coming into an oblique orientation. Importantly, coming up against the institutions we work within is an intentional process for those who more easily inhabit the norms. (see also Chapter 5, Section 5.22)

In designing collaborative workshops, practitioners try to anticipate the optimal conditions for collective creative processes to emerge. Particularly if working within the complex power dynamics of both risk-averse stakeholders (Bason, 2014) and 'marginalised voices', designing this context in public sector projects can be difficult and nuanced. As Ahmed says 'The magical and mundane can belong in the same horizon; "use" can be plodding and capacious at the same time' (2019). Rather than considering the problem-solving function of co-design as 'given', we can instead broaden and question the very use of participation. How can co-design contribute to modelling new ways of relating, being and becoming together that challenge what we are 'used to' (Ahmed, 2019)? Ahmed acknowledges that deviating from norms is hard. The significant work of leveraging and expanding the use of these workshops cannot be dismissed when it comes to supporting the difficult labour of questioning fundamental assumptions and norms. And yet, the (time-consuming) practical decisions made to respond to the anticipated needs of different participants and stakeholders is under-discussed in co-design literature. Instead, often the primary documentation is on the finished tools for surfacing and capturing the solutions or ideas generated from the co-design process (Akama & Prendiville, 2016; Sanders & Stappers, 2016).

In attending to the background, we are anticipating more than just project requirements, but configuring when and how it might be necessary to queer practices and processes surrounding these projects that have become entrenched: how, for instance, to mitigate bias or create space for potential unexpressed desires such as a sense of belonging or autonomy, or to be angry, or to be acknowledged, or to be encouraged, given permission, or to take a risk, or refuse to comply... It is these seemingly background choices, pivots, and anticipatory adaptations-in-action that directly contribute to how co-designers carefully consider and craft the ideal conditions and materials we believe will allow participants to explore the unknown or welcome new perspectives. Unfortunately, the lack of documentation surrounding how designers make these choices not only contributes to erasing complicated entanglements of the designer-researcher within participatory processes (and how they might—or might not—be influencing collective project outcomes), but also misses opportunities for valuable knowledge sharing in the field about leveraging and evidencing the transformative potential of co-design.

This site offers a way in for capturing this decision-making process in more explicit terms: what is my orientation to the background of this project? How does it extend my shape? How do we create more room? How do we question the 'objects' within reach?

6.24 Turning point 4: the SHIFTS | attuning to personal transformations that occur *through* practice towards better understanding of the larger transformative potential *of* co-design practice

While the transformative promise of workshops is often discussed in co-design literature, it remains slippery to evidence (e.g. Blomkamp, 2018). We can often sense transformative learning happening in these workshops, but even following the events that feel most successful, we might be left wondering about the extent and duration of this effect. Was this transformation just a fleeting experience for participants and stakeholders, or has something been shifted? This final turning point questions what we can learn from not only looking for transformation to happen to (or expect transformation to happen for) others and institutions, but to better understand how we are changing as well. In fact, if we approach co-design expecting to create transformation, but not expecting or looking to be transformed ourselves by the process, even a practice that strives to be feminist can take on an unsettling sense of force (in the next section I

emphasise Ahmed's call to 'waver in our convictions'). As I have illustrated in the 3 DRPNs, my attempts to craft the conditions for transformative learning, I have experienced transformations of my own. The analysis undertaken in this study allowed me to confront this transformation and to trace the shifts and limitations in my understanding.

In keeping with the methodological approach and objectives of this study, I was not seeking to 'prove' that co-design at-large is transformative. Yet this research has possible implications for the interdisciplinary field of co-design, which often must work across different knowledge paradigms. More nuanced and plural understandings of transformation might be particularly useful for practitioners working in the public sector, where conventions surrounding 'strong evidence' are linked to funding opportunities. In this study, I revealed examples of how my own 'feminist tendencies' were influenced and made more pronounced through the creative process of materialising. This reflection on shifting practice also traced how my engagement with the co-design process contributed back to my evolving personal feminist perspective. In interrogating our own ongoing and varied affective transformations at the scale of an individual, we can establish a humble precedent for other possible paths to better understanding the wider transformative potential of co-design to shift thinking and address complex or contested social issues.

6.30 Limitations, further opportunities, and implications for Design

I have used this study to provide a thick description (Ryle, 1968/2009) of a designer's embodied understanding of the challenges and opportunities of making positive change through co-design methods. In my own practice, I have been deeply immersed in the context of the intersection of public sector institutions, co-design, and feminism/gender equity. However, there are many other social issues or issues of equity and inclusion where designers working in the public sector may be trying to make change.

