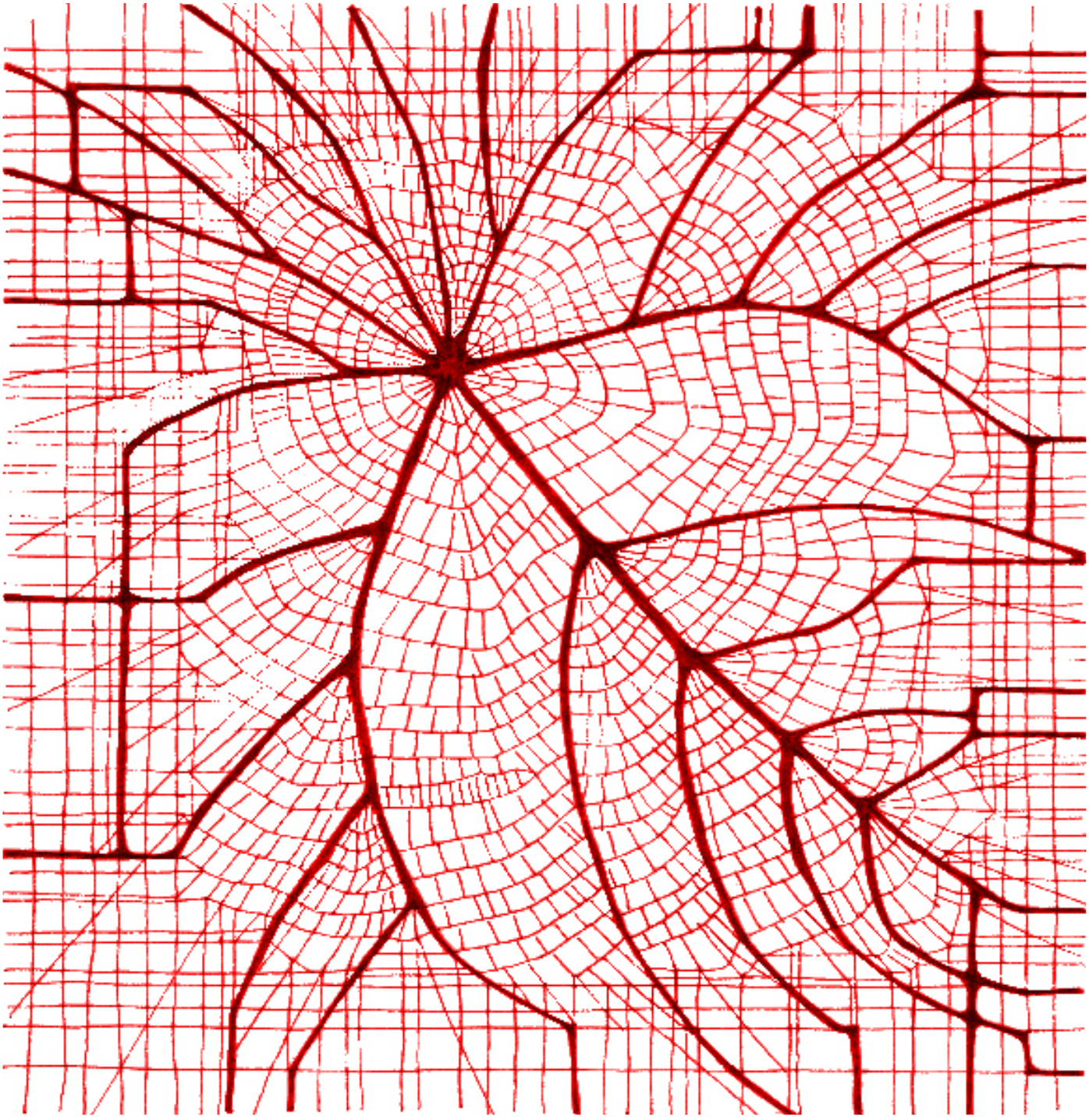


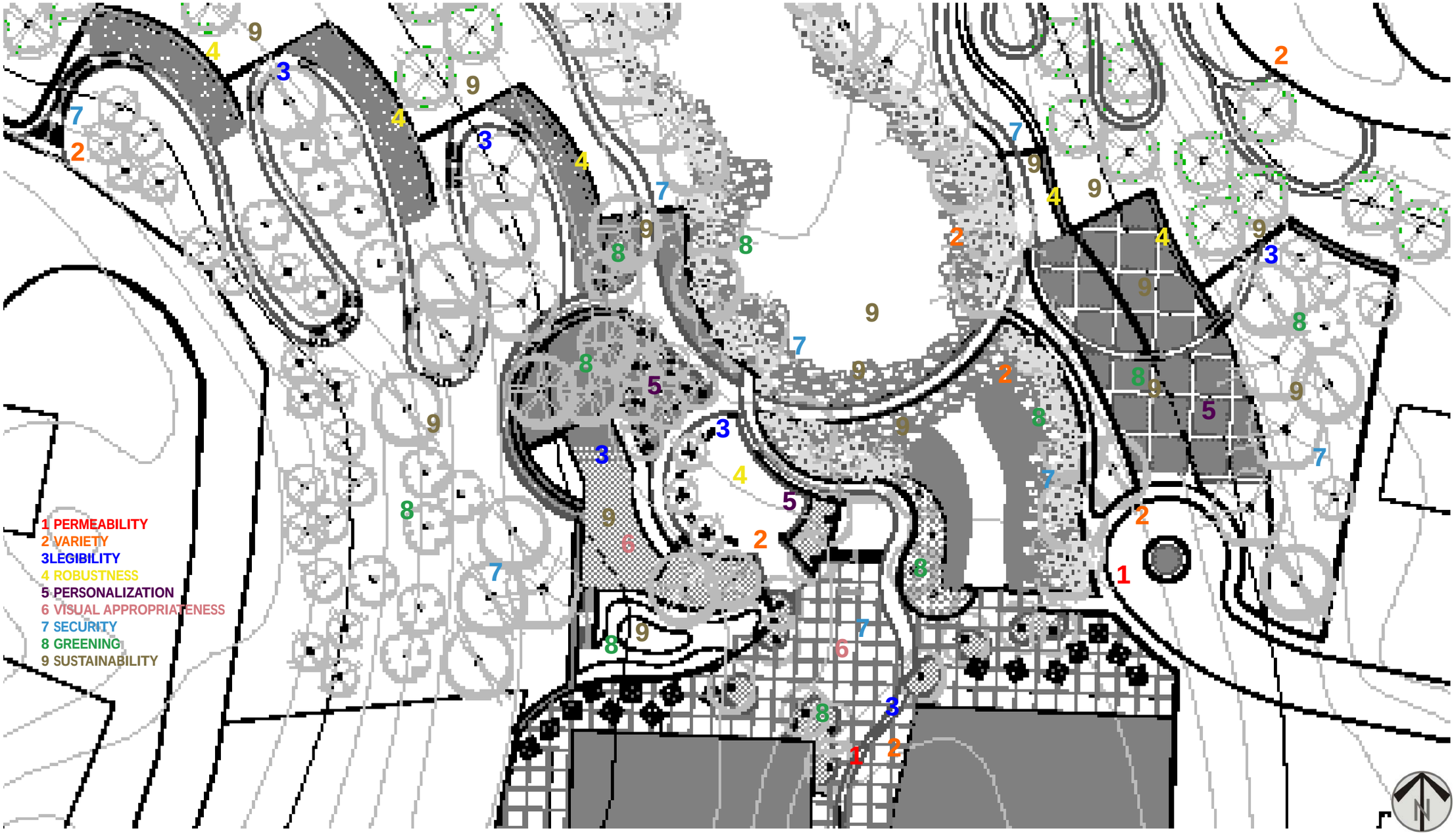
chapter 7
design development

7.1. INTRODUCTION

Within each district, design focus is layered according to the design principles discussed in Chapter 4.

