



# Kent Academic Repository

**Connolly, Stephen (2018) *The Spatial Cinema: An Encounter between Lefebvre and the Moving Image*. Doctor of Philosophy (PhD) thesis, University of Kent,.**

## Downloaded from

<https://kar.kent.ac.uk/68457/> The University of Kent's Academic Repository KAR

## The version of record is available from

## This document version

UNSPECIFIED

## DOI for this version

## Licence for this version

CC BY-NC (Attribution-NonCommercial)

## Additional information

## Versions of research works

### Versions of Record

If this version is the version of record, it is the same as the published version available on the publisher's web site. Cite as the published version.

### Author Accepted Manuscripts

If this document is identified as the Author Accepted Manuscript it is the version after peer review but before type setting, copy editing or publisher branding. Cite as Surname, Initial. (Year) 'Title of article'. To be published in *Title of Journal*, Volume and issue numbers [peer-reviewed accepted version]. Available at: DOI or URL (Accessed: date).

## Enquiries

If you have questions about this document contact [ResearchSupport@kent.ac.uk](mailto:ResearchSupport@kent.ac.uk). Please include the URL of the record in KAR. If you believe that your, or a third party's rights have been compromised through this document please see our [Take Down policy](https://www.kent.ac.uk/guides/kar-the-kent-academic-repository#policies) (available from <https://www.kent.ac.uk/guides/kar-the-kent-academic-repository#policies>).

**The Spatial Cinema:  
An Encounter between Lefebvre and the Moving Image**

Stephen Connolly  
PhD by Research as Practice  
**SMFA**  
**University of Kent**

Submitted 22.09.2017  
Viva 26.03.2018  
Final text with corrections submitted 20.04.18  
University of Kent KAR Deposition 28.06.18

contact  
stephen.connolly@uca.ac.uk  
steve@bubblefilm.net  
+44 (0) 7931 791 307



*Machine Space*, 37 mins 2016, illustration, Connolly 2016

*Machine Space* (2016), practice output of this doctorate, was first screened -

London Film Festival / Experimenta Features Strand 10.10.16,  
NFT3, National Film Theatre, London UK

Subsequently exhibited at the Wexner Centre, Columbus, Ohio,  
April 2017

***The Spatial Cinema: An Encounter ...*** as a doctoral project was awarded -

**First Prize** in the **Best Practice as Research Portfolio: Moving Image Category**

British Association for Film, Television and Screen Studies (BAFTSS)  
Annual Conference, University of Kent, 12.04.18

# The Spatial Cinema: An Encounter between Lefebvre and the Moving Image

by Stephen Connolly

## Contents

**Statement** p.6

**Acknowledgements** p.7

**List of Illustrations** p.8

**Introduction** p.9

Prologue – *Machine Space*

Critical Spatial Practice

Chronology of creative process of the research project

Lefebvre’s *Production of Space*

Lefebvre as a singular animating theorist in the research project?

Disciplinary Context – space as landscape and the cinema

The Project Site – Detroit as a *Production of Space*

Structure of the Dissertation

**Chapter 1** p.32

Introduction

The material and Immaterial: the three moments of Lefebvrian space

Lefebvre’s *representation of space or conceived space*

The *representation of space* as visual image

The *representation of space* in moving image – James Benning

Benning’s work considered as Lefebvrian *spatial production*

Aerial Photography as *Representation of Space* and *Critical Spatial Practice*

The *representation of space* in *Machine Space* and witness

Providing Context to the Aerial Images in *Machine Space*

Manipulated digital aerial image – the *transform fault*

Conclusion

## Chapter 2

p.62

Introduction

Spatial Production in the everyday: *Spatial Practice*

Moving Image as generative of *spatial* experience –

*the space of production begets the production of space*

The *Sensory Cinema*, *spatial practice* & mimesis

Chantal Akerman's *D'Est* (1992)

*Spatial practice* in Detroit

*Machine Space* & the city panorama - a realization of *spatial practice*

Tracing the map in downtown Detroit – the *mimetic* image

*Red-Lining* and *mimetic* representation

Conclusion

## Chapter 3

p.100

Introduction

*Spaces of representation* – the *poetics* of space in Lefebvre

Place and the *Space of Representation* in Detroit – the *Ruin*

The *ruin* as object of mourning in Detroit

The *House* as *space of representation* and dwelling in Detroit

*Spaces of Representation in the house of Machine Space*

*The space of representation as allegory*

Conclusion

<b>Conclusion</b>	<b>p.128</b>
The Spatial Cinema // Redux	
<b>Appendix 1 Dialogue List for <i>Machine Space</i></b>	<b>p.137</b>
<b>Appendix 2 <i>Machine Space</i> Information Insert, Wexner Centre, 04.17</b>	<b>p.161</b>
<b>Appendix 3 <i>Machine Space</i> DVD / commentary by Dr Lucy Reynolds</b>	<b>p.162</b>
<b>Appendix 4 <i>Machine Space</i> online cartographic output</b>	<b>p.163</b>
<b>Bibliography</b>	<b>p.164</b>

I confirm that this is definitively my own work.

A handwritten signature in black ink that reads "Stephen Connolly". The script is cursive and fluid, with the first letters of both words being capitalized and prominent.

Stephen Connolly

22.09.17

## Acknowledgements

This dissertation and the film *Machine Space* would not have been realised but for the kindness of many people. Foremost in allowing this project to commence, I must thank my Director of Studies at the University of Kent, Sarah Turner, who guided me to the resources and the resolution to embark on this journey. Steve Klee, an indefatigable and patient dissertation supervisor, lent his intelligence, wit and enormous reserves of patience to the task of overseeing this text to completion.

I'd like to thank the staff of SMFA at Medway; Andre Conio, Kevin Dawes, Charlie Fleming, Shona Illingworth, Paul Fretwell, Sian Anderson, Graham Lewis, Moses Malekia and Jacky Olsen; and the School of Art at Canterbury; Maurizio Cinquegrani, Lawrence Jackson, Richard Misek, and Cecilia Sayad.

The film *Machine Space* has only been achieved thanks to the following and many more: Julia Yezbick, Marsha Music, Lauren Hood; the McLarens; Cuthbert Thomas, the Rogers of Korash, Detroit; Jennifer Lange, Michael Newell-Dimoff, Alex Thompson; Rob Todd, Lars Bjorn, the Connollys, George Clark, Adam Clitheroe, Ben Cook, Daniel Copley, Ed Lucas, Scott Northrup, Judy Price, Jeremy Rigsby, Neil Stewart, Robert Todd, Brandon Walley and Susan Wineberg. Very special thanks to David Dinnell and Julie Murray.

Last but not least, for their infinite patience and forbearance, my partner Janice and son Richard, to you both this dissertation is dedicated.

Stephen Connolly

September 2017



## List of Illustrations

<i>Machine Space</i> , 37 mins 2016, illustration, Connolly 2016	p.2
Detroit, Downtown East Side; Aerial Images, acquired 1947, 1956, 1967, 2010	p.52
Frame-grabs showing the <i>transform fault</i> , <i>Machine Space</i> (Connolly 2016)	p.58
Machine Space (automobile territory) Detroit Downtown 1974 & 2011 (Horvath 1974; Connolly 2017)	p.78
Camera/Vehicle I, visual pyramids; <i>Spatial Practice</i> <i>visual repertoire</i> (Connolly 2016)	p.82
Camera/Vehicle II, visual pyramids; <i>Spatial Practice</i> <i>visual repertoire</i> (Connolly 2016)	p.83
Camera/Vehicle III frame-grabs; <i>Spatial practice</i> <i>visual repertoire</i> (Connolly 2016)	p.84
HOLC <i>Residential Security Map</i> for Detroit; Hearne Brothers, 1937 sourced online	p.91
Detroit PeopleMover & <i>Machine Space</i> camera route superimposed over Detroit Downtown Map.	p.95
Frame-grab of opening image of <i>Machine Space</i> – fingers manipulate map of downtown Detroit (Connolly 2016)	p.96
<i>Space of Representation in Machine Space</i> - the Suburban Home (Connolly 2016)	p.115
Spatial perspective diagram of suburban house staging – <i>Machine Space</i> (Connolly 2016)	p.125

## Introduction

### The Spatial Cinema

#### Prologue – *Machine Space*

*Machine Space* is an essay film that explores the city of Detroit as a space of movement and circulation. This city is negotiated in the moving image as a palimpsest of maps, spatial metrics and automotive infrastructure; illustrating the material and discursive layers that have constructed this now *post-industrial* metropolis. This is a city where, in the words of the urban thinker Henri Lefebvre, ‘the production of space itself replaces - or, rather, is superimposed upon — the production of things in space.’ (Lefebvre 1991, p.62)

Almost half of *Machine Space*’s 38 minute screen duration is devoted to a panorama of the Detroit downtown, tracing from street-level the circular route of an elevated transit train, the *People-Mover*. As a parallel to this footage, sequences of aerial images document the unfolding spatial form of the city. In a second parallel, a suburban family play the board game *LIFE*, competing with each other to amass a fortune. This *enactment* reflects a central theme of the film, latent in the built environment of downtown, that the engines of financial accumulation are spatially pervasive and omnipotent.

*Machine Space* accompanies its visual panorama of the city with a tangential narration by two residents. Their observations and stories uncover how everyday personal mobility, and histories of community movement, are inscribed in the space of the automobile in the city. The discrimination and inequality that have shaped today’s segregated, impoverished, African American Detroit are significant subtexts. The film is a nuanced exploration of issues of the spaces of the city as they are inscribed by race and finance.

## Key thesis questions - Critical Spatial Practice

The central question posed by *Machine Space* is how space as a social construct can be addressed in moving image. How can this medium be harnessed to address the complexity of an expanded notion of the spatial, in its obscured as well as its visible dimensions? Furthermore, do issues of mediation, or access to spatiality, arise from an address of space as a particular site?

This expanded conception of the intersection of representational media and space, has practical and ideological implications. It situates space as outwith<sup>1</sup> the purview of *landscape*, understood as the depiction of the earth's surface within an aesthetic framework derived from the domain of fine art. Beyond landscape yet still salient to issues of representation, the earth's surface can be framed as a resource. Issues of access, of stewardship, of exploitation, and of land distribution thus arise. In consequence, space is a stage for contestation and conflict.

Scott and Swenson bring an anthropocene framing to space as a resource, and suggest they are ripe for address by art practices –

In what ways is land, formed over the course of geological time, also contemporary, or formed by the conditions of the present? How do environmental and economic structures correlate? Can art spur more nuanced ways of thinking about and interacting with the land? How might art contribute to the expansion of spatial and environmental justice?

(Scott and Swenson 2015, p.1)

As a mode of investigative practice framing space as a relational, socially *produced* terrain, Scott and Swenson propose the term *critical spatial practice*. (Scott and Swenson 2015, p.1) The role of visual representation in rendering space as given, and as related to power, is at the heart of *critical spatial practices*. The *critical* aspect to this practice lies in the assertion that 'the concept applies not only to "objects" of study or criticism, but to the ways one's own actions participate in the production of

---

<sup>1</sup> *outwith* - outside; beyond (Scottish)

space.’ (Paglen In Scott and Swenson 2015, p.38) In other words, *critical spatial practice* is reflexive, aware of the production of space itself as it is operative.

The framing of the investigation of *critical spatial practice* is deeply indebted to Henri Lefebvre’s theory of the *production of space*, ‘a rapprochement between physical space (nature), mental space (formal abstractions about space), and social space (the space of human interaction).’ (Merrifield 2006, p.104) As contended by Myers-Supkita, Lefebvre’s theory is an engine of a *critical spatial practice* that explores space as *production*; that is as *generative*, meaning *active, creative*; and as a process, and thus in movement. (Myers-Supkita In Scott and Swenson 2015) The *production of space* in turn sets the conditions for social life; constituting in Paglen’s words ‘a feedback loop between human activity and our material surroundings.’ (Paglen In Scott and Swenson 2015, p.36) Yet artworks are also an intervention, made by the agency of artists in one way or another. Taking a cue from Walter Benjamin’s stipulation for artworks as addressing their socio-economic context in *Author as Producer*, Paglen contends artworks as *critical spatial practice* are imbricated with the activity and material they speak of. Within the terms suggested by Benjamin, these artworks ‘take a position’ rather than ‘assume an attitude’ towards an ‘subject’ of the work. (Paglen In Scott and Swenson 2015; Benjamin 2003)

This *practice as research* project aims to contribute to a conversation around *critical spatial practice* and moving image by an address of content and cinematic form. To do this, the project stages an encounter between the theoretical work of Lefebvre regarding the *production of space* and the moving image, in which the formal properties of the cinema are also manifest. It is a tactical and impressionistic use of Lefebvre in the service of an artistic practice. It is made manifest in the film *Machine Space* in its exploration of the negotiation of space in city of Detroit. The global claim of the dissertation is Lefebvre can offer an account of the perceptive, cognitive and emotive compact between site, film, and audience. This is a realisation of *critical spatial practice* in the medium of film.

As an artist, my ambition for *Machine Space* as an artwork is to explore how space can be the basis for poetic allegories of the political in cinema. In the realm of the

*artists'* and the *experimental* cinema, key concepts include space, temporality, materiality, embodiment and performance. Spatial representation, as a visual production of time and movement, is apparent across these many contributions to the conversations artist filmmakers undertake with their medium.

Having said this, an exploration of space in the artists cinema is not to dream of unifying agendas; traces of which can be found in some of the literature concerned with spatiality and politics. (Harvey 1989; Soja 1989) Duetsche provides a critique of some of the assumptions this this material invokes. (Deutsche 1996) Rather it is my belief the cinema, as a collective site of audience reception, is the place for the discussion of urgent questions of space as a realm of social agency and power in the contemporary urban scene.

### **Chronology of creative process of the research project**

This research was sparked off from visits to Detroit as a sidebar to my professional activity as a filmmaker; my work screened at the nearby Ann Arbor film festival almost annually from 2006 to 2015. Informal yet informative tours of Detroit, led by local academics and artists are a feature of the festival; these experiences stoked my interest in the city.

Production of the *Machine Space* began around the start of the doctorate in 2013, focusing initially on the street panorama of the city described above. This approach was a derived from a previous film *Zabriskie Point (Redacted)* (Connolly 2013), a work that revisited some of the locations in Los Angeles of the famous Antonioni feature film of the same name. (Antonioni, 1971) The new film develops this approach by investigating the history of the mapping of the city, revealing it as a palimpsest of multiple cartographic layers and using this to inform the cinematography. A map used as a guide to financial lending, the HOLC *Residential Risk Map*, was found to intersect with the equalities issues besetting the city, thus energising the filmmaking in the direction of a critical response to the spaces rather than the landscape of the city.

This conjoining of cartography and motion emerged as an animating tension in the creative visualisation of the film. The movement and fluidity of the camera and the stasis and appeal to certainty of the map are mutually exclusive approaches to spatial representation. With this creative tension in mind, reading the major western theorists of the conjunction of space and politics diverged in their approaches yet almost all referenced Henri Lefebvre as foundational to contemporary urban studies.

In particular, Lefebvre is a source for the work undertaken by Harvey and colleagues as Marxist geographers since the 1970s. At the same time, Lefebvre's texts are difficult to parse; hence secondary literature was consulted to clarify issues. This interpretative work began towards the end of the second year of the doctorate, hence quite late in the research period. More information on the decision to concentrate on a singular theorist in the research will be given below.

The interviews with Detroiters that lend a narrative spine to the film were conducted late in the research period. By this time, the approach to the film had been refined; allowing these conversations to be highly focused and salient to the thematics developed in the moving image. They add to the poetics of the film, as well as contributing to the theoretical work on the everyday experience of space. The editing of the film, the research material and the doctoral text were consolidated at the final stages of this practice as research doctorate.

### **Lefebvre's Production of Space**

The French intellectual Henri Lefebvre (1901 – 91) was prodigious theorist of space and everyday life and engaged with many significant political movements in his long lifetime. His work was eclectic, unbound by academic specialisation, and often ahead of its time. (Merrifield 2006) In the words of his former assistant Manuel Castells, Lefebvre 'doesn't know anything about how the economy works, how technology works ... but he had a genius for intuiting what really was happening. Almost like an artist ...' (cited in Merrifield 2006, p.xxii) A significant thread running through his work is an interest in the impact of modernity on everyday life; observations collected in his monumental *Critique of Everyday Life*. (Lefebvre 2014 (1947 - 1984))

In mapping the impact of modernity on the everyday and the material environment, Lefebvre's aim was a "revalorization of subjectivity" and the quest for spaces that allow for autonomy and creativity.' (Ronneberger quoting Lefebvre, In Goonewardena *et al.* 2008, p.135)

Henri Lefebvre's theory of space is presented in his text *The Production of Space*, written in 1974 and translated into English in 1991. (Lefebvre 1991) At its heart, space is conceived as *produced* by social practice; the activity of people. Space is profoundly social in origin, rather than an ontologically distinct and sufficient object or attribute familiar to the physical sciences. This account of social origins allows Lefebvre to suggest a theoretical unity of three fields of space, 'usually apprehended separately: the physical (nature); the mental (logical and formal abstraction); and the social.' (Dear 2001, p.48) His conception of space is based in *production*; or the generative processes of the social construction of space.

Lefebvre's notion of *production* is as an attribute of social being in the world. 'There is nothing in history or society, which does not have to be achieved and produced.' (Lefebvre 1991, p.68) In this global sense, *production* begets relations of time and space; as activity these relations are in continual flux and movement. As a *process* therefore, space is not inscribed as ontology, or as an essentialist attribute. Instead, in Lefebvre's conception, space is a fundamental *production* of social practice, and the medium of the social relations of the community. As *production*, space has a wide engagement with social activity, beyond the transactional exchange of labour and material goods arising from *production* centred on the *commodity*. (Schmid In Goonewardena *et al.* 2008) Social relations as culture; or the expressive productions of subjectivity, are explicitly included in this framing of *production* of space.

Lefebvre contends the social relations implicated in the *production of space* have implications for *representation* - the means by which space can be known and shared in the social world. As *representation*, space is manifest as three *moments* or dimensions. Space is produced as (1) *spatial practice*, as the embodied habitual

experience of space; (2) the *representation of space*, as artefacts that ‘stand in’ for measured and quantified spaces; and (3) *spaces of representation*, as artefacts that ‘stand in’ for lived spaces. The three *moments* of space have mirror definitions as mental processes of (1) *perceived space*; (2) *conceived space*; and (3) *lived or endured spaces*. (Lefebvre 1991, p.38)<sup>2</sup>

In this project, the three *moments of space* are invoked in the image track of *Machine Space*. To reprise the description of the film opening this chapter, the *moment of spatial practice* is registered in the vehicular panorama of Detroit’s downtown. The *representation of space* is registered in the aerial images of the city’s downtown; their omniscient viewpoint an attribute of the management of the spatial by authority. The suburban family game, pictured at the game board, *enacts* the lived *space of representation* as a site of play and enjoyment.

Together, these three *moments* of space comprise Lefebvre’s *spatial triad* outlined in the *Production of Space* and they explore the *perceived, conceived and lived spaces* of Detroit, the site. In Lefebvre’s theory, each *moment* of space contributes to the *production of space*. (Lefebvre 1991) As Lefebvre describes –

... the lived, conceived and perceived realms should be interconnected, so that ... the individual member of a given social group, may move from one to another without confusion. Whether they constitute a coherent whole is another matter. They probably do so only in favourable circumstances, when a common language, a consensus and a code can be established.

(Lefebvre 1991, p.40)

A ‘common ... code’ in *Machine Space* is a thematic of movement and circulation. This is germane to Detroit, a city built on its contribution to human mobility in the car. In the film, mobility is omnipresent in the visual journeys through the thoroughfares of the downtown; the discussions of the social practice of movement

---

<sup>2</sup> Lefebvre’s *spatial practice* is an element of his spatial analysis – it is to be distinguished from *critical spatial practice* as a mode of artwork making discussed above, sourced in Paglen and codified further in Scott & Swenson. (Paglen In Thompson *et al.* 2008; Scott and Swenson 2015)



in voiceover; and more abstractly, the highway is invoked as a metaphor for the unfolding of biography in the game of LIFE played by the suburban family.

The term *visual repertoire* will apply to the distinct groups of visual images in *Machine Space* predicated on the *moments* of space. *Repertoires* as groups of moving images share similarities of semiotic meaning, narrative inscription, and/or depictive address of site, object or persons. A precursor for this taxonomy can be found in David Bordwell's exposition of the *spatialised narration* he locates in the work of JL Godard. (Bordwell 1985) Bordwell's term is a 'paradigmatic set' of related images and sounds. (Bordwell 1985, p.317) His *spatialised* description of different visual approaches to a scene, object or theme in Godard's work, has analogies to the *repertoire* as a set of depictive options within spatial parameters. In the context of this dissertation, *visual repertoire* is preferred to Bordwell's 'paradigmatic set'.<sup>3</sup>

Consequently, as a heterogeneous ensemble of *visual repertoires*, *Machine Space* can be described as a filmic *assemblage*. Collectively, in a conscious parallel with Lefebvre's suggestion that the three spatial *moments* together generate knowledge of space, the film as *assemblage* achieves effects and *affects* beyond the powers of its parts in isolation. Thus the film *Machine Space* is a generative work of cross-referencing and proximity; as an *assemblage*, its *visual repertoires* resonate in concert. (DeLanda 2011) In combination the *repertoires* contribute to the *assemblage*; if separated into the constituent parts, the film is incomplete.<sup>4</sup>

This dissertation will discuss in three distinct chapters the *translation* of the Lefebvrian spatial *moments* into moving image *repertoires*. *Translation* is here used as a near analogue of the practice of *transcoding* suggested by theorist Frederic Jameson. A comparative procedure for assessing the contribution of theories in relation to each other when attempting an analysis, Jameson offered *transcoding* as testing the 'limits of theories and comparing their conceptual possibilities.' (Jameson,

---

<sup>3</sup> Two further considerations are the poesis of the word *repertoire* as opposed to the technical term *paradigmatic set*; and a necessity for some distance from the ascription of Bordwell's term to the work of one filmmaker.

<sup>4</sup> This is a restricted, technical use of the term *assemblage*, this dissertation is not concerned with *assemblage theory* as elaborated by post-Deleuzian theorists. (eg. DeLanda 2011)

quoted In Dear 2001, p.52) In this context, *translation* will look for theoretical overlaps and cross-references between the *production of space* and cinema.

The tripartite *moment/repertoire* structure is a vehicle for segmenting a trajectory across this terrain in sympathy with Lefebvre. A caveat is devoting separate chapters to *spatial moments/visual repertoires*; the effects of proximity and cross-reference, generated across the work as an *assemblage*, will need to be confirmed by watching the film. Beyond the caveat of the linear presentation of ideas in the thesis form, the film is, finally, the proof of concept of the intellectual journey of the dissertation.

### **Lefebvre as a singular animating theorist in the research project?**

The work of Henri Lefebvre, as the central theoretical engine or armature in this practice as research doctorate, can be viewed as a surprising choice given the known obstacles to clarity and concision of some of his texts, and their age. It is beholden to the researcher here to explain briefly the choice of of single theorist and the limitations of other thinkers in the context of this project.

A key orientation of this project is to explore how film can be responsive to notions of *space* in its widest sense. A concern with the *temporal* has dominated thinking about cinema and its relation to space. With a different emphasis, this project is an encounter between the worlds of film and (loosely) the field of urban studies, derived from the specificities of the choice of object of study - Detroit. This theoretical approach thus needed to be foreground *space* and be responsive to issues of representation. In this case, the term - *representation* - has a productive dual meaning in the domains of art on the one hand; and politics or governance on the other. In a parallel to this, the theoretical framework adopted needed to articulate the political in concerns germane to an artwork as well as a subject which is 'political.'

The approach to space articulated by Lefebvre allows for these inferences and is flexible and expansive. To many contemporary urban scholars, Lefebvre's work remains productive and informative. A new generation of interpreters, notably collected in the large essay collection *Implosions/Explosions*, continues to adapt

Lefebvrian thought to an exploration of the conditions of urban life globally. (Brenner 2014) According to Merrifield's contribution, Lefebvre's *moment* also 'signifies a *presence* ... a fullness, a connection of like minded people.' (Merrifield in Brenner 2014 pp531) This conception of community and existential proximity can be related to cinematic practice as applied to the constituents of an urban space; and in the auditorium at in the reception of a film. Other theorists do not offer this expansive openness to representation as a means of understanding space, and as a performative object-as-artwork in circulation with other artworks and audiences.

As mentioned above, David Harvey is a major figure in the political economy of spatiality. His considerable and consistent body of work has drawn on classical Marxist thought to explain and predict the intersection between capital and space. However, as critiqued by Deutsche, despite the title of his 1989 work *The Condition of Postmodernity: An Enquiry into the Origins of Cultural Change*, Harvey demonstrates little understanding of culture as an expressive and performative production of human activity and a necessary condition of urban life. (Deutsche 1996, Harvey 1989) In general Harvey's writing displays a lack of self reflexivity; it has no appreciation of its status as discourse that is simultaneously contributive to the claims it makes. (Deutsche 1996) This is a necessary feature of a *Critical Spatial Practice* as outlined above, and a requirement of this project.

The work of Doreen Massey, and in particular her *For Space*, will be cited and remembered as a salutary call for *space* and *place* to be given equal consideration to *time* in the study of politics and culture. (Massey 2005) Massey's insistence on the importance of space as a medium and host for multiple narratives could be a leitmotif for this project. However, Massey's work does not offer tools to able to explore the specificities of film representation as generative and performative. Hence her work is a source of inspiration rather than a theoretical contributor to this project.

Saskia Sassen is a renowned contemporary theorist of the global city; interrogating the city as a fluid entity matrix of immaterial flows and exchanges. Her lens is global and looks to cities as a nodes in global movements of capital and labour. (Robinson 2009) Sassen's scale of interest is perhaps appropriate to an analysis of the global re-

structuring of the auto industry based in Detroit, a subject on the margins of this project. In the stead of these thematic, this research is intentionally small in spatial remit or scale, and invested in modes of situated, adaptive, and responsive representation as media rather than a description of urban forms.

These qualities as ascribed to representation were valorised by urban theorist De Certeau, a doctoral student of Lefebvre in the 1970s, and principally known for his later *The Practice of Everyday Life*. (de Certeau 1984) In this text, de Certeau makes the useful distinction between 'strategic' and 'tactical' modes of representation. (cited in Deutsche 1996) 'Strategic representation' is a mode analogous to Lefebvre's *representation of space*; 'tactical' modes closer to *spaces of representation*. (Deutsche 1996)

These modes are germane to this project, yet in their binary structure they imply a monolithic approach to an asymmetry of power relations. Lefebvre's mode of processual thought is more flexible in this domain; and allows for notions of complicity in the reception of representation. de Certeau's focus on the provenance of representation has little to offer a project that seeks to acknowledge the space of media reception as a *Critical Spatial Practice*. Finally, the strategic/tactical binary is difficult to map onto the tripartite visual treatment of space in *Machine Space* as described above. Given these limitations, de Certeau's contribution to urban studies has been passed over for this project.

### **Disciplinary Context – space as landscape and the cinema**

The relationship between space and the cinema is been explored in numerous collections of academic essays. (Aitken and Zonn 1994; Clarke 1997; Vidler 1999; Cresswell and Dixon 2002) Writing as geographers, Aitken and Zonn suggest film can facilitate a practice central to their discipline - looking. 'The very heart of geography – the search for our sense of place and self in the world – is constituted by the practice of looking and is, in effect, a study of images.' (Aitken and Zonn 1994, p.7) For Hopkins, the 'depiction of *landscape*' is a 'logical point of entry into the geography of film.' (Hopkins In Aitken and Zonn 1994, p.49) As representation, or social practice of depiction, a *landscape* is 'a site of sight, a cultural image that

represents and structures our surroundings.’ (Hopkins In Aitken and Zonn 1994, p.49) Hopkins further claims *landscape* is not a neutral visualisation of place; rather it is a ‘charged cultural creation whereby meanings of place and society are made, legitimised, contested, and obscured.’ (Hopkins In Aitken and Zonn 1994, p.7)

Hopkins argues that semiotics – the study of signs and communication – ‘provides a means of mapping the cinematic *landscape* and thus intervening in the fabrication of the cinematic place.’ (Hopkins In Aitken and Zonn 1994, p.50) The semiotic understanding of *landscape* to which this kind of cinematic representation belongs is ‘a theoretical terrain triangulated by semiotics, psychoanalysis, and historical materialism.’ (Clarke 1997, p.7) However, in the last twenty years, the boundaries of this theoretical triangulation have been breached; more recent film theory stresses embodiment and the material in cinema. These interests are not strictly new; according to Thomas Elsaesser, theories of film have always addressed the ‘relationship between cinema, perception and the human body.’ (Elsaesser and Hagener 2015, p.4) The recasting used here of cinema as a spatial concern, invokes a phenomenological framework, positing analogies between the moving image, the human senses and the material nature of corporeality. (Sobchack 1992; Shaviro 1993; Marks 2000)

The remit of embodied and material concerns is not restricted to visual and auditory content. The site of reception of the moving image, the cinema auditorium, also plays a role in ‘the management of [the] ‘unnatural contact between the spectators space and the space of the image,’ a function ascribed to a cinema as depictive of space by Jacques Aumont, encyclopaedic theorist of *The Image*. (Aumont 1997, p.99) As Aumont reminds us, an image constructs a spectator as ‘an active partner ... both emotionally and cognitively.’ (Aumont 1997, p.56) This construction, of a *production of pictorial space* within the image and a *production of experiential space* at the point of reception by the spectator; can be aligned and informed by Lefebvre’s theory of the *production of space*.

Lefebvre’s *The Production of Space* has informed Marxist geographers, urban and spatial thinkers, and critics of capitalist political economy, foremost among them

David Harvey and Edward Soja. (Harvey 1989; Soja 1989) Michael Dear in *The Postmodern Urban Condition* (2001) re-evaluates Harvey and Soja's work as fundamentally modernist projects, offering little room for perspectives outside classical, unified Marxist political economy. To Dear, Soja's work can be read as 'embracing a fairly conventional historical materialism that privileges the economic over the socio-cultural spheres.' (Dear 2001, p.77) Harvey strongly polices the boundaries of Marxism and 'warns that any further analysis of politics, difference, and social theory must be contained within the "more fundamental" categories of historical materialist inquiry before it can be sanctioned.' (Dear 2001, p.81) These accounts are also strongly deductive in argumentative form. Following Dear, and for this project wary of the impact deductive thought can have in creative endeavour, this generation of spatial thinkers will only be referenced sparingly here.

More recent re-readings of Lefebvre's spatial theory can be found in the critical introductions to his life and work by Elden (2004) and Merrifield (2006); the essays in Goonewardena *et al.* (2008) and work and essays collected by Stanek (2011, 2014). (Elden 2004; Merrifield 2006; Goonewardena *et al.* 2008; Stanek 2011; Stanek, Moravánszky and Schmid 2014) Stanek claims a contemporary generation of interpretative work on Lefebvre represented has not only -

... bridged the gap between "political – economic" and "cultural" readings; but understood Lefebvre's consistent integration of political economy, state theory, language theory, architecture, everyday life and lived experience in an encompassing materialist and dialectical framework as the decisive advantage of his theory.

(Stanek In Stanek, Moravánszky and Schmid 2014, p.5)

In practice, this means that the relationships between the spatial and political economy, so emphatic in the interpretation in the work of David Harvey, is displaced in favour of foregrounding the spatial as socially and culturally negotiated, allowing for contingency and human agency. Merrifield locates Lefebvre's theory of the production of space in an insistence in the fine-grained analysis of everyday life. The animation and practice of Lefebvre's project is 'by delving into the atomic structure of life as it is really lived, you can understand the whole structure of the human

universe.’ (Merrifield 2006, p.5) An approach to Lefebvre and space acknowledging this scale of investigation informs this project.

