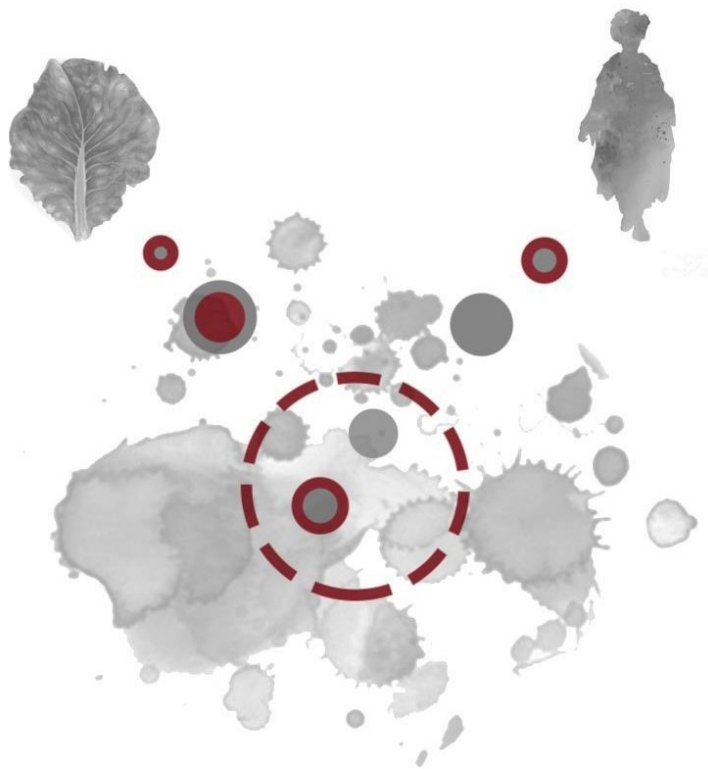


GREEN (INSIDE)?

An eating experience which addresses ecological and lifestyle sustainability,
with the interior as a tool.

A sustainable interior environment, encouraging sustainable living.



by Hilde Schröder

Submitted in partial fulfilment of the requirements for the degree Masters in Interior Architecture (Professional)
to the faculty of Engineering, Built Environment and Information Technology.

Department of Architecture
University of Pretoria

Study leaders: Anika Grobler & Zakkiya Khan
Studio Master: Prof. Barbara P. Jekot

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*“He who supplies seed to the sower and bread for food,
will supply and multiply your seed for sowing and increase the harvest of your righteousness.”*

(Holy Bible, 2 Corinthians 9:10)



PROJECT SUMMARY

| | |
|---------------------------|--|
| TITLE | Green (Inside)? An eating experience which addresses ecological & lifestyle sustainability, with the interior as a tool |
| AUTHOR | Hilde Schröder |
| STUDY LEADERS | Anika Grobler & Zakkiya Khan |
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| DEGREE | Masters of Interior Architecture (Professional) |
| DEPARTMENT | Department of Architecture |
| FACULTY | Faculty of Engineering, Built Environment and Information Technology |
| UNIVERSITY | University of Pretoria |
| YEAR | 2016 |
| RESEARCH FIELD | 1. Environmental Potential 2. Cultural Landscapes |
| TPOLOGY | Retail: Restaurant |
| PROGRAMME | A sustainable restaurant concept, interior design encouraging sustainable living |
| SITE LOCATION | The Maboneng Precinct, Johannesburg: Access City, Cnr Beacon & Staib street |



DECLARATION

In accordance with Regulation 49(e) of the General Regulations (G.75) for dissertations and theses, I declare that this dissertation, which I hereby submit for the degree Masters of Interior Architecture (Professional) at the University of Pretoria, is my own work and has not previously been submitted by me for a degree at this or any other tertiary institution.

I further state that no part of my dissertation has already been, or is currently being, submitted for any such degree, diploma or other qualification.

I further declare that this dissertation is substantially my own work. Where references is made to the work of others, the extent to which that work has been used is indicated and fully acknowledged in the text and list of references.

Hilde Schröder



ABSTRACT

This dissertation originated from a concern regarding healthy and sustainable living, with the focus on aspects of well-being, eating and nutrition. It has not been seen or explicitly explored as a problem to address within the discipline of interior design. It is of the opinion that the environments in which we live can directly influence the way we live.

Green (Inside)? is a project proposal which addresses both a normative stance towards interior design and a recognized gap in the social sphere. A scarceness of experiential design in interior environments is examined. This stance is contextualized as a response against the status quo of the restaurant industry towards sustainable living. Restaurants, specifically fast-food outlets or caf  s, tend to promote unhealthy lifestyles and lack to provide an experience beyond the food itself.

The theoretical approaches of sustainable development, human centred design and experiential design, informed the design discourse. The character of the design is guided by the found theories of a process oriented view, the farm-to-table concept, urban farming and principles of the changing kitchen. The programme is placed within the Maboneng precinct in Johannesburg CBD. It establishes a new urban food identity and brand, furthermore connected with its creative and industrial identity.

The conceptual restaurant, *the Inside*, proposes an eating experience, using the eating process as medium of communication to address various topics of ecological and lifestyle sustainability. It will intentionally expose users to participate and interact within the spaces, its processes and a specific sensory-story. The design interventions will aim to encourage and educate users towards sustainability.

KEYWORDS:

Sustainable living

Sustainable interior environment

Experiential design

Process-oriented-view

Urban farming

The changing kitchen

UITTREKSEL

'n Kommer oor gesonde en volhoubare lewensstyle, spesifiek gerig op welsyn en eetgewoontes, was die vertrekpunt vir die verhandeling. Hierdie kwessie is nog nie heeltemal verken as 'n probleem wat aangespreek kan word in die dissipline van binne-ontwerp nie. Dit is egter van mening dat die ruimtes waarin ons leef en beweeg ons manier van lewe beïnvloed.

"Green (Inside)?" is 'n projek wat gebaseer is op twee aspekte: Die eerste handeling is 'n normatiewe standpunt vir binne-ontwerp, waar 'n skaarste in die ervarings van binneruimtes erken is; die tweede aspek het 'n tekortkoming in die sosiale mark geïdentifiseer. Die probleem is geplaas in die konteks van die restaurant bedryf, rakende volhoubare lewenswyses. Restaurante, spesifiek kitskoswinkels en kafee's, is geneig om ongesonde lewensstyle aan te moedig. Daar is ook 'n gebrek aan ruimtelike ervarings, buiten die ervaring wat die kos self bied.

Verskeie teoretiese benaderings het die argument versterk, onder andere die kwessie van volhoubare ontwikkeling, 'n her-definieëring van kos en die eet proses, verbruiker fokus in ontwerp en laastens ervaringsleer ontwerp. Die karakter van die ontwerp was beïnvloed deur die proses-georiënteerde uitkyk teorie, die plaas-tot-tafel konsep, stedelike landbou asook nuwe beginsels van hoe 'n kombuis verander. Die projek is geplaas in die Maboneng gebiedct, Johannesburg. Verder was 'n nuwe stedelike kulinêre verbruiker voorgestel, gebaseer op die kreatiewe en industriële identiteit van die ligging.

Die konseptuele restaurant, *"the Inside"*, is a voorstelling van 'n eet-ervaring. Die eetproses word gebruik as kommunikasiemiddel waarmee ekologiese en volhoubaarheids kwessies aangespreek word. Verskeie prosesse van die ruimtes sal doelbewus blootgestel word, van waar dié interaksies sal beoog om 'n sensoriese storie vir die verbruiker te skets. Die ontwerp sal beoog om mense te onderig en aan te moedig om aspekte van volhoubaarheid te beoefen.