7.2. ENVIRONMENTAL EDUCATION CENTRE: DISTRICT 2

The creation of an environemtnal education centre on this brownfield site with the main design focus being rehabilitation, applicability to the site features, space creation, education through demonstration and experience, and the integration of the urban and natural environments in a cohesive manner. An essential factor is to increase the sites current social, economic and ecological value.



7.1. Plan of District 2: Environmental Education Centre (Scale 1:500)

7.2.1. PERMEABILITY

- Public transport accessibility - turning circle
- Disabled persons accessibility - ramps at most places
- Circulation routes take all users into consideration - ramps, steps and material use easily navigable
- Permeability represented by the 'gabion' element - promotion of transparency and seeing into the structure. Gabions used for most elements in this landscape (symbolism)
- Pedestrian traffic promoted - enough space and fluidity of movement
- Primary entrance points have high accessibility and legibility
- Commercial facility (nursery) close to primary access point
- Soil quality and water absorption improved by creating indigenous habitats
- Looking-window walls created as an educational element offering visual permeability into the nature reserve

7.2.2. VARIETY

- Skills development in a diversity of ways (gardening, information, sales, tourism)
- Seating provided in variety of positions (shade and sun, views)
- Variety of routes provided
- Spaces created at different scales for various associationis and experiences
- Variety of economic options (nursery, advertising, site rentals, tours)
- Variety of endemic vegetation and increased bio-diversity in as many places as possible
- Diversity inspired by surrounding natural habitats

7.2.3. LEGIBILITY

- Clear legibility between public, semi-public and private spaces by level differences, material changes, vegetation and hard landscaping
- Hierarchy of spaces created by accessibility and function
- Legibility signage legible and forms part of site furniture language

7.2.4. ROBUSTNESS

- Spaces are adaptable to changing functions (large or small gatherings, performances, flea-markets, lectures, fofrmal or informal gatherings)
- Required infrastructure is provided
- Site furniture is robust, being hardy to site conditions and uses
- Planting robust and hardy, being endemic and indigenous to the area

7.2.5. PERSONALIZATION

- Community allowed to personalize this space by creating 'rental squares' that community members can buy and propogate indigenous vegetation to sell to the nursery
- The community may use the space for education and performances, as well as advertising
- Services offered by this open space to be personalized by the community to add vibrancy and distinctness (tours, products sold in site shop, performances)
- Indigenous vegetation introduced to the community through rehabilitation of habitats and creation of new learning habitats

7.2.6. VISUAL APPROPRIATENESS

- Aesthetic, yet functional site furniture relating to the history of Knysna (nautical), using a mix of materials with corten, stainless steel, wire gabions, rocks, planting and timber
- Each element of site furniture within an overall language
- Lighting pollution minimised by using downlighters and the reflection of light downwards

7.2.7. SECURITY

- Primary access routes well lit, while secondary routes are not lit to prevent use and therefore a false sense of security
- Lighting design to be robust, weather- and vandal-resistant
- Thorny and spined vegetation is used at areas that may be high risk for hide-aways, as well as areas where habitats are to be protected