### **The Project Site – Detroit as a *Production of Space* materialised**

The encounter of Lefebvre and the cinema, as a *practice as research* project, requires a site as a proving ground. As mentioned above, the city of Detroit in the state of Michigan, North East US was adopted as the site. Lefebvre suggested in 1974 that the ‘the production of space itself replaces ... the production of things in space,’ anticipating a defining and general spatial feature of globalisation, according to the social scientist Ash Amin. (Lefebvre 1991, p.62; Amin 1995) In particular, Lefebvre’s provocation astutely describes the transformation in the industrial *landscape* of Detroit over the past seventy years. From a post war zenith as the global centre of automotive engineering; the city today has been described as a ‘poster child of ruination in advanced capitalist countries today.’ (Apel 2015, p.4)

The industrial and economic decline and its effects on the socio-metrics of the people of the city have been documented by the historian Thomas Sugrue in *The Origins of the Urban Crisis: Race and Inequality in Postwar Detroit* (Sugrue 1996). The ruined material environment has been re-envisioned in works of architectural research; (Daskalakis, Waldheim and Young 2001); its *ruins* documented as *landscape* photography (Marchand and Meffre 2010; Moore and Levine 2010); and investigated in film. (Channon and Steinmetz 2005) Narratives of residents and public sector workers facing the widespread afflictions in the city have been the subject of reportage (LeDuff 2014) and countless articles and videos in broadcast and social media. (for a summary, cf. Apel 2015)

Detroit’s decline is also manifest in immense social and residential changes. The South East corner of Michigan has been transformed from the relatively dense city settlement of 2 million, covering 136 square miles in 1950; to the Detroit Metro Region, an urban and suburban expanse of 1337.1 square miles and home to over 5 million in 2010. (US Census 2010) Detroit remains at the centre of the region, yet in

2010 it was home to 723,000, just 36% of the population sixty years before. (Sugrue 1996; US Census 2010) Today Detroit is an 83% majority black city; by comparison the State of Michigan has an overall African American population of 13%.<sup>5</sup> The average income within the city limits is half that of the Detroit Metro Region. (US Census 2010) Detroit is relatively African American and impoverished.

The social-economic system in the US is structured to produce results like these. As summarised by Sugrue -

Detroit's postwar urban crisis emerged as the consequence of two of the most important, interrelated, and unresolved problems in American history: that capitalism generates economic inequality and that African Americans have disproportionately borne the impact of that inequality.

(Sugrue 1996, p.5)

This strong claim may be true for all of the US, Surge's work explores the genesis of the particular forms of inequality found in Detroit. Sugrue observes, in this city, 'blackness and whiteness assumed a spatial definition.' (Sugrue 1996, p.9) As a product of a historical narrative, this 'spatial definition' has come about by the flight of white residents, from the city of Detroit to new suburban townships outside the city limits during the post-war period between 1950-80. This white residential movement left behind low income African American Detroiters. Suburban neighbourhoods repulsed African American able to move by restrictive covenants.<sup>6</sup> (Sugrue 1996) Emptied of more wealthy white residents, Detroit became an overwhelmingly African American city in population, facing deteriorating social economic conditions. For at the same time and for many reasons, car manufacturing plants were moved to to the suburbs in the Detroit Metro Region, and later to other cities in the US, and overseas. (Sugrue 1996; Daskalakis, Waldheim and Young 2001)<sup>7</sup>

---

<sup>5</sup> <http://www.psc.isr.umich.edu/dis/census/segregation2010.html>

<sup>6</sup> Covenants in this sense were restrictive clauses written into property deeds that prevented sale to African Americans.

<sup>7</sup> The evolving geography of the globalization of the auto-Industry appears to be under-investigated by academia; a literature search on this important subject drew a blank. (2016)



Discrimination in housing finance came to play a role in the spatial segregation of white and African American communities. (Massey and Denton 1993; Sugrue 1996) Federal mortgage insurance, a measure introduced in the 1930s depression to stabilise the housing market, was rationed along racial and spatial co-ordinates. Inner areas of the city of Detroit, home to African Americans in Detroit, were denied Federal mortgage protection. This rationing of home finance support was documented by maps, applying shading to areas by qualifying and not for mortgage insurance. The shading of red neighbourhoods on *Residential Risk Maps*, indicating insurance refusal, was widely, and derogatorily, called *red-lining*. (Sugrue 1996) (cf. page 50 for the Detroit map)

For many years, African-Americans were shut out of owning their own homes, denying this community the benefits of wealth accumulation through housing. (Shapiro 2004) Although *redlining* was outlawed in 1977, it had produced the relative, intergenerational impoverishment of the African American community across US cities. (Shapiro 2004)<sup>8</sup> The resulting segregation between black and white communities, evident between Detroit and the surrounding suburban region, has been compared to that extant under the Apartheid regime in South Africa. (Massey and Denton 1993)

These conditions place formidable challenges to the filmmaker. How can the city be visualised in the context of such socio-economic disparity without mirroring these imbalances in the realm of representation? How can *symbolic violence*, Bourdieu's term for the imposition of meaning, in the context of differentials of power while at the same time concealing their nature, be circumvented? (Bourdieu and Passeron 1990, p.4) These questions inform the representational strategies adopted by *Machine Space* in its cinematic *production of space* of the city of Detroit. They will be addressed in the conclusion to the dissertation.

## Structure of the Dissertation

---

<sup>8</sup> The *Community Reinvestment Act 1977* - [https://en.wikipedia.org/wiki/Community\\_Reinvestment\\_Act](https://en.wikipedia.org/wiki/Community_Reinvestment_Act)

The dissertation is split into three chapters, each devoted to a Lefebvrian *moment of space* and its *translation* into a *repertoire* of moving images in *Machine Space*. Film works by James Benning and Chantal Akerman, artists' filmmakers, significant formal innovators in the exploration of space in the medium, and precursors of the subject of this research, are discussed in the first two chapters respectively. Chapter three turns to the context of Detroit and considers the image of the *ruin*. As a pervasive trope in the visualisation of this city, the image of the *ruin* is synonymous with the general socio-economic issues pertaining to the general 'Rust-Belt' of the US Great Lakes region.

This selection of visual contexts for artists' film - mainstream media and the art-world - allows for comparisons to be drawn between their visualisations of space and the current project. The distinctiveness of a tactical and impressionistic use of Lefebvre to inform a film, advocated here, will be made apparent. Given the thematic organisation of the *visual repertoires of Machine Space*, the contextual information about Detroit itself will be distributed across the three chapters of the dissertation.

Chapter One, *The Dominant Space*, is devoted to the *representation of space*. It opens with an exploration of Lefebvre's theory of the *production of space* in general. (Lefebvre 1991) *Space* is both *concrete* and *abstract*, and 'appears to be a general means, medium, and milieu of all social practices, and yet it allows accounting for their specificity within the society as a whole.' (Stanek 2011) As *production* and a social practice, space is manifest and shared in *representation*.

The *representation of space* itself is the 'dominant space in any society.' (Lefebvre 1991, p.39) This spatial *moment* is realised in the visualisation practices of the spatial disciplines; economic planning, urban planning, and architecture. Practices of the *representation of space* quantify it; render it divisible and fragmentable; frame it as a resource that can be exchanged. Space in this formulation, is a commodity, and subject to the exchange relations of capital. (Lefebvre 1991)

A suite of *landscape* films, *The California Trilogy* (1999 – 2001) by James Benning, is discussed as manifesting this ‘dominant space’ in the artists cinema. (Benning 2012) To substantiate the claim of this body of work to visualise the ‘spatiality of capital,’ the work of film academic David E James is referenced. (James 2005) As James implies, to make this claim requires capital to be framed as the production of material commodities. Space is yoked to this framing of capital; rather than as Lefebvre would contend, produced as integral to capitalism.

Providing a briefly a contrast to Benning’s approach, the academic Eyal Weizman and photographer Fazal Sheikh develop an analysis of the *production of space* in the Sinai Desert using multiple sources of images and verbal testimony. As the visual means deployed are still images; the site of reception is quite different, yet Weizmann and Sheikh are instructive for their close reading of content. This close attention, with Bennings’ work, is built on and developed by this project. By using a number of similar techniques, *Machine Space* addresses the multiplicity of the social relations of space using the triad of *moments* of Lefebvre’s *production of space*.

The *dominant space*, as *visual repertoire*, is registered in *Machine Space* by aerial photographs of Detroit. In the cinematic presentation, they visualise change and the mutability of the urban terrain of the city. However, as ‘omniscient, intellectually detached’ images, the scope of their depictive attributes is limited. (Cosgrove 2001, p.2) In *Machine Space*, these limitations are exposed by a voiceover narration added to the film. As spoken by Marsha Music, the narration tells of the impact on the African American community by the construction of urban infrastructure in Detroit. As *critical spatial practice*, the *assemblage* of *visual repertoire* and narration thus created is an example of a situated or positional knowledge of a space.

Chapter Two, *Cinema as a Spatial Practice*, explores the translation of the eponymous Lefebvrian *moment* to the cinema. Defined as the perceptual *apprehension* of space, Lefebvre claims *spatial practice* is the ‘secretion’ of the *spatial texture* of a space to those experiencing it. (Lefebvre 1991, p.173) The question of what *spatial practice* could mean in a Detroit context is directed towards spatial experience as part of automotive mobility. Mobility in Detroit in literary

fiction, social science and the phenomenology of the tool are explored. Multiple sources are mobilised to support a claim for *auto-mobility* as a dominant *spatial practice* in the city.

An analogue of the *apprehension* of space as *spatial practice* can be found in the phenomenological approach to film as proposed by Vivian Sobchack. To Sobchack, the cinema is an 'expression of experience by experience.' (Sobchack 1992, p.11) The camera is analogous to the human eye, and engaged in the activity of perception. The resulting depictions can be considered as *haptic* and *mimetic*.

A material relation between object and image can be described as *haptic*; that is, received by the skin as a sensory organ, and an event of *touch*. (Marks 2000) In a film context, the *haptic* invokes the body as the site of reception, typically in the cinema auditorium. This site of *spatial (re)-production* is suggestive in the *critical spatial practice* context of this research project.

The *haptic* is experienced as *affect*; a sensation related to *emotion*, yet more particularly defined as *intensity* by the Deleuzian scholar Massumi. (Massumi 1995) In his conception, *affect* has no singular 'event' or embodied situation, rather it is a more generalised and collective, emotive response to a stimulus. Massumi suggests *affect* as intensity by-passes mental cognition, as he avers 'intensity is embodied in purely autonomic reactions most directly manifested in the skin – at the surface of the body, at its interface with things.' (Massumi 1995, p.87) Massumi's notion of *affect* offers no content; it is instead a 'resonance' with a source. (Leys 2011, p.434)

In a more expansive definition offered by Sullivan, '*affects* are moments of *intensity*, a reaction in/on the body at the level of matter.' (Sullivan 2001, p.126) They can be responses to particular stimuli in artworks. As an embodied responses, they have concrete materiality, yet *affect* as human *emotion* is also immaterial and '*immanent to matter*.' (Sullivan 2001, p.126 italics in original) Within the context of the reception of cinema, *affect* denotes the embodied response in the body in the cinema auditorium to the presentation of *haptic* phenomena on screen and in sound.

The cinema theorist Laura Marks claims *mimesis*, 'from the Greek *mimēsthai*, "to imitate," suggests that one represents a thing by acting like it.' (Marks 2000, p.138) Marks suggests representation as *mimesis* is an opposite form to symbolic representation, whereby a 'symbolic' sign or object/thing 'stands in for' something else. Instead she avers, '*mimesis* is thus a form of representation based on a particular, material contact at a particular moment or 'representation by imitation or acting'.' (Marks 2000, p.138) In an alternative invocation of *mimesis*, the writer David Clarke points out in his introduction to *Cinematic City* that the camera has properties of the 'simulacral as well as representational'; that is, the camera visualises its engagement with the world through its production of images. (Clarke 1997, p.7) It is in the visualisation of space, as relational to the camera, that this engagement is apparent.

*D'Est*, a work by Chantal Akerman, is discussed as a materialisation of a *mimetic* and *haptic* approach to moving image. (Akerman 1995) Akerman's roving camera visualises the streetscapes of East European cities as spaces of circulation and movement. The *haptic* and *mimetic* potential of the cinema is realised in an engagement with urban spatiality. (Marks 2000) Since the journey-as-movement of the camera contributes to the content or form of the image, the representation is termed *mimetic*.

The *visual repertoire of spatial practice* in *Machine Space* has affinities to Akerman's film. At the same time, *Machine Space* builds the address of *mimetic* representation as mobility in *D'Est*; in the new film, the image is linked to social practices of circulation in Detroit. A transport infrastructure particular to the city provides a template for movement; by the same action, the camera traces a boundary in the *cartographic palimpsest* of the Detroit downtown. This *visual repertoire* is informed by the spatial arrangement of the city and the vehicle; the import of this configuration is deeply embedded in the *production* of racial segregation in the city. This is an index of the observation that, 'blackness and whiteness assumed a spatial definition' in Detroit. (Sugrue 1996, p.9)

The third and final chapter, *the Situated Poetics of Everyday Space*, looks at the *moment of lived space*, or the *space of representation*. The context of symbolic depictions of Detroit as a *ruin* is explored; in mainstream media and the art-world. However, given the symbolic overheads attached to the *ruin*, the site chosen for this visual *repertoire* is a suburban house. A staging of a 'family group' playing a board game animates this space. The game as an *enactment* of an allegory of *spatial production* is discussed.

The notion of *enacting* is specifically applied to the game play in *Machine Space*. As *enactment*, this term specifies the embodied facticity of human activity recorded by the camera. The participants in *Machine Space* are not *acting* or performing within the remit of the theatre or narrative fiction; they were asked to play a board game and were recorded by the camera doing so. As Walter Benjamin suggests, in film, 'the actor represents himself to the public before the camera, rather than representing someone else.' (Benjamin 1999, p.229) The second option, staged by actors in a theatrical context, is more familiar in a moving image context; here *enactment* will denote Benjamin's first case as presentation of self to camera.

The notion of a 'self' as *enacted* has been explored in the work of Irving Goffman. (Goffman 1959) His work posits a bifurcated social subject, continually presenting a 'self' in concordance with the expectations of the social world, while retaining a relatively private 'self' away from social interaction. (Goffman 1959; Grennan In Thomas and Round 2014, pp.79–93) <sup>9</sup> Congruent with Goffman's framework of a socially constructed world, in a film context, the gaze of the camera is the social nexus that the self is *enacted* in and for. The 'private self' is not at issue here. Rather, the generative activity of the *enactment* contributes to the *spatial moment* in *Machine Space* as lived and encompassing play.

Conventionally, Detroit is imagined as a city of *ruins*. The art historian Dora Apel surveys the pervasive depiction of the *ruination* of Detroit, and suggests the salience of this imagery is as materialisation of social anxiety. (Apel 2015) Martha Rosler,

---

<sup>9</sup> As Grennan reminds us, Goffman's public and private bifurcated selves are not to be confused with psycho-analytic concepts of the *id* and *ego* for example. (Grennan In Thomas and Round 2014, p.85)

exploring similar work in the social context of the art-world, concludes these images seek affiliation with the social formation of the city in the post-war era, a time of *Fordism* and inferred working class prosperity. (Rosler 2010) The sociologist Steinmetz reminds us this era was one of exclusively white prosperity. He suggests in today's context, images of *ruins* are framed as touchstones for the structural racism that afflicts the city on the one hand, or as presenting evidence of the material consequences of a majority African American population in the city on the other. (Steinmetz In Hell and Schonle 2010)

*Machine Space* frames the inhabited house as *space of representation*. As explored in the ethnographic work of Julia Yezbick, the house in Detroit is contested, a site of 'art, creative industries, real estate, philanthropy and urban revitalization.' (Yezbick 2016) The uneasy juxtaposition between these discourses and the normativity of the family home is collected in a 'family group' *enacting* the game of LIFE in *Machine Space*. The aim of this game 'the wise player will strive "to gain on his journey that which shall make him the most prosperous, and to shun that which will retard him in his progress,' is a statement of financial accumulation underpinning the relations of the *production of space* manifest in the film. (Lepore 2007, p.1) The game is an *allegory* of these processes, played out in the space of home. As a projected image in the cinema, the staging of the game in the suburban house can be considered as a reflexive, mirror image of the audience in the auditorium, convened to watch the film; convened to play a parlour game.

The notion of *allegory* establishes a link between *enactment* and *mimesis*. *Allegory* is a special case of the figurative treatment of one subject in the guise of another, a central signifying practice used by artworks. The modern use of allegory is indebted to the work of Walter Benjamin. According to Cowan, Benjamin distinguishes *allegory* from the symbol by framing it as 'pre-eminently a kind of experience,' in relation to signification. (Cowan 1981, p.110) This invocation of experience as key to *allegory* situates representation as a process, and suggests the figurative treatment is generative and continuously developing. In the context of *Machine Space*, the board game LIFE is presented as an *allegory* for the remote and effortless nature of financial accumulation as *production of space* in *suburbia*.

As a conclusion to this outline of the thesis, the caveat regarding its organisation should be re-stated. The arrangement of the *visual repertoires* into discrete chapters is a narrative fix; a gesture towards a coherence and readability required of a thesis. The division of the *visual repertoires* into isolated silos does not reflect the cumulative and proximity effects generated by the manifestation in *Machine Space*. The film is layered in composition so the *visual repertoires* and their sounds bleed and feed into each other through its temporal unfolding. In this way the film accords with Lefebvre's suggestion, endorsed by *critical spatial practice*, that only through the registration of all three spatial *moments*, an understanding of space as social and relational is achieved.



## Chapter 1

### *The Dominant Space*

The city was here before the freeway system, no doubt, but it now looks as though the metropolis has actually been built around the arterial network. It is the same with American reality. It was there before the screen was invented, but everything about the way it is today suggests it was invented with a screen in mind, that it is the refraction of a giant screen.

(Baudrillard 1989, p.55)

### Introduction

This chapter begins by exploring Henri Lefebvre's theory of the *production of space* as it relates to representation, sufficient for an engagement with the medium of film given the overall aim of this research project. The breakdown of the *production of space* into three spatial *moments* has been identified above; this chapter focuses on the *representation of space* as the 'dominant space' in contemporary, western society. (Lefebvre 1991, pp.38–9)

Lefebvre considered *representations of space* as documents of the *spatial disciplines*, or discursive formations that construct space for dominance and control. A *practice* assisting the visualisation of space in this *moment* is perspective; a 'geometric transformation which projects a three-dimensional space on to a two dimensional one (a flat surface).' (Lefebvre 1991; Aumont 1997, p.160) An early exposition of this practice will be sought in Svetlana Alpers investigation of Dutch artists at the time of the invention of the *landscape* image. (Alpers 1984)

In film, an exemplary visual realisation of 'dominant space' is evident in the work of James Benning. His use of this moment of space to visualise the *spatiality of capital* in his *California Trilogy* will be discussed. (Benning 2012) Situated within the *landscape* tradition in visual art, a limited conception of the relationship between *capital* and space is evident, in comparison with Lefebvre's paradigm of the *production of space*. Eyal Wiezman and Fazal Sheikh's work will be briefly described

to open the possibilities for an expanded notion of the *representation of space*, consistent with Lefebvrian ideas. (Wiezman and Sheikh 2015) This conception of spatial analysis is shown to inform the *visual repertoire* of the *representation of space* proposed in *Machine Space*.

The aerial images form this *visual repertoire* of the *representation of space* in *Machine Space*. Although framed by theorists of the geographic image as a visuality of a disembodied occularism (Cosgrove), the complementing of these images with narration in the film, following the example of Wiezman and Sheikh, is an address of *critical spatial practice*. (Cosgrove 2001, Wiezman and Sheikh 2015) The social process imbricated in the *production of space*, shown in part by aerial images, is fully uncovered by the *assemblage* of image and text in the film.

### **The material and Immaterial: the three moments of Lefebvrian Space**

Henri Lefebvre's theory of space is offered in his text *The Production of Space*. (Lefebvre 1991) At its heart, space is conceived as *produced* by social practice. Space is profoundly social in origin, rather than an ontologically distinct and sufficient attribute arising from a distribution of objects. This account of social origins allows Lefebvre to suggest a theoretical unity of three fields of space, 'usually apprehended separately: the physical (nature); the mental (logical and formal abstraction); and the social.' (Dear 2001, p.48) Lefebvre further remarks this unity 'does not aim to produce a discourse on space, but rather to expose the actual production of space by bringing the various modalities of space ... together within a single theory.' (Lefebvre 1991, p.16)

Dear remarks that for Lefebvre,

Social relations exist to the extent that they possess a spatial expression: they project themselves into space, becoming inscribed there, and in the process,

producing that space itself. Thus social space is both a field of action and a basis for action.

(Dear 2001, p.54)

The ambit of this conception of social *space as production* is wide. Space is a medium for social existence, yet also an active creator of the conditions for the macro structures of global political economy. (Merrifield 2006 Pp106) Lefebvre's notion of *production* is as a continuous, generative process of invention and addition to the worlds; an essential attribute of being in the world. 'There is nothing in history or society, which does not have to be achieved and produced.' (Lefebvre 1991, p.68) He contends that as a goal driven activity, *production* invokes further relations of time and space –

... it organizes a sequence of actions with a certain 'objective' (i.e. the object to be produced) in view. It imposes a temporal and spatial order upon related operations whose results are coextensive. From the start of an activity so oriented towards an objective, spatial elements - the body, limbs, eyes - are mobilized, including both *materials* (stone, wood, bone, leather, etc.) and *matériel* (tools, arms, language, instructions and agendas). Relations based on an order to be followed - that is to say, on simultaneity and synchronicity - are thus set up, by means of intellectual activity, between the component elements of the action undertaken on the physical plane. All productive activity is defined less by invariable or constant factors than by the incessant to-and-fro between temporality (succession, concatenation) and spatiality (simultaneity, synchronicity).

(Lefebvre 1991, p.71 italics in orig)

Hence *production* begets relations of time and space; as activity, *production* ensures these relations are in continual flux and movement. Production is above all process; space is not inscribed as ontology or as an essentialist attribute -

Instead of uncovering the social relationships (including class relationships) that are latent in spaces, instead of concentrating our attention on the production of space and the social relationships inherent to it—relationships which introduce specific contradictions into production, so echoing the contradiction between private ownership of the means of production and the social character of the productive forces—we fall into the trap of treating space “in itself,” as space as such. We come to think in terms of spatiality, and so fetishize space in a way reminiscent of the old fetishism of commodities, where the trap lay in exchange, and the error was to consider “things” in isolation, as “things in themselves.”

(Lefebvre 1991, p.90)

Instead, in Lefebvre’s conception, space is a fundamental *production* of social practice, encompassing the *material* and the *mental*; both *concrete* and *abstract*. It is responsive to social, locative and historical context. Given this sensitivity to context implied, *space* is never fixed or static, it is open to re-inscription and change by social agencies. (Lefebvre 1991)

For Lefebvre, *space* can be construed as a medium of the social relations of the community. As *production*, space has a wide engagement with social activity, beyond the transactional exchange of labour and material goods arising from *production* centred on the *commodity*. (Schmid In Goonewardena *et al.* 2008) Social relations as culture; the expressive productions of subjectivity; are explicitly included in this conception of the *production of space*. Furthermore, Lefebvre’s re-siting of space as a product of social relationships also implies this spatiality is reflexive; that its manifestation is imbricated in its *production* itself. (Lefebvre 1991) As Paglen remarks, space is imbricated in ‘a feedback loop between human activity and our material surroundings.’ (Paglen In Scott and Swenson 2015, p.36)

Lefebvre contends the social relations implicated in the *production of space* are manifest as three *moments* or dimensions of spatiality. Space is produced as (1) *spatial practice*, as the embodied habitual experience of space; (2) the

*representation of space*, as artefacts that 'stand in' for measured and quantified spaces; and (3) *spaces of representation*, as artefacts that 'stand in' for lived spaces. The three *moments* of space have parallel definitions as processes of (1) *perceived* space; (2) *conceived* space; and (3) *lived* or *endured* spaces. (Lefebvre 1991, p.38)

The *production* of a spatial reality is located in perception; we also *conceive* space as we create, or *produce* its objects. The practices of *representation*, the generation of linkages as an image or artefact 'stands in' for space, are necessarily invoked in the *production of space*. Through *representation*, an immaterial artefact can 'stand in' for any form of material and/or imaginary space, allowing it to be shared in the social sphere. Practices of *representation* are central to the *production of space*.

As an example of mirroring the triadic unfolding of the *production of space*, Lefebvre suggests an analogy with discrete framings of the human body. In his words, *spatial practice* 'presupposes the use of the body' and is embodied knowledge of corporeal experience. (Lefebvre 1991, p.40) The *representation of the body* is 'derive[d] from accumulated scientific knowledge ... from knowledge of anatomy, of physiology, of sickness and its cure' and thus can be situated as a abstracted knowledge of the body as an object. The *body's representation* is the 'lived body' as a symbolic, social being, and is manifest as 'culture'. (Lefebvre 1991, p.40) This mapping of the *perceived*, *conceived* and *lived*, onto the body, is analogous to the discrete realms of the moments of spatial production. Lefebvre suggests knowledge of space must address all of the *moments* of space, thus invoking *spatial practice*, the *representation of space*, and *spaces of representation*. (Lefebvre 1991, p.39)

### **Lefebvre's Representation of Space or Conceived Space**

Lefebvre expands on the second *moment* of the spatial triad, the *representation of space* or *conceived space*, as taken by 'conceptualized space, the space of scientists, planners, urbanists, technocratic sub-dividers and social engineers...' (Lefebvre 1991, p.38) This conception of space is a product of the tools that can measure,

enumerate, valorise, and impose divisions, boundaries and limitations on it. As summarised by Stuart Elden -

... our mental interaction with the world, our ordering, generalizing, abstracting, and so on, produces the world that we encounter, as much as the physical objects we create. This does not simply mean that we produce reality, but that we produce how we perceive reality.

(Elden 2004, p.44)

The *production* of perceptions of reality, as well as subsequent concrete realities themselves, is enabled by the social practices of the spatial disciplines. These are architecture, Lefebvre denotes as inscribing the forms habitation takes; urbanism, the shaping of town and city settlements;<sup>10</sup>and planning and economics, informing the regional and national organisations of capital. (Lefebvre 2014, p.41) Thus is created the 'dominant space' in any society. (Lefebvre 1991, p.38)

The discipline of architecture, for example, employs quantified, abstracted, *representations of space* to achieve concrete effects -

... representations of space have a practical impact, that they intervene in and modify spatial *textures* ... Their intervention occurs by way of construction - in other words, by way of architecture, conceived of not as the building of a particular structure, palace or monument, but rather as a project embedded in a spatial context and a texture which call for 'representations' that will not vanish into the symbolic or imaginary realms.

(Lefebvre 1991, p.42)

---

<sup>10</sup> By Urbanism Lefebvre means the disciplines clustered around human settlements – 'Towns, cities - urban space - are the bailiwick of the discipline of urbanism.' (Lefebvre 1991, p.12)

Lefebvre frames architecture as a *discipline* of built space as it impacts on the social domain. This framing is less concerned with the construction of individual houses, more the codification of the built form for dwelling and habitation, and their shaping of social activity. Merrifield concludes this conception of space is indifferent to the concerns of human subjective experience. Instead, quantification and metrics reframe space as a resource, for the extraction of monetary value. Merrifield expands on the *representation of space* as –

... conditioned by a logic that shows no real concern for qualitative difference. Its ultimate arbiter is value itself, whose universal measure (money) infuses abstract space. Here exigencies of banks and business centers, productive agglomerations and information highways, law and order all reign supreme—or try to.

(Merrifield 2006, p.112)

For Lefebvre, this abstraction of the spatial, by the imposition of quantitative rubrics, allows the disciplines of architecture, planning and economics to determine the spatial form of the city. Visual images, employed as *representations of space*, serve as the handmaidens of these disciplines that deliver quantified *productions of space* as abstractions. (Lefebvre 1991; Merrifield 2006)

### **The *representation of space* as visual image**

Are there practices of visual representation that are intrinsic to the spatial disciplines and this *moment* of space? Lefebvre identified *perspective* as a central technique of the *representations of space*. (Lefebvre 1991) This system is a practice of rules governing the form of visual images, social in origin and a ‘symbolic choice which makes sight the measure of any and all representation.’ (Aumont 1997, p.162) Aumont cites the art historian Erwin Panofsky naming these rules as *perspectiva-artificialis*, accounting for their origin as –

... made possible (necessary) by the birth during the renaissance of what he called 'systemic space', mathematically ordered, infinite, homogeneous and isotropic... this form of perspective appeared not in relation to an absolute visual reality, but as a way of plotting space in terms of a rational grid according to optical geometry.

(Aumont 1997, p.162)

For Lefebvre, this form of imagery is key to the codifications of the spatial disciplines. Writing in *Space and Politics*, Lefebvre suggests of *representations of space* that they inform and materialise projects of the built environment - 'the plan does not rest innocently on paper - on the ground it is the bulldozer that realizes these plans.' (Lefebvre 1996, p.191) Lefebvre goes on to remark 'drawing (and by this one must also include design) is not only a skill and a technique... it is a filter, selective towards contents, eliminating this or that part of the "real"?' (Lefebvre 1996, p.191)

An exposition of this practice of drawing can be seen in the instructions for making images dating from the time of the invention of *landscape* as an art form. In *The Art of Describing*, Svetlana Alpers explored the visual culture of Dutch artists in the sixteenth century. (Alpers 1984) She suggests they were influenced by the sixteenth century educator Comenius, author of *The Visible World Pictured* (1658). Comenius specifies an explicit procedure for obtaining visual apprehension -

We will now speak of the mode in which objects must be presented to the senses, if the impression is to be distinct. This can be readily understood if we consider the process of actual vision. If the object is to be clearly seen it is necessary: (1) that it be placed before the eyes; (2) not far off, but at a reasonable distance; (3) not on one side, but straight before the eyes; and (4) so that the front of the objects be not turned away from, but directed towards the observer; (5) that the eyes first take in the object as a whole; (6) and then proceed to distinguish the parts; (7) inspecting these in order from the beginning to the end; (8) that attention be paid to each and every part; (9) until they are all grasped by means of their essential attributes. If these requisites be properly observed, vision takes place successfully; but if one be neglected its success is only partial.



(Comenius, cited in Alpers 1984, p.95)

If these requisites are observed, Comenius contends, 'vision takes place successfully,' objects are rendered as a 'distinct impression' and made available for knowledge. (Comenius cited In Alpers 1984, p.95) The 'systemic space' of images generated by this structured procedure foregrounds the vision of the beholder. Parallel and prior to the practice of perspective in creating images, this is a codification of vision itself. Of Comenius's procedure for vision, it could also be said that it is 'a symbolic choice which makes sight the measure of any and all representation.' (Aumont 1997, p.162)

Comenius describes a social practice of vision that begets a visual practice of *landscape* as a genre of artistic representation. I contend there exist useful analogies between it and an approach to *landscape* taken by filmmaker James Benning. In the following section, his work will be explored as exemplifying the *moment* of the *representations of space* as specified by Lefebvre. However, as limited to a singular *moment* of space, the limits to the claims that can be made for them as *productions of space* will become apparent.

### **The Representation of Space in moving image – James Benning**

In his *California Trilogy* of feature length, *landscape* films, James Benning explores the urban, rural and wilderness sites of the eponymous US state. (Benning 2012) *El Valley Centro* (1999), *Los* (2000) and *Sogobi* (2001) are composed of sequences of 35 static *landscape* shots, each approximately 2 ½ minutes in screen duration. At the close of each film, a scrolling list identifies the owners of the land and properties presented. The sound is restricted to that recorded at the filmed locations; a music track accompanies the closing texts.

Each film explores a thematically different *landscape*. The first film *El Valley Centro* surveys the inland central valley of the state, home to one of the most productive

intensive agriculture systems in the world.<sup>11</sup> Benning shoots the patterns of crop planting and the machinery of harvesting and transport of produce. The second film *Los* surveys the city of Los Angeles, focusing on social institutions and the material infrastructures that support the functioning of the city. The final film, *Sogobi (soil or earth* in the language of the Shoshone Native People) visualises the wilderness in the interior of the state, often shown to be in close proximity to activities of resource extraction and tourism.<sup>12</sup> Across the three films, the places shot are linked by the presence of water according to Slanar, and -

... landscape is not simply presented according to a romantic and sublime pictorial tradition, but as permeated by capital and labour, including industry and the circulation of goods, and the sparse commodity of water. The Californian waterway is therefore a central theme connecting all three parts of the trilogy and water continually recurs as a visual motif.