By calling attention to the implications of personal feminist perspectives embedded within co-design workshop materials and the necessity for more awareness of the embodied practice of co-design, the research does not advocate for practitioners to try to 'control for' or remove their viewpoints and values from within these spaces. To the contrary, it calls for more explicit acknowledgement, transparency, and critical awareness of what the sensemaking creative process of crafting workshops and design engagements for others reveals about the complex contexts we are working within and the difficult work of making change. Though co-design is typically considered a process of including others and 'designing with', this study focuses on the 'intermediate design' (Hyysalo & Hyysalo, 2018; Hyysalo et al., 2019) involved within collaborative processes that requires us to stage, frame, and design for others joining co-design events. Perhaps with the exception of initiatives that are entirely community-led, designers are often tasked with preparing these events by researching and speculatively anticipating the needs of participants to best undertake the collaborative work. This is a highly interpretive and abductive process, which can become obscured by the overarching collaborative nature of the larger project. I have evolved the method of the DRPN to help draw attention and hold space for the complexity of these entangled aspects of the role and responsibility of the designer as a facilitator of collaborative projects. By honing awareness of complex entanglements of agencies and power inherent in this position, designers can become more adept at noticing what 'becomes background' in different institutions and project contexts and within their own embodied activities.

However, the DRPNs employed in this research present a limitation: time. In bringing ideas about embodied design practice into conversation with the feminist theory of Ahmed, this study contributes to this discourse through highlighting the importance of designers to be in conversation with the intermediate materials (Hyysalo & Hyysalo, 2018) of co-design practice and larger, 'happiness' scripts, as well as personal history. The DRPN emerged as a tool for sensemaking with the resonant theories from Ahmed, and worked effectively to attend to aspects of my practice that I had overlooked. However, the way that it has been approached in this study has been a time-consuming, highly theoretical writing approach more well-suited to academic contexts. Preparing a DRPN for public-facing knowledge dissemination can be a slow process. However, as I discussed in Chapter 3, the first iterations of the DRPN method we developed in WonderLab used short, self-reflexive prompts, which are well-suited to teams working together on applied projects in both academic and non-academic contexts. Narrative 3 in this exegesis is a good example of how even a very short narrative can be significant for reflecting on turning points in personal practice.

My colleagues in WonderLab and I continue to experiment with ways of using the DRPN as a part of everyday reflective practice. We recently used this technique in an event for the Design Research Society Festival of Emergence 2021, where key prompts supported short bouts of collective, reflective writing in only 15-20 minutes. Though this event took place online with a group of mostly strangers, the prompts to write about tensions and felt experiences of atmospheres and settings (Grocott et al., 2021).

With awareness of the strengths of engaging slowly with ideas from Ahmed through the DRPN, but also aware of how much time it had taken to immerse myself in her books, I developed the online workshops with practitioners. The methods used in this workshop allowed me to translate some of the key ideas that emerged from writing the DRPNs into conversation starters to share with practitioners both inside and outside academia. I created the generative design workshops for practitioners on Miro, not only because this research has taken place in the context of a global pandemic, but also because this allows for ongoing easy modification and adaptation by others for personal use or with their own teams. It is a fine line between commitments to accessibility and transferability beyond academia and a commitment to not flattening feminist theory into replicable design tools. I hope that the practitioner workshops have struck the right balance between these two objectives in the work.

6.31 Further opportunities beyond the project: infrastructuring

Through prioritising sharing generalisable methods and details about the project context, design practice knowledge conventionally creates certain brackets, orientations, and limitations, which can limit reflexivity and, of course, leaves some things out. While it is impossible to comprehensively document all aspects of an entangled co-design project, the seemingly objective documentation that goes into case studies or feedback reports (usually containing photos and images substantiating the positions presented in writing) can obscure the highly interpretive nature of the research process. It is not uncommon for the purpose and rationale of innovative design research methods like workshops to be misinterpreted or considered more objective than they are. This confusion can happen even among designers who may be more familiar with positivist research methods akin to science or engineering (Lee, 2012). It comes as no surprise that creative co-design methods, though promising and increasingly applied to complex issues found in the public sector, can also be misinterpreted by stakeholders.

Taking inspiration from Ahmed (2020), I think that sharing accounts of personal practice also have potential other 'uses' for co-design as a field:

- 1. through sharing accounts of embodied practice that are explicitly subjective, we unsettle dominant assumptions about objectivity within applied research. This can be useful for opening up conversations with stakeholders about the opportunities and challenges of using co-design.
- 2. through sharing accounts of embodied practice that happens at timescales that are both shorter (the scale of moments) and longer (connected to memories within a lifespan or hopes for futures), we might consider more frames for measuring and creating social impact through co-design beyond the scale of methodology and discrete funded projects. Indeed there are other scales already being used, one of which I discuss more below.

On this second point, I want to point to potential resonance between this study and 'infrastructuring' literature. In research funded by or within the public sector, I have found that it can be challenging to share transferable knowledge outside a certain project context, beyond high-level principles or case studies and methods. This is particularly hard when authoritative hierarchies surrounding the project, limit, delay, or prevent transparency or widespread public dissemination. And yet, it is these very challenging projects where I have both witnessed and experienced the most transformative learning. In the most difficult projects, I have learned the most and developed an embodied knowing about what feminism is really up against. In this study, I used a phenomenological approach to bracket the project, to be able to share salient knowledge in ways that adhered to embargo requirements. This makes me wonder about how this work intersects with practices that are already operating through scales, brackets, and frames beyond discrete projects.