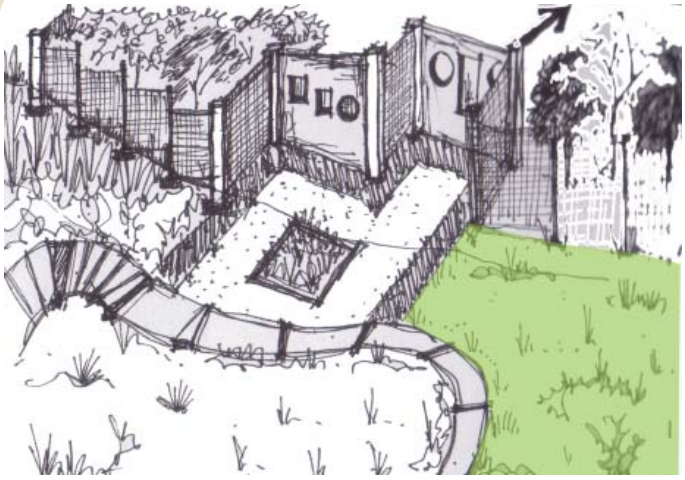
7.2.8. GREENING

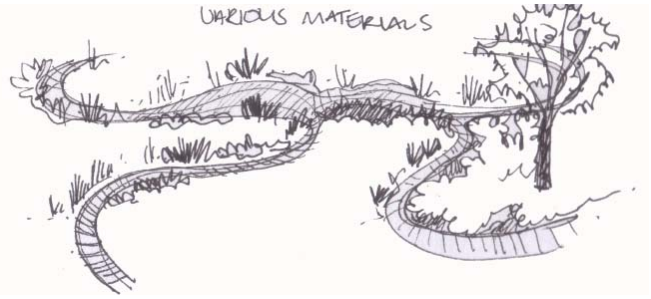
- Trees used to increase human comfort levels (shade and sun)
- Integration of organic and geometric, with organic represented by greening
- Vegetation to be hardy, therefore only a selection of indigenous species to be used
- Indigenous vegetation propogated on site in community gardens and used for rehabilitation
- Planting according to the desired ecological and educational requirements of the design, with the creation of wetland, forest, intermediate forest and fynbos biomes
- Semi-formalised planting at high-use areas