(Slanar In Pichler and Slanar (eds). 2007, p.171)

Southern California is a dry region; its rain falls in remote valleys far from areas of settlement by the Pacific coast. The urban megalopolis of Los Angeles is supported by a hinterland infrastructure of water transport and distribution, as is the intensive farming in the Central Valley. As critical urbanist Mike Davis in the *City of Quartz* argues, water has been central to the politics of the state for the last century. (Davis 1990) Benning's thematic of water is a conventional trope in the critical literature concerning the region; and informs the narrative film *Chinatown*. (Polanski 1974)

---

<sup>11</sup> [https://en.wikipedia.org/wiki/Central\\_Valley\\_\(California\)](https://en.wikipedia.org/wiki/Central_Valley_(California))

In general, the inland Central Valley of the state receives scant attention in mainstream media.

<sup>12</sup> This definition given in (Slanar In Pichler and Slanar (eds). 2007, p.171) The California Shoshone Native people are associated with Paiute people living in the Owens Valley, source of much of the water consumed by the city of Los Angeles.

[https://en.wikipedia.org/wiki/Paiute#Owens\\_Valley\\_Paiute](https://en.wikipedia.org/wiki/Paiute#Owens_Valley_Paiute)

[https://en.wikipedia.org/wiki/Owens\\_Valley](https://en.wikipedia.org/wiki/Owens_Valley)

Benning uses a particular camera and lens across the *Trilogy*. This imposes formal constraints; each image has been registered with the same wide-angle lens (10mm), each shot has a temporal duration of a *Bolex* camera spool of 16mm celluloid film (approx. 2 ½ minutes). He frames the *landscape* using compositional patterns. The film academic, David E James, describes the approach -

Benning's photography is fairly consistent and deliberate; usually his camera is positioned to face its subject squarely from some distance, minimising diagonals and emphasizing symmetry. He avoids extreme close-ups, so most frames cover an extensive visual field, and where possible he takes advantage of lines in the landscape ... that stretch from lens to horizon and the vanishing point and that either divide the frame vertically or generate radial spokes out from the camera-eye.

(James 2005, p.425)

Like Comenius' observer, the camera 'is positioned to face its subject squarely from some distance,' enabling it to 'cover an extensive visual field.' (James 2005, p.425) Compositional effects of depth and symmetry are emphasised through the heightened perspective given by the wide-angle lens. James remarks the consistency of these attributes in the *Trilogy* generates a pictorial grid of *landscape* depictions. The grid allows the *landscapes* to be compared with each other. Placed in sequence in the work, James suggests they generate an effect analogous to an *ostinato* – a repeated musical pattern, or riff.<sup>13</sup> (James 2005, p.425)

Within these constraints imposed on visual composition, the choice of subject to depict lay entirely with the filmmaker. James reports Benning 'followed his intuition ... until he felt a sense of propriety.' (James 2005, p.424)<sup>14</sup> This 'propriety,' as *aptness* or *correctness* is a relationship, negotiated by the filmmaker, between thematic or

---

<sup>13</sup> The Free dictionary - <http://www.thefreedictionary.com/ostinato>

<sup>14</sup> Interestingly enough, David E James implies this aspect of Benning's practice is not structurally different from the phenomenological cinema of subjectivity, and the 'belief in the revelatory potential of present perception' pursued by Stan Brakhage. (James 2005, p.424)

subject and the *landscape* to be filmed. James suggests this aspect of Benning's practice has affinities to the phenomenological cinema of subjectivity, and the 'belief in the revelatory potential of present perception' espoused by Stan Brakhage. (James 2005, p.424) At the heart of the work are choices and a confidence that the presence of the filmmaker at a site models the perception of that *landscape*, that an audience thus re-iterates this perceptive activity in the cinema.

At the level of depiction, James recognises a consistency to this 'propriety' in the figurative content of the images, claiming they evince Benning's interest in 'the working class, with their places and with the labor that transforms nature into the spatialities of capitalism ... the dialectics of human industry's transformation of the land and its entropy of its dissolution back into nature.' (James 2005, p.428)<sup>15</sup> The 'spatialities of capitalism' identified by James refer to his depictions of the industrial plant and infrastructures that enable the *production* and transformation of materials and commodities. The services provided directly by labour, in the tending of gardens and waste, are also shown. These infrastructures are directly referenced in the opening sequence in *Los*; an image of a water spillway from a dam, indexing the water supply to the city, segues into framings of advertising billboards, freeways, highways, the port... The film also visits the corporate business district, the central jail, an oil refinery, the airport, baseball fields and a gathering of police officers as they wait to be deployed to manage a protest march. As noted by James, 'the *trilogy's* ambitions are encyclopedic, it aspires to represent the state as a whole, if only synecdochically.' (James 2005, p.426)

---

<sup>15</sup> Later interpreters of the *Trilogy* (MacDonald In Rust, Monani and Cubitt 2012), quoting Benning, foreground the exploration of the politics of water and neglect the *spatialities of capitalism* cited by James. MacDonald's framing of Benning's work emphasises the construction of audience relationships with the material environment in the reception of the work; and the viewer attention demanded by the work, as of a different order to that of the mainstream media for example. Cf. (Macdonald 2002; MacDonald In Rust, Monani and Cubitt 2012)

## **Bennings work considered as Lefebvrian *spatial production***

James' invocation of the 'spatiality of capital' as the subject of Benning's *Trilogy* has close affinities to a spatial category Lefebvre terms 'abstract space' –

Capitalism and neocapitalism have produced abstract space, which includes the 'world of commodities', its 'logic' and its worldwide strategies, as the power of money and that of the political state. This space is founded on the vast network of banks, business centres and major productive entities, as also on motorways, airports and information lattices.

(Lefebvre 1991, p.53)

Lefebvre's 'abstract spaces' coincide figuratively with the spaces Benning shoots, itemised above as particularly evident in *Los*. (Benning 2012) The means by which he does this, as described by James above, are consistent with the visual observation in the manner of Comenius, as 'distinct impressions'. (Comenius In Alpers 1984) There are clear analogies between Bennings approach and Lefebvre's *moment* of the *representation of space*.

Yet there is a difficulty with the equation of the 'spatiality of capitalism' and its visualisation in Benning's work, identified by James in his analysis, and mirrored in the Lefebvre's construction of his theory of the *production of space*. Generating a context for Benning, James briefly cites Communist documentaries, made by the *Cinema League* in the 1930s, reporting on the strikes by agricultural and dock workers in industrial California. He contends these cinematic antecedents to Benning also explored the 'spatialities of capitalism' in the state. The difference of the earlier work, James contends, is 'the league's integration in proletarian political struggle demanded an agitational explicitness that was achieved by intertitles and the live commentary by labor activists.' (James 2005, p.427) In contrast, Benning's visual record relies on the aesthetic attributes of *landscapes* to be directly articulate about

the social relations they aim to reveal. This is not just a difference in filmmaking styles; it is fundamental to the attributes of the image. As James summarises, ‘the films implication that spatiality is directly articulate and social and political relations can be read off the *landscape* manifests an un-self-conscious and problematic empiricism.’ (James 2005, p.427) <sup>16</sup>

In other words, ‘empiricism’ dictates that social and political relations can be captured in their material forms and registered in an image. However, in practice this may not be apparent. Consider that a factory may function on capitalist, or socialist, or co-operative principles – the site is home to distinct models of social relations in each case. However, such an industrial plant may yield an identical representation of its physical form.

In his work, the images Benning makes of spaces like this do not present evidence of the social relations that may pertain to them. As James contends, the social relations of the ‘spatiality of capitalism’ need articulating by the agents involved in the social relations of capital and space. This issue, as mentioned in the introduction, was invoked by Benjamin in his *Author as Producer* text and reflected upon by Paglen as a demand of *critical spatial practice*; artworks ‘take a position’ rather than ‘assume an attitude’ towards an ‘subject’ of the work. (Paglen In Scott and Swenson 2015) In a Lefebvrian framework, Benning’s deployment of the singular *moment* of the *representation of space* in his work does not articulate these social relations of space.

As has been explained above, Lefebvre considers a wide canvas of social relations as constitutive of space. The panoply of social relations in space is met by Lefebvre’s insistence that the *production of space* – a process engaging, but not reducible to, the social relations of capital – is manifest across three *moments* of spatial Detroit,

---

<sup>16</sup> As support for this contention, James quotes the maxim attributed to Brecht by Benjamin – *the social relations of production are not captured by an image of the factory* in his footnotes to the discussion of Bennings work. (James 2005)

Downtown East Side, Aerial Images, acquired 1947, 1956, 1967, 2010

Sources : [http://claslinux.clas.wayne.edu/photos/ap\\_index.htm](http://claslinux.clas.wayne.edu/photos/ap_index.htm) <https://www.usgs.gov>

representation. As Lefebvre suggests, the relations of the three *moments* of space are such that 'the lived, conceived and perceived realms should be interconnected, so that ... the individual member of a given social group, may move from one to another without confusion.' (Lefebvre 1991, p.40)

Benning's *Trilogy* is a powerful and exemplary work of *cinematic landscapes* and a significant landmark in artist's film. A question for this project is how to build on it, mobilising a Lefebvrian framing of the spatial to address how the *representation of space* can articulate the social relations of space. As a *critical spatial practice* – a practice that is articulate of its construction of space - this project needs to be transparent in the social relations that inform its relations.

A first step is to discuss the aerial image, a form of visibility exemplifying attributes of the *representation of space* critiqued by Lefebvre. The following will be to briefly consider a project animating the aerial image – Wiezman and Skeikh's *The Conflict Shoreline* – before exploring how these images are mobilised and re-contextualised in *Machine Space*.

### **Aerial Photography as *Representation of Space* and *Critical Spatial Practice***

*Aerial images*, or remote photographs of the earth's surface, are acquired by cameras mounted on airplanes in the sky. Invented in 1915 by the German Oskar Messter, the airborne automatic camera allowed pilots to photograph a '60-by-2.4-kilometer strip of land surface in a sequence of frames at the scale of conventional topographic maps.' (Cosgrove 2001, p.239) The date of this invention is important – aerial images were first used in the 1914-18 conflict in Northern France for the surveillance of enemy positions. (Cosgrove 2001) Cosgrove suggests that these kinds of photograph marked 'a new way of seeing in which . . . the earth became a target as far removed from the personal experience of the observer . . . as a distant

planet.’ (Wohl 1983 cited In Cosgrove 2001, p.240) These images are products of an imagined spectator that Cosgrove names as the *Apollonian Eye*, described as ‘synoptic and omniscient, intellectually detached.’ (Cosgrove 2001, p.2)

There are parallels between Cosgrove’s description of the aerial image and Jonathan Crary’s work in *Techniques of the Observer*, suggesting the camera obscura as a model of the acquisition of knowledge. (Crary 1992) These linkages endow the aerial images as a form of knowledge, and therefore possessing an attributes of power. Lefebvre is in no doubt about the efficacy of this *visual repertoire*, writing ‘representations of space have a practical impact, that they intervene in and modify spatial textures ... [they] have a substantial role and a specific influence in the production of space.’ (Lefebvre 1991, p.42) Lefebvre suggests these linkages can be translated into material facts on the ground. He also attests to their endurance as practical documents, as they ‘will not vanish into the symbolic or imaginary realms.’ (Lefebvre 1991, p.42)

Given their attribution as knowledge, aerial photographs have been harnessed as material for techniques of visual analysis and interpretation. In an essay collection devoted to the use of aerial images as historical documents and commenting on examples from the 1939-45 conflict, Cowley suggests -

Aerial photographs are uniquely rich and textured sources for the study of landscape - recording the multi-temporal environments we occupy in a way that other media such as maps cannot match. With the action of a camera shutter, moments in time are frozen and preserved for future study, ranging from the mundane pattern of cultivation on a small farm to major historical events of the 20<sup>th</sup> century.

(Cowley, Standing and Abricht 2010, p.1)

For Cowley et al, the study and comparison of photographs, shot at intervals, informs the study of material change in on the earth’s surface. The indexical information they yield, as witness to the materiality of this surface, can be usefully compared with the symbolic realm of representation provided by maps. In *The Power of Maps*, Dennis Wood reminds us that cartography presents an accumulation of ‘codes, laws, ledgers,



contracts, treaties, indices, covenants, deals, agreements, in pledges, in promises, in words given and oaths taken.' (Wood 1992, p.10) Maps represent a codification of space in past agreements over how it was understood. Aerial images can document the traces of actual human activity over periods of time if taken at intervals.

An example of a study of a changing environment, foregrounding aerial images with other sources, is Weizman and Sheikh's exploration of the Sinai Peninsula in *The Conflict Shoreline* (Weizman and Sheikh 2015) Weizman, a spatial researcher, and Sheikh, a photographer, are interested in validating the claims of Bedouins to land ownership in this part of Israel. In Lefebvrian terms, Weizman and Sheikh seek evidence of the *production of space* by the Bedouin in the desert.

In his analysis, Weizman frames the desert is a material palimpsest of human activity, revealed by the aerial photography of Sheikh. In the absence of maps recording land ownership, their long-term activity as spatial agents warrants a case for habitation and thus, by precedent, their land claim. Weizman compares aerial images of the desert taken at different times over the last century and suggests -

For those willing and able to read photographs closely, the surface of the desert at this time can reveal not only what is present, but also the subtle traces of what has been erased ... taken together, these photographs present us with a palimpsest in which evidence of earlier patterns of habitation and agricultural use have been overlaid by successive settlements, military zones, and areas of cultivation. The interpretation of images such as these helps the Bedouins argue their claims.

(Weizman and Sheikh 2015, pp.14–16)

Weizman and Sheikh are careful to point out that material traces of past and present need to be confirmed by the visual interpretation of the images. The evidence provided by aerial photography is not immediately legible without knowledge of the activities that may leave traces. Furthermore, as Weizman notes, the indexical limits of analogue photography, as images of a defined resolution, limit what can be seen by size. He cites image analysts, who consider events or objects with a footprint smaller than 50cm square, as not registering in aerial images. (Sheikh and Weizman 2015, p.70) This size-based exclusion includes people present on the site.

The aerial images reveal evidence of animal husbandry and cemeteries as the burial sites of ancestors. These primary activities of economic survival, and continuities of presence through familial generations, evidence past and present habitation. The images are supported by testimony and land use and tax documents. Collectively, this collage of evidence, from multiple and official sources, supports the Bedouin's claims. (Weizman and Sheikh 2015)

Within a Lefebvrian framework, Weizman and Sheikh's work can be considered be in parallel to the claims made for the *production of space* as a triad of *moments*. If significant sources in this project are aerial images as exemplary *representations of space*, Weizman's construction of his argument references all three *moments* of spatial representation within these sources. The *moments* of space inhere in and across the visual evidence presented. Within the aerial images, traces of *spatial practice* in animal husbandry can be found. The *spaces of representation* formed by the rituals of family succession, in the cemeteries, are also present and confirmed by Bedouin testimony.

As a composite whole, Weizman and Sheikh's work presents an *assemblage* of documents and evidence, with multiple *productions of space*. The project is an example of the potential of multiple and re-enforcing framings of the spatial, for in this case, pushing back against the claims of the Israeli State against the Bedouin. Their interpretative use of spatial material is congruent with the methods and aims of *critical spatial practice*. (Scott and Swenson 2015)<sup>17</sup> Weizman's interrogation of the indexical claims of the analogue image situates representation itself as central to landscape.<sup>18</sup>

Weizman and Sheikh work with an expanded conception of the surface of the earth, considering it a *production of space*; a conjunction of power, contest and conflict,

---

<sup>17</sup> Weizman's analysis of this site is also enriched by its analysis of the history of Israeli State policy concerning the desert, and the place of the Bedouin there, and the significance of a climate boundary (rainfall) that bisects the site. (Weizman and Sheikh 2015)

<sup>18</sup> As opposed to portraiture for example, where the claims of the medium are rarely central to the representational practice.

and representation. In their work, multiple objects and materials are mobilised to visualise the site as a space of contested representations. As an engagement with Lefebvre, it de-centres the 'dominance' of *representations of space*, and looks to multiplicity and the inclusion of narrative and testimony in the *production of space*.

### **The representation of space in *Machine Space* and witness**

Aerial images of Detroit are presented as a *visual repertoire* of the *moment of representation of space* in *Machine Space*. Monochrome analogue photographs, taken in 1947, 1956 and 1967, are presented in sequence; colour aerial images, taken in 2011 and hosted online by the US Geological Survey.<sup>19 20</sup> The more recent are digital images; acquired by an aerial scanning of the earth's surface and an automated, post-production processes.

The first instance of aerial images in *Machine Space* is as a sequence of depictions of the same site. Shown in order by acquisition date, these images trace the razing of the eastern boundary of the downtown for the construction of the I-75 urban freeway. They are accompanied by Marsha describing, in voiceover, the vibrant and busy street life of the African American community she experienced as a child, before its destruction by the urban re-building programme documented.

The continuity of the Detroit street grid pattern across the time period covered by the sequence of the analogue photographs guides their alignment within the film frame. This grid continuity is a pattern against which significant changes in built environment can be identified. Hypotheses about changes in the presence of community can be intuited from interpretations of land use and evidence of activity as evidenced by the aerial photographs. Each photograph will be shortly described in turn.

---

<sup>18</sup> Hosted online by Wayne State University - [http://claslinux.clas.wayne.edu/photos/ap\\_index.htm](http://claslinux.clas.wayne.edu/photos/ap_index.htm)  
The appropriate images for the city of Detroit are the Wayne County resources.

<sup>19</sup> Accessed - <https://www.usgs.gov>

The 1947 image shows a densely woven streetscape in a regular pattern in each street of the grid. The buildings have varied footprints within their small lot sizes, with backyards and small fore and after-courts. The presence of cars in the courts suggests residence and/or small shops.<sup>21</sup> The streets evidence a significant volume ambulant traffic and dense kerb-side parking. This parking can be interpreted as evidence of small business and residential activities in the area covered by the image; albeit this may be dependant on the time of image acquisition. In general, the image evidences a residential community on the fringes of the downtown area.

The 1956 image shows many of the 1947 buildings have been removed. The few structures on the downtown side, or left of the image, are post 1947, larger in footprint, and feature flat, rather than pitched, roofs. Empty city blocks, devoid of built structures, line the on-going construction of a freeway, a zone two vacant blocks wide. The freeway displays an anthropomorphic footprint, with feeder lanes and access ramps suggestive of the shape of a body with arms. Very little auto traffic is evident, yet this may be a consequence of the time and day of photography. In contrast to 1947, there is almost no kerb-side parking.<sup>22</sup> The image shows a blighted area now solely devoted to the infrastructures for vehicular circulation and movement. The resident community, exhibiting a streetscape of mixed activities evident in the 1947 image, has gone.

The 1967 image shows the freeway has been completed; it's present identity is the *Chrysler Freeway or Interstate (I)75*. Multi-story buildings with larger ground footprints have been built on the blocks adjacent to the freeway service roads. The image shows a streetscape dominated by offices and institutional structures. The spatial arrangements of the downtown have expanded across the area covered by the image. Between the offices, city blocks are given over to car parks, highly organised into patterns of individual parking bays. Kerb parking is non-existent and little road traffic is evident, again possibly a consequence of the time and day of photography.

---

<sup>21</sup> A 'shop' in the US is an auto repair garage.

<sup>22</sup> There could be other explanations for this – image could have been taken on a Sunday/non business day; city parking regulations could be prohibitive of parking.



Detroit, Downtown East Side; Aerial Images, acquired 1947, 1956, 1967, 2010

Sources : [http://claslinux.clas.wayne.edu/photos/ap\\_index.htm](http://claslinux.clas.wayne.edu/photos/ap_index.htm) <https://www.usgs.gov>

This sequence of images presented in *Machine Space* index the *production of space* in this corner of the Detroit downtown. This location is shown by the sequence to have changed from a multiply inscribed space supporting a plurality of social relations; to a planned space, supporting 'localised' and singular activities favouring the vehicle. (Lefebvre 1991, p.44) The images in sequence document the *spatiality of capital* as a temporal process, using like Benning, a depictive rubric of the *representation of space*. However, the *(re)-production* of this space in the cinema is not complete, because there is no recognition of the status of these images as representations. As a production of *critical spatial practice*, the media requires recognition of its status as 'stand in' for spatial knowledge. This is provided in *Machine Space* by the narration of a context to these images.

### **Providing Context to the Aerial Images in *Machine Space***

The sequence of aerial images registers the changes in the spatial configuration of this side of the downtown of the city. However, the images do not register the impact and specificity of the changes they document on the residents of this part of the city. The remit of aerial images only extends to what can be inferred from the material evidence of the environment they depict. Thus the *production of space* as revealed by aerial images is only apparent through a chain of deductions from the interpretation of material traces in the images. As suggested earlier in the discussion of Benning's work, an image of the material environment cannot make claims about the social relations in that space. As reported above, only the most general of claims regarding the likely ownership and use of the physical structures can be inferred from the images.

Hence in *Machine Space*, the sequence of aerial images is accompanied by a spoken testimony by Marsha in voiceover. Marsha is a resident of Detroit, who grew up in the neighbourhood shown in the aerial images, the predominantly African American district of Black Bottom to the east side of the downtown.<sup>23</sup> Her contribution begins by identifying Hastings Street, a thoroughfare that bisects the aerial images -

---

<sup>23</sup> This area was so named for the exceptional fertility of its soil. (Sugrue 1996)

09'06"

**MARSHA MUSIC**

*So Hastings Street was the main thoroughfare  
That ran through Black Bottom  
And because of black people having to make  
An entire life in this tiny area,  
It was also the place where black people  
Began to develop businesses.*

*So in the period of about a decade,  
Both Black Bottom,  
The centre for African American living -  
And - Hastings Street,  
The main thoroughfare - were destroyed.  
And in its place was going to be put a freeway -  
What we call the I-75 –  
It was later named the Chrysler freeway.*

*Machine Space Connolly 2016 <sup>24</sup>*

Marsha limits her contribution to facts. She asserts the freeway construction, on the East side of downtown Detroit, displaced the businesses of the city's black community. As described above, although the social practices evident in the area of the aerial images can be intuited; the community residing in the area depicted cannot be identified from the evidence given. Marsha's testimony identifies the area as the centre for African American business activities in the city, and a centre for this community.

---

<sup>24</sup> Marsha's contribution has poetic qualities in its spoken performance, as might be expected of a writer and raconteur. Her material has been edited to bring these attributes of her text to the fore. Cf. Appendix 1

As documented in the images and like so many 'urban renewal' projects in the post-war US, The I-75 freeway was built through the black districts in the city.<sup>25</sup> The writer and activist James Baldwin famously referred to programmes of 'urban renewal' – the euphemism for urban freeway projects - as 'negro removal' in a 1963 interview on national television. (Baldwin 1963)<sup>26</sup> Writing recently, David Harvey has suggested these freeways 'create major physical highway barriers - moats, in effect - between the citadels of high-value downtown property and impoverished inner-city neighborhoods.' (Harvey 2012, p.117) From the evidence of aerial images, co-indicated by the *Residential Security* maps discussed in the following chapter, the physical form taken by east side of downtown Detroit matches Harvey's description.

Given this train of events registered by the images shown in *Machine Space*, a register of *affect* in an audience could be fostered by a description of the residential displacement of the community. The loss of individual home and place of memory, and identity could have been invoked in the voiceover. Instead, Marsha's account focuses on the effects on black businesses in the area. Her account directs attention to the loss of the Black communities investment in commercial and cultural activity as 'living'; the loss incurred is economic and community – wide, it is social.<sup>27</sup>

Marsha's account frames the construction of the Chrysler freeway as a site and event of *spatial contestation* – a conflict between the city authorities and the black business community over the use of urban space. Her testimony is a riposte to the concealment, in the aerial images as *representation of space*, of these conflicts in this *production of space* on the ground. The art historian Roslyn Deutsche studied artworks invested in the context of spatial conflict in lower Manhattan, New York, in

---

<sup>25</sup> Cf. *The Power Broker* for a biographical treatment of Robert Moses, the principal figure behind urban renewal in North America as head of public works in post war New York City. (Caro 2015) Harvey contends 'Moses changed the scale of thinking about the urban process and-through the system of (debt-financed) highways and infrastructural transformations, through suburbanization, and through the total re-engineering not just of the city but of the whole metropolitan region.' (Harvey 2012, p.9)

<sup>26</sup> <https://www.youtube.com/watch?v=T8Abhj17kYU>

<sup>27</sup> In fact Marsha's father, Joe Von Battle, the proprietor of a recording studio in the area, was impacted severely by the dispossession of his business in this 'urban renewal' project. See further – <https://marshamusic.wordpress.com>



the 1990s. As Deutsche remarked of these processes of what became known as gentrification, 'conflict, heterogeneity and particularity' is constitutive of urban spaces. (Deutsche 1996, p.xxiii) Deutsche, informed by Lefebvre, suggests that 'space is ... political, inseparable from the conflictual and uneven social relations that structure specific societies at specific historical moments.' (Deutsche 1996, p.xiv)

Following Deutsche therefore, it is hard not to see this instance of 'urban renewal' as a spatial allegory of the uneven social relations between the city authorities and black community in Detroit. In his history of the genesis of the crisis conditions in the city, Sugrue recounts in detail the multiple areas of conflict between the black community and the city's elected representatives. (Sugrue 1996) Issues of housing segregation, employment discrimination and the violence meted out to African Americans by the Detroit Police Department reveal long-standing practices of systemic racism in the city. (Sugrue 1996)<sup>28</sup>

Marsha's testimony establishes that the *production of space* in the city is a register of these relations. Her focus on 'living' as the business and commerce of the Black community identifies this as a collective narrative of hardship. Marsha's account is testimony to the systemic nature of these uneven social relations. She provides evidence of Sugrue's assertion in his work that 'blackness and whiteness assumed a spatial definition' in the city. (Sugrue 1996, p.9)

Marsha makes connections between her experience and the spatial domain in her voiceover narration. Her account of the destruction of Black Bottom is prefaced by a recall of a childhood memory of the streets of Detroit. The following are her opening remarks, introducing the film's audience to her acoustic, vocal presence in the work -

**08'06"**

**MARSHA MUSIC**

*I remember as a child, that you literally, when you jaywalked,*

---

<sup>28</sup> The violent and discriminatory everyday behaviour of the city's Police force led to the 1967 Detroit Rebellion; 10 days of public disorder, 43 deaths and billions in economic damage. Kathryn Bigelow's *Detroit* (2017) recounts the rebellion in an admirable blend of documentary material and (drama) - fictionalization. Cf. for the Detroit rebellion - [https://en.wikipedia.org/wiki/1967\\_Detroit\\_riot](https://en.wikipedia.org/wiki/1967_Detroit_riot)

*you were taking your life in your hands.*  
*And this is why your parents always cautioned you against jaywalking.*  
*Because the traffic was so great on the main streets,*  
*that you literally were in danger, trying to cross a street,*  
*because there were so many cars.*

*Machine Space, Connolly 2016*

This short text is rich in spatial analogies, invoking each of Lefebvre's *moments*. Marsha associates an activity of *spatial practice* – jaywalking – as a measure of the *representation of space* – the quantitative volume of traffic on the street – in a memory, or a *space of representation* as a relation of affect – in her recall of place. (Marsha Music In *Machine Space, Connolly 2016*) This is a fluid realisation of Lefebvre's proposition that 'the lived, conceived and perceived realms should be interconnected, so that ... the individual member of a given social group, may move from one to another without confusion.' (Lefebvre 1991, p.40)

### **Manipulated digital aerial image – the *transform fault***

Around the temporal centre of *Machine Space*, a colour digital image of the North East corner of the downtown is shown. After thirty seconds, part of the image begins to move across the screen. The image is split into two sections, joining along the central reservation of a large thoroughfare that bisects it. The upper-screen section moves slowly past the stationary, lower screen section. The terrain in the image can be described as rent or torn, and compared in analogy to a *transform fault* or *boundary* between two tectonic plates.<sup>29</sup>

This *transform fault* created in post-production of the film mimics common artefacts in digital aerial image scans. Those used in *Machine Space* are sourced from a tranche of images of the Detroit area; a quality control note for the files summarises - 'I found some tilt in tall building 2 offset roads and 1 warped bridges.' (sic) (Imagery Quality Assessment Summary (Gpsc) USGS 2012) The artist Clement Valla has

---

<sup>29</sup> cf. [https://en.wikipedia.org/wiki/Transform\\_fault](https://en.wikipedia.org/wiki/Transform_fault)



Frame-grabs showing the *transform fault*, *Machine Space* (Connolly 2016)

collected examples of image offsets and warps generated in Google Earth. He contends they should not be classified as visual errors. (Valla 2012) Instead, for Valla they illustrate the boundary conditions of the 'Universal Texture' data engineering in software. For Valla, these artefacts in these visualizations of landscape -

... expose how Google Earth works, focusing our attention on the software. They are seams which reveal a new model of seeing and of representing our world - as dynamic, ever-changing data from a myriad of different sources – endlessly combined, constantly updated, creating a seamless illusion.

(Valla 2012)

Here Valla is asserting a radically different paradigm for producing singular representations of the material environment, a parallel discussion to the multiple registers of information for spatial representation invoked by Lefebvre.

In this case, the manipulation of the image as a *transform fault* operates on the spatial register of the image, bringing disparate areas of the city into physical proximity in the depiction. As the upper portion of the screen slides across the image, the visible landscape begins to exhibit features of dereliction and abandonment. The city's downtown is thus brought into intimate proximity with neighbourhoods that have seen homes falling into dereliction and destroyed, residential lots now visible as empty grass spaces.

The effect of this *transform fault* using these images is to change the location of the devastated areas of North Eastern Detroit along *Gratiot* – the major thoroughfare on this side of the city – to be in close spatial proximity to the corporate built spaces of the downtown. In effect, these outlying neighbourhoods have overcome the 'major physical highway barriers - moats, in effect,' cited by Harvey above, as insulating them from the downtown. (Harvey 2012, p.117) Sugrue furnishes a historical account of the racism and negligence of industrial and corporate Detroit towards the African American community over the past seventy years. (Sugrue 1996) This *transform fault*, applied to the aerial image within the film, in visual terms returns the effects of these practices to the visual field and proximity of the downtown.

## Conclusion

This chapter has discussed the general overview of Lefebvre's theory of the *Production of Space*, a framing of space as socially constructed, processual and informed by the relations of production pertaining to its social, geographical and historical context. Lefebvre contends that *spatial production* is manifest in three *moments*; of *perceptive, cognitive and lived space*; or the correlates *spatial practice*; the *representation of space*; and *spaces of representation*. Spatial knowledge is generated by the contributions of all three *moments* of space. The *production of space* informs processes at different scales of social life and organisation; for Lefebvre space is a key agent in social arrangements.

*Representations of space* are made manifest through the use of practices such as perspective, and asserted by Lefebvre as the enablers of the spatial disciplines. These practices of rendering space as an image were developed by artists to generate *landscapes*, the aesthetic depiction of space. The work of James Benning lies in this tradition, and was explored here as a contemporary *landscape* practice in in artists film.

As a putative examination of the 'spatiality of capital', in subject Benning's work is exemplary in the interests of this project the encounter of Lefebvre and the cinema. However, the Lefebvrian framework has consequences as to how space can be conceived. Multiple approaches to the *production of space* are required to warrant spatial knowledge. The current project builds on the work of Benning to mobilise contributions from all three *moments* of space.

*Machine Space* builds on Benning's work through a *visual repertoire* and sequence of aerial images. Albeit a singular *moment* of the *representation of space*, they are accompanied on the soundtrack by narration, addressing the social processes and practices invoked by the *production of space* documented. The construction of an urban freeway is with further information on the social relations affected by this *production of space*. In the narration, Marsha notes this manifestation of *spatial production* as a contest and conflict is realised in the film.

The addition of the narration is a concession that the *visual repertoire* alone is insufficient as a representation of space as a social process. And as theorised by Lefebvre, a singular spatial moment cannot account for the *production of space*. In conclusion, an *assembly* of visual and narrative techniques, married in moving image, can address the complexity of Lefebvre's invocation of space.

The embrace of this understanding of space by the film warrants this visual repertoire in the film as a *critical spatial practice*. The use of visual representation for the examination of *spatial justice* justifies this claim. Furthermore, as explored above in relation to the work of Benning, the use of voiceover as an adjunct to aerial images is evidence of cognisance of the limitations of visual representation, true to the reflexive impulses that inform the *critical* in *critical spatial practice*.