A case study from Hilgren et al. advocates for designing at the scale of infrastructuring rather than project-based design for social innovation. In their words, 'infrastructuring is characterised by a continuous process of building relations with diverse actors and by a flexible allotment of time and resources' (Hilgren et al., 2011, pp. 180). I did not engage deeply with the infrastructuring literature in this study because the conditions this process requires were not comparable to my own contract and project-based practice. For example, infrastructuring looks at attachments rather than frames (Marres, cited in Hilgren et al., 2011), which allows a dynamic view of authority structures. This is useful for settings where power dynamics arise from 'fluid social alignments rather than institutionalized divisions' (Le Dantec and DiSalvo, 2013, pp. 246). Again, though there are many similar intentions between this study and the processes of infrastructuring presented by these authors, my personal practice was not situated within the conditions required for 'fluid' infrastructuring processes to take place. In fact, rather than a description of a practice that has adapted to trace an account of fluidity and dynamism, this has more been an account of adapting a practice to trace how public institutions can maintain their stability even in the face of fluid, inclusive, participatory processes. Indeed, in the Hilgren et al. infrastructuring case study, the authors' own description of working with various local organisations suggested several moments where the researchers encountered the invisible wall—where a public institution can be 'positive' about an initiative, without necessarily getting behind it (Hilgren et al., 2011, p.177). However, this part of the work is not emphasised in the article, which is focused on advocating for the potential of infrastructuring. Following this study, I believe there is potential to bring feminist phenomenological accounts to practices of infrastructuring to deepen and amplify the embodied knowledge of institutions that practitioners gain through their applied efforts to make change.

6.40 Final reflections

A feminist movement thus requires that we acquire feminist tendencies, a willingness to keep going despite or even because of what we come up against. We could think of this process as practicing feminism. If we tend toward the world in a feminist way, if we repeat that tending, again and again, we acquire feminist tendencies (Ahmed, 2017, p. 6).

In Chapter 3, I listed guiding research questions that shaped this study. The objective was not to find definitive answers, but to help set a trajectory for diverging and converging paths of inquiry. I revisit these questions here with a similar intention at the conclusion of this document:

How does a designer 'tend toward the world in a feminist way' through practice? In turn, how do transformative learning experiences of co-design practice contribute back to our evolving personal feminist tendencies?

Through the DRPNs and combining concepts of from Ahmed's feminist practical phenomenology and the 4DRO/expanded practice of making framework from Grocott & Sosa (2018), I have illustrated how design practice can yield valuable insights and inform personal understanding of feminism. Designers are trained to change present situations into preferred futures through tending to alternative possibilities and speculation, tangible and appropriate prototypes and solutions, and affective and material quality of human experience. By attending to both our personal, embodied, experiences of project situations as well as these shared disciplinary orientations and tactics in practice, we can amplify and share and build upon our evolving understanding of co-design practice in the context of unequal institutional worlds. As we try to tend toward practice in a feminist way, we are refining our strategic approaches for how to help make feminist change happen. This research has explored how this difficult work of trying to make change and transformation in the public sector through co-design generates valuable 'sweaty concepts' that, in turn, shape and extend personal understanding of feminism, especially what feminism is 'up against'.

How are designers negotiating and making sense of feminist tensions, blockages, and transformation through situated project contexts?

You might say that the personal account of transformation and becoming feminist offered in this study, has equally been an account of institutions that do not transform and co-design processes that—despite their happy association with change, innovation, and movement—can reinforce or help unequal structures become more stable. In joining the calls from other researchers asking for more accounts of personal, embodied design practice, I also extend this request to include more stories of the moments where our attempts to create social change in our practice 'get stuck.'

Deviation is hard, deviation is made hard (Ahmed, 2020, p. 42).

Inspired by Ahmed, the research seeks to both answer and provoke the question: in crafting the right context for co-designing more equitable futures, how are practitioners unmaking how hard it is (for all of us) to deviate from norms that support and perpetuate inequality?

It is never possible for designers to transcend the unequal structures we are working within, even through critical reflection. Importantly, this is a struggle for feminists and scholars in gender studies too. For example, feminist scholars, Ramos & Roberts (2021) are concerned that many authors of mainstream feminist scholarship 'remain disembodied in their thinking' and state that 'inclusion of women of colour and/or other underprivileged groups' is not enough to decolonise gender studies. Their solution has been to draw together the writings of Luce Irigaray and Sara Ahmed on ideas of 'wonder' as a 'non-appropriative relationality making space for the new' (Ramos & Roberts, 2021, pp. 31-35). The authors look to these feminist work to embrace a philosophy of wonder as feminist pedagogy. They open their article with a quote from Ahmed:

'It is through wonder', Sara Ahmed (2004, p. 180) writes, 'that pain and anger come to life', pushing us to realise that 'what hurts, and what causes pain ... is not necessary, and can be unmade as well as made'. Wonder, for Ahmed (ibid., p. 181), thus 'energises the hope of transformation ... the will for politics' and is key to feminist pedagogy' (Ahmed, cited in Ramos & Roberts, 2021, pp. 29).