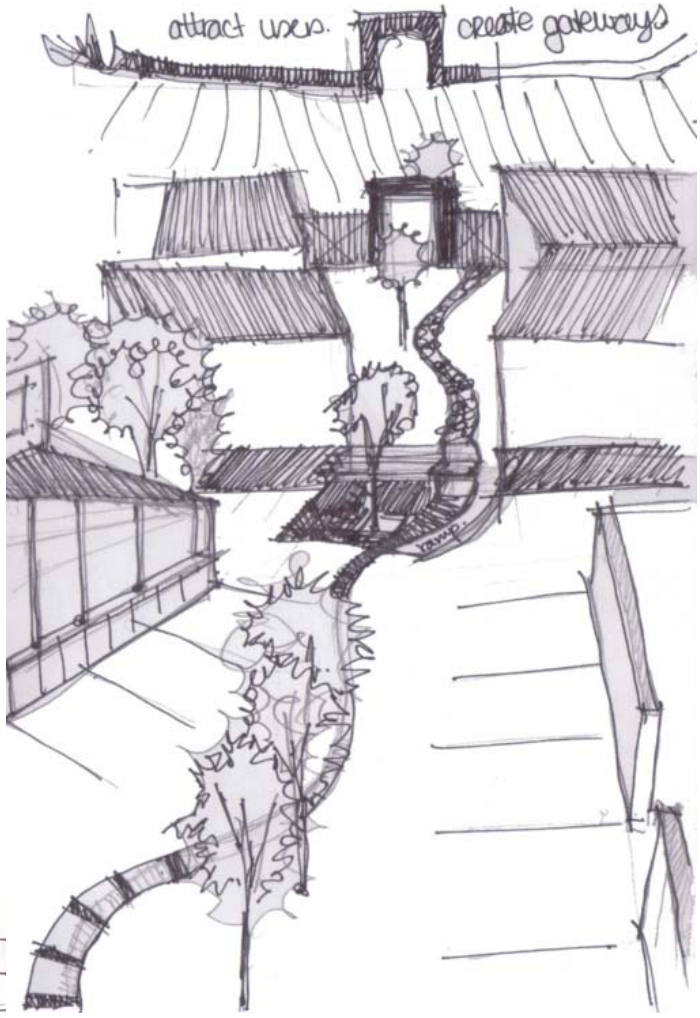
7.2.9. SUSTAINABILITY

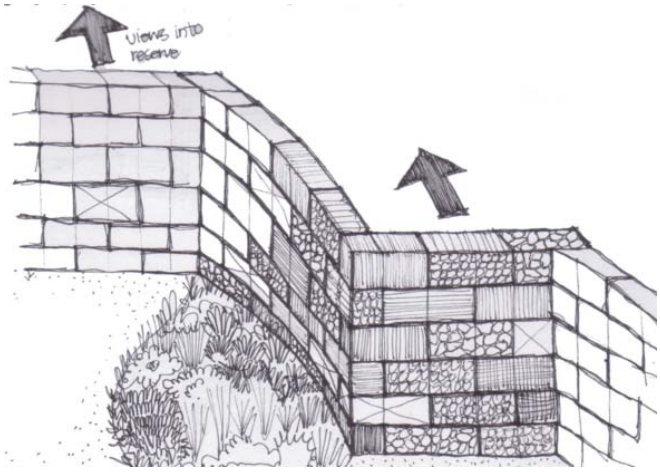
- Community participation in the community propogation gardens
- Local community services, materials, products and labour to be used in landscape features, structures and elements
- Eradicated trees to be used as a material - poles and lattices
- Slope paths and boundary walls to be aligned with contours to minimise impact
- Creation of roof garden to reduce stormwater runoff
- Runoff from paving to be directed to vegetated areas
- Stormwater to be retained to prevent erosion and flooding
- Habitats created (stream and wetland, forest recreation, slope rehabilitation