The dissertation will now turn its attention to the articulation of the first *moment* of the Lefebvrian production of space, *spatial practice*. An examination of *spatial practice* will further the multiple articulation of the processes of the *production of space* in *Machine Space*.

## Chapter 2

### The Cinema as *Spatial Practice*

All cities are geological. You cannot take three steps without encountering ghosts bearing all the prestige of their legends. Certain shifting angles, certain receding perspectives, allow us to glimpse original conceptions of space, but this version remains fragmentary.

(Ivan Chitchevlov In Knabb 2007, p.13)

### Introduction

This chapter deepens the engagement of Lefebvre's theory of the *production of space* with the moving image. The *spatial moment* Lefebvre dedicates to the sensory perception of space, *spatial practice*, is here at issue. A claim that *spatial practice* can be realised in moving image will be made, evidenced in *Machine Space* by a *haptic* and *mimetic* panorama of the Detroit downtown.

To begin, the definition of *spatial practice* within the framework of the *Production of Space* will be discussed. (Lefebvre 1991) Lefebvre defines *spatial practice* as arising in the habitual movement and negotiation of space by people. This establishes the basis for the confluence of *spatial practice* with the camera as a phenomenological machine. It will engage the work of film theorist Vivian Sobchack, positing camera vision as an *address of the eye*, and the moving image as an expression of 'experience by experience.' (Sobchack 1992, p.4) She contends the spectator, as an embodied *being*, is transported into the spatial world of the film. (Sobchack 1992) In this framing of the moving image, the perceptual attributes of *spatial practice* find analogues in the audience reception in the film theatre.

A cinematic visualisation of *spatial practice* is modelled in Chantal Akerman's 1995 film and installation work *D'Est*. (Akerman 1995) Akerman realises a form of cinematic *mimesis*, or representation by *doing*, by driving her camera on a roving

itinerary through the cities of Eastern Europe. (Akerman 1995; Marks 2000, p.138)  
This work exemplifies how a *mimetic* visualisation can be forged in a material engagement between representation and the world. This linkage generates the analogue between *spatial practice* and the *sensory cinema* and is posited as a realisation of Sobchack's ideas. (Sobchack 1992)

The chapter will then explore how the example offered by Akerman's *D'Est* is built upon in a *visual repertoire* of cinematic *spatial practice* in *Machine Space*. A justification for the *mobility* of the camera in this *visual repertoire* will be first considered in relation to the specificity of the site of Detroit. (Cresswell 2006) First hand material and perspectives from fiction and the social sciences will be sourced as offering rich accounts of the perceptual activity in automotive *mobility*. A phenomenology of technology forges material links between the vehicle and the *moment of spatial practice*. (Ihde 1977; Lefebvre 1991; Urry 2004)

The *translation of spatial practice* into the cinematic images of *Machine Space* will be explored through description of their qualities and their reception in the film theatre. This automotive visuality indexes the material environment yet also fragments and obscures the space of the city. The configuration of views, situating the spectator, transpose the implied spatial immersion of the vehicle to the film theatre. The *haptic* qualities of the image add to the degree of immersion offered by the image.

Given the movement of the vehicle, shadowing the downtown public transit, the panorama unfolds as a *mimesis* of habitual movement through the motor city. This route also traces a financial demarcation between downtown and the inner-city neighbourhoods; the latter have been designated as *red-lined* for much of the modern city's history. The combination of these multiple relationships and linkages translation of the *production of space* warrants *Machine Space* as a work of *critical spatial practice*.



## Spatial Production in the everyday: *Spatial Practice*

The perceptual apprehension of *space* is addressed in the *moment* of Lefebvre's spatial triad termed *spatial practice*. 'Apprehension' denotes the flow of sensory data generated in material engagement with the proximate surroundings of the perceiver. *Spatial practice* is processual. It is located in the body as the embodied perception of space. *Spatial practice* is phenomenological knowledge, premised on the assertion that the world is known first and foremost through an embodied, material connection with the world. As the philosopher of phenomenology Maurice Merleau-Ponty asserts –

The thing, and the world, are given to me along with the parts of my body, not by any 'natural geometry', but in a living connection comparable, or rather identical, with that existing between the parts of my body itself.

(Merleau-Ponty 1945, p.237)

The material continuity between body and world is, according to Merleau-Ponty, the basis for the perceptive knowing of the structures that make the world. 'It is starting from perception and its variants, ... that we shall try to understand how the universe of knowledge could be constructed' he says as a statement of the intent of his phenomenology. (Merleau-Ponty 1969, p.157)

Lefebvre elaborates the spatial implications of Merleau-Ponty's scheme. He invokes material engagement in his assertion that 'the *spatial practice* of a society secretes that societies' space'. (Lefebvre 1991, p.38) Within *spatial practice*, 'secret[ions]' of space inform perception. (Lefebvre 1991, p.38) The term 'secrete,' is suggestive of *production* and *communication* through a material or substance, emblematically the operative mode of the *hormone*, or *signalling molecule*.<sup>30</sup> Arising in the social

---

<sup>30</sup> <https://en.wikipedia.org/wiki/Hormone>

negotiation of *space* and informed by complex aggregations of the material environment, Lefebvre suggests *spatial practice* -

... embodies a close association, within perceived space, between daily reality (daily routine) and urban reality (the routes and networks which link up the places set aside for work, 'private' life and leisure) ... the daily life of a tenant in a government-subsidized high-rise housing project. Which should not be taken to mean that motorways or the politics of air transport can be left out of the picture.

(Lefebvre 1991, p.38)

Lefebvre describes 'society's space' as the material infrastructure of the present day West, and it implies movement. In Merrifield's reading, *spatial practice* has 'close affinities with ... people's perceptions of the world, of their world, particularly its everyday ordinariness.' (Merrifield 2006, p.110)

A realisation of the association, between 'perceived space' and 'urban reality,' claimed by Lefebvre as *spatial practice*, is provided in the work of urban planner Kevin Lynch. (Lynch 1960) In *The Image of the City*, Lynch suggests perception is shaped by spatial features; specifically the *path*, *edge*, *landmark*, *node* and *region*. (Lynch 1960) *Path* denotes a route, and *edge* a boundary between differentiated spaces; the *region* applies to distinct areas or districts of a city; *nodes* are 'anchor points,' their 'essence ... a distinct and unforgettable place.' (Lynch 1960, p.102) Lynch avers this typology of features 'facilitate[s] the visual identification and structuring' of the city as 'building blocks of the process of making firm differentiated structures on an urban scale.' (Lynch 1960, p.95)

While Lynch's framework and typology is not directly useful here; it suggests the 'secretion of space' suggested by Lefebvre is a shared register of spatial perception. Can analogies to *spatial practice* be found in the cinema? Is there a perceptual framing of the moving image that can address *spatial practice* as a *production of*

*space*? The encounter of the moving image with such a framework is discussed in the following.

### **Moving Image as generative of *spatial* experience –**

#### ***The space of production begets the production of space***

As an opening gambit to an alignment of *spatial practice* and the cinema, we can note again Aumont's functional description of the cinematic *apparatus* as 'offer[ing] concrete solutions to the management of [the] unnatural contact between the spectators space and the space of the image,' was advanced but not developed. (Aumont 1997) Here the encounter of the *moment of spatial practice* with moving image can be deepened.

For the moving image to address the perceptual aspect of *spatial practice*, film must be considered a *sensory* medium. This is the premise of *The Address of the Eye*, by film theorist Vivian Sobchack. (Sobchack 1992) This approach to the cinema 'attempt[s] to understand the senses in their interplay and perception as embodied, as well as to theorise this embodiment in it's own complexity;' situating it experientially as the reception of the film image and sound in the auditorium. (Elsaesser and Hagener 2015, p.110)

Sobchack considers the moving image as a visual *address of a relational space* between the body and its surroundings -

It is the embodied and enworlded "address of the eye" that structures and gives significance to the film experience for filmmaker, film, and spectator alike. The embodied eye materially presents and represents intending consciousness: the "I" affirmed as a subject of (and for) vision not abstractly, but concretely, in lived-space, at an address, as an address. ... Vision is an act that occurs from somewhere in particular; its requisites are both a body and a world. Thus, address, as noun and

verb, both denotes a location where one resides and the activity of transcending the body's location, originating from it to exceed beyond it as a projection bent on spanning the worldly space between one body-subject and another.

(Sobchack 1992, pp.24–25)

Sobchack invokes the *spatial* as implicated in the *address* of vision, the situation of vision as embodiment, and the expanse over which vision operates. The *address* of vision is both situated and open to the world as *space*. The 'intending consciousness' cited by Sobchack is the idea, informed by Merleau-Ponty, that the activity of sensory perception is directed to objects, and is selective of received information from the environment. (Merleau-Ponty 1945) This 'intention' of the eye can be shared by the camera in a rendering of the world as a *representation*, and made available to the spectator as moving image. (Sobchack 1992)

Sound is a component of *spatial practice*. As the name suggests, *auditorium* is a space designed for hearing as well as a site for visual spectatorship. Sound brings dimensions to the depictive spaces of the moving image beyond that of carrying spoken information or as complement to the visual track. Elsaesser suggests sound in the cinema has an -

... encompassing role of actually and metaphorically anchoring and stabilizing the spectator's body (and self-perception as a perceiving subject) in space. ... a focus on the ear and sound directly emphasizes the spatiality of the cinema experience; we can hear around corners and through walls, in complete darkness and in blinding brightness, even when we cannot see anything. ... The spectator is no longer a passive recipient of images at the pointed end of the optical pyramid, but rather a body being enmeshed acoustically, spatially and affectively in the filmic texture.

(Elsaesser and Hagener 2015, pp.131–2)

This enveloping of the audience by sound in the auditorium is constitutive of a material relationship with space, a warrant of the embodied, enfolded relationship

with the screen.<sup>31</sup> Further analogues between worldly experience and the cinema emerge in the impact of spatio-temporal attributes of moving image. Sobchack contends the body of the spectator is restless, as embodied experience in the world implies mobility. The -

... temporal and spatial limitations of embodied consciousness inaugurate a *need for movement* in the world—fulfilled by the *power of movement* made possible through the agency of the material and enworlded lived-body. Thus, in existence, the body's finitude and situation and its power of movement transform the abstractions of time and space, informing them with the weight of choice and the thickness of movement  
...

(Sobchack 1992, p.59)

Embodied mobility implies the on-going generation of *space*, primarily the relationship between body and world. This relationship has an analogue in film; the moving image can be a generative process of *spatial production* in its 'enworlded' depiction as the 'camera-eye.' (Sobchack 1992) Sobchack explores this in more detail in the following passage -

... space is dynamized as habitable, as "lived in" as described in the depth that lived movement, not geometry, confers upon the world. Thus, space in the film becomes the situation of an existence, and objects and landscapes take on a thickness and substantiality, an always emerging meaning that is chosen in the diacritical marking of movement (whether cinematographic or editorial). The film, then, offers us the existential actualization of meaning, not just the structure and potential for its being. Its significance is constituted in its emergence and existence to a world that is encountered through an active and embodied gaze that shares the materiality of the world and inscribes temporality as the concrete spatiality of its situation.

(Sobchack 1992, pp.61–2)

---

<sup>31</sup> In *The "Return" of 3-D: On Some of the Logics and Genealogies of the Image in the Twenty-First Century*, Elsaesser foregrounds the importance of the technical evolution of sound in cinema, enhancing immersion and complementing the visual depiction. (Elsaesser 2013)

In this invocation parallel to Merleau-Ponty's idea of the 'sensible'; 'being' is in relation to given spatial and material dimensions. (Merleau-Ponty 1969) The 'sensible' situates moving image as a direct analogue to *spatial practice*, also a production of 'being' realised in the perception of space. As cited above, Lefebvre describes *spatial practice* in terms of 'habitual being;' with a material claim in 'the use of the hands, members and sensory organs, and the gestures of work as of activity unrelated to work'. (Lefebvre 1991, pp.38 & 40)<sup>32</sup> These invocations of *spatial practice* translate to the cinema 'as space in the film becomes the situation of an existence.' (Sobchack 1992, pp.61–62)

If the moving image is considered as an *address* of the world from a situated, embodied being in space, it becomes a close analogue to *spatial practice* as defined by Lefebvre. In this phenomenological conception, the perceptive is the source of sensory data registered as image and sound in cinematic media. By these means, the moving image can 'stand in' for the perceptive process that is *spatial practice*.

### **The Sensory Cinema, *spatial practice* & mimesis**

Within a sensory cinema, the comparison of the camera to the 'eye', and the moving image as an expression of 'experience by experience,' implies processes of imitation. (Sobchack 1992, p.3) How imitation is made manifest in cinema is a subject of the work of Laura U Marks, a researcher of artist and world cinema. (Marks 2000) Marks invokes *mimesis* as a form of representation by imitation –

Mimesis, from the Greek mimeisthai, "to imitate," suggests that one represents a

---

<sup>32</sup> Given the flavour of these habitual experiences cited by Lefebvre, we should note an agenda pursued by him arising from his dismay at the technocratic changes to the peripheries of urban centres of France at the time of writing of *The Production of Space* in the early 1970s, an agenda pointed out by both surveys of his work, Elden 2004, and Merrifield 2006. Incidentally, the dismay of Lefebvre, amongst many, has been vindicated by the recent history of violence, and the on-going social exclusion and deprivation issues in these places.

thing by acting like it. Mimesis, in which one calls up the presence of the other materially, is an indexical, rather than iconic, relation of similarity. ... According to Erich Auerbach (1953), mimesis requires a lively and responsive relationship between listener/reader and story/text, such that each time a story is retold it is sensuously remade in the body of the listener. Auerbach was describing the relationship between reader and written text; we might expect the relationship between "viewer" and the more physical object of cinema to be more convincingly mimetic.

(Marks 2004 pp138)

Marks highlights examples of *mimesis* given by other writers – ‘that between a child at play and an airplane’ (Benjamin and Demetz 1986), ‘a moth and the bark of a tree ... or a Songhay sorcerer and a spirit.’ (Marks 2000, p.138) An action or activity is inscribed as part of the symbolic. These relationships are *haptic* and indexical; they combine contributions from both elements. Marks suggests that ‘*Haptic* cinema, by appearing to us as an object with which we interact rather than an illusion into which we enter, calls upon this ... embodied and *mimetic* intelligence.’ (Marks 2000, p.190) Shaviri, writing in *The Cinematic Body*, echoes this and suggests *mimesis* ‘involves a participatory and tactile contact between what post-Cartesian thought calls the object and the subject...’ (Shaviri 1993, p.52) *Mimesis*, claims Marks, enables a relationship with the world that is co-constitutive -

... through mimesis we cannot only understand our world, but create a transformed relationship to it—or restore a forgotten relationship. Mimesis shifts the hierarchical relationship between subject and object, indeed dissolves the dichotomy between the two, such that erstwhile subjects take on the physical, material qualities of objects, while objects take on the perceptive and knowledgeable qualities of subjects. Mimesis is an immanent way of being in the world, whereby the subject comes into being not through abstraction from the world but compassionate involvement in it.

(Marks 2000, pp.139 & 141–2)

Marks makes the suggestion that *mimesis* reconfigures the ‘standing in’ process of *representation* as a material ‘enmeshing’ with the world. (Sobchack 1992; Marks 2000) This ‘standing in’ or ‘for’ is participatory and co-extensive, and offers an

alternative to the distance and abstraction implied by the semiotic basis of symbolic representations as *landscapes* for instance. Lefebvre's invocation of 'secretion' as the imbrication of *spatial practice* and the 'spatial textures' of the built environment points to a mechanism of material contact. (Lefebvre 1991)

### **Chantal Akerman's *D'Est* (1992)**

Chantal Akerman (1950-2015) became known for her film *Jeanne Dielman, 23 quai du Commerce, 1080 Bruxelles* (1975), a close observation of the daily life of *Jeanne*, a homemaker and sex worker. (Akerman 1975) Using a looping structure, the film is a relentless portrayal of the routines of a confined, gendered, domestic space. The importance of the spatiality of urban life has been a constant in Akerman's work, thematically evident in her early works *Hotel Monterey* and *News from Home*. (Akerman 1972; 1976)

Akerman's later *D'Est/From the East* (1995) is a visual journey through East Germany, Poland and Russia. (Akerman 1995) Shot in 1992, the film documents the spaces of Eastern Europe before their transitions to a post-communist states. Akerman's journey east was freighted with familial resonances – her mother survived Auschwitz and migrated west to Belgium to make her home in the post-war period. In her proposal for the film, Akerman specified an interest in filming the everyday. In an echo of Lefebvrian interests and *spatial practice*, she stated -

I'd like to shoot everything. Everything that moves me. Faces, streets, cars going by and buses, train stations and plains, rivers and oceans, streams and brooks, trees and forests. Fields and factories and yet more faces. Food, interiors, doors, windows, meals being prepared.

(Akerman quoted In Akerman 2012)



True to her proposal, the shots of the opening third of the film depict roadways, rural fields and settlements, and holiday resorts, evoking a visual record of a visit to somewhere new. The second third of the film registers urban environments, in winter and at nightfall. Here Akerman's durational images coalesce into two types of mobile camera shot, alternating in sequence. Both depict aspects of quotidian movement, or 'the routes and networks which link up the places set aside for work, 'private' life and leisure'; Lefebvre's description of *spatial practice*. (Lefebvre 1991, p. 38)

In the first type of mobile shot we will call the *wake*, the camera was fixed to a vehicle driven through the thoroughfares of a significant sized city. The camera covers the visual field out from the rear of the vehicle, visualizing the space the car has just moved through. Given the nocturnal shooting and a paucity of ambient street lighting in the *pro-filmic* space, little detail of the streetscape or other vehicles is revealed apart from their three dimensional form and volume.

The second kind of mobile camera shots are *lateral* camera movements. The frame of the visual image scans a scene in a sideways motion, maintaining a consistent distance from significant features in the field of view. This consistent spatial relationship between camera and scene is deployed to visualise sites such as railway station concourses; crowds of people waiting for public transport at exterior bus stations or interchanges; and lines of people standing at the side of the road, hawking goods. In each case, the linear axis of the scene is filmed by a parallel, lateral camera trajectory. This camera/object combination produces a moving image unfolding like a scrolling *frieze*, a form of decorative depiction of the citizenry of the polis, common to the facades of ancient Greek architecture.

The materiality of these environments is evidenced in the grimy and distressed walls and furniture of the public areas of the transport infrastructure and the textured winter coats of the crowds present in them. The camera is directed to register the undulations and flaws in these surfaces, of the bundled shapes of people in their

thick clothes, and the sculptural massing of the built forms of the streetscape. These qualities are emphasised by the 'natural' yet *crepuscular* lighting conditions.

Writing about the work, the theorist of visual culture Giuliana Bruno suggests Akerman's approach to filming space –

... haptically takes us into a world of images that become labored, textured, and nuanced as they float in a precise and specific way. In her work, we travel through an architecture of atmosphere, a formally rigorous aesthetic of frontal long takes with stationary and moving camera, often made of symmetrical compositions. With these frames fixed as if to seize motion, Akerman constructs a geometry of passages and a relational form of screening that empathetically includes us. By virtue of the camera position, which often refuses to move with the characters and rolls independently, remaining steady in time, we cannot pry. We are simply there.

(Bruno In Akerman 2012, p.20)

The vehicles and streetscapes are rendered as visual *fields* of massed objects, distinguishable in form by the luminescence of the thick snow on the ground. The lack of light, obscuring definition and detail, invites perceptive work by the audience to discern the content in the image. Shorn of the tokens of explicit identity, these images foreground the materiality of the forms shaping the space and registered on film, without a firm commitment to the discernment of their identity.

The movement of Akerman's camera/eye needs to be considered. The *wake* camera is taken on a journey through the city. Its trajectory is dependent on other road users and traffic management. The visual image thus is contingent on patterns of vehicular circulation. It has an explicit relationship with the environment – the streetscape, other vehicles – that interact with the mobility of the camera, beyond the control of the filmmaker. This arrangement of visual acquisition forges material links between the pro-filmic urban space and the image.

In a similar manner, people depicted in the *lateral* shots respond to the camera. People in the crowds, waiting for something; the bus, a buyer of their goods, their train; their family members; gesticulate to, and speak with, the camera crew. As described by Stephen Barber, 'the individual gazes of the waiting figures lock together into a mass gaze of blank hostility at the film-maker's visible camera.' (Barber 2002, p.74) This response to the camera is a material index in the image, a contingent response to the *hic et nunc* of the image acquisition. In a treatment of the sound in post-production, Akerman obscures the auditory content of the spoken exchanges. In this way, the materiality of the scene is foregrounded, unleavened by the intrusion of the discursive in the form of speech. (Akerman 1995)

This approach to registering and treating the image and sound foregrounds the materiality of the image and engages with the tenets of *spatial practice*. The clarity of figurative content in the image is a secondary. These visual strategies foreground the perceptive, by insisting on the apprehension of image content by an audience. In this way, materiality and movement as key attributes of *spatial practice*, are realised in the cinematic image.

### ***Spatial practice in Detroit***

Today, we experience an ease of motion unknown to any prior urban civilization ... we take unrestricted motion of the individual to be an absolute right. The private motorcar is the logical instrument for exercising that right, and the effect on public space, especially the space of the urban street, is that the space becomes meaningless or even maddening unless it can be subordinated to free movement.

(Sennett 1992, p.8)

As observed by Richard Sennett, this 'right' to mobility by car as an entitlement, is a framing of the pervasiveness of the automobile in everyday experience in North American. In a parallel with Lefebvre's spatial 'secretion,' Sennett suggests that space is rendered intelligible and of value by the mobility enabled by the car. The 'entitlement' to auto-mobility is a privilege enabled and manufactured in Detroit, and a leitmotif to the material that follows.

In *The Production of Space*, Lefebvre invokes mobility in the daily routine; the 'urban reality (the routes and networks which link up the places set aside for work, 'private' life and leisure),' as the raw material of spatial practice. (Lefebvre 1991, p.38)

Cresswell in *On the Move* distinguishes between human *mobility* and *movement*.

(Cresswell 2006) *Movement* is 'an act of displacement that allows people to move between locations' in an abstracted, and technical sense. (Cresswell 2006, p.2)

*Mobility* is socially inflected motion, shaped according to Cresswell, by three distinct relations. First, motion can be quantified; second, it can be the basis of *representation* in visual media; and 'Third, mobility is practiced, it is experienced, it is embodied.' (Cresswell 2006, p.3) He suggests that *mobility* can be understood as the interface between the *movement* of physical bodies and material environments and the *representation* of mobility as a register of experience. (Cresswell 2006)

Following Sennett above, a claim will be made that in Detroit, *mobility* has been captured by the vehicle and *produces the space* of the city. To explore how the *spatial practice* of mobility in this environment is 'secreted' as experience, an extract from crime fiction writer Elmore Leonard, and an interview with Detroit resident *Lauren Hood*, conducted for *Machine Space* (2016), will be offered and discussed. Finally, the sociological perspective of John Urry, exploring sociability as enabled by car use, will merit a brief mention.

Leonard is a Detroit native and his early work is noted for its setting there. His novel *City Primeval* follows the adventures of a criminal couple, Clement and Sandy, as they attempt to stay one step ahead of the police. (Leonard 1980) This vignette features Clement, driving a car in pursuit of Sandy and the Albanian, the latter he reasons will lead both of them to a stash of money. In this extract, passages concerned with symbolism and characterisation have been excised to foreground the descriptions of Clement's perception of movement, indicative of *spatial practice* -

Leaving the track, all Clement wanted to do was keep Sandy and the Albanian in sight.

Forget the silver Mark VI.<sup>33</sup>

Follow the black Cadillac, the Albanian stiff-arming the wheel like a student driver taking his road test, hugging the inside lane in the night traffic. It should've been easy.

...

But this silver Mark was something else, poking along in the centre lane with half a block of clear road ahead, holding Clement back while the Cadillac got lost up there amongst all the red taillights.

Sandy and the Albanian turned right on Nine Mile. Clement got into the right lane. When he was almost to the corner the silver Mark cut in front of him and made the turn.

Clement said, You believe it?

He followed the taillights around the corner and gunned it, wanting to run up the guy's silver end. But instinct saved him. Something cautioned Clement to take it easy and, sure enough, there was a dark blue Hazel Park police car up ahead. ...

The Eight Mile light showed green. Clement gave the car some gas. He glanced over, surprised, feeling a car passing him on the right – the Mark, the silver boat gliding by, the drifting in front of him as Clement tried to speed up, seeing the light turn to amber. There was still time for both of them to skin through; but the chicken-fat jig<sup>34</sup> braked at the intersection and Clement had to jam his foot down, felt his rearend break loose and heard his tires scream and saw that big silver deck right in front of him as he nailed his car to a stop.

Sandy and the Albanian were gone. Nowhere in sight.

(Leonard 1980, pp.2–5)

Clement's freedom of vehicular movement is obstructed by the *Lincoln Mark VI* constantly ahead of him.<sup>35</sup> His responsive, fine-tuned driving negotiates his progress

---

<sup>33</sup> A 'silver Lincoln Mark VI' (ibid pp1) More precisely, a *Lincoln Continental Mark VI Signature Series 4-door* – Ford's flagship car in 1980 with many luxury optional extras.

<sup>34</sup> *Jig* is short for *Jigaboo*, a racial slur denoting an African American. It has been linked to a Bantu (African) word meaning meek, or servile (i.e. a slave). For a contemporary use and context - see here - [https://www.washingtonpost.com/news/morning-mix/wp/2016/09/02/a-texas-teacher-named-her-class-the-j-word-her-racial-slur-defense-ignorance/?tid=sm\\_fb&utm\\_term=.6fbf5e0644c6](https://www.washingtonpost.com/news/morning-mix/wp/2016/09/02/a-texas-teacher-named-her-class-the-j-word-her-racial-slur-defense-ignorance/?tid=sm_fb&utm_term=.6fbf5e0644c6)

<sup>35</sup> Cars often play prominent roles in narratives set in the city. The car is also a central motif in Leonard's *Swag / Ryans Rules*, a tale of a highly mobile career in crime of a team of used car salesman and car thief. (Leonard 1976)

through the unpredictable road *space* of fast moving vehicles, people and traffic signals. At this moment in the narrative, Clement is still trying to avoid conflicts with the other vehicle; in further developments in the story this changes.<sup>36</sup>

On two occasions, Clement's 'instinct' alerts him to the proximity of others; the presence of a police car, and the *Mark VI* overtaking on (unexpected) in or right side. (Leonard 1980) In this context, 'instinct' is a short circuit response to perception, not accessible to conscious thought. The philosopher Bergson elaborates on 'instinct' as opposed to 'intelligence', suggesting that 'Instinct is sympathy... intelligence and instinct are turned in opposite directions, the former towards inert matter, the latter towards life.' (Bergson 1911, p.176) 'Instinct', unlike intuition, does not reflect on itself. (Bergson 1911) Both framings of 'instinct' rest in an expanded notion of *practice* as 'life' and concerned with *space*, if not confirming 'instinct' as a variant of *spatial practice*.

Clement's 'instincts,' framed as *spatial practice* are contingent responses; they are unforeseeable and generative moments that arise from spatial interaction. They evidence his perceptive processing of the proximate surroundings of his vehicle as it moves through, and thus spatially negotiates, the world. This is *spatial practice*.

*Spatial practice* as the everyday activity of driving is pertinent to Detroit in terms of its history with the car, yet a brief mention of current transport research will situate it in the present everyday. In a study of residents' access to vehicles in the city, the transport scholar Grengs suggests 'what travellers want is interaction, in the form of personal contact with people and places with which they like to engage.' (Grengs In Thomas 2015, p.101) Accessibility to mobility is defined as 'the "potential of opportunities for interaction" or the ease of reaching places" as opposed to mobility on its own, which is the "ease of movement."' (Grengs In Thomas 2015, p.101) Access to an automobile is extremely important to residents of Detroit. As mentioned above, the city covers a large area – 137 square miles – spanning

---

<sup>36</sup> The 'obstructive' driving has fatal consequences for the black driver, a circuit judge called Alvin Guy, in the novel. Maddened by losing his tail on Sandy and the Albanian, Clement runs Guy off the road, shoots him and, after a chase, the white woman passenger. (Leonard 1980)

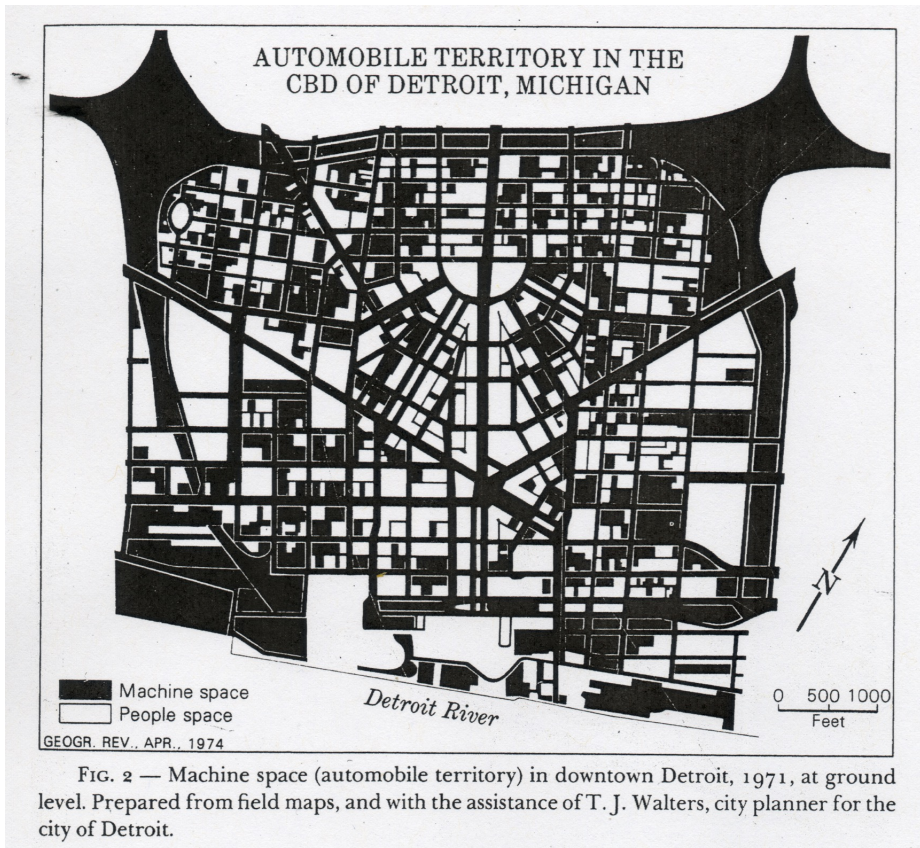
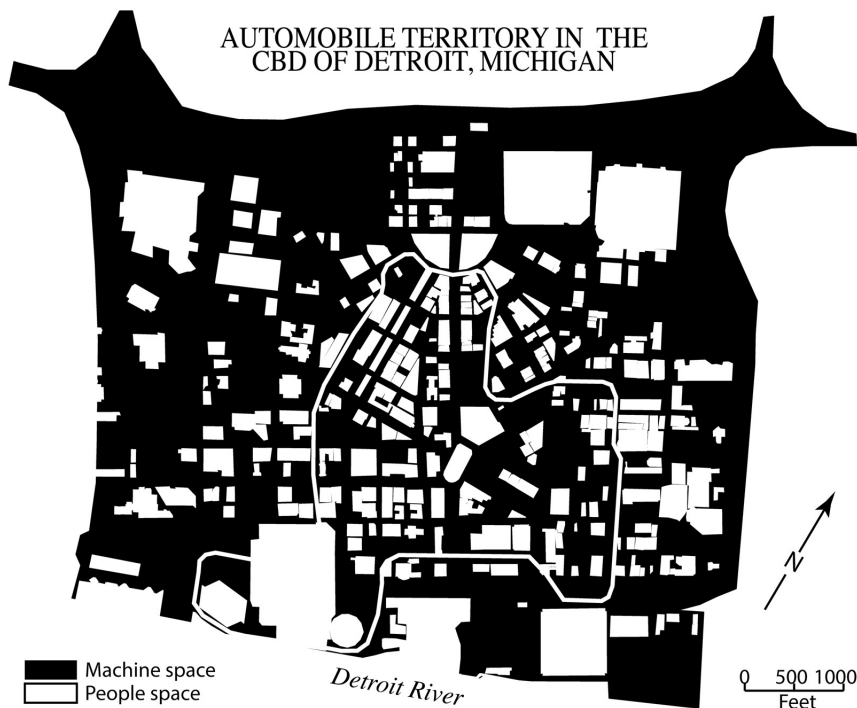


FIG. 2 — Machine space (automobile territory) in downtown Detroit, 1971, at ground level. Prepared from field maps, and with the assistance of T. J. Walters, city planner for the city of Detroit.