TABLE OF CONTENTS

| | |
|---|-------------|
| ACKNOWLEDGEMENTS | i |
| PROJECT SUMMARY | ii |
| DECLARATION | iii |
| ABSTRACT | iv |
| UITTREKSEL | v |
| | |
| TABLE OF CONTENT | vi |
| LIST OF FIGURES | x |
| LIST OF DIAGRAMS | xiii |
| LIST OF TABLES | xiv |
| | |
| Chapter 1: INTRODUCTION | 1 |
| 1.1 Dissertation overview | 2 |
| 1.2 Background | 4 |
| 1.2.1 Normative stance towards interior design | 4 |
| 1.2.2 Context: Addressing the status quo | 5 |
| 1.2.3 Consumer behaviour: Habit & change | 6 |
| 1.3 The problem statement | 6 |
| 1.3.1 Hypothesis | 6 |
| 1.4 Research question | 7 |
| 1.4.1 Sub-questions | 7 |
| 1.5 Aims and objectives | 7 |
| 1.6 Approach | 8 |
| 1.6.1 Sustainable development by adapting theories: re-defining food and the eating process | 8 |
| 1.6.2 Human centred design | 8 |
| 1.6.3 Experiential design | 8 |
| 1.7 Field and topics | 9 |
| 1.8 Methodology | 9 |
| 1.8.1 Context & analysis | 10 |
| 1.8.2 Theoretical investigation | 10 |
| 1.8.3 Design development | 10 |
| 1.9 Keywords and definitions | 11 |
| 1.10 Conclusion | 14 |
| | |
| Chapter 2: CONTEXT & ANALYSIS | 15 |
| 2.1 Precedent studies | 16 |
| 2.1.1 Method of analysis | 16 |
| A. Programme | 16 |
| B. Concept | 16 |
| A.1 Rambutan fruit studio | 18 |
| A.2 Fermier | 19 |
| A.3 Babylonstoren | 20 |
| A.4 Nat. fine bio restaurant | 21 |
| A.5 Grain | 22 |
| A.6 Bloom | 23 |
| A.7 The cold pressery | 23 |
| A.8 Palaeo | 24 |
| A.9 UF002 de Schilde | 24 |



| | |
|---|----------------|
| A.10 The cannery |25 |
| B.1 Hands on |26 |
| B.2 24 Frames per second |26 |
| B.3 Colour food |27 |
| B.4 Energy & relax |27 |
| B.5 Tableware |28 |
| B.6 Reel gardening SA |28 |
| 2.1.2 Conclusion of analysis |28 |
| 2.2 Define programme in a context |29 |
| 2.3 Context |29 |
| 2.3.1 Site |29 |
| 2.3.2 Reason for site selection |29 |
| 2.3.3 Maboneng precinct |30 |
| 2.3.4 Proposed program within the site |31 |
| 2.3.5 Access city |35 |
| 2.4 Target user |38 |
| 2.4.1 Moodboard: character of the user |39 |
| 2.5 Conclusion |40 |
| | |
| Chapter 3: THEORETICAL INVESTIGATION |41 |
| 3.1 Background |42 |
| 3.1.1 The interior environment |42 |
| 3.1.1.1 Tool for knowledge and education |42 |
| 3.1.1.2 Tool for behaviour and influence |42 |
| 3.1.2 Programme: restaurant context |42 |
| 3.1.2.1 Timeline |42 |
| 3.1.2.2 Restaurant design and psychology |43 |
| 3.2 Sustainable development |44 |
| 3.2.1 Re-defining food: process-oriented view |44 |
| 3.2.2 Organic food movement |46 |
| 3.2.3 Urban agriculture |47 |
| 3.2.3.1 Urban farming systems |48 |
| 3.3 Human Centred Design |50 |
| 3.4 Experiential design |51 |
| 3.4.1 New theory: experience-centred design in the interior environment |51 |
| 3.4.2 The user |53 |
| 3.4.2.1 Psychological needs of the user |53 |
| 3.4.2.2 User strategy to create an experience |53 |
| 3.4.2.3 User behavioural aspects |55 |
| A. Interaction pattern |55 |
| B. Pro-environmental and sustainable consumer behaviour |57 |
| C. Habit and change |58 |
| 3.4.3 The interior |59 |
| 3.4.3.1 Spatial journey |59 |
| 3.4.3.2 Shared experience pattern |59 |
| 3.4.3.3 Context: the changing kitchen |61 |
| 3.4.3.4 Spatial design method: the setting |63 |
| 3.5 Conclusion |64 |



Chapter 4: DESIGN DEVELOPMENT

| | |
|--|-----------|
| | 65 |
| 4.1 Design approach | 66 |
| 4.1.1 Implementing theory in a spatial manner | 67 |
| 4.1.2 Spatial translation of the changing kitchen concepts | 67 |
| 4.1.3 Spatial journey through the interaction of the process oriented view | 68 |
| 4.1.4 Conceptual ideas from theories | 70 |
| 4.2 Brand development | 71 |
| 4.2.1 Logo | 71 |
| 4.2.2 Menu & packaging design | 72 |
| 4.2.3 Look & feel | 74 |
| 4.2.4 Conceptual requirements of the proposed programme | 76 |
| 4.2.4.1 Operational style | 76 |
| 4.2.4.2 Consumer behaviour | 76 |
| 4.3 Commercial kitchen requirements | 77 |
| 4.3.1 Classification | 77 |
| 4.3.2 Spatial requirements for movement | 77 |
| 4.3.2.1 Movement 1: Receiving/deliveries and storage | 78 |
| 4.3.2.2 Movement 2: Preparation, cooking and assembly/service | 78 |
| 4.3.2.3 Movement 3: Cleaning and waste | 78 |
| 4.3.2.4 Conceptual movement | 78 |
| 4.3.3 Spatial requirements of the proposed programme | 80 |
| 4.4 Spatial layout | 81 |
| 4.4.1 Programme list | 81 |
| 4.4.2 Exploration of the layout | 83 |
| 4.4.2.1 Iteration 1: summary | 84 |
| 4.4.2.2 Iteration 2: summary | 85 |
| 4.4.2.3 Iteration 3 | 86 |
| 4.4.3 Requirements | 92 |
| 4.5 The sequence of the sensory interactions | 93 |
| 4.6 Materiality and design | 97 |
| 4.6.1 Shaping | 97 |
| 4.6.2 Joining | 97 |
| 4.6.3 Surface | 97 |
| 4.6.4 Requirements | 98 |
| 4.7 The design detail focus | 100 |
| 4.7.1 Seating configurations | 101 |
| 4.7.1.A Pod seating configuration | 104 |
| 4.7.1.B Booth seating configuration | 105 |
| 4.7.2 Kitchen interface | 106 |
| 4.7.2.A Trolley & bins system | 109 |
| 4.7.2.B Adaptable signage | 109 |
| 4.7.3 Interaction platform | 110 |
| 4.8 Intended spatial meaning | 111 |
| 4.9 Conclusion | 116 |



Chapter 5: TECHNICAL DEVELOPMENT

| | |
|------------------------------------|-----|
| 5.1 Technical approach | 118 |
| 5.2 Materials | 120 |
| 5.3 Electric approach | 135 |
| 5.3.1 Lighting calculations | 138 |
| 5.4 Frameworks | 140 |
| 5.4.A Indoor environmental quality | 140 |
| 5.4.B Operational framework | 140 |
| 5.4.C Secondary functions | 141 |
| 5.4.D Water | 141 |
| 5.5 Rating | 142 |
| 5.6 Conclusion | 144 |

Chapter 6: CONCLUSION

| | |
|-----------------------|-----|
| 6.1 Overview of study | 146 |
| 6.2 Outcomes | 147 |
| 6.3 Contributions | 147 |
| 6.4 Recommendations | 148 |
| 6.5 Conclusion | 148 |

LIST OF REFERENCES

APPENDIX A: EXPLORATION OF THE LAYOUT

APPENDIX B: XANITA X-BOARD

APPENDIX C: GROWLIGHT SPECIFICATIONS

APPENDIX D: PERSONAL REFLECTION

APPENDIX E: FINAL PROTOTYPES

| | |
|-------|------------|
| | 149 |
| | A |
| | B1 |
| | C1 |
| | D1 |
| | E1 |



LIST OF FIGURES

Note: All of the figures in the document without a reference, where compiled by the author of this dissertation.