So while we cannot separate ourselves from the institutional contexts and social structures we are embedded within, we can include our embodied experiences in the collective wondering and pursuit of unmaking and new possibilities. Even with the most creative convivial tools, feminism reminds us that we can never really know—nor should we be striving to appropriate—the interior worlds of participants, stakeholders and collaborators involved in our co-design projects. But we can strive to 'perceive the directions and dimensions of...intentionality' in everyone's contributions as we work together to make change (Irigaray, cited in Ramos & Roberts, 2021). While confusion about how best to adopt co-design methods in the public sector is still common, becoming more adept at communicating the orientations and intentions of this work is an important part of avoiding the pitfalls of co-option and cultivating effective momentum for social change. The authors, as feminists, also recognise the 'real danger' that can occur when trying to challenge norms, where individuals might be pushed to the point of 'shutting off and disengaging, which would mean that a possibility of wonder is lost' (ibid, p. 39). As designers of interactive experiences and modes of engagement, we can attune to these affective experiential qualities that mediate any process of transformation, including our own transformations. To make it easier to deviate from norms that perpetuate inequality, we design artefacts and encounters not only for project objectives, but for helping us hold open the possibility to wonder together, despite what we come up against in practice.

References

- Agid, S. (2012). Worldmaking: Working through theory/practice in design. *Design and Culture, 4*(1), 27-54. https://doi.org/10.2752/175470812X13176523285110
- Agid, S., & Chin, E. (2019). Making and negotiating value: design and collaboration with community led groups. *CoDesign*, 15(1), 75-89.
- Agid, S., & Akama, Y. (2018). Dance of designing: Rethinking position, relation and movement in service design. In *Proceedings of the ServDes. 2018 Conference* (pp. 800-811). Linköping University Electronic Press.
- Agid, S. (2019). Making safety, making freedom: Problem-setting, collaborative design and contested futures. In T. Fisher & L. Gamman (Eds.) *Tricky design : The ethics of things* (pp.115-30). Bloomsbury Visual Arts. https://doi.org/10.5040/9781474277211.ch-008
- Agid, S., & Akama, Y. (2020). Reflexive account-giving through 'practice notations': Plural dimensions and dynamics of infrastructuring. In *Proceedings of the 16th Participatory Design Conference 2020 Participation(s) Otherwise Volume 2* (pp. 164-169). https://doi.org/10.1145/3384772.3385136
- Ahmed, S. (2006a). Orientations: Toward a queer phenomenology. *GLQ*, *12*(4), 543-574. https://doi.org/10.1215/10642684-2006-002
- Ahmed, S. (2006b). Queer phenomenology: Orientations, objects, others. Duke University Press.
- Ahmed, S. (2010a). Happy objects. In M. Gregg & G. J. Seigworth (Eds.), *The affect theory reader* (pp. 29-51). Duke University Press. https://doi.org/10.1215/9780822393047-001
- Ahmed, S. (2010b). Orientations matter. In D. C. a. S. Frost (Ed.), *New materialisms: Ontology, agency and politics*. Duke University Press.
- Ahmed, S. (2010c). The promise of happiness. Durham NC: Duke University Press.
- Ahmed, S. (2012). On being included: Racism and diversity in institutional life. Durham: Duke University Press. https://doi.org/10.1215/9780822395324
- Ahmed, S. (2014). Willful subjects. Durham: Duke University Press.
- Ahmed, S. (2017). Living a feminist life. Durham Duke University Press.
- Ahmed, S. (2019). What's the use?: On the uses of use. Durham, London: Duke University Press.
- Akama, Y., Hagen, P., & Whaanga-Schollum, D. (2019). Problematizing replicable design to practice respectful, reciprocal, and relational co-designing with Indigenous people. *Design and Culture*, 11, 1-26. https://doi.org/10.1080/17547075.2019.1571306
- Akama, Y., & Prendiville, A. (2014). Embodying, enacting and entangling design: a phenomenological view to co-designing services. *Swedish Design Research Journal*, 1, 29-40.
- Bacchi, C., & Eveline, J. (Eds.). (2010). *Mainstreaming politics: Gendering practices and feminist theory*. University of Adelaide Press.
- Bacchi, C. L. (2009). Analysing policy: what's the problem represented to be? Pearson.