Machine Space (automobile territory) in downtown Detroit, 2011, at ground level. Prepared from orthographic photography and GIS.

Machine Space (automobile territory) Detroit Downtown 1974 & 2011  
(Horvath 1974; Connolly 2017)

approximately 17 miles east to west, 8 miles north to south. It is no longer densely populated.<sup>37</sup> According to Grengs, 'Detroit is largest urban area in the county without ... rail transit so residents [without cars] must rely exclusively on buses.' (Grengs In Thomas 2015, p.103)

Living in the city without a car and relying on buses is problematic, as Lauren, one of the Detroit respondents for the voiceover in *Machine Space* points out –

I don't think we can get out of our cars. Public transportation is unreliable – I've heard stories of people that wait two or three hours for a bus for a short manageable distance in a car ... I know people who have been mugged or assaulted on buses so it makes me not want to take public transportation ...

Lauren Hood, *Machine Space* outtakes, 2016

In Lauren's view, public transport is unreliable and dangerous. Cars are associated with safety; their passenger compartments are lockable, protective enclosures, insulating their occupants from potential dangers. Lauren continues –

I like to take adventures around the city but I feel safe because I am in my car... I like to go to different neighbourhoods and take pictures but I do think I have my little personal coat of armour, and that is my car ... because I have grown up in this car centric environment ...

Lauren Hood, *Machine Space* outtakes, 2016

A concern for personal safety is not surprising. In 2014, the city of Detroit registered the highest rate of violent crime in the US.<sup>38</sup> (cf. LeDuff 2014) Vehicles guarantee safety in mobility for their occupants, an aspect of *spatial practice* far from unique, but certainly salutary in Detroit.<sup>39</sup> For Lauren, her car enables her to interact with

---

<sup>37</sup> As a comparison, the similarly sized area of Inner London (123 square miles) is home to a population of 3.5 million, five times that of Detroit in 2011 (723,000).

<sup>38</sup> [https://en.wikipedia.org/wiki/List\\_of\\_United\\_States\\_cities\\_by\\_crime\\_rate](https://en.wikipedia.org/wiki/List_of_United_States_cities_by_crime_rate) These crime rates are the raw data compiled by the FBI.

<sup>39</sup> For the record, in my six visits to the city undertaking this project, I have never witnessed any crime whatsoever nor felt threatened.



people and places in the city she likes; a vivid manifestation of the ‘accessibility perspective’ as described by Grengs. (Grengs In Thomas 2015)

Following Lefebvre’s scheme, the centrality of vehicles to everyday experience has implications for *spatial practice* and perception. Lauren suggests it is city specific; this ‘secretion’ of *spatial practice* is related to the presence of the ‘Big Three’ auto companies – *Ford, General Motors and Chrysler* –

We are the home of the Big Three ... it is so entrenched in our being, we are so used to not walking much and being in our little transportation vehicles - it is just who we are here ... so although it may seem that manufacturing got shipped away ... so it seems like we are not so auto-centric ... It’s engrained in who we are as a city so I don’t think we can ever... I would love to get away from [it] ...

Lauren, *Machine Space* outtakes, 2016

Lauren avers that, despite the de-industrialisation of the city, the contribution of vehicular mobility to perception remains, it is ‘entrenched in our – being.’ In Lauren’s opinion, the perception of urban space, in terms of embodied access and safety, is informed by vehicle use.

The sociologist John Urry uses *automobility* to define social experience enabled by vehicles. (Urry 2004) At the level of ‘habit and the everyday’ invoked by the spatial configuration of the city, Urry claims -

... Automobility has irreversibly set in train new socialities, of commuting, family life, community, leisure, the pleasures of movement and so on. ... These new mobilities result from how the car is immensely flexible and wholly coercive. ... Cars extend where people can go to and hence what they are literally able to do. Much ‘social life’ could not be undertaken without the flexibilities of the car and its 24- hour availability.

(Urry 2004, p.28)

Urry's claim for the influence of the 'car' can be expanded if the vehicle itself is seen as part of a system of fluid interchanges. The 'car' presupposes a context and a system of spatialities -

'Auto' mobility thus involves autonomous humans combined with machines with capacity for autonomous movement along the paths, lanes, streets and routeways ... What is key is not the 'car' as such but the system of these fluid interconnections. Slater argues that: 'a car is not a car because of its physicality but because systems of provision and categories of things are "materialized" in a stable form'... About one-quarter of the land in London and nearly one-half of that in LA [Los Angeles] is devoted to car-only environments.

(Urry 2004, p.30)

The impact of car-only environments is particularly evident in Detroit, a city with a higher proportion of its surface area devoted to cars (Machine Space) than cited by Urry for Los Angeles.<sup>40</sup> (Horvath 1974) The relationship between car and the driver as an embodied being, has been explored by Don Ihde, a philosopher and phenomenologist of technology. To Ihde, the material contact between a piece of chalk and a blackboard is a localized example of the sensory apprehension of the world through a simple machine. 'I experience the blackboard through the chalk, the chalk being taken into my "self-experiencing,"' he explains. A 'good' simple machine becomes 'transparent' in the sensory linkage between body and material world. (Ihde 1977, p.271) The relations offered by simple machines can be extended to complex machines –

A series of variations would show that such relations are widespread and encompass a wide variety of human-machine relations. Furthermore, experienced uses of machines of this sort are not restricted to simple machines, but include a vast number of highly complex machines as well. For example, even driving an automobile includes relations of this type. The expert driver when parallel parking needs very little by way of visual clues to back himself into the small place - he 'feels' the very extension of himself through the car as the car becomes a symbiotic extension of his own embodiedness.

---

<sup>39</sup> *Machine Space* was the term given by Horvath (1974) to this space in Detroit, measured at 65% of the surface area bounded by the downtown. See illustration.

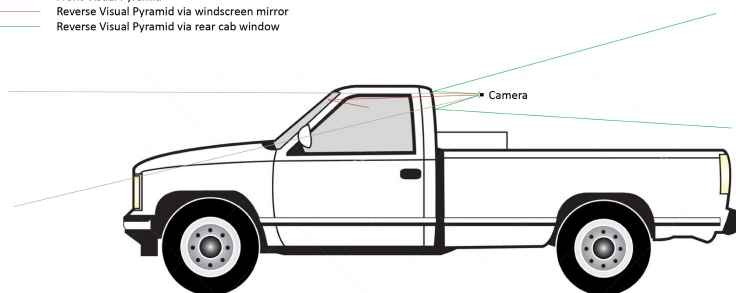
(Ihde 1977, p.272)

This observation mirrors the description of Clement's driving cited above. Performing the simple action of parking involves for Ihde a material link between the sensory apparatus of the body, auto-mobility and space. Through these linkages, auto-mobility can be considered a conduit for the 'secretion' of the spatial texture as *spatial practice*. (Lefebvre 1991, p.173) In Detroit, the car is the machine for *producing the space* of the city.

### ***Machine Space & the city panorama - a realization of spatial practice***

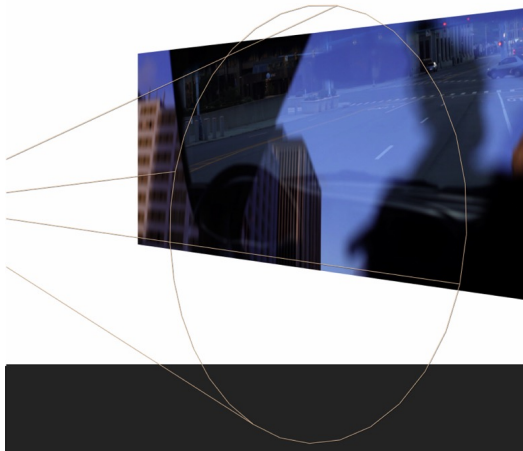
The film *Machine Space* mounts the camera on a car and drives around downtown Detroit. By shooting from a vehicle, with the axis of the lens aimed through the windows of the cab, a complex, composite image of reflection and refractions of the built environment is created. It is arguably the most iconic of the three *visual repertoires* that alternate and develop in sequence throughout *Machine Space*, and car footage consumes almost half of the total screen time of the film.

— Front Visual Pyramid  
— Reverse Visual Pyramid via windscreen mirror  
— Reverse Visual Pyramid via rear cab window



Camera/Vehicle I, visual pyramids; *Spatial Practice visual repertoire* (Connolly 2016)

Front Visual Pyramid - Camera/Vehicle image



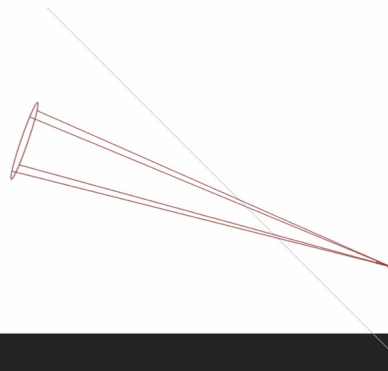
(top view)



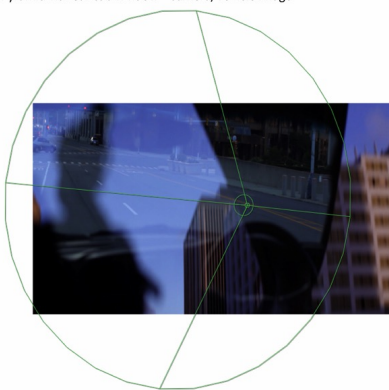
Reverse Visual Pyramid via windscreen mirror - Camera/Vehicle image



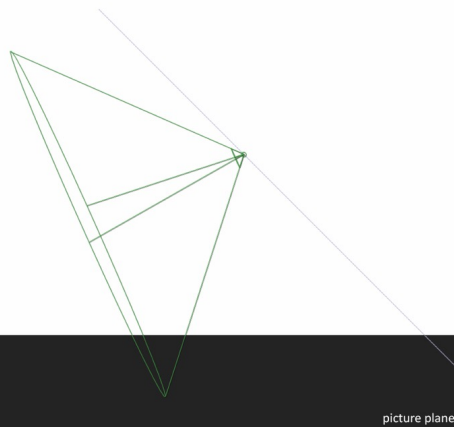
(top view)



Reverse Visual Pyramid via rear cab window - Camera/Vehicle image



(top view)



Camera/Vehicle II, visual pyramids; *Spatial Practice visual repertoire* (Connolly 2016)



Camera/Vehicle III frame-grabs; *Spatial Practice visual repertoire* (Connolly 2016)

This *visual repertoire* is composed of an image with a fixed framing with three *spatial fields* inset and layered over each other. The *forward spatial field* covers the streetscape in front of the car, through the windshield of the *camera/vehicle*. This *field* has a central perspective or vanishing point. Bounding the *forward spatial field* and within the expanse of the screen, the windshield frame generates a *frame* as a dark hued mask.

In the upper third of the screen, alternating close left and right of the centre axis, the rear view mirror of the vehicle generates a second *rear spatial field*. Placed within and obstructing the *forward field*, the *rear field* produces a tightly bounded and *framed* image; featuring the cab and driver if the mirror is situated screen right; and featuring the rear of the vehicle cab if situated screen left. This *rear spatial field* covers the proximal space of the driver and passenger, occupants of the cab of the vehicle.<sup>41</sup>

A third *elevated rear spatial field* is manifest as a wash of visual information across the expanse of the image; it is translucent trace image, layered over the other *spatial fields*. The *elevated rear field* gathers light and shadow from the upper rear prospect of the *camera/vehicle*. As the incident light varies, the *elevated rear field* bleeds over the windscreen mask and creates a darkened layer of graphic forms and colour. The massed forms of the built environment in this notional space provide the image content of this *field*. The wash of the *elevated rear field* across the screen image obscures but does not mask the other *spatial fields*.

The three *spatial fields* construct an image with three perspectives. The image is constantly in motion, the *fields* sliding over each other, as the *camera/vehicle* negotiates the streets. The visual contents of the *spatial fields* intersect, as elements in the streetscape slide from the *forward*, to the *rear* and *rear elevated fields* in succession. Each *spatial field* is a registration of a material feature of the vehicle; the

---

<sup>41</sup> The camera/vehicle is a pickup truck – the camera is mounted on a tripod close to the cab rear window.

front windscreen has a frame; the rear-view mirror is a reflective object; the rear cab window is a screen, capturing an image but also a medium through which the other fields are registered. These supports generate material linkages between cinematic image and *camera/vehicle*.

By these means, the city-panorama is enmeshed and 'en-worlded' in its 'address' of the surroundings, a feature of the *sensory cinema* claimed by Sobchack. (Sobchack 1992) This is premised on the images of this *visual repertoire* displaying *haptic* visual characteristics. Marks sources the *haptic* in art history –

In haptic visuality, the eyes themselves function like organs of touch. I derive the term from nineteenth-century art historian Alois Riegl's distinction between haptic and optical images. Riegl borrowed the term haptic from physiology (from haptēin, to fasten), since the term tactile might be taken too literally as "touching". ... Haptic visuality is distinguished from optical visuality, which sees things from enough distance to perceive them as distinct forms in deep space: in other words, how we usually conceive of vision. Optical visuality depends on a separation between the viewing subject and the object. Haptic looking tends to move over the surface of its object rather than to plunge into illusionistic depth, not to distinguish form so much as to discern texture. It is more inclined to move than to focus, more inclined to graze than to gaze.

(Marks 2000, p.162)

*Haptic* vision is the apprehension of 'textural' qualities in an image. The *haptic* is a visualisation of the materiality of an object or surface depicted in the image. (Marks 2000) In *Machine Space*, the rear *spatial field*, located in the *textural* visual wash across the screen, is *haptic*, attenuating the spatial relationships between the objects of its depiction.

In parallel with the nocturnal photography of Akermans *D'Est*, the obscured nature of the panorama image demands the audience devote perceptual labour to decipher

the relationships between image content, and the spatial orientation of the three *spatial fields*. Laura Marks makes the claim that spectators must work to identify the content of *haptic* images. She suggests the *apprehension* of these images develops from a perception of visual material as textural -

The works I propose to call haptic invite a look that moves on the surface plane of the screen for some time before the viewer realizes what she or he is beholding. Such images resolve into figuration only gradually, if at all. Conversely, a haptic work may create an image of such detail, sometimes through miniaturism, that it evades a distanced view, instead pulling the viewer in close. Such images offer such a proliferation of figures that the viewer perceives the texture as much as the objects imaged. While optical perception privileges the representational power of the image, haptic perception privileges the material presence of the image.

(Marks 2000, pp.162–3)

As the wilfully obscured process of *apprehension* is bypassed by *optical* images, in this citation Marks suggests that *haptic* and *optical* images demand different perceptual engagements from their viewers. A manifestation of this altered form of engagement can be found in its implications for the spatial engagement of viewers of images. The conventionally termed *visual pyramid* spatially locates a viewer by the reverse perspectival projection of an image. (Aumont 1997) The spatial situating of an audience by an image, is also central to the 'un-natural' spatial interface in the auditorium; between audience and image in the cinema. (Aumont 1997, p.99)

Marks identifies the *visual pyramid* as a condition of the *optical* image. Given their lack of explicit delineation of objects and their spatial environment, Marks' description of *haptic* images implies they do not generate *visual pyramids* and therefore do not generate spatial relationships with an audience -

The ideal relationship between viewer and image in optical visibility tends to be one of mastery, in which the viewer isolates and comprehends the objects of vision. The ideal



relationship between viewer and image in haptic visuality is one of mutuality, in which the viewer is more likely to lose herself in the image, to lose her sense of proportion.

(Marks 2000, p.184)

This loss of spatial bearings, in relation to an image, implies an audience that situates themselves as co-extensive with the space implied by the image. *Haptic* images engender relationships with viewers that reconfigure the 'un-natural' contact between image and audience in cinema and suggest the spaces of screen and reception are co-extensive.

This condition is foregrounded in this *visual repertoire* in *Machine Space*. Viewers take some time to align the *spatial fields* of the panorama image into a coherent rendering of a space. The process of spatially positioning oneself, as a spectator within the three *fields* of the panorama, requires a negotiation of spatial-perceptual location. If the spatial position suggested by the apexes of the 'visual pyramids' is followed, the spectator is sited inside the vehicle, within the implied space of the image on screen and enfolded within the *rear* and *rear elevated spatial fields*. That is, the spatial location of an audience is suggested as within the plane of the cinema screen, as part of the image, and not in the auditorium at all. The intersection of visual pyramids suggesting this positioning is shown in the diagram (above on page 77).

A further possibility is that the auditorium takes on the dimension of the vehicle cab itself. The seats of an audience, in the cinema auditorium, occupy the places of driver and passengers of the vehicle. This locative solution to the spatial puzzle of the panorama image is a 'transport' of the audience into the spatial realm of the moving image. Giuliana Bruno links the linguistic roots of 'emotion' as a 'motive force' within the manifestation of affect. (Bruno 2007, pp.6–7) The 'transport,' generated by the panorama as product of the *camera/vehicle*, is an invitation to the cinema audience to share the *spatial practice* of the vehicle as it negotiates the streetscape of the city.

## Tracing the map in downtown Detroit – the *mimetic* image

The spatial puzzle evident in the downtown *visual repertoire* in *Machine Space* builds on the *haptic* and *sensory* engagements realised by Akerman in *D'Est*. Yet a deepening of this engagement is apparent in *Machine Space*. Questions of 'where are we going; where is this image taking us and why?' - legitimate concerns of image content - are not addressed in *D'Est*. This property of the image is, however, developed in *Machine Space*. There is a figurative, cartographic and spatial rationale for this sequencing and the route of the vehicle in *Machine Space*. It is signalled in the *camera/vehicles* apparent shadowing of the overhead public transit visible in the downtown panorama.

The figurative element of the transit is key to the trajectory or journey of the *camera/vehicle*. This public transit, known as the *People Mover*, circles the downtown on an elevated track. The first iteration of the footage sets a pattern whereby the appearance of the transit, moving across the screen, initiates the forward movement of the *camera/vehicle*. As the *People Mover* comes to a halt at a station stop, the *camera/vehicle*, on the street below follows suit. This alignment of motion between *camera/vehicle* and *People Mover* is repeated throughout the image repertoire. The distinctive red transit is a visual motif woven into the panorama's trajectory around the city. It is a 'specific and mobile engagement,' of *camera/vehicle* and a pro-filmic feature. (Sobchack 1992, p.62)

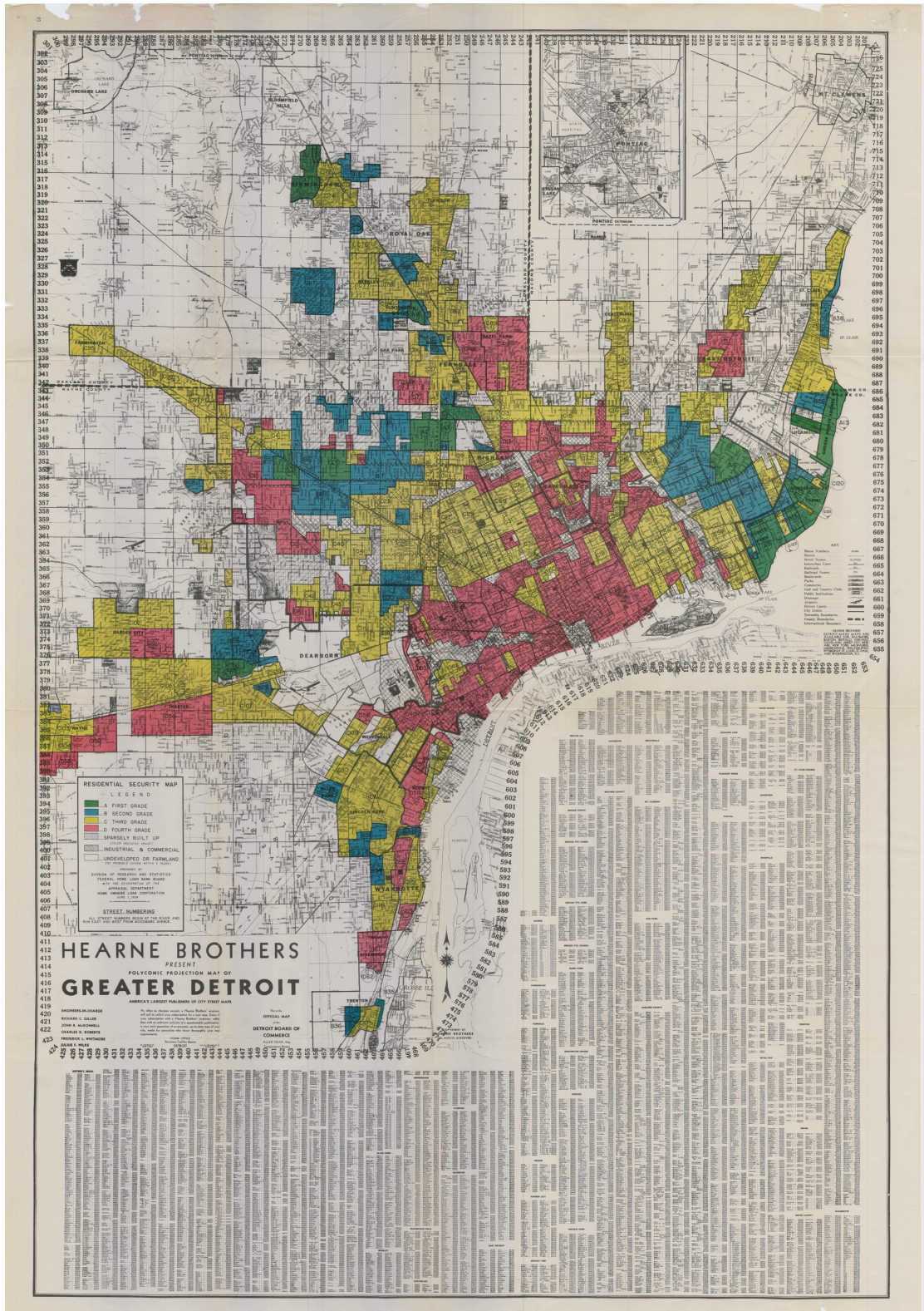
The engagement of *camera/vehicle* and *People Mover* deepens the contingent linkage between image and world. As mentioned above, Marks refines the concept of *mimesis* as a calling up of 'the presence of the other materially ... an indexical, rather than iconic, relation of similarity. (Marks 2000, p.138) In *Machine Space*, the conjuncture of the trajectories of *camera/vehicle* and *People Mover* - and the other events in the street – generates these indexical linkages. In the film a *spatial practice* – a habitual and everyday activity – is reproduced by the *mimesis* enacted by the *camera/vehicle* journey.

Marks suggest that importance of *mimetic* representation lies in its difference from symbolic forms of representation. In this case, the *mimetic* trajectory, fashioned into a sequential representation does further work of 'standing in' for the city's space. Marks suggests an 'excess' given by the *mimetic* over and above the symbolic aligned with abstraction thus -

Mimetic representation, then, exists on a continuum with more symbolic forms of representation. It lies at the other pole from the symbolic representation characteristic of contemporary urban and post-industrial society. The highly symbolic world in which we find ourselves nowadays is in part a function of the capitalist tendency to render meanings as easily consumable and translatable signs, a tendency that in turn finds its roots in Enlightenment idealism. Consequently, critics of capitalism often seek a return to mimetic representation in order to shift the emphasis from the world of abstraction to the concrete here-and-now. Because vision is the sense that best lends itself to symbolization, contemporary forays in Western scholarship into a tactile epistemology are generally rooted in critiques of the current state of visibility in post-industrial, capitalist society.

(Marks 2000, p.139)

In this citation, Laura Marks opposes *mimetic* and symbolic representation, and situates the latter as a prevalent mode of visualisation in post-industrial capitalism. Her preferred foregrounding of tactile representation is, in this scheme, a counter strategy against the symbolic as a translatable, exchangeable, currency of the



HOLC Residential Security Map for Detroit; Hearne Brothers 1937 sourced online

semiotic. For Marks, the *mimetic* can displace the symbolic sign and its co-option by capital. This displacement is realised in *Machine Space* by the *spatial practice* of the *camera/vehicle* in tracing a boundary of the spatial distribution of capital. By the presentation of a panorama of the city in this way, finance capital as an organising feature of the city is made evident. The impact on the residents of the city of the strictures of this organisation will be explored in the following section.

### ***Red-Lining and mimetic representation***

The route of the *People Mover* around downtown Detroit closely follows a cartographic demarcation of zones of financial-spatial risk. This co-occurrence of transit route and financial risk demarcation can be revealed by superimposing maps from different time periods over the city. If the 1937 *HOLC Residential Security Map* of the city is laid over a map of contemporary Detroit, the route of the transit can roughly be seen to shadow the demarcation between the risk exempt downtown, and the *red-lined* inner-inner city residential zone.<sup>42</sup> *Red-lining* is the term, coined by the communities impacted, for the designation of zones as a lending risk and thus the refusal of credit by financial institutions.

The conceptual basis for making this superimposition lies with the fact that the *Residential Security Map* guided, for nearly forty years (1937- 1977)<sup>43</sup>, mortgage lending for properties in the African American districts of the city. The previous chapter discussed the traces of human activities left as material evidence on the earth's surface and revealed by aerial photography. In this case, the *Residential Security Map*, through the refusal of finance, has material consequences that have persisted into the present. (Massey and Denton 1993; Wood 1992; Shapiro 2004)

---

<sup>42</sup> HOLC – Home Owners Loan Corporation was a government-sponsored corporation created as part of the New Deal. It was established in 1933 to refinance home mortgages currently in default to prevent foreclosure. It invented the modern mortgage, essential normalising the long term, amortized financing of land. The corporation was closed in 1951. [https://en.wikipedia.org/wiki/Home\\_Owners\\_%27\\_Loan\\_Corporation](https://en.wikipedia.org/wiki/Home_Owners_%27_Loan_Corporation)

<sup>43</sup> HOLC *Residential Security Map* for Detroit is dated 1937. *Red-lining* was outlawed by the Community Reinvestment Act 1977. cf [https://en.wikipedia.org/wiki/Community\\_Reinvestment\\_Act](https://en.wikipedia.org/wiki/Community_Reinvestment_Act)

This practice of superimposition recognises the space of the city as a palimpsest, a representation composed of layers that has been inscribed and overwritten by different hands and authorities.

Decades of under-investment in the material environment of inner city neighbourhoods in Detroit have contributed to the devastated materiality of this landscape, now inhabited by pauperised communities. (Sugrue 1996) The ownership of real estate is implicated in the distribution of wealth in the community. Shapiro's study of wealth and ethnicity in the US contends that 'Homeownership is by far the single most important way families accumulate wealth,' and goes on to support this with numerous examples of how leveraging a spatial asset can assure security, safety and further accumulation. (Shapiro 2004, p.3) In the east side of Detroit, as shown in *Machine Space* by the sliding aerial images described in the previous chapter, this disparity is vividly evidenced in the material environment. As this illustrates, the devastation begins in the residential streets just beyond the freeway perimeter of the downtown.

Following a circuit of the downtown, the *People-Mover* co-incidentally traces these boundaries of *red-lined* residential areas. In Detroit, residents beyond the boundary of the downtown have lived without access to mainstream sources of credit offered by banking and mortgage institutions for two generations. Mapped onto the *Machine Space* image as seen in the cinema, this community resides off-screen to the left hand side of the auditorium.

At the same time, access to finance is generally controlled by the institutions located in the Detroit downtown. For example, a significant employer and investor in the city centre is *Quicken Loans*, the second largest mortgage retailer in the US. As a non-bank and private company, *Quicken Loans* is the currently the largest participant in

the FHA insurance scheme, the rationales of which generated *red-lining*.<sup>44 45 46</sup> *Quicken's* holding company, Rock Ventures, is solely owned by billionaire Dan Gilbert and has extensive real estate holdings in the downtown.<sup>47</sup> The buildings housing financial institutions such as *Quicken* feature in the panorama of the city as a *visual repertoire* in *Machine Space*. In general, these institutions are located off-screen, to the right hand side of the visual image.

In the screen image, the implied location of these distinct spaces of loanee and lender, to either side of the perspective registered by the camera, is determined by the clockwise trajectory of the *camera/vehicle* as it circles the Detroit downtown. The trajectory of the camera thus inscribes the *red-lining* boundary as it is extant in Detroit.

A further way of conceptualising the camera is as a technology of remote, live vision. The *camera/vehicle* is a platform for the trajectory of vision, and can be described as a surveillance or patrol of the boundary. This framing of the camera as 'operative,' a broad definition of a 'vision machine,' is summarised by Elsaesser as -

... the technologies of imaging today are not means of assisting sight, whether of real or imagined things, but technologies of probing and penetration. As vision machines,

---

<sup>44</sup> FHA – The Federal Housing Administration is a United States government agency created in part by the National Housing Act of 1934. It sets standards for construction, underwriting, and insures loans made by banks and other private lenders for home building. The goals of this organization are to improve housing standards and conditions, provide an adequate home financing system through insurance of mortgage loans, and to stabilize the mortgage market. See further - [https://en.wikipedia.org/wiki/Federal\\_Housing\\_Administration](https://en.wikipedia.org/wiki/Federal_Housing_Administration)

<sup>45</sup> This means the financial products sold by Quicken are underwritten by Federal finance. An on-going lawsuit alleges Quicken mis-represented mortgage holder's income before the financial crisis of 2007-8, and claimed millions of dollars of compensation from the FHA.

<sup>46</sup> Employees of *Quicken* have been unable to access mortgages for properties in inner city Detroit in a widely believed instance of the persistence of *red-lining*. First reported in the Detroit News some years ago, this story has now become apocryphal.

<sup>47</sup> [https://en.wikipedia.org/wiki/Quicken\\_Loans](https://en.wikipedia.org/wiki/Quicken_Loans) See further - [https://www.nytimes.com/2017/01/21/business/dealbook/quicken-loans-dan-gilbert-mortgage-lender.html?\\_r=0](https://www.nytimes.com/2017/01/21/business/dealbook/quicken-loans-dan-gilbert-mortgage-lender.html?_r=0)



An interactive map showing how the vehicle platform for camera shadowed the people mover

PEOPLE MOVER ROUTE

📍 All items

CAMERA / CAR TRAJECTORY

- 👉 CAR SHOT 1
- 👉 CAR SHOT 2
- 👉 CAR SHOT 3
- 👉 CAR SHOT 4
- 👉 CAR SHOT 5

HOLC RED-LINED INNER EXTENT

📍 RED-LINED INNER EXTENT

Detroit PeopleMover & *Machine Space* camera route superimposed over Downtown Map. Also accessible in an interactive version online here - [http://www.bubblefilm.net/projects/machine\\_space\\_spatial-practice.htm](http://www.bubblefilm.net/projects/machine_space_spatial-practice.htm)

they generate knowledge that has little to do with human perception or seeing, in the sense of “I see” meaning “I know,” and more to do with controlling territory, occupying space, monitoring a situation, and mining it for useful information or active intervention.

(Elsaesser 2013)



If the camera is inspecting the boundary in its movement of *spatial practice*, this inspection is at the behest of some authority or power. Given this *visual repertoire* is *mimetic*, the cinema audience are thus complicit with the patrol of the boundary. In the image itself, an implication of the translucency of these images suggests we are apprehending the city through financial institutions.

Thus in this *visual repertoire*, the city is apprehended through a double moment of spatial visibility; by means of the *haptic* image of mobility, reflection and refraction; and by the *mimesis* of movement along the financial/spatial boundary, part of the palimpsest of the spatial representation of the city. How is this made explicit in the film? The linkage between the *People Mover* transit route and the *red-line* boundary is first signalled in the opening image of the film. Shot in close up, human fingers are depicted tracing the transit route as a solid *red-line* on a composite, touch screen image, of the city. This touch screen image is layered; part transit diagram, part map, and part aerial image. It can be described as a spatial palimpsest, referencing different strategies of representing space. In this context, activating or recovering the palimpsest testifies to the continuing traces of financial/spatial discrimination across the *production of space* in Detroit.