Chapter 2: CONTENT & ANALYSIS

| | | |
|---------------|--|----|
| Figure A.1.1: | Zone 1, front of house (Franklin, 2015) | 18 |
| Figure A.1.2: | Display (Franklin, 2015) | 18 |
| Figure A.1.3: | Shopfront (Franklin, 2015) | 18 |
| Figure A.1.4: | Zone 2 with counter (Franklin, 2015) | 18 |
| Figure A.2.1: | Interior view (Fermier, 2016) | 19 |
| Figure A.2.2: | Floor articulation (Fermier, 2016) | 19 |
| Figure A.2.3: | Lighting emphasize food (Fermier, 2016) | 19 |
| Figure A.2.4: | Materials (photos by author of dissertation) | 19 |
| Figure A.3.1: | Babel restaurant (Babylonstoren, 2016) | 20 |
| Figure A.3.2: | Greenhouse restaurant (Babylonstoren, 2016) | 20 |
| Figure A.3.3: | Pick and serve (Babylonstoren, 2016) | 20 |
| Figure A.3.4: | Seasonal plates (Babylonstoren, 2016) | 20 |
| Figure A.3.5: | Rural farm (Babylonstoren, 2016) | 20 |
| Figure A.4.1: | Interior axonometric (Contemporist, 2010) | 21 |
| Figure A.4.2: | Interior seating area, natural characteristics (Contemporist, 2010) | 21 |
| Figure A.5.1: | Interior view (photo by author of dissertation) | 22 |
| Figure A.5.2: | Retail displays (Fawzy, 2015) | 22 |
| Figure A.5.3: | Shopfront and outside seating area (Fawzy, 2015) | 22 |
| Figure A.5.4: | Retail display (Fawzy, 2015) | 22 |
| Figures A.6: | Interior counter, seating and water point (Nourished, 2013) | 23 |
| Figures A.7: | Order counter and seating area (The Cold Pressery, 2014) | 23 |
| Figure A.8.1: | Order station, different materials (Palaeo, 2012) | 24 |
| Figure A.8.2: | Fresh produce station (Palaeo, 2012) | 24 |
| Figure A.8.3: | Social interaction bar station (Palaeo, 2012) | 24 |
| Figure A.9.1: | Urban farming building (Urban Farmers, 2014) | 24 |
| Figure A.9.2: | Aquaponics systems (Urban Farmers, 2014) | 24 |
| Figures A.10: | Community based on urban farming (The Cannery, 2016) | 25 |
| Figure B.1: | Interacting with food event (Vogelzang, 2006) | 26 |
| Figure B.2: | Food as performance art (Vogelzang, 2006) | 26 |
| Figure B.3: | Information installation, the colour of ingredients (Vogelzang, 2006) | 27 |
| Figure B.4: | Designed menu for a specific mood (Vogelzang, 2006) | 27 |
| Figure B.5: | Tactile sensory cutlery (Dezeen, 2012) | 28 |
| Figure B.6: | Paper strips with seeds within (Reid, 2016) | 28 |
| Figure 2.3.1: | Interpretation of the Maboneng precinct site map | 30 |
| Figure 2.3.2: | Photographs of the precinct character | 32 |
| Figure 2.3.3: | Diagram of proposed site from figure 2.3.1 | 32 |
| Figure 2.3.4: | Photographs of the surrounding context for programmatic integration | 32 |
| Figure 2.3.5: | Site plan | 33 |
| Figure 2.3.6: | The proposed site | 34 |
| Figure 2.3.7: | Existing fabric | 36 |
| Figure 2.3.8: | Analysis of the existing fabric, both the exterior and the interior | 37 |
| Figure 2.4.2: | An expression of the urban character, representing both the context and the people A collection of images from a social-media platform, compiled by author: 2016) | 39 |



Chapter 3: THEORETICAL INVESTIGATION

| | | |
|---------------|--|----|
| Figure 3.2.1: | Diagrammatic representation of a process oriented view (Interpretation by author from (Whitehead, 1978) & (Meisner-Jensen, 2011)) | 45 |
| Figure 3.2.2: | An interpretation of urban farming within an interior environment | 49 |

Chapter 4: DESIGN DEVELOPMENT

| | | |
|-------------------|---|-----|
| Figure 4.1.4.1: | Colours of seasonality (Cameron, 2014) | 70 |
| Figure 4.1.4.2: | Ingredients turned into a product (Bricco, 2011) | 70 |
| Figure 4.2.1: | Image of the service board | 73 |
| Figure 4.2.2: | Image of the envelope with recipe and seeds | 73 |
| Figure 4.2.3: | Image of the paper-bag packaging | 73 |
| Figure 4.3.A: | Podium seating (Dodo, 2011) | 79 |
| Figure 4.3.B: | Booth seating (Archdaily, 2014) | 79 |
| Figure 4.4.2.3.A: | Sketch representing exterior urban façade intervention | 86 |
| Figure 4.4.2.3.B: | Sketch representing interior seating area view | 86 |
| Figure 4.7.1.1: | Table frame support (MapleCityFurniture, 2012) | 101 |
| Figure 4.7.1.2: | Sewing detail (Erz & Co, n.d.) | 101 |
| Figure 4.7.1.3: | Floor pattern (Shastri, 2014) | 101 |
| Figure 4.7.2: | Maquet of the worktop interface | 106 |
| Figure 4.7.3.1: | Adaptable frame (Nam, 2014) | 110 |
| Figure 4.7.3.2: | Adaptable rope detail (Gonzalez, 2015) | 110 |
| Figure 4.7.3.3: | Adaptability of fasteners (Lowe's, n.d.) | 110 |
| Figure 4.7.3.4: | Aesthetic and organic pole structure (Archdaily, 2012) | 110 |
| Figure 4.7.3.5: | Images of the conceptual exploration using food colour for staining | 110 |

Chapter 5: TECHNICAL DEVELOPMENT

| | | |
|-----------------|-----------------------|-----|
| Figure 5.2.1: | General layout | 121 |
| Figure 5.2.2: | Urban facade | 124 |
| Figure 5.2.3: | Kitchen interface | 125 |
| Figure 5.2.3.1: | Kitchen interface | 126 |
| Figure 5.2.3.2: | Kitchen interface | 127 |
| Figure 5.2.4: | Infarm details | 128 |
| Figure 5.2.4.1: | Infarm details | 129 |
| Figure 5.2.5: | Interaction platform | 130 |
| Figure 5.2.5.1: | Interaction platform | 131 |
| Figure 5.2.6: | Seating configuration | 132 |
| Figure 5.2.6.1: | Pod configuration | 133 |
| Figure 5.2.6.2: | Pod configuration | 134 |
| Figure 5.3.1: | Ceiling plan | 137 |
| Figure 5.4.1: | Frameworks | 140 |

LIST OF DIAGRAMS

Note: All of the diagrams in the document without a reference, where compiled by the author of this dissertation.

Chapter 1: INTRODUCTION

| | | |
|----------------|---|---------|
| Diagram 1.1: | A broad outline of the entire dissertation |3 |
| Diagram 1.2.1: | The representation of a normative stance towards interior design |4 |
| Diagram 1.2.2: | An illustration which address the current status quo of the restaurant industry |5 |
| Diagram 1.2.3: | Consumer behaviours against sustainable principles |6 |
| Diagram 1.5: | Reference to the sustainable topics for the proposed programme |7 |
| Diagram 1.7: | A representation of the dissertations' field and topics |9 |
| Diagram 1.8: | The outline of the dissertation's methodology |11 |

Chapter 2: CONTENT & ANALYSIS

| | | |
|----------------|--|---------|
| Diagram 2.1: | The outline of the precedent study analysis |17 |
| Diagram A.1: | Progressive path |18 |
| Diagram A.4.1: | "Growing" counter |21 |
| Diagram A.4.2: | Seating behaviours |21 |
| Diagram A.5: | Layout separates processes, front versus back of house |22 |
| Diagram A.9: | Transparency of farming systems |24 |
| Diagram 2.4.1: | Consumer trends and character of the proposed target user and stakeholders |38 |