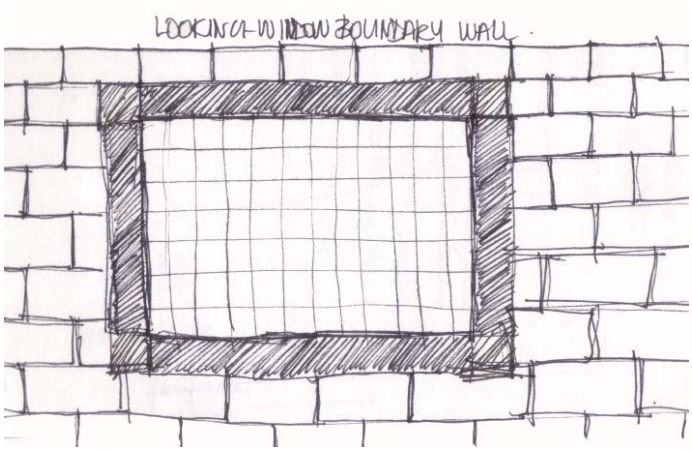
CONCEPT SKETCHES

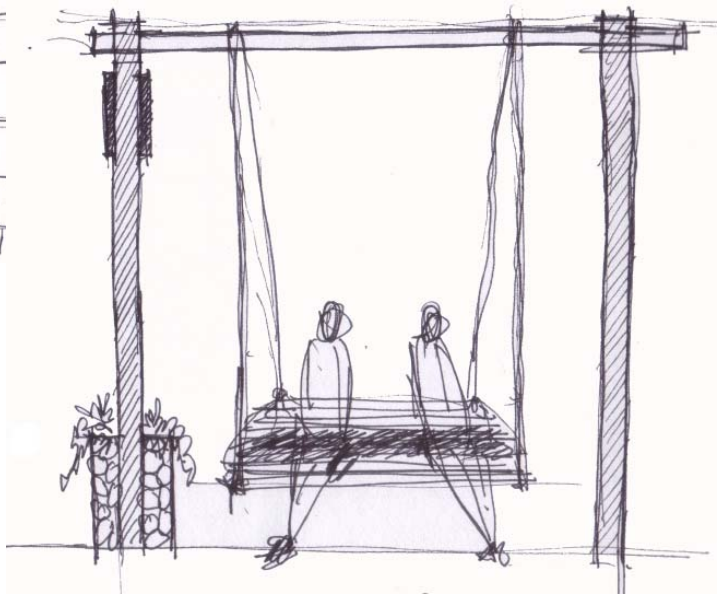


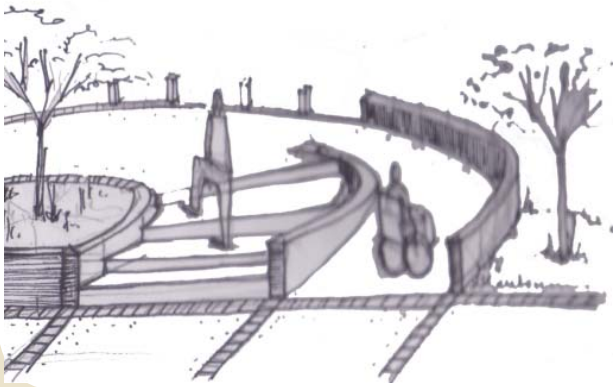




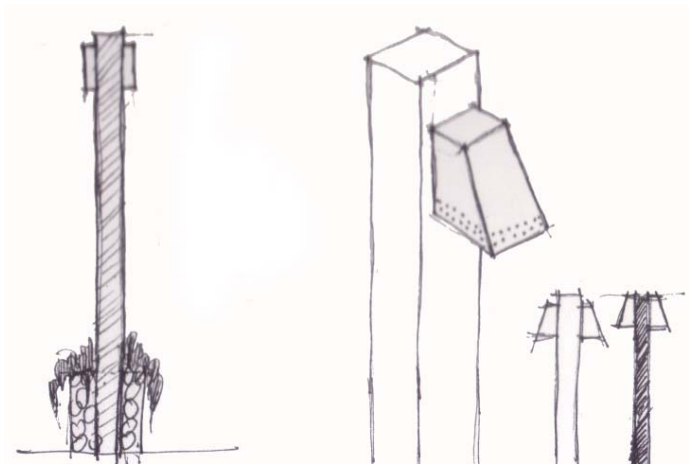