- Bannon, L. J., & Ehn, P. (2012). Design matters in participatory design. In J. Simonsen & T. Robertson (Eds.), *Routledge international handbook of participatory design* (pp. 37-63). Taylor & Francis Group.
- Bardzell, S. (2010). Feminist HCI: taking stock and outlining an agenda for design. Conference on Human Factors in Computing Systems,
- Bason, C. (2014). Design for policy. Farnham, Surrey, Burlington, VT: Gower.
- Berlant, L. G. (2011). Cruel optimism. Durham: Duke University Press.
- Berlant, L. G. (2019). The hundreds. Durham: Duke University Press.
- Blomkamp, E. (2018). The promise of co-design for public policy. *Australian Journal of Public Administration*, 77(4), 729-743. https://doi.org/10.1111/1467-8500.12310
- Bonsiepe, G. (2006). Design and democracy. *Design Issues*, *22*(2), 27-34. https://doi.org/10.1162/desi.2006.22.2.27
- Buchanan, R. (1992). Wicked problems in design thinking. Design issues, 8(2), 5-21.
- Buckley, C. (1986). Made in patriarchy: Toward a feminist analysis of women and design. Design Issues, 3-14.
- Buckley, C. (2020). Made in patriarchy II: Researching (or re-searching) women and design. *Design Issues*, 36(1), 19-29. https://doi.org/10.1162/desi_a_00572
- Braidotti, R. B. (2013). Metamorphoses: towards a materialist theory of becoming. Polity Press.
- Brandt, E. (2001). Event-driven product development: collaboration and learning. Technical University of Denmark.
- Candy, S., & Watson, J. (2015). The thing from the future. *The APF methods anthology*. London: Association of Professional Futurists.
- Candy, S. (2018). Gaming futures literacy: The thing from the future. In *Transforming the future* (pp. 233-246). Routledge.
- Chivukula, S., & Gray, C. (2020a). Bardzell's "feminist HCI" legacy: Analyzing citational patterns. *Conference on Human Factors in Computing Systems*, 1-8. https://doi.org/10.1145/3334480.3382936
- Chivukula, Sai Shruthi. (2020b). Feminisms through design: A practical guide to implement and extend feminism. *Interactions*. 27. 36-40. 10.1145/3427338.
- Costanza-Chock, S. (2018). Design justice: Towards an intersectional feminist framework for design theory and practice. *Proceedings of the Design Research Society*.
- Connory, J. (2019). The view from here. Monash University.
- Cross, N. (1982). Designerly ways of knowing. Design Studies, 3(4), 221-227.
- Department of Premier and Cabinet. (2016). Ending family violence: Victoria's plan for change. Melbourne: State Government of Victoria.
- DiSalvo, C. (2009). Design and the construction of publics. *Design Issues*, *25*(1), 48-63. https://doi.org/10.1162/desi.2009.25.1.48
- Dorst, K. (2015). *Frame innovation: Create new thinking by design*. Cambridge: The MIT Press. https://doi.org/10.7551/mitpress/10096.001.0001

- Elsbach, K. D., & Flynn, F. J. (2013). Creative collaboration and the self-concept: A study of toy designers. *Journal of Management Studies*, 50(4), 515-544.
- Eriksen, M. A. (2012). Material matters in co-designing: Formatting & staging with participating materials in co-design projects, events & situations. Malmö University.
- Findeli, A. (1999). A quest for credibility: Doctoral education and research. in R. Buchanan, D. Doordan, L. Justice and V. Margolin (Eds.), *Doctoral education in design conference proceedings*. Carnegie Mellon University.
- Findeli, A. (2001). Rethinking design education for the 21st century: Theoretical, methodological, and ethical discussion. *Design Issues*, 17(1), 5-17. https://doi.org/10.1162/07479360152103796
- Freire, P. (1970). Pedagogy of the oppressed. New York: The Seabury Press.
- Gaver, W. (2012). What should we expect from research through design? *Conference on Human Factors in Computing Systems*, 937-946. https://doi.org/10.1145/2207676.2208538
- Grocott, L. (2012). The discursive practice of figuring diagrams. TRACEY Journal: Drawing Knowledge, 1-15.
- Grocott, L. (2017). Make happen: Sense-making the affordances of a practice-based PhD in design. In L. Vaughan (Ed.), *Practice-based design research* (pp. 165-174). Bloomsbury Academic.
- Grocott, L., & Sosa, R. (2018). The Contribution of design in interdisciplinary collaborations: A framework for amplifying project-grounded research. In J. Oliver (Ed.), *Associations: Creative Practice and Research* (pp. 35-52). Melbourne University Publishing.
- Grocott, L., Holman-Jones, S., Korsmeyer, H. & Edwards, A. (2021). *The praxis narrative: a research writing playdate (part 1)*. DRS Festival of Emergence.
- Hannan, C. (2001). The United Nations commitment to gender mainstreaming: a global strategy for promoting equality between women and men. In *ODCCP Field Representatives Seminar*. New York : Office of the Special Adviser on Gender Issues and Advancement of Women.
- Haraway, D. (1988). Situated knowledges: The science question in feminism and the privilege of partial perspective. *Feminist Studies*, 14(3), 575–599. https://doi.org/10.2307/3178066
- Haraway, D. J. (1991). Simians, cyborgs, and women: the reinvention of nature. New York: Routledge.
- Haraway, D. J. (2016). Staying with the trouble: making kin in the Chthulucene. Durham: Duke University Press.
- Haseman, B. (2006). A manifesto for performative research. *Media International Australia*, 118(1), 98-106. https://doi.org/10.1177/1329878X0611800113
- Heidaripour, M., & Forlano, L. (2018). Formgiving to Feminist Futures as Design Activism. In *Proceedings of DRS2018 (Vol. 2). (DRS International Conference Series).* Design Research Society.
- Hemmings, C. (2005). Invoking affect: Cultural theory and the ontological turn. *Cultural Studies*, *19*(5), 548-567.
- Hilgren, P. A., Seravalli, A., & Emilson, A. (2011). Prototyping and infrastructuring in design for social innovation. *CoDesign*, 7(3-4), 169–183. https://doi.org/10.1080/15710882.2011.630474
- Hill Collins, P. (2000). *Black feminist thought: knowledge, consciousness, and the politics of empowerment* (2nd edition). New York: Routledge.