Chapter 3: THEORETICAL INVESTIGATION

| | | |
|----------------|--|---------|
| Diagram 3.1.1: | Timeline of the restaurant context |43 |
| Diagram 3.1.2: | Illustration of interior barriers and fields, suggesting the bridge between these thresholds |43 |
| Diagram 3.3: | Human centred design model and future exploration of experience design (Interpreted by author from (Clark & Smith, 2009) and (Kreitzer, 2012)) |50 |
| Diagram 3.4.1: | Interpretation of the theory of experience centred design (Interpreted by author from (Hassenzahl, 2014), (Hassenzahl, 2010: 8) (Hassenzahl, et al., 2010)) |52 |
| Diagram 3.4.2: | Defining user strategies and consideration for experience design (Interpreted by author from (Hassenzahl, et al., 2010) (Sheldon & Kasser, 2001)(Schmitt, 1999: 71-72)) |54 |
| Diagram 3.4.3: | Indication of user interaction patterns and the desired strategy for implementation (Interpreted by author from (Jackson, 2005) (Strömberg, et al., 2015)) |56 |
| Diagram 3.4.4: | Defining the interior threshold as design tool for experience design (Interpreted by author from (Garrett, 2006) , (Lockton, 2011) & (Hassenzahl, et al., 2013)) |60 |
| Diagram 3.4.5: | Showcasing the 4 concepts of the changing kitchen (Interpreted by the author from (Mills, 2010)) |62 |

Chapter 4: DESIGN DEVELOPMENT

| | | |
|----------------|--|---------|
| Diagram 4.1.1: | Summary of the problems related to the aim and objective of the interior design |66 |
| Diagram 4.1.2: | Exploration of transparent qualities for the interfaces |67 |
| Diagram 4.1.3: | Conceptual menu development with interior farming systems |68 |
| Diagram 4.1.4: | Movement of the two spatial routes and the centrally placed interaction |68 |
| Diagram 4.1.5: | Macro scale spatial implementation of the process of eating |69 |
| Diagram 4.1.6: | Micro scale implementation of the processes, create an interaction pattern |69 |
| Diagram 4.2.1: | Logo exploration |71 |
| Diagram 4.2.2: | Menu design |72 |
| Diagram 4.2.3: | Look & feel moodboard |75 |
| Diagram 4.3.1: | Requirements and considerations for a commercial kitchen, (Created by the author of this dissertation with reference to (Lawson, 2008: 17-2, 17-3)) |79 |
| Diagram 4.3.2: | Concepts for movement between processes, (Created by the author of this dissertation with reference to (Dodo, 2011) (ArchDaily, 2014)) |79 |



| | | |
|--------------------|--|-----|
| Diagram 4.3.3: | Spatial exploration of the proposed programme based on ergonomic spatial requirements (Created by the author of this dissertation with reference to (Lawson, 2008: 17-8 - 17-10)) | 80 |
| Diagram 4.4.1: | Representations of the proposed programmes, requirements and intentions; divided into the three phases of eating | 82 |
| Diagram 4.4.2.1: | Summary and reflection on iteration 1 | 84 |
| Diagram 4.4.2.2: | Summary and reflection on iteration 2 | 85 |
| Diagram 4.4.2.3(A) | The story | 88 |
| Diagram 4.4.2.3(B) | Final layout | 89 |
| Diagram 4.4.2.3: | Spatial use | 90 |
| Diagram 4.4.2.4: | Demolition sequence for the proposed programme (Interpreted by author based on the degrees of alteration (Scott, 2008)) | 91 |
| Diagram 4.4.3.1: | Illustration with calculations, indicating how the proposed programme achieved spatial requirements | 92 |
| Diagram 4.4.3.2: | Summary of the minimum requirements achieved | 93 |
| Diagram 4.5.1: | Conceptual illustration of the sensory experience | 93 |
| Diagram 4.5.2: | Three strategies of the sensory experience | 94 |
| Diagram 4.5.3: | Explanation of the sensory interactions, experienced individually and shared | 95 |
| Diagram 4.5.4: | Conceptual illustration emphasizing the intended user interaction through touch | 96 |
| Diagram 4.6: | Exploration of material characteristics and requirements | 99 |
| Diagram 4.7: | Outline of the design focus | 100 |
| Diagram 4.7.1A: | Sectional diagram of seating configurations and infarm systems | 101 |
| Diagram 4.7.1.B: | Different articulations and similarities of the seating configurations | 102 |
| Diagram 4.7.1.C: | Material choices and joinery details for the seating configurations | 103 |
| Diagram 4.7.1.D: | Conceptual exploration of the pod seating configuration | 104 |
| Diagram 4.7.1.E: | Conceptual exploration of the booth seating configuration | 105 |
| Diagram 4.7.2.A: | Sectional diagram showcasing the kitchen interfaces and their articulations | 106 |
| Diagram 4.7.2.B: | Conceptual exploration of the kitchen interface | 107 |
| Diagram 4.7.2.C: | The arrangement and concept of the kitchen interfaces | 108 |
| Diagram 4.7.2.D: | Diagrammatic illustration of the kitchen articulation and its transparent quality | 108 |
| Diagram 4.7.2.E: | Conceptual exploration of the systems supporting the function of the kitchen | 109 |
| Diagram 4.8.2: | Kitchen interface elements | 113 |
| Diagram 4.8.3: | Seating configuration elements | 115 |

Chapter 5: TECHNICAL DEVELOPMENT

| | | |
|------------------|---|-----|
| Diagram 5.1.1: | Aspects of sustainability for the proposed programme | 118 |
| Diagram 5.1.2: | Icons for material and electric specifications | 119 |
| Diagram 5.1.3: | Outline of the technical focus | 119 |
| Diagram 5.2.1: | Floor finishes | 122 |
| Diagram 5.3: | Exploration of the lighting strategy of different LED's with different moods or tasks | 136 |
| Diagram 5.4.B.1: | Proposed waste framework | 140 |
| Diagram 5.4.B.2: | Frameworks encouraging community upliftment | 140 |
| Diagram 5.4.C: | Secondary functions of the interior | 141 |
| Diagram 5.4.D: | Diagrammatic water reticulation | 141 |

APPENDIX A

| | | |
|--------------------|---------------------|----|
| Diagram 4.4.2.1(A) | Multiple kitchens | A1 |
| Diagram 4.4.2.1(B) | Central kitchen | A2 |
| Diagram 4.4.2.1(C) | 3 Nodes | A3 |
| Diagram 4.4.2.1(D) | 2 Systems | A4 |
| Diagram 4.4.2.2(A) | Sharing structure | A5 |
| Diagram 4.4.2.2(B) | Seated to speed | A6 |
| Diagram 4.4.2.2(C) | Technicalities | A7 |
| Diagram 4.4.2.2(D) | Process orient view | A8 |



LIST OF TABLES

Chapter 4: DESIGN DEVELOPMENT

| | | |
|--------------|---|----------|
| Table 4.8.1: | Spatial meanings of the urban façade and interior interventions |111 |
| Table 4.8.2: | Spatial meanings of the kitchen interface |112 |
| Table 4.8.3: | Spatial meanings of the seating configurations |114 |

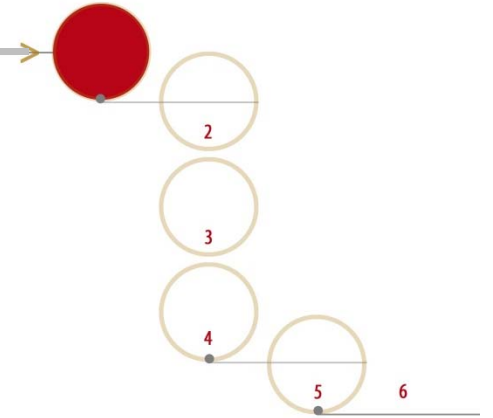
Chapter 5: TECHNICAL DEVELOPMENT

| | | |
|--------------|---|----------|
| Table 5.2.1: | Schedules |123 |
| Table 5.3.1: | Lighting specifications |137 |
| Table 5.3.2: | Lighting calculations |138 |
| Table 5.3.3: | Illumination requirements (Compiled by author with reference to (Saflii, 2003) (Pioneerlighting, n.d.) (Lamps & Lighting, 2016)) |139 |
| Table 5.3.4: | Illuminance calculations |139 |
| Table 5.5.1: | SBAT rating |142 |
| Table 5.5.2: | GreenStar rating |143 |



CHAPTER 1

INTRODUCTION



“The way people live their lives are directly linked to the designed environments in which they live”
(Lockton, 2011).

Chapter one provides a short discussion on a personal manifesto and normative stance towards interior design and a hypothesis as background. The project proposal is developed based on this background. As point of departure the problem statement is developed. This leads into a series of research questions, where after a status quo is addressed. As response, aims and objectives are presented. The dissertations intent informs the three identified approaches for research theory which forms the foundation for design development. Further, the project field and topics are stated. A design-thinking-process methodology is discussed and keywords and definitions are given. This chapter is concluded with a suggested overview of the dissertation.