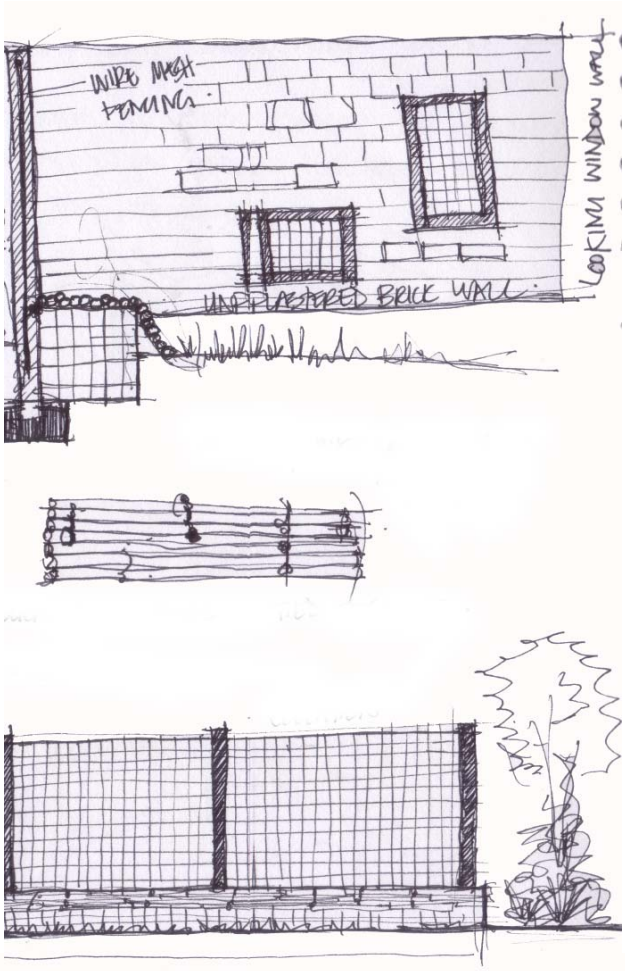


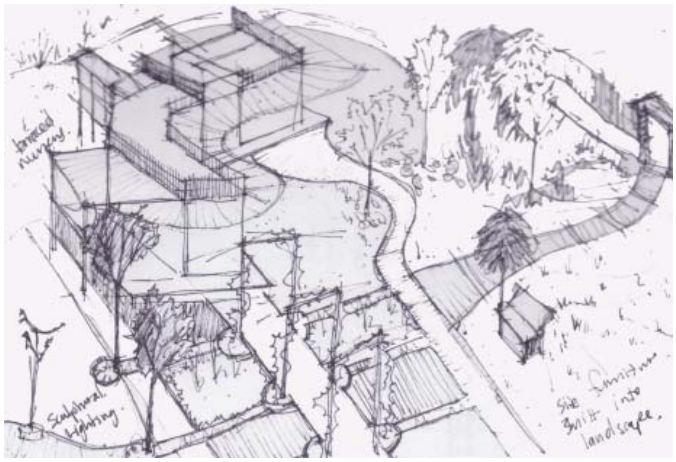


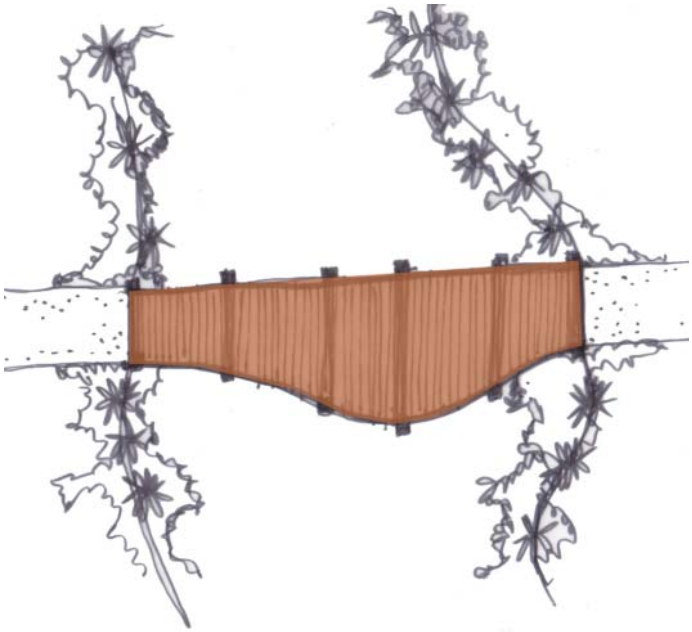