Frame-grab of opening image of *Machine Space* – fingers manipulate map of downtown Detroit (Connolly 2016)

## Conclusion

This chapter has staged an encounter between the phenomenological cinema, as conceived by Sobchack, and Lefebvre's notion of *spatial practice*. A hallmark of Sobchack's theories of the moving image is an emphasis on the situation of the camera and thus, by analogy of the eye, the spectator, receiving the moving image. The situation of camera/spectator in the encounter staged in the cinema models the intimate contact between body and space as the basis for spatial perception. This is a projection of the spectator, as 'an active partner in the image, both emotionally and cognitively,' into the domains of space and time registered in the moving image. (Aumont 1997, p.56) The analogies so constructed, bonding film image and spectator, suggest possibilities for cinema as a moving image translation of Lefebvre's *spatial practice*, the perceptive apprehension of space in everyday, habitual activity.

Given the strong analogies between Lefebvre's *production of space* and Sobchack's invocation of the cinema, this chapter has proposed this offers a framework for an actual visual artefact. The chain of arguments constructing this contention begins with identifying *spatial practice* with mobility, or the experience of movement. A link has been established with a *spatial practice* specific to Detroit, where the nature of mobility is overwhelmingly vehicular, described by Urry as 'auto-mobility.' (Urry 2004) Realised as a mobile, vehicular mounted visual depiction, *spatial practice* can be realised in a panorama, generative of an *affective*, cinematic spectatorship or 'transport' by image. (Bruno 2007) Given the rationale for the movement in *Machine Space*, this panorama is a representation as *mimesis* or 'imitation' by doing.

The *haptic* qualities of Akerman's *D'Est* foreground the material features, surfaces and peoples of the post-Soviet urban cityscape in the film. (Akerman 1995) In its layered presentation of the horizontal and vertical spaces and interstices of the built environment of the Detroit downtown, *Machine Space* accesses similar *haptic* qualities of the image. These *haptic* investments inform the spectator experience of the work in the cinema. In a development of the reach of the *haptic*, this *visual*

*repertoire* in *Machine Space* is attentive to the spatial configuration of the auditorium. The image is composed of three perspectives, implying three *visual pyramids*, or subtended views in the image. If, as Aumont attests, an image spatially situates its spectator, in this case the auditorium stands in for the space of the automobile interior projected by the image. (Aumont 1997)

This *visual repertoire of spatial practice* inscribes an additional *production of space* in its trajectory around the downtown. The inscription of the *cartographic palimpsest* in the route of the visual repertoire is referenced by images of the *Residential Risk* or *red-lining* map in the film. These references introduced in first shot of the film depicting a hand moving the map, and re-enforced through direct illustration in the bridging sections in *Machine Space*.

There are multiple and layered relationships between *spatial practice*, the cinema, and the specificity of Detroit as a site. They are demonstrated in *Machine Space* as an *assemblage of mimetic and haptic* visual images that, in combination, can be understood as a representation of *spatial practice*. Lefebvre's *production of space* has been shown to be generative how the moving image can address the multi-discursive nature of urban space as exemplified in Detroit.

The attentiveness of this address of the production of space in Detroit warrants the conclusion that *Machine Space*, as an artwork, fulfils the criteria as *critical spatial practice*. The rich, fertile, multiply coded rendition of the *production of space* in Detroit, informed by the social relations of the city, is a claim for the salience of *critical spatial practice* to film as an artwork. In a development of the exploration of the previous chapter, the discussion of *spatial practice* as representation has shifted focus to consider the aesthetic attributes of the image.

The mobile panorama of the Detroit downtown in this *visual repertoire* has been framed as *mimetic* and *haptic*, qualities that *transport* an audience. (Bruno 2007)

This *transport* invokes spaces of human freedom and liberation, an essential aim of Lefebvre's intellectual project, but also an aspect of *critical spatial practice* that claims to mobilise space to 'detonate' it and consider how it can be constructed otherwise. (Scott and Swenson 2015) The invocation of affect and pleasure in the reception of the work is an aspect of *critical spatial practice* that will be further developed in the thesis conclusion.

The following chapter explores Lefebvre's final *moment of spaces of representation*, the invocation of art and poesis in the depiction of the space. A significant thematic to the exploration ahead is the wider social context within visual depictions of material ascribed and related to Detroit operate. This wider social context includes understandings of the history and the contemporary state of economic and social conditions of the 'Rust-Belt,' the former industrial heartland of North America.<sup>48</sup> In spatial terms, the 'Rust Belt' is distributed across the Great Lakes; Detroit is near the centre of this economic geography.

---

<sup>48</sup> Cf. [https://en.wikipedia.org/wiki/Rust\\_Belt](https://en.wikipedia.org/wiki/Rust_Belt)

## Chapter 3

### Situating the *poetics* of Everyday Space

“No one sees the barn,” he said finally.

A long silence followed.

“Once you’ve seen the signs about the barn, it becomes impossible to see the barn.”

He fell silent once more. People with cameras left the elevated site, replaced by others.

We’re not here to capture an image, we’re here to maintain one. Every photograph reinforces the aura. Can you feel it, Jack? An accumulation of nameless energies.” ...

Another silence ensued.

“They are taking pictures of taking pictures,” he said.

(DeLillo 1986, p.13)

### Introduction

This chapter completes the encounter of Lefebvre’s *Production of Space* and the moving image as realised in the practical output of the research, the film *Machine Space*. The final spatial *moment* Lefebvre dedicates to the ‘lived’ experience of space, termed *spaces of representation*, is explored in this chapter. The intersection of this moment of *spatial production* with the cultural context of the ‘Rust Belt’ is a domain of contest however. This contest has guided the realisation of *spaces of representation* in *Machine Space* and will be discussed below.

This chapter first explores Lefebvre’s *spaces of representation* with reference to the notion of place, significant in the spatial discipline of cultural geography and a key idea informing the visual arts. The work of Yi-Fu Tuan and Doreen Massey, and the poetic approach to place exemplified by the work of Gaston Bachelard, will be briefly mentioned. (Lefebvre 1991; Tuan 1977; Bachelard 1992; Massey 2005)

Secondly, the intersection of *spaces of representation* with the context of the shared symbolic visualisation of Detroit as *ruin* will be explored. The *ruin* is a powerful visual

meme in contemporary North America; its realisation in popular media is surveyed by art historian Dora Apel; its parallel manifestation in the art world is critiqued by Martha Rosler. (Rosler 2010; Apel 2015) For both writers, *ruin* imagery is concerned with loss, and specific framings of the past. These framings can imply notions of social relations and causation that, as evidenced in a Detroit context, can be divisive and unfounded. As political commitments, these framings of the *ruin*, as ascribed by Apel, Rosler and more forcefully by Steinmetz, are antithetical to the research aims of this project. (Steinmetz In Hell and Schonle 2010)

Given this impasse, the film locates a *space of representation* in the home or house, a *space* that is also a place, 'lived' in, and subject to change over time. In Detroit, the home as symbolic place, a material structure, a financial asset and as spatial resource has been contested; reference is made to the work of Julia Yezbick whose *Domesticating Detroit: An Ethnography of Creativity in a Post-Industrial Frontier* explores these topics. (Yezbick 2016) Yezbick's invocation of the house as a resource informs the *space of representation* as a *visual repertoire* in *Machine Space*. This *repertoire* of the *suburban house* stages the playing of a board game, *LIFE*, itself a symbolic representation of the suburban environment, by three onscreen players. This game as an allegory of the *production of space* will be discussed.

### ***Spaces of Representation – the poetics of space in Lefebvre***

The third *moment* of Lefebvre's triad of *spatial production* is devoted to *spaces of representation*, or *lived spaces*. These depictions as *lived* means they are invested with human experience and are informed by subjectivity. As *symbolically* invested spaces, they are inscriptions of imagination and spatial inhabitation. As *symbols*, the meaning of these spaces is augmented by a property of 'standing in' for something else. Lefebvre considers this poesis of spatial depiction as he writes of -

... space as directly lived through its associated images and symbols, and hence the space of 'inhabitants' and 'users', but also of some artists and perhaps of those, such as a few writers and philosophers, who describe... space which the imagination seeks

to change and appropriate. ... [these spaces] overlay physical space, making *symbolic* use of its objects. [they] tend towards ... systems of nonverbal *symbols* and signs.

(Lefebvre 1991, p.38)

Lefebvre suggests *spaces of representation* have symbolic characteristics generated in the encounter of people and *space*. As described by the Lefebvre interpreter and academic Schmid, a *space of representation* -

... refers to the process of signification that links itself to a (material) symbol. The symbols of space could be taken from nature, such as trees or prominent topographical formations; or they could be artefacts, buildings, and monuments; they could also develop out of a combination of both, for example as “landscapes” ... the material “order” that emerges on the ground can itself become the vehicle conveying meaning. In this way a (spatial) symbolism develops that expresses and evokes social norms, values, and experiences.

(Schmid In Goonewardena *et al.* 2008, p.37)

Schmid suggests *spaces of representation* are ubiquitous within the *symbolic* exchanges that are evident in everyday sociality. *Allegories*, as narratives with obscured meanings, are also included in *spaces of representation*. (Lefebvre 1991) This *moment* of space fulfils Lefebvre’s aim of addressing the gamut of social relations as *productions of space*. Merrifield invokes this range and richness of his conception of space in his biographically inflected account of Lefebvre’s thought -

... Spaces of representation are the café on the corner, the block facing the park, the third street on the right after the Cedar Tavern, near the post office. Spaces of representation may equally be linked to underground and clandestine sides of life and don’t obey rules of consistency or cohesiveness, and they don’t involve too much head: they’re felt more than thought. A space of representation is alive: “it speaks. It has an affective kernel or centre: Ego, bed, bedroom, dwelling, house; or, square,

church, graveyard. It embraces the loci of passion, of action and of lived situations, and thus immediately implies time.”

(Merrifield 2006, p.110 quoting Lefebvre 1991 p. 42)

*Spaces of representation* are analogous to places; locations invested in the subjective, the experiential, and *affect*. This conception of *spaces of representation* has parallels in geography. The work of Yi-Fu Tuan explores place as an *affective* register of location; Doreen Massey’s dialogic conception of *space* as narratively inscribed exhibits many of the generative features of place. (Tuan 1977; Massey 2005) Tuan’s work isolates the *qualia*, or the qualitative registers of sensation,<sup>49</sup> as the basis for an understanding of place. Inseparable from subjectivity and biography, place for Tuan is constitutive of human existence in the world. (Tuan 1977)

Massey emphasises a dialogic approach, locating *space* in the unfolding of social relations and the enunciation of shared narratives. *Space* is multiple, plural and never completed, always under construction as a ‘simultaneity of stories so far.’ (Massey 2005, p.9) Massey’s conception of *space* as place is similar to Lefebvre’s *spaces of representation*; both are held to be products of discursive processes and realised over time. In *For Space*, Massey foregrounds the discursive rather than the *affective* – or emotive – registration of *space* as evidenced in Tuan and Lefebvre’s accounts. (Massey 2005)

The *affect* of place is central to Gaston Bachelard’s *The Poetics of Space*, a key text in the arts. (Bachelard 1992) Lefebvre cites this work in *The Production of Space* -

With his 'poetics of space' ... Bachelard links *representational spaces*, which he travels through as he dreams (and which he distinguishes from *representations of space*, as developed by science), with this intimate and absolute space. The contents

---

<sup>49</sup> Sensation as experience, as posited in philosophy and psychology – see for instance – <https://en.wikipedia.org/wiki/Qualia>



of the House have an almost ontological dignity: drawers, chests and cabinets are not far removed from their natural analogues ... namely, the basic figures of nest, shell, corner, roundness. ... The House is as much cosmic as human. ... The shell, a secret and directly experienced space, for Bachelard epitomizes the virtues of human 'space.'

(Lefebvre 1991, p.121)

Further on, Lefebvre concurs with Bachelard in his description of the provenance of *spaces of representation*: 'Redolent with imaginary and symbolic elements, they have their source in history — in the history of a people as well as in the history of each individual belonging to that people.' (Lefebvre 1991, p.41) Bachelard's concentration on the 'attachment that is native in some way to the primary function of inhabiting' illuminates the human relationship with space at the heart of *spaces of representation*. (Bachelard 1992, p.1) Yet mindful of the expansive remit of his *Production of Space*, Lefebvre suggests *The Poetics of Space* 'stands opposed to any analytic approach and even more to any global account of the generative process in which we are interested.' (Lefebvre 1991, p.122) Given the Marxist grounding of his theoretical framework, Lefebvre claims for his work a perspective that relates space to production, as informed by social process, and thus also open to social change.

Bachelard's work has interesting implications for Lefebvre's *spaces of representation*. The phenomenological investments in this conception of place suggest affinities between this *moment* and *spatial practice*. Yet the *symbolic* and *allegorical* forms and realisations of *lived* space identify cognition as the difference between them. As the perceptual apprehension of space, *spatial practice* is pre-cognitive, and invested in the primary encounter with the spatial. Cognitive operations generate *symbolic* meanings. It is in the realisation of *spaces of representation* as *symbolic* and *allegorical* that the distinctiveness of this *moment* of space is apparent.

## **Place and the *Space of Representation* in Detroit – the *Ruin***

How does the symbolism of *spaces of representation* relate to Detroit? The art historian Dora Apel locates the visual identity of the city in the media as ‘a vast network of ruin images, making the former Motor City the poster child of ruination in the advanced capitalist countries today.’ (Apel 2015, p.4) The city is symbolised by the ruin, a building or environment in a state of decay or material distress. The Detroit ruin is a derelict house; an administrative building or school; a modern factory, built in the last century. These ruins are near contemporary buildings that have been abandoned, not tumbledown structures from antiquity.

Apel claims the abundance and symbolic value of ruin images lies in their manifestation of widespread social anxieties in material form. (Apel 2015) Ruins, she suggests, symbolise concerns about ‘increasing poverty, declining wages and social services, inadequate health care, unemployment, homelessness, ecological disaster and degradation, and fear of the other.’ (Apel 2015, p.3) For Apel, these images enact a feedback loop between image and audience; ‘ruin imagery constructs the nature of modern decline and shape collective ways of seeing.’ (Apel 2015, p.4)

A discourse around ruins has a long provenance in the arts; invocations of time and materiality in ruins have large literatures. (Flam 1996; Schama 2004; Dillon 2011; Dillon 2014) Introducing a useful survey of ruins as artwork, the contemporary critic and writer Brian Dillon suggests -

It seems the harder we think about destruction and decay, the closer we stare at this or that crumbling mass of stone or concrete or steel, and the further we explore the very idea of the ruin itself, the less the whole category holds together. ... We ask a great deal from ruins, and divine a lot of sense from their silence.

(Dillon 2014 p5)

Writing in a Detroit context, George Steinmetz echoes Dillon, noting 'if all material objects are semiotically underdetermined, the ruin is particularly open to differing representations.' (Steinmetz In Hell and Schonle 2010, p.294) So how does a practice of ruin depiction speak of the motivations of artists and their audiences? This question has particular resonances in Detroit.

A significant platform for images of Detroit ruination is the large photo-book. Marchand and Meffre's *The Ruins of Detroit* presents monumental, formally composed vistas of architectural decay. (Marchand and Meffre 2010) They photographed abandoned and decaying public institutions (schools, libraries, police and railway stations), luxury hotels, small businesses, and industrial plants. In the accompanying text the photographers invoke the ruins of antiquity, describing the city as a 'contemporary Pompeii, with all the archetypical buildings of an American city in a state of mummification.' (Marchand and Meffre 2010 n.p.)<sup>50</sup>

The photographs of Andrew Moore's *Detroit Disassembled* (Moore and Levine 2010) focus on the interface between nature and culture evident in abandoned buildings in the city. Moore says of his work 'Where others see an end, I see a beginning. The potent forces of nature and entropy are starting reclaim and transform the Motor City.' (Moore and Levine 2010, p.21) Images such as *Walden Street* and *Couch in the Trees, Detroit* depict the vestiges of dwellings and furniture consumed by vegetation, their materiality in transition between an assignment as cultural or natural objects. (Moore – website 2008-9)<sup>51</sup>

In Apel's estimation, these photographers offer opposing yet oddly parallel depictive strategies. Marchand and Meffre's work presents 'a lamentation for irreversible decline and mortal rigor, while Moore's photographs ... offer a commemorative tribute to the beauty of decay and the resurgence of nature.' (Apel 2015, p.90) Although contrasting these approaches to photography are contrasted as on the one

---

<sup>50</sup> Marchand/Meffre - <http://www.marchandmeffre.com/bio.html>

<sup>51</sup> Andrew Moore - <http://andrewlmoore.com/cv/>

hand 'laments'; on the other 'romanticised reveries'; both allow for the inscription of subjectivity and identity in the material environment, qualifying them as *spaces of representation*.

Lefebvre suggests *lived space* is host to the 'clandestine or underground side of social life,' an activity literally manifest in the contemporary *urban explorer movement*. (Lefebvre 1991, p.33) Generally defined as the entry and exploration of the built environment, often by stealth and trespass, ruins are of particular interest to *urban explorers*. (Apel 2015) The blogger 'Ninjalicious' is cited by Apel as explaining the *urban explorer movement* as a search for excitement, laced with affection. 'We're in it for the thrill of exploration and a few nice pictures... We love the places we explore.' (quoted In Apel 2015, p.59) Websites like [detroiturbex.com](http://detroiturbex.com) present information about entering and exploring the ruins of Detroit; the most visited are the former *Michigan Central Rail Station* (1914 closed in 1988); the *Packard Automotive Plant* (1905 production ceased in 1958, the building has been mostly derelict since the mid-1990s) and the *Michigan Theatre* in the *Michigan Building* (1926, 4000 seat cinema, concert venue 1971-6, now a car park).

### **The *ruin* as object of mourning in Detroit**

Martha Rosler's text *Culture Class: Art, Creativity, Urbanism* is a wide-ranging investigation into the links between artists practice, urban change, and gentrification in North America. (Rosler 2010) A central observation is that artists' practice has contributed to 'the growing role of the visual – and its relation to spatiality – in modern capitalism, and thus the complicit role of art in systems of exploitation.' (Rosler 2010) This is a large claim, grounded in Guy Debord's notion that images mediate the social relations of capital. (Rosler 2010) As producers of images, artists supply the raw materials for this mediation and are thus complicit with it. By situating the social relations of images as inflected by Debord, Rosler suggests that *spaces of representation* have social-political implications; in particular

they are implicated in *productions of space* in major metropolises such as gentrification.<sup>52</sup> (Rosler 2010)

In Rosler's conception, the city of Detroit represents 'one of the great triumphs of capitalist manufacturing but also one of the great compromises between capital and labor.' (Rosler 2010) The ruin image is a vestige of this 'state-of-economic-grace,' and as an economic system, is implicated as *traces* in the *production of space* in the city. Rosler is interested in our access to this past mediated by the ruin. Ruination as a *trace* of the past implies loss, invoking mourning, and processes of imaginary possession. (Rosler 2010) For Rosler, these processes are activated by the depiction of ruins -

... only through the act of mourning something as having been lost can the melancholic possess that which he or she may never have had; the contours of absence provide a kind of echo or relief of what is imagined lost, allowing it to be held. In this respect, most art- world projects centring on decaying places like Detroit are melancholic monuments to capital, in the sense of depicting both the devastation left in its absence but also the politics it provoked. ... To be upper middle class and melancholic about Detroit is to firmly fix one's political responsibilities to a now absent past; mourning Detroit is a gesture that simultaneously evidences one's social conscience and testifies to its absolute impotence.

(Rosler 2010)

The social relations of ruins, Rosler suggests, manifest ascriptions, on behalf of artists and the art-world, to the absent people of past, *Fordist-era* Detroit. In other words,

---

<sup>52</sup> The process of 'gentrification' was first identified by the sociologist Ruth Glass in the London of the 1960s, describing how 'One by one, many of the working-class quarters of London have been invaded by the middle classes-upper and lower. Shabby, modest mews and cottages-two rooms up and two down-have been taken over, when their leases have expired, and have become elegant, expensive residences. Larger Victorian houses, downgraded in an earlier or recent period-which were used as lodging houses or were otherwise in multiple occupation-have been upgraded once again ... Once this process of "gentrification" starts in a district it goes on rapidly until all or most of the original working-class occupiers are displaced and the whole social character of the district is changed.' (Glass In MacGibbon and Kee 1964, p.xviii)

as the depiction of former spaces of work, play and dwelling in the city; images of ruins are the symbolic *spaces of representation* of the industrial working class. Yet Rosler maintains that however persistent and desired, the people and activity invoked by these images are no longer extant in Detroit. (Rosler 2010) The *Fordist* working class city of Detroit, a city of mass employment, high wages and union membership, is a social formation of the past.<sup>53</sup> (Sugrue 1996; Amin 1995; Daskalakis, Waldheim and Young 2001; Rosler 2010)

In this context, Rosler's final observation implies ruin depictions function as doubled signifiers of loss in an art-world context. Not only do ruin depictions symbolise a vanished working class; the reminder of this disappearance also signifies a loss of class agency in a contemporary era of unfettered capital exploitation and globalization. Steinmetz suggests that a feature of the lost world/object of the melancholic is the absence of social conflict. (Steinmetz In Hell and Schonle 2010, p. 318) This is an innovative framing of the city's history, given the degree of conflict over unionisation of the workforce in the auto industry from the 1930s to the 1950s, as documented by Widick in his *Detroit: City of Race and Class Violence*. (Widick 1989)<sup>54</sup> Steinmetz supports his contention that an idyllic past is invoked by the nostalgia attendant on the ruins of Detroit in the footnotes to his essay -

... what is distinctive about the cultural system of Fordism and the present day nostalgia for that system is the belief that it attenuated social stratification. Nostalgic activities around Detroit's industrial history, such as Ford's official presentation at the company's River Rouge plant tour, tap into and nourish neocorporatist public memories in which class differences are symbolically overcome.

(Steinmetz In Hell and Schonle 2010, p.318)

---

<sup>53</sup> UAW – Union of Auto Workers; a significant Union for autoworkers with a powerful mandate under the leadership of Walter Reuther 1946 – 1970. Membership, once 1.5 million is now 390k. Source – [https://en.wikipedia.org/wiki/United\\_Automobile\\_Workers](https://en.wikipedia.org/wiki/United_Automobile_Workers)

<sup>54</sup> Widespread violence in connection with unionization of Ford was exemplified by the Battle of the Overpass in 1937, between the UAW and up to forty Ford Company thugs. Three years later, the UAW was finally recognized by Ford. For the full narrative, cf (Widick 1989)

Steinmetz suggests that in a Detroit context, recalling the corporate achievements of Fordism is exclusive of the memory of the struggles of labour and unionisation in the city. Apart from the omission of the long struggle with the UAW, there is no mention at the River Rouge Visitors facility of Ford's role in pioneering the de-centralisation of auto production from its base in Detroit in the early 1950s, a national precursor to the processes of international globalisation thirty years later.<sup>55</sup>

From a Lefebvrian perspective, this framing of spaces as the repositories of loss may not make generative contributions to knowledge of the *production of space*, as informed by on-going processes of capital. It is worth pointing out that the subjective locus of loss, as informing the experience of spatial *production* of the ruin, may be temporally contingent. It is salient that the specificities of union membership and stable employment of 'Fordist' Detroit are increasingly remote from contemporary lived experience. Steinmetz is forthright; in a Detroit context, ruins are vessels for *nostalgia*, or 'the sense of having lost an entire socio-historical context and the identifications that accompany it, and the related desire to re-experience that past.' (Steinmetz In Hell and Schonle 2010, p.299) Given present conditions in the city, Steinmetz goes on to claim that while 'some acknowledge the racism and class exploitation that pervaded everyday life in Detroit during the Fordist era ... others blame the African American majority for Detroit's deterioration.' (Steinmetz In Hell and Schonle 2010, p.299)

As discussed in the first chapter, Marsha provides a voiceover contribution to *Machine Space* with a reminder that the urban freeways were constructed at the expense of the hub of African American life in Detroit. Marsha's voiceover follows this with a statement on the tensions, revolving around the space of residence, in the social relations of the city. Living in the city, she suggests, was contingent on segregation and the financial interests imbricated in space as real estate –

---

<sup>55</sup> Personal visit to Ford Company Museum and Rouge Plant Visitor Centre with family, August 20 2016.

08'06"

MARSHA MUSIC

There were interests that were driving attitudes, fears...  
Real Estate companies would call people in the neighbourhoods  
and basically terrify them.

They would tell them - you know, a black moved on the next block, you better sell your home  
right now and get out before its too late –  
your home will not be worth anything.

And you have to realise, this is during a time in the late 1940s and the early 1950s where  
what we understand as urban crime today and crime in the cities was not a factor.

You know many people sort of create memories about this,  
and talk about how their people moved out because of crime  
and fear your schools,  
things that happened at the de-stabilisation of the city.

But in those early times of the city - those weren't factors.

So it was mostly the fear that was drummed  
throughout the city in all areas of the city.

By describing them as having been driven out of the city,  
I was trying to describe this tremendous cloud of fear  
that permeated the city to try to compel whites to leave their homes.  
And to turn this real estate over; and to make a lot of people rich.

*Machine Space, Connolly 2016*

Marsha is describing the manipulation of 'fear' of African American residents of the city, powered by real estate and financial interests. She suggests that this 'fear' was a causative factor in the movement of whites to the suburbs, as reflected by Sugrue's observation of Detroit that 'blackness and whiteness assumed a spatial definition.' (Sugrue 1996, p.9) Marsha also cautions against a tendency to 'create memories,' remarking of this migration of whites, that it occurred before the city



witnessed a turn to crime, and education standards in the city's schools declined. (Marsha In Connolly 2016) It should also be noted that Marsha speaks of the period from the 1940s to the early 1950s, a time of peak population of Detroit (2 million) and the height of *Fordism*, the 'economic state of grace,' invoked by Rosler as a mourned lost object of nostalgia. (Rosler 2010)

The work of exploring the basis for 'fears' is beyond the remit of *Machine Space* as a cinematic encounter with the spatial theory of Lefebvre. Although ruins offer a perspective on the *production of spaces* of Detroit, the conceptual basis of Lefebvre cannot address this 'fear.' The context in which Marsha's testimony is given in *Machine Space* is one of *spatial practice*. As described in the last chapter, Marsha speaks over a *camera/vehicle* journey through the downtown at night. This cinematic, nocturnal sally, is a suggestive accompaniment to the invocation of 'fear.' The wider point is that, pertinent to the *moment* of space under consideration here, *Machine Space* has thus avoided engaging with the ruin in its symbolic realisation of this particular city. Instead, *Machine Space* is invested in exploring the on-going *production of space* of Detroit.

### **The House as space of representation and dwelling in Detroit**

Attention can be turned to the house as a *space of representation*. As a dwelling, the house is inscribed by continuously unfolding social life and change. Over the past century, the house in residential Detroit has been continuously reimagined, and more recently reclaimed and re-appropriated into new spaces of *production*. (Yezbick 2016) Inscriptions of the house are rich in association and potential as a *space of representation* in *Machine Space*.

Yezbick's account of the material history of the Detroit house begins a century ago in 1915. At a period of rapid industrial expansion in the city, the emerging Ford Motor Company supported a housing market for autoworkers. The high wages paid by Ford

included options to finance the purchase and improvement of dwellings. Significant social obligations with regard to standards of dwelling were mandated for employees, enforced by the company's Welfare Department. (Yezbick 2016) Ford's prescriptions for the home and its linkage with supposed social virtues were illustrated in publications. As described by Yezbick -

Ford's utopic vision for his employees was laid out in (these) booklets, clearly showing in words and images the changes wrought through his largess. The images showing the homes of Ford employees who passed the inspections of the profit-sharing plan made an unmistakable connection between a clearly illustrated notion of domestic righteousness, good citizenship, and profit. This corporate welfare scheme placed a social value on the object of the single-family home, extending it beyond simply a symbol of economic class, thus linking the single-family home with other social values such as employment, nuclear families, and sobriety, and marking individuals as not only productive workers ("Ford men"), but as productive members of society contributing to the well-being of their families and communities.

(Yezbick 2016, pp.47–8)

Yezbick suggests the house as material and financial object contributed to the social relations and economic system of *Fordism*, the 'economic state of grace' as invoked by Rosler above. (Rosler 2010) Keller Easterling, in her exploration of *Subtraction*, or the architecture of demolition, writes –

In 1934 the FHA (Federal Housing Administration) legally transformed houses into a kind of currency ... the house connected two areas of distress; jobs and banks. Construction was a big employer at the time, and the house created jobs while stimulating banking. The FHA developed a mortgage formula whereby the house became a commercial multiplier by developing a streamlined financial organ – the long term, low-interest loan. ... Economic science dictates that the house should behave in two ways. It should be an immaterial node in the pulsing global networks of finance, but it should also be a stable space to which a very agreeable inhabitant

returns and sleeps night after night. This dual role maximises profitability for the financial institution.

(Easterling 2014, pp.19–20)

This dual index of the house as a realisable, standardised asset, contributes to the *production of space* in residential Detroit. However, these spaces as realisable financial assets excluded African Americans, as mentioned in the previous chapter.<sup>56</sup> (Easterling 2014; Yezbick 2016) The house as a materialisation of ‘domestic righteousness, good citizenship, and profit’ – a triangulation of property, banking and employment, was beyond most African Americans during the ‘economic state of grace’ of Fordism. (Rosler 2010; Yezbick 2016) Around the same period as noted before, African Americans as a proportion of the residential population in Detroit grew from 12% in 1950 to 83% in 2010. (Sugrue 1996; US Census 2010) These inscriptions within the domain of the *representation of space*, as explored in previous chapters, are a foil to the image of the *suburban house* in *Machine Space*.

### ***Spaces of representation in the house of Machine Space***

A static, interior tableau shot of three people sitting around an occasional or *side* table, introduces the house as a *visual repertoire* in *Machine Space*. The content of the four segments of this *repertoire* will be described, starting with the ‘master shot’ of a three member ‘family’ playing the board game of *LIFE*.

The camera viewpoint is low, approximately at waist height, and a large picture window stretches across the image behind the ‘family’. At the centre of the composition, a young boy sits with his back to us, facing a board game on the *side*

---

<sup>56</sup> FHA – The Federal Housing Administration is a United States government agency created in part by the National Housing Act of 1934. It sets standards for construction, underwriting, and insures loans made by banks and other private lenders for home building. The goals of this organization are to improve housing standards and conditions, provide an adequate home financing system through insurance of mortgage loans, and to stabilize the mortgage market. See further - [https://en.wikipedia.org/wiki/Federal\\_Housing\\_Administration](https://en.wikipedia.org/wiki/Federal_Housing_Administration)

table. A middle-aged man is sat to the left, across the table a woman is sat to the right. The three figures are backlit by the natural light streaming through the window and appear as silhouettes or outlines, with features of identity masked. Through the window, a screen of trees can be seen; beyond them a body of water may be discerned in the far background. This 'master shot' recurs throughout the *LIFE* segments in the film. The players will be referred to as MAN, CHILD and WOMAN consistent with the discussion of the script to come.



*Space of Representation in Machine Space - the Suburban Home* (Connolly 2016)

The three people are playing a board game called *LIFE*, a staple family activity in North American households (sales of the game amount to over 35 million).<sup>57</sup> The invention of *LIFE* can be traced to 1860; the company named for the inventor, Milton Bradley (MBM), revived it on the centenary of the game in 1960.<sup>58</sup> The object of *LIFE* is enfolded within an invitation to play; 'You too can be a Millionaire in this game of Life' assures the instructional text. (MBM Games 1963) As described by a writer in the magazine *The New Yorker*, the game –

---

<sup>57</sup> [https://en.wikipedia.org/wiki/The\\_Game\\_of\\_Life](https://en.wikipedia.org/wiki/The_Game_of_Life)

<sup>58</sup> [https://en.wikipedia.org/wiki/The\\_Game\\_of\\_Life](https://en.wikipedia.org/wiki/The_Game_of_Life)

... was reinvented as a lesson in Cold War consumerist conformity, a kind of two-dimensional Levittown, complete with paychecks and retirement homes and dental bills. Inside the game box are piles and piles of paper (Life is . . . paperwork!): fake automobile insurance, phony stock certificates, pretend promissory notes, and play money, seven and a half million dollars of it, including a heap of mint-green fifty-thousand-dollar bills, each featuring a portrait of Milton Bradley near the end of his days—bearded, aged, antique.