1.1

DISSERTATION OVERVIEW

The dissertation will be divided into three stages namely: Inspiration, Ideation and Implementation, which is discussed below (Brown, 2008). The chapters and their overviews (*diagram 1.1*) will be based on these stages, as discussed in section 1.7.

1. Inspiration

An idea is generated based on an identified problem. The idea is inspired by a background, such as a stance, identified area of interest or by addressing a status quo.

2. Ideation

In response to the inspiration stage, the idea is realized by implementing methods for development. This methodology refers to the design-thinking-process, which is further divided into 3 stages:

- a. Empathy, to understand the user.
- b. Knowledge, defined by literature studies.
- c. Explore, by developing design concepts with prototypes and testing.

3. Implementation

After the design development, the intent of the ideas is rationalised. Design specific details are technically resolved.

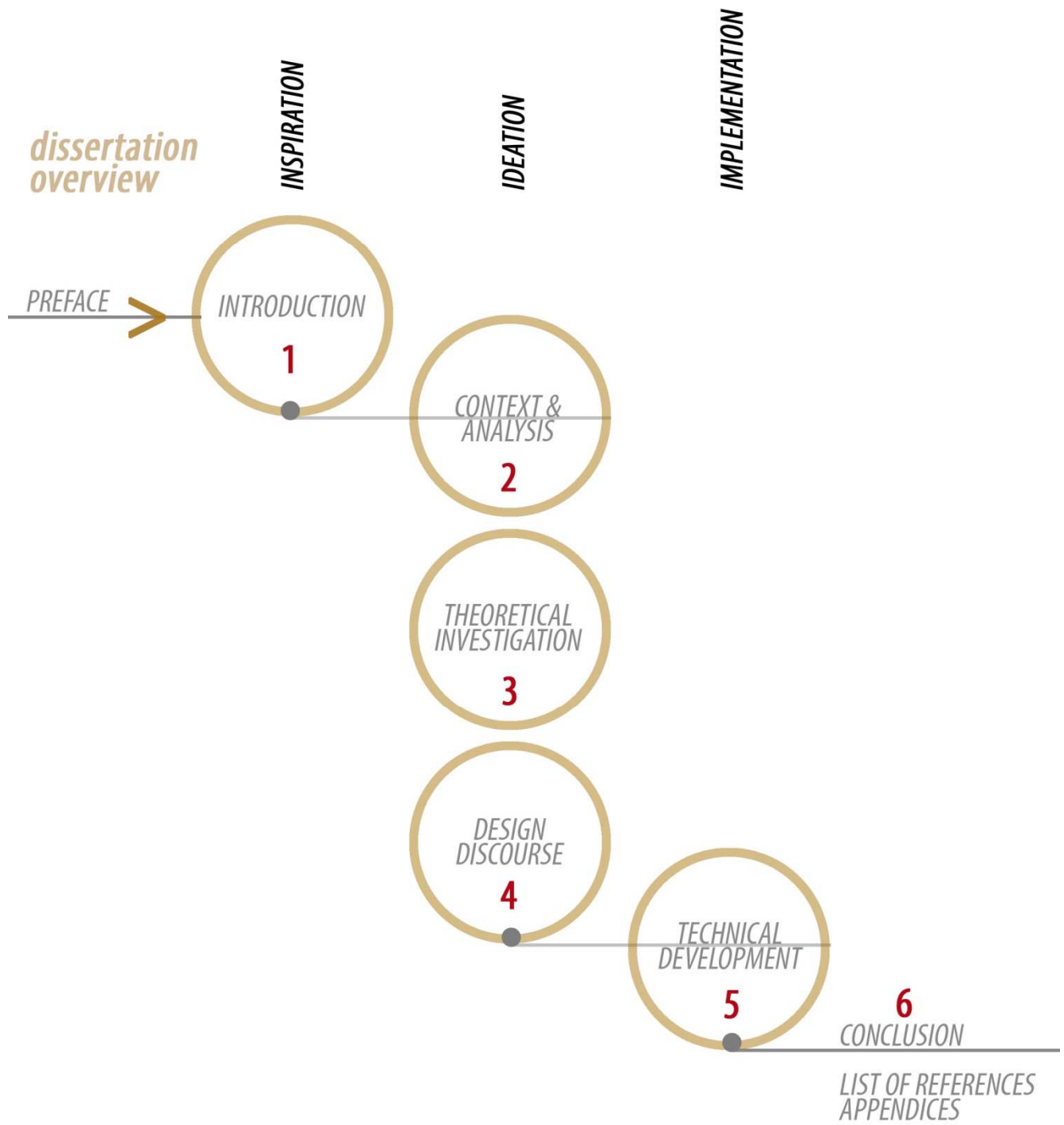


Diagram 1.1: A broad outline of the entire dissertation

1.2

BACKGROUND

1.2.1

NORMATIVE STANCE TOWARDS INTERIOR DESIGN

As an emerging interior design-researcher, it is identified that the interior discipline has an unrecognised value in social spheres. In formulating a personal manifesto, it is of opinion that the interior is and should be addressed as 'the body of space' designed for 'the body in space', which is the user. The aim of this dissertation is to address how the body of space can potentially change the body in space.

This embodied interior space must be viewed as a product for the user's experiences. An interior experience is a strategy which seeks a user interaction and involvement within a space and its artefacts, to convey an intended meaning, feeling or message (Vogelzang, n.d.). It envisions the interior as a combination of different elements, working together, yet experienced individually while maintaining their own identity (Scott, 2008:137). These designed experiences are a continuous endeavour of detailed, intimate and sensitive contrasts, creating a sequence of movements and views in a spatial narrative. With this identity focussed on creating experiences, the disciplines' potential is to influence the inhabitants (see diagram 1.2.1).

As a designer, it is both an opportunity and responsibility to implement spatial explorations and experiences within the interior threshold. Our discipline is therefore influential when these implementations are sustained by an established knowledge base and rational decision making process (König, 2010:50-52).

There is a scarceness in experiential design created through the interior discipline. A need for theories and knowledge in this area exist. This manifesto will relate to the dissertation's proposal, by investigating how interior design can specifically influence the user with its embodied experience.

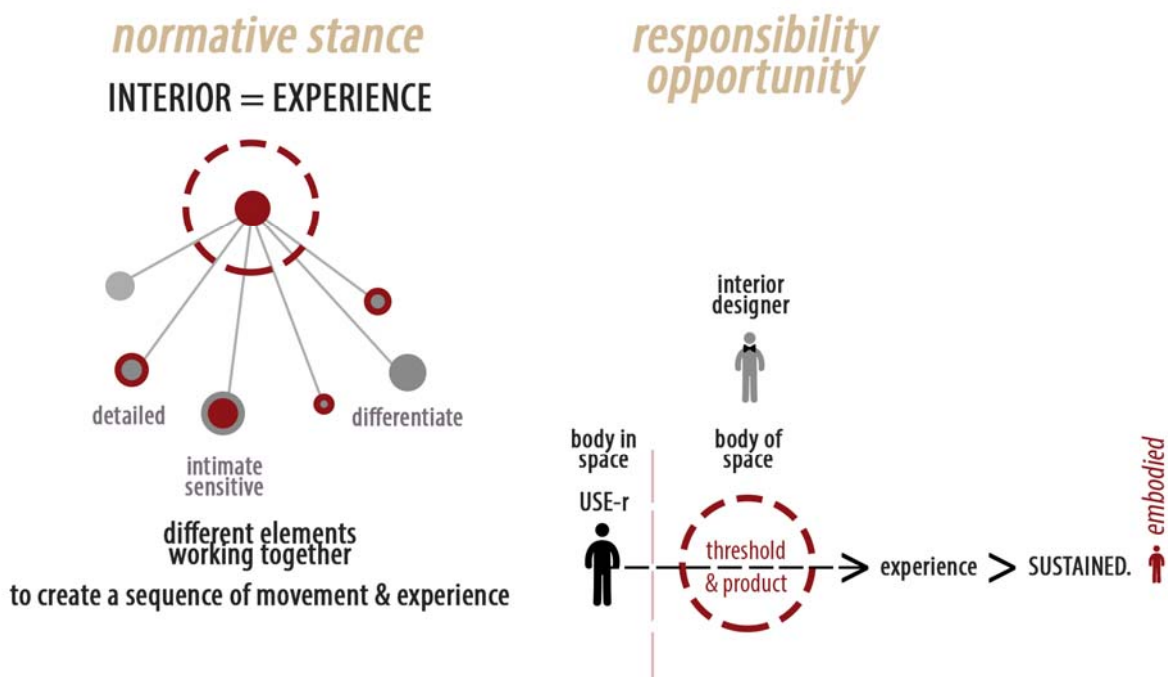


Diagram 1.2.1: The representation of a normative stance towards interior design

1.2.2

CONTEXT: ADDRESSING THE STATUS QUO

A greener way of living is taking the world by storm. Susan Dunn, the Executive Vice President of Nielsen, a Global Health & Wellness information and measurement company stated: "Health is going mainstream, as consumers around the globe search for better, healthier and smarter solutions that fit their lifestyle and specific needs. The motivation for manufacturers and retailers to foster strategies for a healthier world is powerful. But much more needs to be done" (Nielsen, 2015). With agreement yet dispute, this trend is contradicted.