- Hooker, L., Ison, J., Henry, N., Fisher, C., Forsdike, K., Young, F., Korsmeyer, H., O'Sullivan, G., & Taft, A. (2021). *Primary prevention of sexual violence and harassment against women and girls: Combining evidence and practice knowledge final report and theory of change.* La Trobe University.
- Hooker, L., Ison, J., O'Sullivan, G., Fisher, C., Henry, N., Forsdike, K., Young, F., & Taft, A. (2020). *Primary prevention of sexual violence and harassment against women and girls: Combining evidence and practice knowledge Evidence review and data synthesis.* La Trobe University.
- hooks, b. (2000). Feminism is for everybody: Passionate politics. Pluto Press.
- Huybrechts, L., Benesch, H., & Geib, J. (2017). Institutioning: participatory design, co-design and the public realm. *CoDesign*, 13(3), 148-159. https://doi.org/10.1080/15710882.2017.1355006
- Hyysalo, V., & Hyysalo, S. (2018). The mundane and strategic work in collaborative design. Design Issues, 34(3), 42-58. https://doi.org/10.1162/desi_a_00496
- Hyysalo, S., Perikangas, S., Marttila, T., & Auvinen, K. (2019). Intermediate codesigning in transitions governance: catalysing and channelling participant action. *The Design Journal*, 22(6), 873-894.
- Kalms, N., Bawden, G., Berry, J., Salen, P., Korsmeyer, H., Edwards, A., Condliffe, Z. & Mitchell, E. (2018). SHEcity. In *WORKAROUND*. RMIT Design Hub.
- Keinonen, T. (2009). Design method instrument, competence of agenda? Multiple ways to design research. Swiss Design Research Network Symposium 09. Lugano, Switzerland.
- Kensing, F., & Greenbaum, J. (2012). Heritage: Having a say. In *Routledge international handbook of participatory design* (pp. 41-56). Routledge.
- Kimbell, L. (2014). The service innovation handbook: action-oriented creative thinking toolkit for service organizations: templates, cases, capabilities. Amsterdam, Netherlands: BIS Publishers.
- Kimbell, L., & Bailey, J. (2017). Prototyping and the new spirit of policy-making. *CoDesign*, *13*(3), 214-226. https://doi.org/10.1080/15710882.2017.1355003
- Kimbell, L., & Vesnić-Alujević, L. (2020). After the toolkit: Anticipatory logics and the future of government. *Policy Design and Practice*, *3*(2), 95-108.
- Kolko, J. (2010). Abductive thinking and sensemaking: The drivers of design synthesis. *Design Issues*, 26(1), 15-28.
- Korsmeyer, H., Light, A., & Grocott, L. (2022). Understanding feminist anticipation through 'back-talk': 3 narratives of willful, deviant, and care-full co-design practices. *Futures*, *136*, https://doi.org/10.1016/j.futures.2021.102874
- Le Dantec, C. A. & DiSalvo, C. (2013). Infrastructuring and the formation of publics in participatory design. Social Studies of Science, 43(2), 241–264. https://doi.org/10.1177/0306312712471581
- Lee, J.-J. (2012). Against method: The portability of method in human-centered design. Aalto University, School of Arts, Design and Architecture. http://urn.fi/URN:ISBN:978-952-60-4860-4
- Lee, J.-J. (2014). The true benefits of designing design methods. *Artifact*, *3*, 5.1-5.12. https://doi.org/10.14434/artifact.v3i2.3951
- Lee, J. J., Jaatinen, M., Salmi, A., Mattelmäki, T., Smeds, R., & Holopainen, M. (2018). Design choices framework for co-creation projects. *International Journal of Design*, 12(2).