(Lepore 2007, p.2) <sup>59</sup>

Lepore situates *LIFE* in a genre of 'square board race games' and claims it is related to 'snakes and ladders.' (Lepore 2007, p.3) These games originate in India as the 'Knowledge Game,' briefly summarised as 'land on a virtue and you get to climb a ladder toward the god Vishnu and karmic liberation; land on a vice—or karmic impediment—and you're swallowed by a snake.' (Lepore 2007, p.3) In place of 'karmic liberation', *LIFE* is invested in the social relations of Fordism, the 'economic state of grace' invoked above. By steady accumulation of money and assets in player's progress through the game, the aim is to achieve millionaire status rather than the grace of god Vishnu. (Lepore 2007, p.3)

In the film, the game play unfolds in four scenes distributed through the running length of the work. The importance of rules that govern and guide play make a case for the game of *LIFE* as *enactment*, a routine performance of activity captured by the camera. As a board game with a journey or 'race' like route, it has an inherent narrative arc from start to the conclusion of play. (Lepore 2007, p.3) In a parallel to the progression of the game, each segment in the film features new visualisations of the game play or *enactment*. In the second and third segments for example, hand held, close-up, insert shots document the handling of the game objects and counting money. *Facsimile-framings* of paper bills of exchange, similar in appearance to banknotes, punctuate the images of game play. Named *Promissary Notes* and *Fire*

---

<sup>59</sup> Levittown was a 1947 settlement of factory built, single-family dwellings built by a single developer, a prototype for subsequent suburban expansion in North America. [https://en.wikipedia.org/wiki/Levittown,\\_New\\_York](https://en.wikipedia.org/wiki/Levittown,_New_York)

*Insurance Certificates*, these insert images are given *haptic* attributes by being shown as material objects, handled and exchanged by visible human hands. The mobility of the camera implied by these alternate framings model *tactile* and participatory audience spectatorship. (Marks 2000)

The production process of realising the game as moving image also featured repetition. The screen *enactment* of *LIFE* has been assembled in post-production from three iterations of pro-filmic game play.<sup>60</sup> The filmmaker's family were first gathered to play the game and filmed. Their dialogue on the sound track was substituted by Automatic Dialogue Replacement (ADR), the process of substituting speech, recorded with visual image, with a new performance – this time *enacted* by staff and friends at the Wexner Centre in Ohio. This group also played a further, free iteration of the game. Both of these substitute sound performances feature on the soundtrack in *Machine Space*. Small mismatches of dialogue in relation to the visual image may be apparent to a highly attentive audience in a cinema. Incidentally, both free performances returned an identical result - the boy beat the adults at the game by a large margin.

### ***The space of representation as allegory***

How can the *house* and the game in *Machine Space* be framed as a *space of representation*? Within the terms of the *visual repertoire* of this *spatial moment*, the staging in the house is *symbolic*; the *enactment* of the game as the narrative engine of the staging is allegorical. In other words, the staging in the *suburban house*, as a *visual repertoire*, is a symbolic 'standing in' for a configuration of the house as 'Fordist' material commodity and asset. Following Benjamin, as an activity - or experience - the game is an *allegory*. (Cowan 1981) In this case, the allegorical

---

<sup>60</sup> The image and sound was recorded in summer 2014 in St Catharines, Canada in the location indicated. Sound for the game was recorded in two further iterations of the game at the Wexner Centre in Columbus Ohio, in spring 2015. As mentioned, the first and second iterations of the game were free form; the final iteration was a sound-only session following a script extracted from the first iteration.

content in the game lies in its imitation – or *mimesis* – of processes of remote accumulation by rents on financial investments. The game is re-imagined as the collection and exploitation of financial assets.

Lefebvre frames *spaces of representation* as conventional and normative, as shared, expressive registers of *space*. (Lefebvre 1991; Merrifield 2006) In *enacted* terms, the first segment features the players, MAN, CHILD, WOMAN seated left to right in the visual image, setting up the gameplay. The WOMAN takes the role of the *banker*; she will control and monitor the exchanges of money in the game. Gameplay commences, and players move their counters around the board. Early on, the CHILD is fortunate, gaining financial windfalls. As the game progresses, it becomes evident the MAN will lose. His assets are destroyed in acts of natural disaster; consequently the MAN borrows money and complains about his misfortune. In the final segment, the CHILD is heard counting his winnings. The large margin of the CHILD's victory is given emphasis by the length of the sound recording of this tallying of banknotes; the WOMAN and MAN then congratulate him on his success in the game.

In the game instructions, the aims of play are given as –

You too can be a Millionaire in this Game of Life. That's the object of the game. It all centres around the Wheel of Fate. You start out on Life's highway, just out of high school, with a car and \$2000. As you travel, you will meet with success, failure and revenge. Your luck – your decisions – may give you more than one chance to make good.

(MBM 1960)

The goals of the game are explicit – to amass wealth. The instructions use a spatial metaphor – 'Life's highway' - to compliment the temporal development implied in the biography. (MBM 1960) In this metaphor, time is repurposed as movement through space, and the game tokens are automobiles. 'Fate' is appended to a spinning wheel, generating outcomes as products of chance. Game success and

failure, quantified as wealth, are stages along an implied *biography*, symbolically represented as traversal of *space* by a model car. Hence *biography* as a *space of representation*, mediated through the symbol of the road, is a central framing device in the game. The trajectory of the game is an *enactment* of a schematic *biography*, however 'lacking in choices and one-dimensional'. (Lepore 2007, p.1)

In this *staging* of the game, the players – WOMAN, MAN and CHILD - replicate in gender assignment and age a normative 'family' structure. Situated in the 'family', the game *enacts* social *reproduction*, or the transmission of social conduct from adults to children. An extension of the notion of *production* in the thought of Marx and Lefebvre, *social reproduction* explains enduring stratifications of wealth, power and influence across time and familial generations.

The mechanisms of inter-generational transmission were developed by the sociologist Pierre Bourdieu as processes of *symbolic violence*; the imposition of meaning while concealing the uneven power relations and the force of its application. This the first axiom of his work *Reproduction in Education, Society and Culture* (1979) -

Every power to exert symbolic violence, i.e. every power which manages to impose meanings and to impose them as legitimate by concealing the power relations which are the basis of its force, adds its own specifically symbolic force to those power relations.

(Bourdieu and Passeron 1990, p.4)

Bourdieu considers that *symbolic violence* lies at the heart of *social reproduction*; specifically focusing on education as a site for this process. This *visual repertoire* in *Machine Space* presents framings of capital, space and biography constructed by *LIFE*, as content for *symbolic violence* to be *enacted* in a space or leisure or game. The fourth and last segment of the game in the film confirms *symbolic violence* as a



process of social reproduction has been successfully achieved – the CHILD wins the game by a large margin.<sup>61</sup>

In the following exchange from segments 2 and 3, the financialised and transactional nature of every exchange is foregrounded. In the first, the CHILD and MAN receive chance financial windfalls, while in segment 3 the prospect of debt and natural disaster afflicts a player –

#### GAME SEGMENT 02

CHILD

Weekend in Las Vegas – collect fifty thousand dollars.

WOMAN

Shazzam! That’s why it pays not to go to college.

MAN

What! Fifty Thousand dollars! Why did I go to college...

WOMAN

I collect my salary though which is a measly five thousand dollars because I passed payday...

MAN

One – can’t land there so I go there. Find Uranium deposit  
– collect one hundred thousand dollars!

CHILD

Geez!

---

<sup>61</sup> In both enactments of the game for the production of the film, with completely different players, the child won the game. In the author’s opinion having witnessed (and recorded) them, the adults were not visibly ‘allowing’ the child to win.

WOMAN

Better find the big bills for that. Here you go sir.

MAN

Thank you.

...

GAME SEGMENT 03

CHILD

One two three four five six seven eight nine  
Sweepstakes winner! Collect hundred and fifty thousand dollars!

WOMAN

We are breaking the bank boy.

MAN

Nice job Michael – you really earned that.

CHILD

I know – right.

WOMAN

My turn?

MAN

One; two; three; four; five; six.

Cyclone. Wrecks home.

Pay forty thousand.

Can I get some more promissory notes?

*Machine Space Connolly 2017*

The goal of amassing wealth in *LIFE* is *explicitly* demonstrated by the obvious pleasure the players exhibit as they gain large sums of money. The game clearly references a capitalist domain of differentiated spaces, where accumulation is enabled and sanctioned, and flows to distant investors. Secondly, the gains in wealth modelled in the game do not arise as a consequence of skill or work in the gameplay, a normative explanation for wealth. In the *enactment*, the MAN acknowledges this, commenting on the CHILD's windfall - 'Nice job, Michael – you really earned that.' (*Machine Space* 2017) This irony in this exchange issues from a dissociation of monetary gain from labour or the application of skill or talent.

As the game of *LIFE* is being set up and organised amongst the players, there is also a heightened sense of a 'scene of fiction' under construction. This is foregrounded by the action of the CHILD who turns to camera and addresses the cinema audience directly. This exchange traverses the boundary between the spatial domains occupied by the *enactment*, and the space of spectatorship or cinema auditorium. As a spatially transgressive event in the *enactment*, it acknowledges this separation of audience from the reserved space of the screen.

In the visual repertoire of *spatial practice*, the downtown of the city is seen through translucent images of offices of the corporate America. This hub of the auto industry is apprehended through the financial and abstracted operations of business, rather than the material operations of production.<sup>62</sup> As cited above, Lefebvre suggested as early as 1971 that 'the production of space itself replaces - or, rather, is superimposed upon — the production of things in space.' (Lefebvre 1991, p.62) As a re-iteration of this perspective, the historic *red-lining* interface between the downtown and nearby neighbourhoods, a financial boundary, is invoked by *mimesis* in the journey around the downtown. In other segments of the film, aerial images, as a visual repertoire, 'stand in' as fully quantified registers of the *moment of representations of space*. Aerial images document the impact of the disciplines of

---

<sup>62</sup> The center of Detroit has largely been purchased by the owner of a real-estate mortgage company – Dan Gilbert of *Quicken Loans* and owns over 60 million square feet of office space. Cf. *Quicken Loans, the New Mortgage Machine*, New York Times (Creswell 2017)

urban and economic planning and generate a discourse of *space* as a quantifiable, *financialised* resource.

Through this pervasive *thematic* of imbrication of finance and space, *Machine Space* suggests a continuum of resource quantification throughout *public*, urban space, and the *private, domestic* domain. All spaces are implicated in monetary quantification. As cited above, Easterling frames the house as the material manifestation of ‘a streamlined financial organ – the long term, low-interest loan.’ (Easterling 2014, pp. 19–20) The pervasive nature of this practice lends credence to Lefebvre’s claim that the *production of space* is deeply informed by the social formation of production, in this case organised by capital. (Lefebvre 1991)

As has been mentioned, a ‘social dynamic’ of the Detroit Metro region can be found in the bifurcation between city and suburb; the latter exhibiting favourable metrics of social well being; the former existing in a state of extreme poverty and deprivation. (US Census 2010) Harvey suggests the difference between these spaces has consequences for the environment and the North American polity –

... suburban separatism in the US - based upon class and racial antagonisms - increases car dependency, generates greenhouse gasses, diminishes air quality and encourages the profligate use of land, fossil fuels and other agricultural and mineral resources. Militant particularism here functions as a seemingly immovable conservative force to guarantee the preservation of the existing order of things. Even when such a politics dresses up in democratic or radical clothing, its drift lies towards exclusionary and authoritarian practices.

(Harvey 2001, pp.190–91)

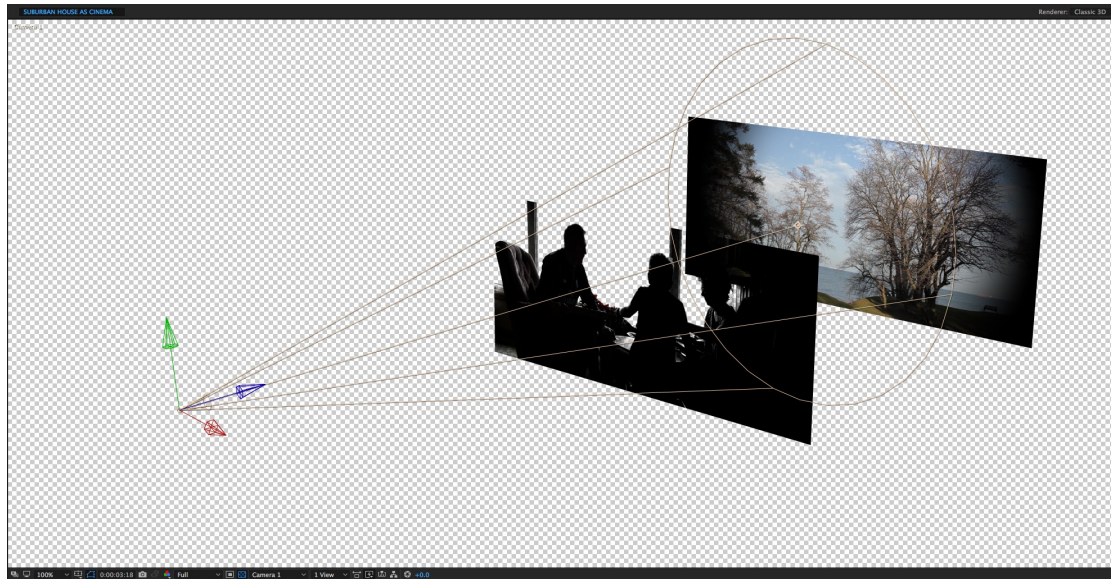
In the case of the film, a number of visual cues locate the staging of this *visual repertoire* in a notional suburbia of the Detroit Region. The grounds of the house, visible through the picture window, and the lake in the far background of this image have been described; as a contrast to the downtown they reference *Metro* Detroit.

That is, they are distinct from the residential neighbourhoods of the city, distinguished by the scale of the grounds (far beyond the lot), and the presence of water. Linkages of distinction between this site and the downtown space that is seen in much of *Machine Space* may be invoked by this operation of difference; but is there another means by which an audience, unfamiliar with the spatial structure of US cities, can be made aware of these connections?

I contend that the spatial co-ordinates of the *staging of game*, before the picture window, *mimic* the spatial co-ordinates of the space of spectatorship in the cinema auditorium itself. In an instance of *spatial (re)-production*, the space of the reception of the cinematic image is also depicted in the visual image of the suburban house. Rather than the invitation, given in the repertoire of *spatial practice*, to consider the cinema as a mobile platform to view the city, the depiction of the act of cinema spectatorship is brought to this *space of representation*. The configuration of the screen image can be taken as a visualisation of its own projection in the cinema auditorium.

How is this image of cinema spectatorship achieved? The diagram below offers an exploded view of the spatial depth of the 'master shot' in this *visual repertoire*. In the foreground, closest in this virtual space to the audience in the cinema, sit the 'family,' playing the game. Behind them, in the medium ground, the window frame of the house is separates the inside from the outside space. Furthest away from the audience, is the spatial plane of the garden grounds and lake, in deep space behind the window frame. The co-ordinates of the visual pyramid, centred on the spatial organisation of the cinema audience, are indicated in the diagram by the sketched cone.

The window as an aperture has long served as a metaphor for cinema as a offering a view onto the world. Elsaesser reminds us that projecting a film in the cinema –



Spatial perspective diagram of Suburban House staging – *Machine Space*  
(Connolly 2016)

... the (real) two dimensional screen transforms in the act of looking into an (imaginary) three dimensional space which seems to open up beyond the screen. And ... (real and metaphorical) distance from the events depicted in the film render the act of looking safe for the spectator, sheltered as s/he is by the darkness inside the auditorium.

(Elsaesser and Hagener 2015, p.14)

This description of the window and spectator in cinema are reflected in the staging in this *space of representation*. In this depiction, the window is a visual portal onto a further spatial domain, a garden. These two spaces are separated by the glass screen of the window; the garden outside a world apart from that depicted in the rest of *Machine Space*, a place of concrete and distressed materiality. The players, silhouetted against the window aperture, continue their game in darkness, these conditions mimicking those in the cinema auditorium.

This is an opening for the audience to self identify with the game players, ostensibly residents of a suburban house near Detroit. It should be borne in mind these suburbs are privileged enclaves with average incomes of over twice that of the city. This

identification presents an opportunity for a heightened awareness on behalf of the author of the relative privilege and economic advantage of both filmmaker and audience in the institution of artists' cinema. The audience of this film are sited as complicit in this space.

## Conclusion

Lefebvre's notion of the *space of representation* has been presented in this chapter as closely aligned with the thought of Tuan and Massey in the realms of geography, and by extension the notion of place in visual art. An engagement with extant theories of place is illustrative of the reach and wide applicability of Lefebvre's overarching *production of space*. However, the siting of *spaces of representation* as a *moment* within a larger scheme of *production* has been shown to be generative of deeper and wider analysis of space.

The *space of representation* discussed as context – the large body of *ruin* imagery claiming to symbolise the material and socio-economic conditions in Detroit - yielded interesting conclusions. As reported by local academics, images of *ruins* can be invested with sentiments of nostalgia and racism. A film using images of *ruins* would need to address these very complex social relations in a manner that is sensitive and appropriate given a rapidly changing, challenging, contemporary socio-cultural context.

*Machine Space* instead presents a *space of representation* as a suburban house. Given Lefebvre's inclusion of play and leisure with this spatial *moment*, the *enactment* of the game of LIFE in this space is a link to his theory. The suburban house is a space of memory, and shared biography for a typical audience for *Machine Space*. In the film, the space is not presented statically, rather it is a stage for *enactment*, symbolising processes invoked in the other segments of the film. The gameplay of *LIFE* requires space and property to be framed as financial assets; referencing the processes that lie behind the spatial injustices evident in the city.

The game is an activity of *social reproduction*, the transmission of ideas and mores across generations from adults to children. This transmission, the 'reproduction of society as it perpetuated itself generation after generation, conflict, feud, strife, crisis and war notwithstanding,' according to Lefebvre, has spatial implications. (Lefebvre 1991, p.32) Thus conceptions of the social relations of space pass from one generation to the next. In *Machine Space*, the transmission of these relations as a game, locates the relations of the *production of space* as a resource into the home. As allegory, this is enacted across the context of this *visual repertoire*. This siting of the economic relations of the *production of space* in this manner is a contribution the film can make to a *critical spatial practice*. It opens up new perspectives on the *production of space* in the social formation of North American cities such as Detroit.

Finally, the spatial arrangement of the master shot of the *visual repertoire* can be seen as reflecting the cinema auditorium. The distribution of the family across the image, in front of the framing of the garden landscape, mirrors the seating of an audience in front of the cinema auditorium. By this locative strategy, the audience is co-opted as locating themselves in the staging of the game. This is an invitation to an audience to be complicit in the *production of space*, an essential aspect of a work of *critical spatial practice* and an appropriate complement to the uncovering of the *production of space* in the everyday.



## Conclusion

### The Spatial Cinema // Redux

The foregoing chapters have presented an encounter between Lefebvre's three *moments of spatial production* and the cinema. Each *moment* of space has been given a cinematic translation in *Machine Space*. The film as an *assemblage* presents these translations as three *visual repertoires*; perspectives on the *spatial production* of the city of Detroit.

These perspectives offer spatial representations outside the remit of the aesthetics of *landscape* and place. Instead Detroit is portrayed through its unevenly distributed spaces; as mobility and the spatial experience in the city; and as a site of material infrastructures. These framings of the city generate an artwork as a *critical spatial practice* – an investigation of the *use* and representation of space. (Scott and Swenson 2015) In the cinema auditorium meanwhile, the work generates particular spatial experiences of spectatorship, exhibiting the reflexivity that *critical spatial practices* – *critical* denoting an awareness of their own statuses as knowledge forms and spatial productivity - exemplify.

---

Chapter One explored the *representation of space* in the artist's cinema, offering the example of James Benning's work. If the built environment is directly legible, his *California Trilogy* offers a representation of the *spatiality of capital*. This research builds on Benning's practice, replacing the formal restraint of his practice with a translation of the multiple *productions of space*. An *assemblage* cinematic form, demonstrated in *Machine Space*, addresses the three moments of the spatial as defined by Lefebvre. These framings of space go beyond the claims made for legibility of the political economy of space by the singular *representation of space* evident in Benning's work.

*Machine Space* adds narration to aerial images; as a filmic *assemblage* these most distanced and omniscient images are imbricated in the social relations of the spaces they depict and create. This chapter concluded that the *assemblage* form is requisite as a translation of Lefebvrian spatial production into the cinema. This first chapter sets the overall terms of engagement between Lefebvrian *space* and the cinematic form of *Machine Space*.

Chapter Two discussed the encounter of Lefebvrian *spatial practice* with the cinema using the work of Vivian Sobchack as a mediator. For Sobchack, film is the expression of 'experience by experience.' (Sobchack 1992, p.4) In this conception, film engages all of the senses; the *haptic* associated with the skin specifically invokes touch through the suggestion of material contact in film. The *haptic* is evident in the registration of the amorphous forms and surfaces of streetscapes of Akerman's *D'Est*. (Akerman 1995) These qualities of the image are referenced and built upon in *Machine Space*.

Detroit warrants an automotive cinematographic panorama as the city of the car. The visual journey also traces an obscured cartographic fact of the city – its division into spaces of differential financial risk. This journey marks the boundary between *red-lined* areas of town, a space in which loans are withheld from residents – and the downtown; where these decisions are made. In conclusion, the *visual repertoire* of *spatial practice* is also able to invoke the habitual negotiation of structural inequalities in the city; to *mimetically* entrain an audience in their patterns and forms.

Chapter Three discusses the *moment* of *spaces of representation* in a wider context of mainstream representations of Detroit in the media and the art-world. These are overwhelmingly images of the *ruined* material environment. Apel, Rosler and Steinmetz suggest they function as emblems of social and economic conditions in the 'Rust Belt' in the US and objects of nostalgia and mourning. (Steinmetz In Hell and Schonle 2010; Rosler 2010; Apel 2015) Given these inscriptions, *ruins as landscapes* do not feature in the visualisation of spaces in *Machine Space*. Their use in the film would be at odds with the Lefebvrian framework of the *production of space* at the centre of this project.

Instead, an ordinary suburban house was chosen as a *visual repertoire* to explore, through an *enacted allegory*, the concerns raised by a Lefebvrian spatial analysis. This *enactment* is generative of effects of scale (a global process of the spatiality of capital reproduced on a game board); and spatial context, the suburban living room 'stands in' as a microcosm of the urban formation. The game of LIFE is an *enacted allegory* in *Machine Space*, an activity that situates a miniaturised version of the *production of space* within everyday play and leisure. In conclusion, these resources of *enactment*, available to film can be mobilised as allegory to illustrate the processes of the production of space as a reflexive *spatial production*.

---

In his survey of Harvey and Soja's analyses of space, Dear suggests Lefebvre's *production of space* foreshadowed the passing of the certainties of modernism's claim to theoretical knowledge. (Dear 2001) 'Lefebvre ... calls for a retreat from the errors and lies ... of (the) modernist trio of readability, visibility, and intelligibility' he contends. (Dear 2001, p.61) In the stead of this modernist trio, Lefebvre's multiple *moments* of space aim to uncover the many engagements he suggests structure socially constructed space -

The more carefully one examines space, considering it not only with the eyes, not only with the intellect, but also with the senses, with the total body, the more clearly one becomes aware of the conflicts at work within it, conflicts which foster the explosion of abstract space and the production of a space that is *other*.

(Lefebvre 1991, p.391)

The art historian Roslyn Deutsche contends space is inherently contested. These contests may not be legible within the theoretical framework of class conflict. Space is instead 'inseparable from the conflictual and uneven social relations that structure specific societies at specific historical moments;' these are relations of gender, race and sexuality. (Deutsche 1996, p.xiv) Deutsche asserts these social relations are

evident in the multiplicity of practices enacted in urban space by its inhabitants. She cites the observation by the urbanist Raymond Ledrut that the 'city is not an object produced by a group in order to be bought or even used by others. *The city is an environment formed by the interaction and the integration of different practices.*' (Ledrut cited In Deutsche 1996, p.52) As has been discussed, this is made evident in the cinematic registration of the space of Detroit in *Machine Space*.

Thomas Sugrue gives an historian's account of how in Detroit, multiple social practices created the conditions for Deutsche's 'uneven social relations.'<sup>63</sup> Sugrue observes that in this city, 'blackness and whiteness assumed a spatial definition.' (Sugrue 1996, p.9) Sugrue's phrase may be shorthand for segregation, but a specificity in his phrase hints at the importance of the visual in 'uneven social relations.' Sugrue further observes -

The physical state of African American neighborhoods and white neighborhoods in Detroit reinforced perceptions of race. The completeness of racial segregation made ghettoization seem an inevitable, natural consequence of profound racial differences. The barriers that kept blacks confined to racially isolated, deteriorating, inner-city neighborhoods were largely invisible to white Detroiters. To the majority of untutored white observers, visible poverty, overcrowding, and deteriorating houses were signs of individual moral deficiencies, not manifestations of structural inequalities. White perceptions of black neighborhoods provided seemingly irrefutable confirmation of African American inferiority and set the terms of debates over the inclusion of African Americans in the city's housing and labor markets.

(Sugrue 1996, p.9)

---

<sup>63</sup> The difference between the urban and the suburban experience in terms of income has been noted above. The sense of this spatial injustice as anecdote is recorded with great acuity in the autobiography of Coleman Young, Mayor of the city from 1974 to 1994. (Young and Wheeler 1994) His first, famous public statement on becoming Mayor, was to warn all criminals to leave town, eliciting howls of protest from the suburbs. Vilified in his long tenure, the media is currently re-habilitating Young as one of the most fiscally responsible public servants of the city in the last century – see further here – <http://www.freep.com/story/news/local/michigan/detroit/2013/09/15/how-detroit-went-broke-the-answers-may-surprise-you-and/77152028/>

Hence according to Sugrue, the appearance of the material environment feeds back to mechanisms of resource distribution, further extenuating the differences between urban spaces in the US. This spatial unevenness is potentially a source of conflict and spatial contestation. At the same time, Sugrue suggests the visual is implicated in naturalising the existence of differences, through the ascriptions of stereotypes to the appearance of the material environment and people. (Sugrue 1996) Knowledge based on visual appearance may confirm 'African American inferiority' in the perception of whites, re-enforcing prejudice. (Sugrue 1996)

A film project realised within the aesthetics of *landscape* would foreground *visual* appearance. In addition, given the specificity of the Detroit context, as Steinmetz remarks, the 'semiotic under-determination of *ruins*' as normative *landscapes* of the city opens opportunities for prejudicial framings. (Steinmetz In Hell and Schonle 2010, p.299) Given this, the framing of the city within the semiotics of *landscape* may be generative of *crises* in the inscription of such representation. This is demonstrated in the reports made by Steinmetz of *ruin* images of Detroit as supplying justifications for racism through the ascription of causality. (Steinmetz In Hell and Schonle 2010)

These inscriptions confirm the very real socio-economic distress and disadvantage in the city and its pervasive ascriptions to and with African Americans in the city. As Sugrue shows, institutional and financial frameworks, with significant spatial outcomes, engender this state of affairs. (Sugrue 1996) Hence the *landscape* as a normative visual form is far from neutral in Detroit. How has this representational caveat been addressed in *Machine Space*? The film uses representational strategies apart from *landscape*, as a work of *critical spatial practice* would be expected to. The critical interjection of Lefebvre as offering a more sophisticated theory of space as relational has been necessary to meet these challenges. These strategies will be here reconsidered.

In the first chapter, the invocation of Lefebvre's *moment of the representation of space*, as a description of 'dominant', perspectival images, challenged the neutrality and completion of this form of visibility. The aerial images presented in *Machine Space* demonstrate that the social relations implied by such depictions cannot be inferred from them. However, as the example of Weizman and Skeikh's work shows, this form of imagery can, with further information, be used to contest dominant ascriptions of power. *Machine Space* builds on this by adding narration to images supplying information that is not evident; in this case the urban re-structuring and demolition for freeways in Detroit was achieved at the expense of the African-American community. (Sugrue 1996) The need for narration to these images exemplifies their inability to visualise spatial conflict and enter into contestation directly. Although presenting the material environment as a given, their interpretation requires prior information, or conceived approaches.

In the second chapter, the engagement of Lefebvre's *spatial practice* and the film *phenomenology* of Sobchack, provides a context to situate the image as an embodied *production of space*. The unfolding panorama of Detroit as a *visual repertoire*, as an analogue for a mobile experience of the city, is a layered, composite image, presenting multiple refracted angles on the downtown. As the camera moves, the image actualises the unfolding of visual space and material environment. The shifting visual planes suggest on-going processes, mobility and circulation. The resulting fluid, morphing image can be seen as a visualisation of contestation and conflict, whereby multiple, competing registers of space remain in flux. This visualisation of the city is an illustration of the social *production of space* as an urban form.

The third chapter looked to the context in which visual representations of Detroit take place. The care taken by *Machine Space* not to include *ruins* in its *visual repertoire* was fully intentional. A deliberate strategy to avoid the presenting *ruins* is an acknowledgement of the efficacy of this content to frame understandings of the social relations, as discussed above, of this city. In the stead of reproducing these framings, the film suggests the on-going strictures of residential finance continue to structure the spaces of this city. The 'lived spaces' (*spaces of representation*) of

suburban residence are key to an understanding of underlying processes of ruination within the city limits. This mode of indirect representation is suggestive of a degree of complicity on behalf of an audience in the social relations of Detroit. In this way, the city is not framed as exceptional or 'other' to everyday experience of the film's audience. It does this without showing poverty – the film does not elicit empathy for those less fortunate. It is rather that the everyday experience of a city like this implies consent to these conditions. As Sugrue has remarked, these are structural features of North American life.

Given these observations about the *visual repertoires* in *Machine Space*, we can come to final conclusions. Central to the rationale for the framework of the *production of space* for the film is the subject, the city of Detroit. Jerry Herron suggests in his *First the Facts* section of his contribution to *Stalking Detroit* -

... Detroit [is] the revealed "Capital of the Twentieth Century," and likely the century ahead, because this is the place, more than any other, where the native history of modernity has been written. The same modernity that has made Americans collectively, and globally, what we are still becoming today...

(Herron In Daskalakis, Waldheim and Young 2001)

Herron writes of Detroit as the locus of the creation of collective social processes and the engine of capital. This, he suggests, is the history of modernity as a collective identity and the shaper of lives. He avoids the customary ascriptions of place as particular in memory and biography. In a parallel move, *Machine Space* is an inscription of form arising from the attributes of content. The film situates the *(re)-production of space* in the formal attributes of the image. The centrality of the spatial, across the *production of space* and the presentation of film in the cinema, is the contribution of *Machine Space* as *critical spatial practice*.

What potentials may be offered by a set of Lefebvrian tools for interrogating space in the cinema? In a general sense, space as socially produced can be understood as a medium of social life, thus a repository and generator of narratives. This linkage between past and present was demonstrated by the content of the aerial images in

the first chapter; the spatial has the potential to collapse temporality. This attribute of space is an important contribution to moving image, given its insistent inscription of the present at production and reception.

Lefebvre's multiple envisioning of the spatial is also anti-totality; it does not advance totalising spatial representations. Instead Lefebvre's *moments* of space are relational, connective of levels of human and social engagement and embodiment with our material surroundings. Lefebvre's idea of *spatial practice* as informed by the *secretion* of spatial texture is particularly interesting. This conjunction of the perceptive and the intimate within a wider frame has manifestations for the political in cinematic representation. *Spatial practice* realised as an itinerary locates space as an agent in the inscription of narrative. In cinematic terms, this translates into the potential for a rich, mobile, cinematic ensemble.