This stance is contextualized as a response against the status quo of the restaurant industry, towards sustainable living. Restaurants, specifically fast-food outlets or café's, tend to dominantly promote unhealthy lifestyles and lack in an experience beyond the food itself. Due to the current interest in healthy and sustainable living, this conflict can be utilized through the implementation of design. In response, the question must be asked: "If eating out were only about food, then the setting would not matter" (Fox, n.d.). As stated, the setting in its character, experience and sustainable value, are neglected in all aspects of its being.

The problem statement is manifested in section 1.2.1, the normative stance. Interior environments have the opportunity to be both experiential and influential. This statement enlightens the recognized desperate need for change in the status quo of the restaurant industry (*diagram 1.2.2*).

STATUS QUO

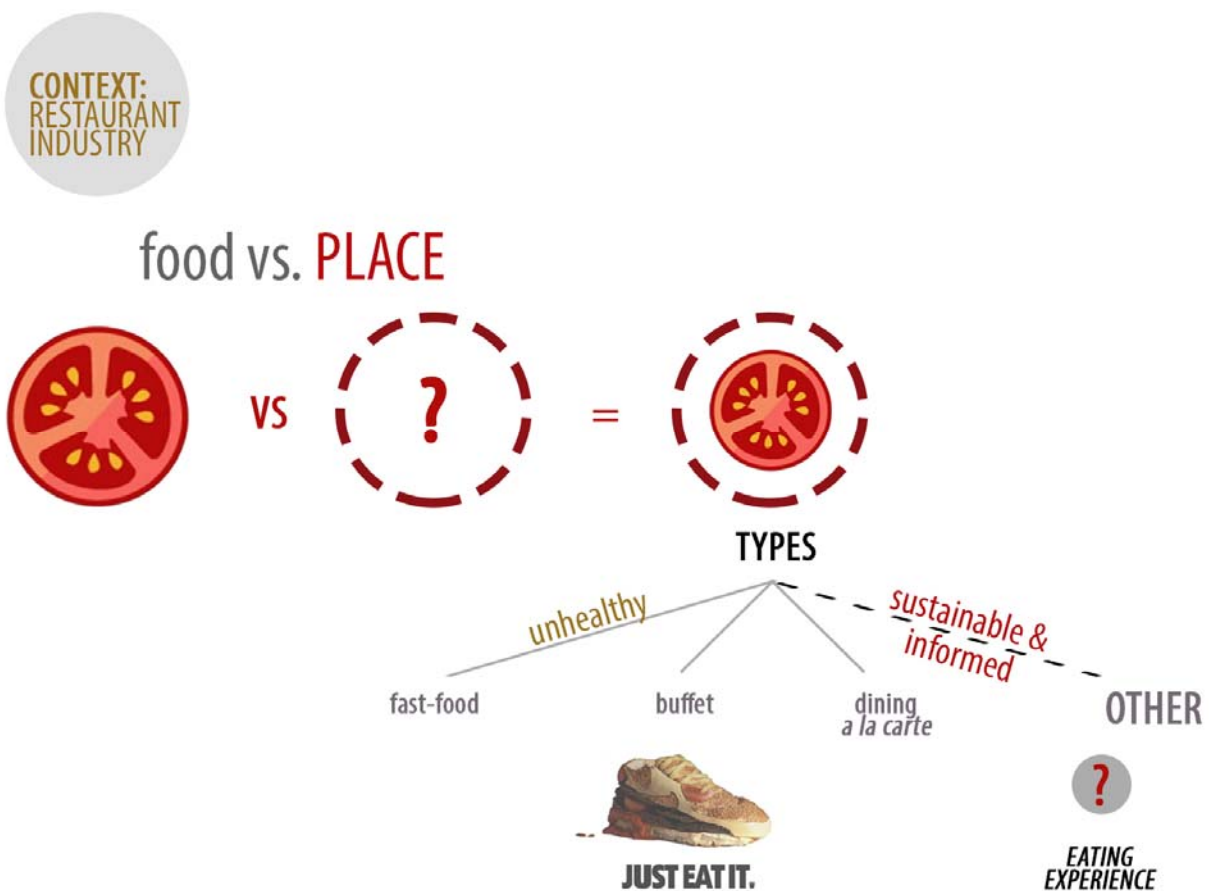


Diagram 1.2.2: An illustration which address the current status quo of the restaurant industry

1.2.3

CONSUMER BEHAVIOUR: HABIT & CHANGE

Consumers tend to react against healthy and sustainable living principles for various reasons (*diagram 1.2.3*). Behavioural changes of consumers are needed in order to implement sustainable living principles. This will be achieved with informed habit formation being motivating, desired or rewarding.

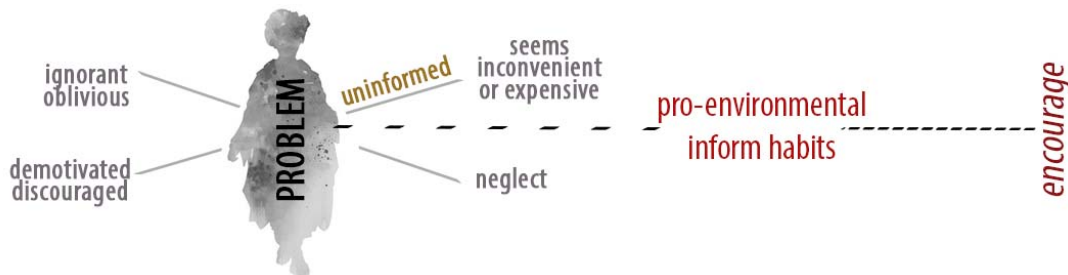


Diagram 1.2.3: Consumer behaviours against sustainable principles

1.3

THE PROBLEM STATEMENT

A rising problem in the social sphere is a concern of healthy and sustainable living, with the focus on aspects of well-being, eating and nutrition. It has not been seen or explicitly explored as a problem to address within the discipline of interior design. In relation to the problem statement, the questions to ask are:

Why do some interior designers choose to practice sustainable design, while others don't? (Templeton, 2011: 3).

Why do some people choose to practice sustainable living, while others don't? (Adapted statement of (Templeton, 2011) by author of this dissertation).

1.3.1

HYPOTHESIS

There is a rising collective interest in food, a healthy lifestyle and sustainable behaviours. This emerging interest must be utilized as both an opportunity and responsibility for design.

These aspirations are not realized because a large number of the society does not share the same views and behaviours. The ideals of living in a sustainable manner is not habituated or internalized. This is due to the experience of and in our interior environments we live in. The question is whether the interior environment can determine or contribute to a sustainable lifestyle?

1.4

RESEARCH QUESTION

What interior determinants encourage sustainable behaviours and living?

1.4.1

SUB-QUESTIONS

- How can human centred design in the interior be used to determine and suggest a sustainable way of living? Will new perspectives of experiential design in the interior environment encourage sustainable principles?
- Will a sustainable interior environment contribute or encourage sustainable living?
- Are the ways we eat and live relational towards its setting?