- Light, A. (2010). The unit of analysis in understanding the politics of participatory practice. In *Proceedings of the 11th Biennial Participatory Design Conference*, 183-186.
- Light, A., & Akama, Y. (2012). The Human Touch: Participatory practice and the role of facilitation in designing with communities (Vol. 1). https://doi.org/10.1145/2347635.2347645
- Lindström, K., Mazé, R., Forlano, L., Jonsson, L., & Ståhl, Å. (2018). Editorial: Design, research and feminism(s). In *Proceedings of DRS2018 (Vol. 2). (DRS International Conference Series).* Design Research Society.
- Loi, D. (2007). Reflective probes, primitive probes and playful triggers. *Ethnographic Praxis in Industry Conference Proceedings*, 2007, 232-245. https://doi.org/10.1111/j.1559-8918.2007.tb00079.x
- Lorde, A. (1984). Sister outsider: essays and speeches. Freedom, CA: Crossing Press.
- Luck, R. (2018). What is it that makes participation in design participatory design? *Design studies*, *59*, 1-8. https://doi.org/10.1016/j.destud.2018.10.002
- Mahoney, J., & Goertz, G. (2006). A tale of two cultures: Contrasting quantitative and qualitative research. *Political analysis*, *14*(3), 227-249. https://doi.org/10.1093/pan/mpj017
- Martin, K., & Mirraboopa, B. (2003). Ways of knowing, being and doing: A theoretical framework and methods for indigenous and indigenist re-search. *Journal of Australian studies*, 27(76), 203-214.
- Marx, K. (2000). Commodities. In *Marx's capital*. (Students Edition) (pp. 76). Electric Book Company. (Original work published 1887).
- Mattelmäki, T. (2006). Design probes. Aalto University.
- Mattelmäki, T., Brandt, E., & Vaajakallio, K. (2011). On designing open-ended interpretations for collaborative design exploration. *CoDesign*, 7(2), 79-93. https://doi.org/10.1080/15710882.2011.609891
- Mattelmäki, T., & Visser, F. S. (2011). Lost in co-x: Interpretations of co-design and co-creation. In *Proceedings of IASDR'11, 4th World Conference on Design Research, Delft University,.* International Association of Societies of Design Research (IASDR).
- Mattelmäki, T., Vaajakallio, K., & Koskinen, I. (2014). What happened to empathic design? *Design issues*, 30(1), 67-77. https://doi.org/10.1162/DESI_a_00249
- McCammon, H. J. (2012). Explaining frame variation: More moderate and radical demands for women's citizenship in the US women's jury movements. *Social Problems*, *59*(1), 43-69.
- McGann, M., Blomkamp, E., & Lewis, J. M. (2018). The rise of public sector innovation labs: experiments in design thinking for policy. *Policy Sciences*, *51*(3), 249-267. https://doi.org/10.1007/s11077-018-9315-7
- McKercher, K. A. (2020). *Doing co-design for real: Mindsets, methods, and movements.* Sydney, NSW: Beyond Sticky Notes.
- Meer, S. (2005). Freedom for women: Mainstreaming gender in the South African liberation struggle and beyond. *Gender and development, 13*(2), 36-45. https://doi.org/10.1080/13552070512331332285
- Mezirow, J. (1978). Perspective transformation. *Adult Education (Chapel Hill), 28*(2), 100-110. https://doi.org/10.1177/074171367802800202
- Mezirow, J. (1991). Transformative dimensions of adult learning. San Francisco: Jossey-Bass.