The scale and reach of *spatial practice* can register the small-scale complexities of political life within a spatial context. It also permits an analysis to participate in the object or scene of its attention. A work of *critical spatial practice* as advocated here is reflexive with reference to its participation in the *production of space* as culture. By these means, film can be invested in a spatially responsive, or localised, *resistance* to the social relations invested in the materiality of the environment by capital. This, consistent with Lefebvre's aim for 'a quest for spaces that allow for autonomy and creativity,' is a salient goal for film as artwork. (Ronneberger In Goonewardena *et al.* 2008, p.135)

A final point is pertinent to this *practice as research* project. *Machine Space* is an example of the *assemblage* form in moving image. Dense, allusive and allegorical in form, it may be accessed only in part by a cinema audience in a screening. As evidenced in conversations about the work, and the DVD commentary by the film academic Dr Lucy Reynolds, these chains of interlinked allusions may not be manifest to those in the cinema.<sup>64</sup> At the same time, the work has multiple points of entry and

---

<sup>64</sup> The DVD commentary by Lucy Reynolds is accessible on the DVD attached as Appendix 3.



engagement by an audience, and thus creates the potential for autonomous and generative spaces of spectatorial experience.

As a final conclusion, *Machine Space* models a *critical spatial practice* in moving image. Given its foregrounding of the discursive, cartographic, and pragmatic framings of *space* as resource and medium; the *assemblage* and *land-use* approach of the film supersedes the framing of the space within the remit of visual aesthetics. This is a contribution to an on-going project to revive the description and analysis of our situation in the world – as makers, citizens or subjects, and audiences - as spatially located, and as reflected in the cinema. If this work furthers discussion and understanding of our spatial experience of this world, this labour will have achieved its goal.

Stephen Connolly

September 2017

Post-Viva Amendments - April 2018

## Appendix 1

MACHINE SPACE

38:22 mins 2016

director – Stephen Connolly

Contact : [steve@bubblefilm.net](mailto:steve@bubblefilm.net)

DIALOGUE LIST

AUTOMATIC TRANSIT VOICE

*This is the Joe Louis Arena. Station.*

Title

**MACHINE SPACE**

03:35

JULIA YEZBICK

It is a really odd thing I think, to have a city that is so bisected by highways. Even right into the downtown. The highways themselves, you know which are this infrastructure that we all live with, and are forced to live with, every day today - you can't get anywhere without driving in this city, and most people take the highway, you can choose not to take the highway.

These highways are a way of sectioning off areas of town.

GAME SEGMENT 01

BOY

Who should be the banker?

MAN

Ok – we have banker.

BOY

My mum is the banker.

WOMAN

Are you setting out the banknotes Michael?

MAN

Spin the wheel and low man is the banker –  
we could do it that way  
or we could have a volunteer banker

MAN

Do we have a volunteer banker?

WOMAN

Yeah sure - I'll be the volunteer banker.

MAN

All right.

BOY

Okay. One hundred thousand dollars, fifty thousand dollars - that is a lot of money

WOMAN

Yeah - and we get -

BOY

No - this is fifty so it's meant to go in here...

WOMAN

Ok - shall I set up these notes?

BOY

You set up...

MAN

The money is...

BOY

I've got the insure - I've got the insurance on here...

WOMAN

What about the promissory notes

MAN

Good to know

WOMAN

Pro - miss - ory notes

BOY

Well they all go in the box li have

WOMAN

Is that what the bank promises?

BOY

Think so. Well - proof - my uncle can tell you that...

MAN

Hmmm. That's right - the bank gives out cars and pegs  
- which has already happened.

WOMAN

Is our smallest bill five hundred dollars?

BOY

Yeah - and our highest bill is...

MAN

Can see the currency in it?

WOMAN

Yeah can I have the twenties - from you –  
the twenty thousands.

BOY

Ok and the insurances go here -

WOMAN

How much money do we get to start with?

BOY

Four five hundred notes.

I believe and that will equal two thousand.

WOMAN

Four five hundred notes

MAN

So spin the wheel - the high number goes first the  
others take turns going clockwise the banker  
gives each player including himself a car  
with a pink or blue peg in it  
and four five hundred dollar bills.

WOMAN

Four five hundred -

MAN

So the banker issues four five hundred  
dollar bills each player

WOMAN

Okay

BOY

Three. So I'm the red one. One; two; three;

WOMAN

Excellent.

MAN

You decided to turn right.

WOMAN

So you have ...

You're buying a raccoon coat so  
you have to pay five hundred dollars for that.

BOY

You are very...

WOMAN

Okay

BOY

Can I turn this around?

WOMAN

Yeah, sure. Okay. Watch your money.

BOY

I'll watch out.

WOMAN

You want the spinner near you - huh?

BOY

Uh - huh. Because it gets very confusing...

WOMAN

Yeah - especially for you.

BOY

No.

WOMAN

So you have bought a raccoon coat have you?

BOY

Don't listen to her

WOMAN

Ok. Right - soooo - you're -

MAN

Okay - and then we both had twos...

WOMAN

We are going to go clockwise so you're next.

MAN

All - Right

MAN

Two

WOMAN

Two

MAN

We just like to have two these days

BOY

Uhhh that's -

MAN

And I get to find - circus elephant –  
collect one thousand five hundred dollar reward

WOMAN

Wow

BOY

Here's

WOMAN

Ahaha

MAN

Banker, banker didn't pay me - banker please

WOMAN



Okay - here's one thousand five hundred –  
you didn't buy car insurance?

MAN

Well first you get to decide whether you buy auto insurance or not -

08:42

MARSHA MUSIC

I remember as a child, that you literally, when you jaywalked,  
you were taking your life in your hands.

And this is why your parents always cautioned you against jaywalking.

Because the traffic was so great on the main streets,  
that you literally were in danger, trying to cross a street,  
because there were so many cars.

So Hastings Street was the main thoroughfare that ran through Black Bottom  
and because of black people having to make an entire life in this tiny area,  
it was also the place where black people began to develop businesses.

So in the period of about a decade, both Black Bottom,  
the centre for African American living - and - Hastings Street,  
the main thoroughfare - were destroyed.

And in its place was going to be put a freeway - what we call the I-75 –  
it was later named the Chrysler freeway.

GAME SEGMENT 02

BOY

Weekend in Las Vegas – collect fifty thousand dollars.

WOMAN

Shazzam! That's why it pays not to go to college.

MAN

What! Fifty Thousand dollars! Why did I go to college...

WOMAN

I collect my salary though which is a measly five thousand dollars because I passed  
payday...

MAN

One – can't land there so I go there. Find Uranium deposit – collect one hundred  
thousand dollars!

BOY

Geez!

WOMAN

Better find the big bills for that. Here you go sir.

MAN

Thank you.

BOY

Oh my Gosh.

WOMAN

Five.

BOY

One; two; three; four; five.

Tornado blows you back to start. Wait next turn.

WOMAN

Ok

MAN

Wow. Sorry Michael.

WOMAN

Well you are definitely going to get another payday – so that's good.

BOY

Or maybe I can find another uranium deposit...

WOMAN

Or go to Vegas.

One; two; three; four; five.

Jury duty, lose turn.

MAN

And then there is a payday – interest due

WOMAN

Michael – Wait, wait, Listen.

MAN

When you pass or land on one of these spaces you must pay the bank five hundred

interest for every twenty thousand promissory note –

huh! I can't wait until I get there –

you don't have any notes so you just get your pay.

WOMAN

Ok – you just get your pay. There you go.

BOY

Whoohay, Cool!

WOMAN

Yes it is your turn Alex.

MAN

Yes. I wonder what I am coming up to.

WOMAN

Payday?

Ten!

How do you guys always spin tens.

MAN

One two three four five six seven eight nine ten.

I've gotta pay twice – so I have to pay interest ...

Thank you – are you giving me my pay Michael, banker Michael?

So then I have to pay interest on...

BOY

I'm not. I'm a doctor.

MAN

And I have to pay five hundred for a new set of

WOMAN

Choppers -

MAN

Choppers. So there's my choppers -

WOMAN

Yeah. Plus how much on each much on each

promissory note - five hundred?

MAN

Five hundred. So I have five...

WOMAN

So you owe two thousand...

MAN

How many - I have six of them

WOMAN

Oh six.

Wait. Wait Michael. No no - he's paying us -

BOY

Oh

MAN

So - how much do I owe?

BOY

What paying you actually...

WOMAN

Oh - five hundred - if you have six of them –  
six thousand - that's mean...

MAN

Yeah - thanks. Who lands on every one - that says something bad –  
and even passes bad things...

WOMAN

That's life!

Three - who gets the lowest scores?

The lowest dials – One; two; three...

12.15

MARSHA MUSIC

There were areas people grew up in, outside of black bottom,  
but they were very specific and they had very specific boundaries.

And the people who grew up in them understood,  
that they were not to cross those boundaries.

Now segregation per se, was de-facto –  
meaning that it was segregation - in fact -

GAME SEGMENT 03

BOY

One two three four five six seven eight nine  
Sweepstakes winner! Collect hundred and fifty thousand dollars!

WOMAN

We are breaking the bank boy.

MAN

Nice job Michael – you really earned that.

BOY

I know – right.

WOMAN

My turn?

MAN

One; two; three; four; five; six.

Cyclone. Wrecks home.  
Pay forty thousand.  
Can I get some more promissory notes?

WOMAN

Are you sure that was six – I thought that was here.

13.16

LAUREN HOOD

So whereas you would think that a city's government would determine or people by proxy - would determine what the city looks like – it's really up to the people with the money.

CHARLIE

The last...

LAUREN HOOD

So there's a handful of individuals you can know by name, who are determining what our three-dimensional landscape looks like here. There are those of us like myself who choose to work inside the system and try to make change happen that way, but I have a lot of activist colleagues that think that it is an exercise in futility - if you really want to have equitable development, you have to smash the system and start over.

18.10

MARSHA MUSIC

There were interests that were driving attitudes, fears...  
Real Estate companies would call people in the neighbourhoods and basically terrify them.  
They would tell them - you know, a black moved on the next block, you better sell your home right now and get out before its too late –

your home will not be worth anything.

And you have to realise, this is during a time in the late 1940s and the early 1950s where what we understand as urban crime today and crime in the cities was not a factor.

You know many people sort of create memories about this, and talk about how their people moved out because of crime and fear your schools, things that happened at the de-stabilisation of the city.

But in those early times of the city - those weren't factors. So it was mostly the fear that was drummed throughout the city in all areas of the city.

By describing them as having been driven out of the city, I was trying to describe this tremendous cloud of fear that permeated the city to try to compel whites to leave their homes. And to turn this real estate over; and to make a lot of people rich.

20:10

JULIA YEZBICK

I can remember as a kid driving from Ann Arbor or Ypsilanti and heading east towards Detroit, and being in the car with my siblings and my dad saying – ok we are getting close to Detroit, everybody lock the doors! And experiencing Detroit as a child just through the frame of out of a car window - and I think that is a lot of peoples experience unfortunately. And the thing about the automobile is that it is a personalised bubble, you do not have to engage with other people, you do not have to even see over the wall of the highway if you stay in your car and you just go from point A to point B, and you leave your house, the individual realm of your home, to whatever the destination might be.

And I think the lack of public transportation has had really far reaching effects on the continuance of the racial tensions in the city,



the continuance of the racial segregation of the city, because -  
it may be slightly an idealistic perspective –  
but I think that public transportation allows for a space  
where people can literally bump into each other, and have, even fleeting,  
have interactions with people from  
different racial and socio-economic backgrounds.

So when you take this out of the picture, in Detroit, and you add to the fact that  
there is very little public space in this city, what happens is, all of the segregation and  
racial tensions of the mid-century and surrounding decades really - it just sits there,  
it hangs, it stagnates, because there is not the right kind of circulation of people,  
happening.

If you are an affluent white person that lives in the suburbs  
and you want to see the Tigers play,  
you hop on the highway and you get right down to the ballpark,  
in the heart of the city, and right back out,  
without ever even having to see the city of Detroit,  
you go right through it and back out.

And that is really damaging.

If people had to drive through  
the neighbourhoods to see a Tigers game,  
I think they would have a vast shift in perspective.

And so the infrastructure of the city really facilitates a lot of problems  
we are still dealing with today and I'm not sure how to change them –  
we have ... there is a lot to be done...

29:28

MARSHA MUSIC

When whites began to leave the city,  
I remember that  
and I remember this sense of us being left behind.  
But also wondering –

why would anybody leave this beautiful place where we lived?

And so I began to write about the kidnapped children  
of Detroit because,

I wanted to express the fact that these children  
did not leave Detroit of their own volition.

Because I wanted to express this feeling of having watched my school mates be  
snatched away, be taken away, you know like captain Hook - taking Peter and these  
kids out of the city – that’s how it felt - one by one they were just taken away from  
the city.

But in retrospect, what I was also doing was trying to find a way  
to engage the issue of white flight

without blaming the whites of my generation who left as children.

Because I think that the tentacles of fear and guilt and blame and all these things  
they poison our discussions so greatly

that it is very difficult for us to have clear and honest talks  
about these truths that happened in this city.

31:08

LAUREN HOOD

Loveland was tasked with mapping all the properties in the city so there were some  
almost four hundred thousand parcels in the city. If you were delinquent on your  
taxes that information would be on this website and we would provide a link so you  
could take care of paying your taxes.

Ha ha – what is it really about or what do they say it is about?

Sure it is to get people to pay their taxes.

Really what it does is just clear out a bunch of neighbourhoods.

It was always everyone else’s contention that –

I don't want to get in trouble for saying this – but they would always say –

Lauren; no one is that smart.

Nobody that we have interacted with in city government or otherwise  
is that brilliant to have orchestrated this kind of multi-layered,  
multi-faceted plan to clear out the neighbourhoods, but it was always my contention  
that - there are greater forces at work,  
it is not just co-incidence that these neighbourhoods would end up  
cleared out because of foreclosures.

32:26

GAME SEGMENT 04

BOY

Hundred thousand,  
two hundred thousand,  
three hundred thousand,  
four hundred thousand  
five hundred thousand  
six hundred thousand  
six hundred and fifty thousand  
six hundred and sixty  
six hundred and seventy  
So six hundred seventy  
Six hundred seventy one  
Seventy two  
Seventy three  
Seventy four  
Seventy five  
Seventy six  
Seventy seven

Seventy eight – Six hundred and seventy eight thousand dollars.

WOMAN

Nice job.

MAN

Good job Michael.

WOMAN

What did I end up with – not that much.  
Actually how much money did you have Alex?

MAN

I have a little debt here.

WOMAN

Yeah. Alex is over one hundred thousand dollars in debt.

MAN

Way big debt.

WOMAN

So it's not good. It's not good at all.

MAN

So you are the de-facto big winner!

BOY

I am - the Winner - woo!

WOMAN

Don't celebrate too much or  
you will make us feel really bad.

BOY

Good game?

WOMAN

Good game Michael.

BOY

Let me do cross arm. Good

BOY & MAN

Game!

34:44

MARSHA MUSIC

To talk about Detroit's streets being ...

saying there is no-one in Detroit.

This is far from true - it is just not even numerically true.

Detroit is a city that has at least seven hundred thousand people.

So it is the relative space that is not occupied does not mean it is empty.  
But it does tend to be empty to people who view black people as invisible –  
which is sort of an oxymoron because you can't view invisible people –  
but we are invisible in many ways to people that view the city,  
and they simply do not see our existence here.

AUTOMATIC TRANSIT VOICE

*The next station is the Millender Centre. This is Millender Centre. Station.*

AUTOMATIC TRANSIT VOICE

*The next station is Financial District.*

**CREDITS**

Anthropologist

**Julia Yezbick**

Memoirist

**Marsha Music**

Activist

**Lauren Hood**

Lakeside Seance

**Bruce McLaren**

**Janice McLaren**

**Richard McLaren**

Transauto

**Cuthbert Thomas**

Korash Florists, Gratiot Avenue, Detroit

**James Rogers**

**Jason Rogers**

**Michael Rogers**

**Yvonne Hill**

**Dana Parks**

Wexner Centre ADR

**Jennifer Lange**

**Michael Newell-Dimoff**

**Alex Thompson**

Driver Extraordinaire

**Rob Todd**

Also Appearing

**Charlie McLaren**

Inspiration

**Giuliana Bruno**

**Ta-Neshi Coates**

**David HARvey**

**Bruno Latour**

**Henri Lefebvre**

**Thomas Sugrue**

thanks to

**Lars Bjorn**

**Allison Buenger**

**George Clark**

**Adam Clitheroe**

**Andy Conio**

**Ben Cook**

**Daniel Copley**

**Tony Dowmunt**

**Charlie Fleming**

**Shona Illingworth**

**Ed Lucas**

**The McLaren Family**

**Scott Northrup**

**Mike Olenick**

**Jean Pitman**

**Judy Price**

**Jeremy Rigsby**

**Neil Stewart**

**Robert Todd**

**Susan Wineberg**

special thanks to

**Chris Bournea**

**Jennifer Lange**

**Chris Stults**

special thanks to

**David Dinnell**

**Janice McLaren**

**Julie Murray**

**Rob Todd**

special thanks to

**Steve Klee**

**Sarah Turner**

special thanks to

**Lauren Hood**

**Marsha Music**

**Brandon Walley**

**Julia Yezbick**

soundmix/Wexner ADR

**Paul Hill**

sound assistance Kent SMFA

**Charlie Fleming**

support provided by the

**Film/Video Studio Program**

**at the**

**Wexner Centre for the Arts**

support provided by the



**School of Music & Fine Art  
at the  
University of Kent**

soundmix

**Charlie Fleming**

image/edit/sound

**Stephen Connolly**

©

**bubblefilm**

**2016**

## Appendix 2

***Machine Space Information Insert***, Wexner Centre, 04.17

online here -

[http://bubblefilm.net/texts/pdf\\_texts/Machine\\_Space\\_Newsprint.pdf](http://bubblefilm.net/texts/pdf_texts/Machine_Space_Newsprint.pdf)

### Appendix 3

**Machine Space** 2016 / Doctoral & Premiere Version -

<https://vimeo.com/198754766>

**Machine Space** 2016 / Commentary by Dr Lucy Reynolds -

<https://vimeo.com/234194693>

**Machine Space** 2018 / Final Screening Version -

<https://vimeo.com/269583301>

all passwords - peplemover

**Machine Space** 2016 DVD / Optional commentary by Dr Lucy Reynolds

**Machine Space** 2018 DVD / Final Screening Version

## Appendix 4

### ***Machine Space*** online cartographic output

Cartographic supporting information and *visual repertoires* developed for *Machine Space* in an interactive online form -

# 1 *representation of space 1*

[http://www.bubblefilm.net/projects/machine\\_space\\_horvath.htm](http://www.bubblefilm.net/projects/machine_space_horvath.htm)

#2 *representation of space 2*

[http://www.bubblefilm.net/projects/machine\\_space\\_holc.htm](http://www.bubblefilm.net/projects/machine_space_holc.htm)

#3 *spatial practice*

[http://www.bubblefilm.net/projects/machine\\_space\\_spatial-practice.htm](http://www.bubblefilm.net/projects/machine_space_spatial-practice.htm)

#4 *spaces of representation*

[http://www.bubblefilm.net/projects/machine\\_space\\_spaces-representation.htm](http://www.bubblefilm.net/projects/machine_space_spaces-representation.htm)

## Bibliography

- Aitken, S.C. and Zonn, L. (1994). *Place, Power, Situation, and Spectacle: A Geography of Film*. Lanham, MD: Rowman & Littlefield.
- Akerman, C. (2012). *Chantal Akerman: Too far, too close*. Antwerpen: Ludion.
- Akerman, C. (1995). *D'Est*. [DVD]. Icarus Films.
- Akerman, C. (1972). *Hotel Monterey*. [DVD]. Criterion Collection.
- Akerman, C. (1975). *Jeanne Dielman, 23 Quai Du Commerce, 1080 Bruxelles*. [DVD] Criterion Collection. 201 minutes.
- Akerman, C. (1976). *News from Home*. [DVD]. Criterion Collection.
- Alpers, S. (1984). *The Art of Describing: Dutch Art in the Seventeenth Century*. Reprint edition. Chicago: University Of Chicago Press.
- Amin, A. (1995). *Post-Fordism: A Reader*. London: Wiley.
- Apel, D. (2015). *Beautiful Terrible Ruins: Detroit and the Anxiety of Decline*. New Brunswick, NJ: Rutgers University Press.
- Aumont, J. (1997). *The Image*. London: British Film Institute.
- Bachelard, G. (1992). *The Poetics of Space*. Boston: Beacon Press.
- Baldwin, J. (1963). James Baldwin interviewed by Kenneth Clark. *James Baldwin interviewed by Kenneth Clark PBS*. PBS.  
<https://www.youtube.com/watch?v=T8Abhj17kYU> [Accessed 09.2017]
- Barber, S. (2002). *Projected Cities: Cinema and Urban Space*. London: Reaktion Books.
- Baudrillard, J. (1989). *America*. London: Verso.
- Benjamin, W. (1999). *Illuminations*. London: Pimlico.
- Benjamin, W. (2003). *Understanding Brecht*. London; New York: Verso.
- Benjamin, W. and Demetz, P. (1986). *Reflections: Essays, Aphorisms, Autobiographical Writing*. Schocken Books.
- Benning, J. (2012). *The California Trilogy*. [DVD Box Set]. Österreichisches Filmmuseum Vienna.
- Bergson, H. (1911). *Creative Evolution*. Lanham, MD: University Press of America.
- Bordwell, D. (1985). *Narration in the Fiction Film*. Madison, WI: University of Wisconsin Press.

- Bourdieu, P.P. and Passeron, J.C. (1990). *Reproduction in Education, Society and Culture*. Thousand Oaks, CA: Sage Publications.
- Brenner, N. (2014). *Implosions/Explosions: Towards a Study of Planetary Urbanization*. Berlin: JOVIS Verlag.
- Bruno, G. (2007). *Atlas of Emotion: Journeys in Art, Architecture and Film*. New York: Verso Books.
- Caro, R.A. (2015). *The Power Broker: Robert Moses and the Fall of New York*. New York: Random House.
- Channon, M. and Steinmetz, G. (2005). *Detroit; Ruin of a City*. [DVD] Footscray, Australia: Artfilms.
- Clarke, D. (1997). *The Cinematic City*. London: Routledge.
- Cosgrove, D.E. (2001). *Apollo's Eye: A Cartographic Genealogy of the Earth in the Western Imagination*. Baltimore, MD: The Johns Hopkins University Press.
- Cowan, B. (1981). Walter Benjamin's Theory of Allegory. *New German Critique*:109–122.
- Cowley, D., Standring, R. and Abricht, M. (2010). *Landscapes Through the Lens: Aerial Photographs and the Historic Environment*. Oxford: Oxbow Books.
- Crary, J. (1992). *Techniques of the Observer: On Vision and Modernity in the Nineteenth Century*. New York: October Books.
- Cresswell, T. (2006). *On the Move: Mobility in the Modern Western World*. New York: Routledge.
- Cresswell, T. and Dixon, D. (2002). *Engaging Film: Geographies of Mobility and Identity*. Lanham, MD: Rowman & Littlefield.
- Creswell, J. (2017). Quicken Loans, the New Mortgage Machine. *New York Times*.
- Daskalakis, G., Waldheim, C. and Young, J. (2001). *Stalking Detroit*. Barcelona: Actar.
- Davis, M. (1990). *City of Quartz: Excavating the Future in Los Angeles*. London; New York: Verso Books.
- Davis, M. (1999). *Ecology of Fear: Los Angeles and the Imagination of Disaster*. New York: Vintage Books.
- Dear, M.J. (2001). *The Postmodern Urban Condition*. Oxford: John Wiley & Sons.
- de Certeau, M.D. (1984). *The Practice of Everyday Life*. Berkeley, CA: University of California Press.
- DeLanda, M. (2011). *A New Philosophy of Society: Assemblage Theory and Social Complexity*. London; New York: Continuum.

- DeLillo, D. (1986). *White Noise*. New York: Penguin Books.
- Deutsche, R. (1996). *Evictions: Art and Spatial Politics*. Cambridge, MA: MIT Press.
- Dillon, B. (2014). *Ruin Lust*. London: Tate Gallery Publishing.
- Dillon, B. ed. (2011). *Ruins*. London; Cambridge, MA: Whitechapel Art Gallery.
- Easterling, K. (2014). *Critical Spatial Practice 4 - Subtraction*. Berlin: Sternberg Press.
- Elden, S. (2004). *Understanding Henri Lefebvre: Theory and the Possible*. London; New York: Continuum.
- Elsaesser, T. (2013). The 'Return' of 3-D: On Some of the Logics and Genealogies of the Image in the Twenty-First Century. *Critical Inquiry* **39**.
- Elsaesser, T. and Hagener, M. (2015). *Film Theory: An Introduction through the Senses*. 2 edition. London: Routledge.
- Flam, J. (1996). *Robert Smithson: The Collected Writings*. 2Rev Ed edition. Berkeley, CA: University of California Press.
- Goffman, E. (1959). *The Presentation of Self in Everyday Life*. New York: Doubleday.
- Goonewardena, K. et al. (2008). *Space, Difference, Everyday Life: Reading Henri Lefebvre*. London: Routledge.
- Harvey, D. (2012). *Rebel Cities: From the Right to the City to the Urban Revolution*. London: Verso Books.
- Harvey, D. (2001). *Spaces of Capital: Towards a Critical Geography*. London: Routledge.
- Harvey, D. (1989). *The Condition of Postmodernity: An Enquiry into the Origins of Cultural Change*. Oxford: Wiley-Blackwell.
- Hell, J. and Schonle, A. eds. (2010). *Ruins of Modernity*. Durham, NC: Duke University Press.
- Horvath, R. (1974). Machine Space. *Geographical Review* **64**:167–188.
- Ihde, D. (1977). *Experimental Phenomenology: An Introduction*. Albany, NY: SUNY Press.
- James, D.E. (2005). *The Most Typical Avant-Garde: History and Geography of Minor Cinemas in Los Angeles*. Berkeley, CA: University of California Press.
- Knabb, K. ed. (2007). *Situationist International Anthology*. Berkeley, CA: Bureau of Public Secrets.
- LeDuff, C. (2014). *Detroit: An American Autopsy*. New York: Penguin Books.

- Lefebvre, H. (2014). *Critique of Everyday Life*. London: Verso Books.
- Lefebvre, H. (1991). *The Production of Space*. Oxford: Wiley-Blackwell.
- Lefebvre, H. (1996). *Writings on Cities*. London: Wiley.
- Leonard, E. (1980). *City Primeval: High Noon in Detroit*. Boston, MA: G.K. Hall.
- Leonard, E. (1976). *Swag*. New York: Dell Publishing.
- Lepore, J. (2007). The Meaning of Life. *The New Yorker*.
- Leys, R. (2011). A Turn to Affect. *Critical Inquiry* **37**:434–472.
- Lynch, K. (1960). *The Image of the City*. Cambridge, MA: MIT Press.
- Macdonald, S. (2002). *The Garden in the Machine: A Field Guide to Independent Films About Place*. Berkeley, CA: University of California Press.
- MacGibbon and Kee (1964). *London: Aspects of Change*. London: University College London.
- Marchand, Y. and Meffre, R. (2010). *The Ruins of Detroit*. Göttingen: Steidl.
- Marks, L.U. (2000). *The Skin of the Film: Intercultural Cinema, Embodiment, and the Senses*. Durham, NC: Duke University Press.
- Massey, D. (2005). *For Space*. Thousand Oaks, CA: SAGE Publications.
- Massey, D.S. and Denton, N.A. (1993). *American Apartheid: Segregation and the Making of the Underclass*. Cambridge, MA: Harvard University Press.
- Massumi, B. (1995). The Autonomy of Affect. *Cultural Critique*: 83–109.
- MBM (1960). *The Game of Life*. [Board Game] East Longmeadow, MA: Milton Bradley.
- Merleau-Ponty, M. (1945). *Phenomenology of Perception*. Abingdon: Routledge.
- Merleau-Ponty, M. (1969). *The Visible and the Invisible*. Evanston, IL: Northwestern University Press.
- Merrifield, A. (2006). *Henri Lefebvre: A Critical Introduction*. New York: Routledge.
- Moore, A. and Levine, P. (2010). *Andrew Moore: Detroit Disassembled*. Akron, OH: Akron Art Museum.
- Pichler, B. and Slanar (eds), C. (2007). *James Benning*. Vienna: Synema Gesellschaft für Film u. Medien.
- Polanski, R. (1974). *Chinatown*. [DVD] Los Angeles: Paramount Pictures.



- Robinson, W.I. (2009). *Saskia Sassen and the Sociology of Globalization: A Critical Appraisal*. *Sociological Analysis* Vol 3: Issue 1, 5–29.
- Rosler, M. (2010). Culture Class: Art, Creativity, Urbanism. *eflux Journal* [Online] **21**. <http://www.e-flux.com/journal/21/67676/culture-class-art-creativity-urbanism-part-i/> [Accessed 09/2017]
- Rust, S., Monani, S. and Cubitt, S. eds. (2012). *Ecocinema Theory and Practice*. New York: Routledge.
- Schama, S. (2004). *Landscape and Memory*. New York: Harper Perennial.
- Scott, E.E. and Swenson, K.J. (2015). *Critical Landscapes: Art, Space, Politics*. Berkeley, CA: University of California Press.
- Sennett, R. (1992). *The Fall of Public Man*. New York; London: W. W. Norton & Company.
- Shapiro, T.M. (2004). *The Hidden Cost of Being African American: How Wealth Perpetuates Inequality*. New York: Oxford University Press.
- Shaviro, S. (1993). *The Cinematic Body / Steven Shaviro*. Minneapolis, MN: University of Minnesota Press.
- Sheikh, F. and Weizman, E. (2015). *Eyal Weizman and Fazal Sheikh: The Conflict Shoreline*. Göttingen: Steidl.
- Sobchack, V.C. (1992). *The Address of the Eye : A Phenomenology of Film Experience*. Princeton, NJ: Princeton University Press.
- Soja, E.W. (1989). *Postmodern Geographies*. London; New York: Verso.
- Stanek, D.L., Moravánszky, D.Á. and Schmid, D.C. (2014). *Urban Revolution Now: Henri Lefebvre in Social Research and Architecture*. Farnham, UK: Ashgate Publishing Ltd.
- Stanek, Ł. (2011). *Henri Lefebvre on Space: Architecture, Urban Research, and the Production of Theory*. Minneapolis, MN: University of Minnesota Press.
- Sugrue, T.J. (1996). *The Origins of the Urban Crisis: Race and Inequality in Postwar Detroit*. New Preface edition. Princeton, NJ: Princeton University Press.
- Sullivan, S. (2001). THE AESTHETICS OF AFFECT thinking art beyond representation. *Angelaki* **6**:125–135.
- Thomas, B. and Round, J. (2014). *Real Lives, Celebrity Stories: Narratives of Ordinary and Extraordinary People Across Media*. New York: Bloomsbury Publishing.
- Thomas, J.M. (2015). *Mapping Detroit: Land, Community, and Shaping a City*. Detroit, MI: Wayne State University Press.
- Thompson, N. et al. (2008). *Experimental Geography*. Brooklyn, NY: Melville House.

- Tuan, Y. (1977). *Space and Place: The Perspective of Experience*. London: E. Arnold.
- Urry, J. (2004). The 'System' of Automobility. *Theory, Culture & Society* **21**:25–39.
- US Census (2010). *US Census Bureau 2010 Census* [Online].  
<https://www.census.gov/2010census/> [Accessed 06.2017]
- Valla, C. (2012). The Universal Texture. *rhizome* [Online]  
<http://rhizome.org/editorial/2012/jul/31/universal-texture/> [Accessed 06.2017]
- Vidler, A. (1999). *The Architectural Uncanny: Essays in the Modern Unhomely*. Cambridge, MA: MIT Press.
- Weizman, E. and Sheikh, F. (2015). *Fazal Sheikh/Eyal Weizman: The Conflict Shoreline: Colonialism as Climate Change in the Negev Desert*. Göttingen: Steidl.
- Widick, B.J. (1989). *Detroit: City of Race and Class Violence*. Detroit MI: Wayne State University Press.
- Wood, D. (1992). *The Power of Maps*. New York: The Guilford Press.
- Yezbick, J. (2016). *Domesticating Detroit: An Ethnography of Creativity in a Postindustrial Frontier*. Harvard, MA: Harvard University PhD Dissertation.
- Young, C. and Wheeler, L. (1994). *Hard Stuff: The Autobiography of Mayor Coleman Young*. New York: Viking.