1.5

AIMS AND OBJECTIVES

An approach is developed which aims to address a healthier way of living through an interior design project. The objective is to create a lifestyle of welfare, with the interior as a tool. Intentionally, a sustainable interior environment must encourage sustainable living. Sustainability refers to the topics of both the environment and well-being. The environmental aspect addresses materiality, recycling, composting, water, energy and labour. Well-being dominantly refers to nutrition as well as physical activity, sleeping, recovery and social interaction (*diagram 1.5*).

Scarceness of user experience in interior environments will be examined. The dissertation will broaden and define the application of experiences in the interior and establish it as a distinct tool, significant to the discipline. It will showcase the potential influential value of an interior, for societal change.

A concept is proposed as *Green (Inside)*; an eating experience, using the eating process as a medium of communication, to address ecological and lifestyle sustainability. These experiences will intentionally involve and expose users to participate within the spaces and its processes.

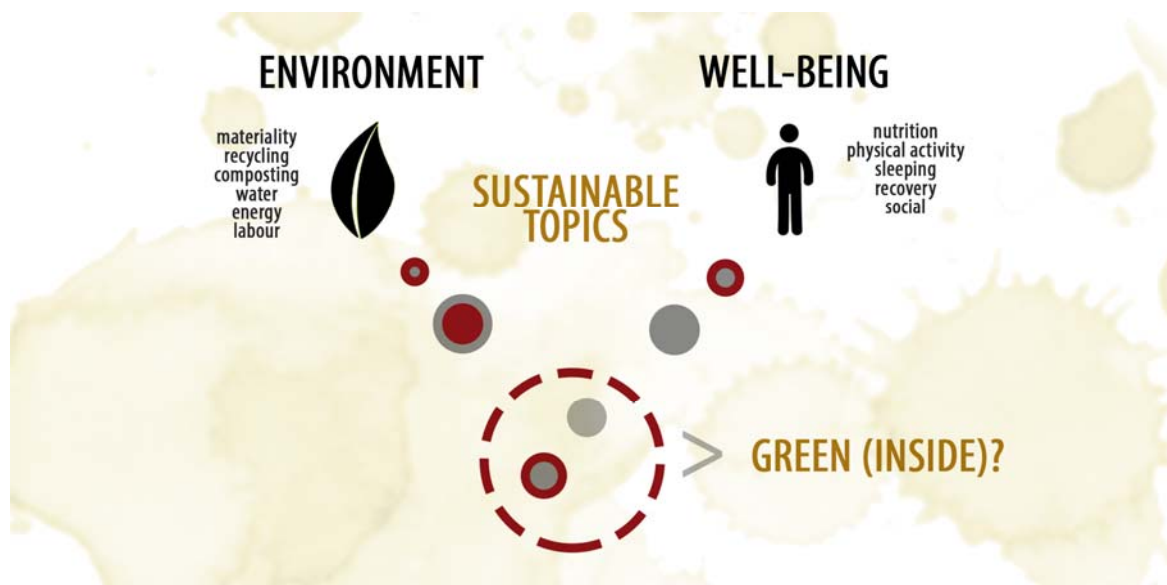


Diagram 1.5: Reference to the sustainable topics for the proposed programme

1.6

APPROACH

This dissertation will manifest itself in three research theory aspects (*refer to chapter 3*):

- 1.6.1 Sustainable development: re-defining food and the eating process
- 1.6.2 Human Centred Design
- 1.6.3 Experiential design

1.6.1

SUSTAINABLE DEVELOPMENT BY ADAPTING THEORIES: RE-DEFINING FOOD AND THE EATING PROCESS

A perspective of Jon Meisner-Jensen in *Eating Processes: How a redefinition of food can help solve food problems* (2011) is investigated. The author encourages a process orientated view towards food. It aims to showcase foods' progressive route of change in order to change the user perspective. This view links with two main concepts of investigation, namely; the farm-to-table principle and farming in the city (urban agriculture).

The organic philosophy, a sustainable and transparent approach towards food production with regards to human consumption and the environment, will be investigated (Meisner-Jensen, 2011: 7). It is the most ethical food movement and presents economic prospects. (Ripe, 2015) (Kuepper, 2010:3-13).

1.6.2

HUMAN CENTRED DESIGN

A focus on habit formation and environmental psychology will influence strategies for behavioural change. It will discuss the theories of designing for sustainable behaviour through the role of consumption (Jackson, 2005) and an interaction pattern (Strömberg, et al., 2015). An in-depth analysis of the behaviours of the user will consequently determine the extent of the desired experience to be designed.

1.6.3

EXPERIENTIAL DESIGN

Adaptive Path, an established company situated in San Francisco, created a framework for a customer journey model in the interior environment (Adaptive Path, 2013). This framework suggests a new theory seen as a sub-theory of human centred design. It is the focus of experiential design in the interior environment.

Following the principles of the Adaptive Path framework, different exposures will seek to reinvent the experience of interaction in a restaurant context. Spatial configurations based on principles of the changing kitchen (Mills, 2010) will inform the design of the proposed framework. The exploration will contribute spatial strategies for creating experiences, directly within the discipline of the interior designer.

1.7

FIELD AND TOPICS

The dissertation falls under the field of environmental potential. Secondly it focusses on creating cultural landscapes.

It primarily addresses the topic of well-being, with its reference to health and sustainability; situated within the areas of retail and hospitality (*diagram 1.7*).

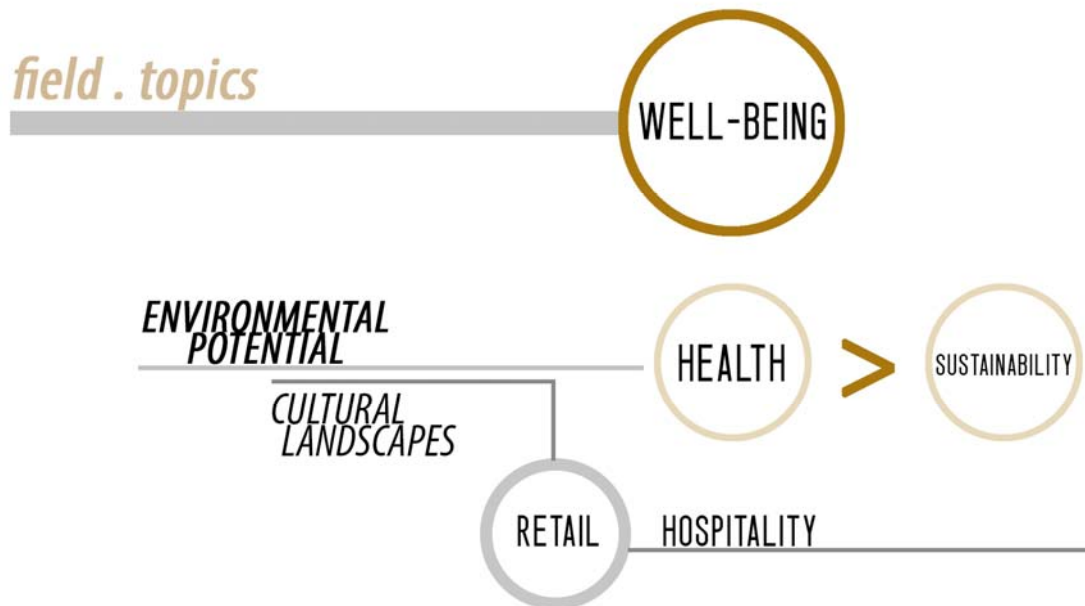


Diagram 1.7: A representation of the dissertations' field and topics

1.8

METHODOLOGY

An iterative research methodology, referred to as a design-thinking-process, will be followed. Defined with a human-centred focus, it is based on consumer and designer involvement in all aspects of design (Lockwood, 2009).

The research method comprises of three methods of investigation (*diagram 1.8*):

- 1.8.1 Context and analysis (*empirical*)
- 1.8.2 Theoretical investigation (*literature studies*)
- 1.8.3 Design development (*qualitative*)

1.8.1

CONTEXT & ANALYSIS

This is the point of departure for the design project. Empirical data will be generated through observation and psychological analysis. The data will be generated through precedent studies where after the context, site and target-user is identified for the proposed programme.

The following deliverables will follow:

- Precedent studies must be informants for the dissertations development.
- Identify an appropriate context for the proposed programme.
- Analyse site context and urban vision.
- Place dissertation programme within the context.
- Define and understand the specific user and stakeholders.