- Mezirow, J. (2009). An overview on transformative learning. In K. Illeris (Ed.), *Contemporary theories of learning: learning theorists...in their own words* (pp. 90-106). Routledge.
- Milojević, I., Hurley, K., & Jenkins, A. (2008). Futures of feminism. *Futures : the journal of policy, planning and futures studies, 40*(4), 313-318. https://doi.org/10.1016/j.futures.2007.08.010
- Pennington, S. (2018). Taking care of issues of concern: Feminist possibilities and the curation of speculative and critical design, in Storni, C., Leahy, K., McMahon, M., Lloyd, P. and Bohemia, E. (eds.), *Design as a catalyst for change DRS International Conference 2018*. https://doi.org/10.21606/drs.2018.632
- Pihkala, S., & Karasti, H. (2016). Reflexive engagement: enacting reflexivity in design and for 'participation in plural'. *ACM International Conference Proceeding Series*, *1*, 21-30. https://doi.org/10.1145/2940299.2940302
- Pillow, W. (2003). Confession, catharsis, or cure? Rethinking the uses of reflexivity as methodological power in qualitative research. *International Journal of Qualitative Studies in Education*, *16*(2), 175-196. https://doi.org/10.1080/0951839032000060635
- Pollock, D. (1998). Performing writing. In P. Phelan & J. Lane (Eds.) *The ends of performance* (pp. 73-103). New York: New York University Press.
- Pollock, D. (2007). The performative "I". *Cultural Studies* \leftrightarrow *Critical Methodologies*, 7(3), 239-255. https://doi.org/10.1177/1532708606288649
- Pollock, D. (2009). Beyond experience. *Cultural Studies* ↔ *Critical Methodologies*, *9*(5), 636-646. https://doi.org/10.1177/1532708609338036
- Prochner, I., & Marchand, A. (2018). Learning from feminist critiques of and recommendations for industrial design. https://doi.org/10.21606/drs.2018.355
- Puwar, N. (2004). Thinking about making a difference. The British Journal of Politics and International Relations, 6(1), 65-80.
- Rai, S. M. (2018). The good life and the bad: Dialectics of solidarity. *Social Politics: International Studies in Gender, State & Society*, 25(1), 1-19.
- Ramos, F., & Roberts, L. (2021). Wonder as feminist pedagogy: Disrupting feminist complicity with coloniality. *Feminist review*, 128(1), 28-43. https://doi.org/10.1177/01417789211013702
- Rich, A. C. (1986). Blood, bread, and poetry: selected prose, 1979-1985 (1st ed. ed.). New York: Norton.
- Rommes, E., Bath, C., & Maass, S. (2012). Methods for intervention: gender analysis and feminist design of ICT. *Science, technology, & human values, 37*(6), 653-662.
- Rosner, D. K. (2018). *Critical fabulations: Reworking the methods and margins of design*. Cambridge: MIT Press. https://doi.org/10.7551/mitpress/11035.001.0001
- Ryle, G. (2009). The thinking of thoughts: What is 'le penseur' doing?. In *Collected essays 1929 1968 : Collected papers volume 2.* pp. 501-504. Taylor & Francis Group. (Original work published 1968)
- Salen, P., & Connory, J. (2018). The interplay of [in]visibility. *Design and Culture, 10*(3), 323-335. https://doi.org/10.1080/17547075.2018.1512733
- Salmi, A. & Mattelmäki, T. (2021) From within and in-between co-designing organizational change, *CoDesign*, *17*(1), 101-118, DOI: 10.1080/15710882.2019.1581817

- Sanders, E. (2002). From user-centered to participatory design approaches. In *Design and the social sciences* (pp. 18-25). CRC Press.
- Sanders, E. B. N. (2016). Convivial design toolbox: generative research for the front end of design. Amsterdam: BIS Publishers.
- Sanders, E. B. N., & Stappers, P. J. (2008). Co-creation and the new landscapes of design. *CoDesign*, 4(1), 5-18. https://doi.org/10.1080/15710880701875068
- Schön, D. A. (1983). The reflective practitioner: how professionals think in action. Basic Books.
- Self, J., Dalke, H., & Evans, M. (2013). Designerly ways of knowing and doing: design embodiment and experiential design knowledge. *DRS Eksig 2013*.
- Sengers, P., Boehner, K., David, S. and Kaye, J. Reflective design. Proc. CC '05, 49-58, 2005.
- Simonsen, J., & Robertson, T. (2012). *Routledge international handbook of participatory design*. Taylor & Francis Group.
- Steen, M. (2013). Virtues in participatory design: cooperation, curiosity, creativity, empowerment and reflexivity. *Sci Eng Ethics*, 19(3), 945-962. https://doi.org/10.1007/s11948-012-9380-9
- Suchman, L. (2002). Located accountabilities in technology production. *Scandinavian Journal of Information Systems*, 14(2), 7.
- Suchman, L. (2006). *Human-machine reconfigurations : plans and situated actions* (2nd ed.). Cambridge : Cambridge University Press.
- Tracy, S. J. (2019). *Qualitative research methods : Collecting evidence, crafting analysis, communicating impact.*John Wiley & Sons, Incorporated.
- UK Government. 2019. 'Policy lab. Co-design in policy: learning by doing.' Accessed 1 March 2020. https://openpolicy.blog.gov.uk/2019/01/11/co-design-in-policy-learning-by-doing/
- Van der Velden, M., Mörtberg, C., Van den Hoven, J., Vermaas, P. E., & Van de Poel, I. (2014). Participatory design and design for values. *Development*, 11(3), 215-236.
- Vic Gov. (2020). 'Human-Centred Design Playbook (Version 1.4)' https://www.vic.gov.au/human-centred-design-playbook
- Vic Gov. (2019). 'DPC Corporate Plan' https://www.vic.gov.au/dpc-corporate-plan-2019-23/section-6
- Whitzman, C. (2013). *Building inclusive cities: women's safety and the right to the city*. London, New York: Routledge.
- Yee, J., Raijmakers, B., & Ichikawa, F. (2019). Transformative Learning as Impact in Social Innovation. *Design and Culture, 11*(1), 109-132. https://doi.org/10.1080/17547075.2019.1567984
- Zamenopoulos, Theodore, Lam, Busayawan, Alexiou, Katerina, Kelemen, Mihaela, De Sousa, Sophia, Moffat, Sue, & Phillips, Martin. (2021). Types, obstacles and sources of empowerment in co-design: the role of shared material objects and processes. *CoDesign*, *17(2)*, 139–158. https://doi.org/10.1080/15710882.2019.1605383