1.8.2

THEORETICAL INVESTIGATION

The dissertation will manifest itself in the three identified literature studies in support of and for design concepts, development, strategies and implementations. As starting point to the proposed programmes investigation, background will be supplied. It will define the interior environment as well as the restaurant context.

The theories are as follow (*investigated in chapter 3*):

- Sustainable development: re-defining food and the eating process.
- Human Centred Design.
- Experiential design.

1.8.3

DESIGN DEVELOPMENT

As a result of the literature study, a qualitative response will be made through prototyping and testing.

Conceptual and spatial explorations with iterative reflections, will define the final design. The iterations will be documented with different variations of diagrams and photographs. It will clearly showcase the testing, building or expressions of conceptual ideas.

The requirements for restaurant operations as well as new technicalities and details for the programme will be integrated within this chapter.



methodology

ITERATIVE

DESIGN THINKING PROCESS

consumer & designer involvement

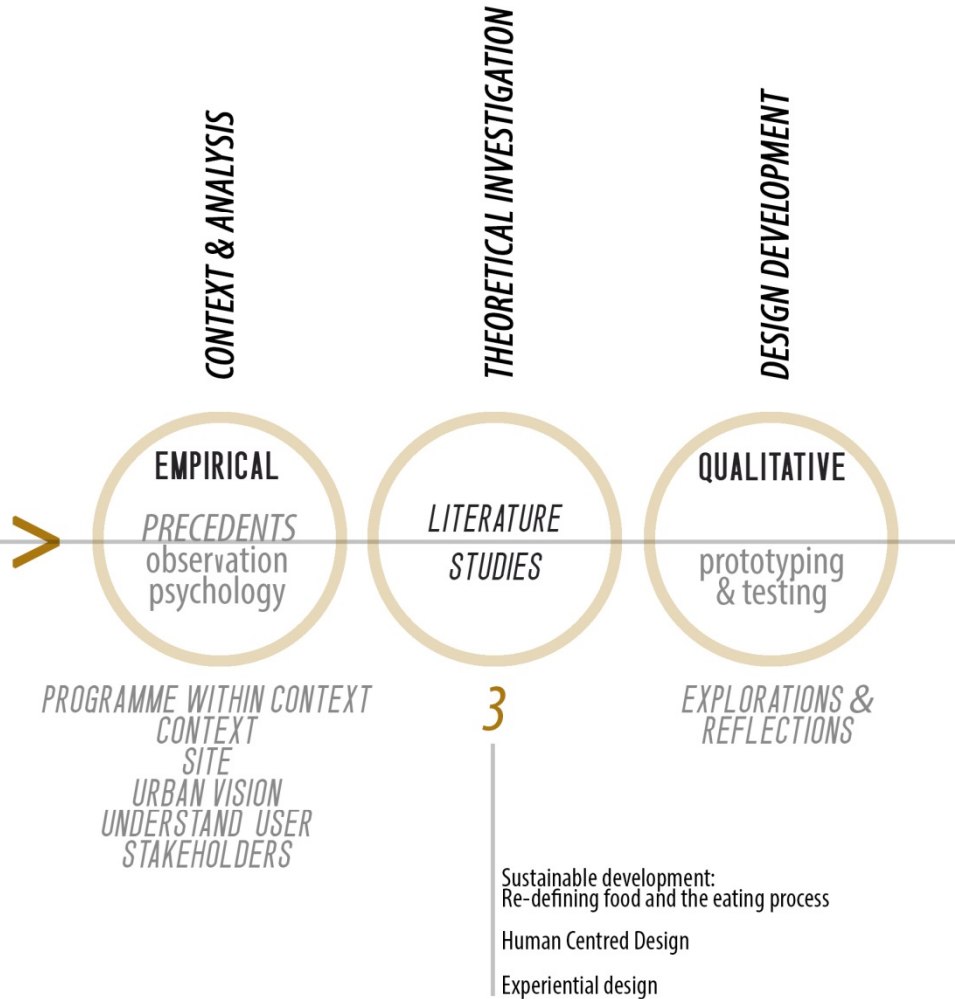


Diagram 1.8: The outline of the dissertation’s methodology

1.9

KEYWORDS AND DEFINITIONS

Artefacts

Artefacts can be referred to as all cultural residues of human production, both tangible and intangible, with cultural agency (being of meaning). An object is a subset of an artefact, consisting of tangible material form (König, 2015).

Changing kitchen

This is an approach which considers the kitchen as a central space defining element. Various changed concepts, contradicting the norm, can be developed or implemented (*refer to chapter 3.4.3.4*) (Mills, 2010).

Environment

The environment can be referred to as the interaction of physical and biological surroundings. It is therefore the sum of water, air, land and its inter-relationship between humans, other living organisms or materials. We as humans have an influence on the environment through overuse or over-exploitation of resources. This term is also referred to as ecology or ecological factors (Kaushik, 2010).

Experience

An experience is a sensation or user participation due to an exposure to intended design strategies. It seeks for interaction, involvement and intimacy within a space and its' artefacts, to convey an intended meaning, feeling or message (Vogelzang, 2006).

Healthy

Health must be viewed as a positive concept. It is defined as; "A state of complete physical, mental and social well-being and not merely the absence of disease or infirmity." The word; healthy, refers to a balanced condition of living, when there is a harmonious performance of vital functions. This level of function allows individuals the ability to adapt and self-manage when facing physical, mental or social challenges (World Health Organisation, 1948).

Lifestyle

An aggregation of certain habits, attitudes, tastes, moral standards, or behaviours; based on personal decisions or societal influence, which constitute a specific way and manner of living (Dictionary.com, 2016).

Relate to well-being.

Nutrition

The intake of food according to body dietary needs, in a balanced combination with physical activity. An adequate level of nutrition and activity denotes good health (World Health Organisation, 2016).

Restaurant

A business or establishment which accommodate the consumption of prepared food, through service, on site (CharMeck , 2016). It is a place where food is cooked, assembled, portioned, and served in a packaged or unpackaged manner. Three types of restaurants exist, namely; fast-food, buffet and dining: *à la carte* (Undo, 2010). They are differentiated in food preparation, service and interaction, as stated:

- Fast-food

Fast prepared food on demand, with no table service. There is a quick interaction between the servant and customer. Usually has a drive-thru option.

- Buffet

Pre-cooked food attained through self-service. There is no interaction between the servants and preparation processes with the customers.

- Dining: *à la carte*

Food is delivered on request to a table by a servant. There is customer and service interaction.

Sustainability

Sustainability is viewed as a life cycle approach, promoting a long-term balance and benefit. The Oxford University Press stated in 2007 that the word sustainability refers to; “The capability of being maintained, borne, defended, upheld or supported” (Templeton, 2011).

Sustain, a verb, refers to a task/principle to be held or maintained continuously.

Sustainable, an adjective, refers to a task/principle being capable. It is able to be sustained for an indefinite period, if it doesn't damage the environment or deplete resources (Harrison, 2008).

Welfare

With relation to interior design: An interior environment which supports physical, psychological, social, and spiritual well-being. It furthermore assists or contributes to the financial or economic management, success, and responsibility (Guerin & Martin, 2010).

Well-being

It is a state of being in balance. This is an alignment of mind, body and soul. This state of balance is affected by health, purpose (meaning to life or work), relationship (social connectedness), community (engagement and empowerment of people with resources and infrastructure), security (basic human needs, stability) and our environments (Kreitzer, 2012).

Well-being is thus a strategy to improve *health*, and can be touched upon the discipline of interior design by changing the environments users inhabit.

1.10

CONCLUSION

The project proposal for the dissertation was developed based on a normative stance towards interior design. A gap in the social sphere has been recognised towards sustainable living, and how the discipline of interior design can be used in response.

The dissertation is contextualized as a response against the status quo of the restaurant industry, which tends to be unhealthy and lack to provide an experience beyond the food itself. Research questions informed the investigation of the three theoretical approaches with regards to this problem. Through context analysis and a theoretical investigation, the aim is to create a designed user experience in the interior environment which encourages sustainability. The experience must be regenerative to be sustained and internalized by the users.

A contextual study and analysis will follow in the next chapter.