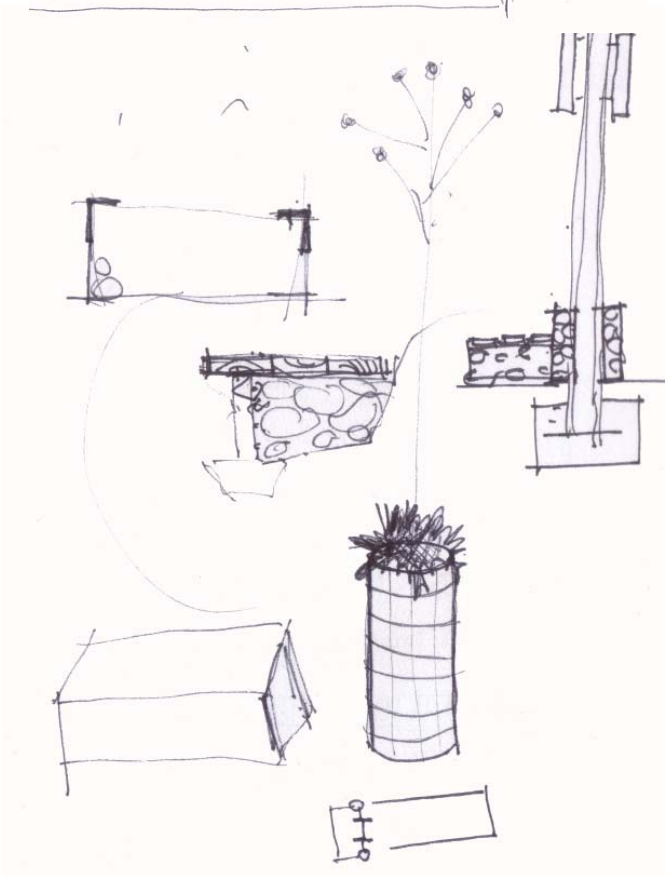
CONCEPT SKETCHES

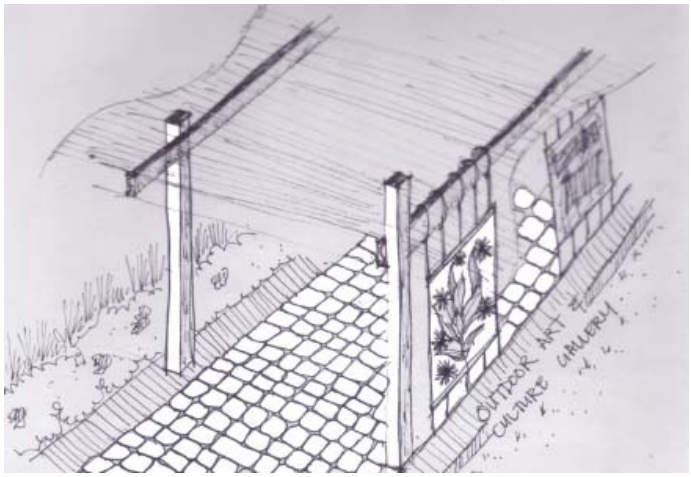


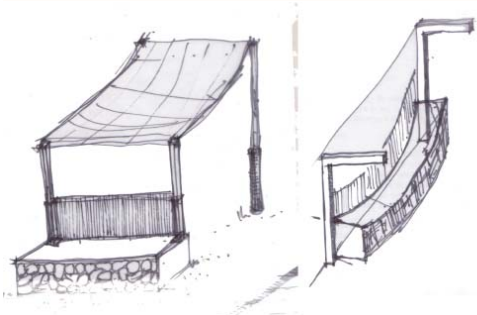




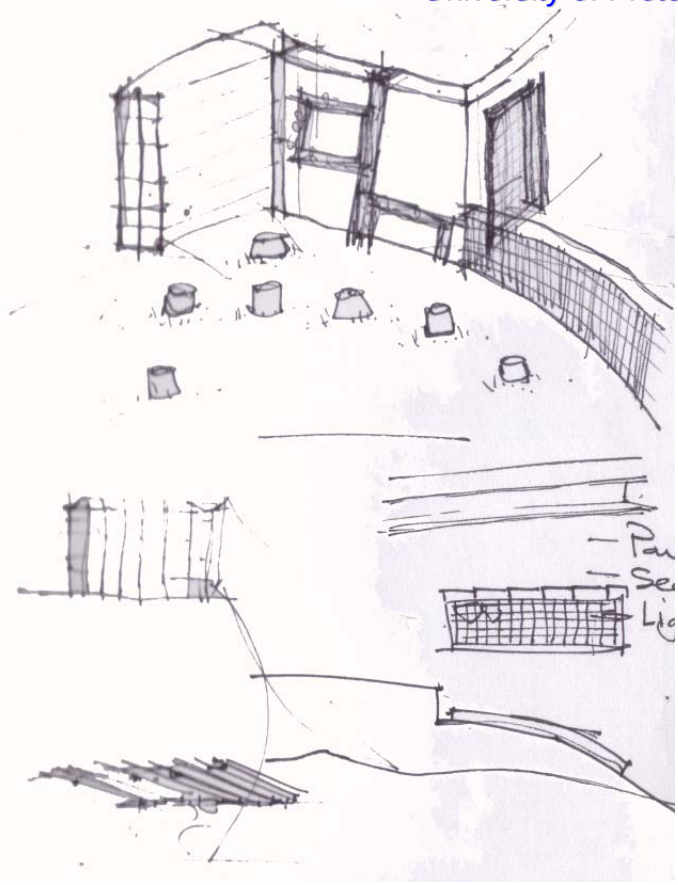


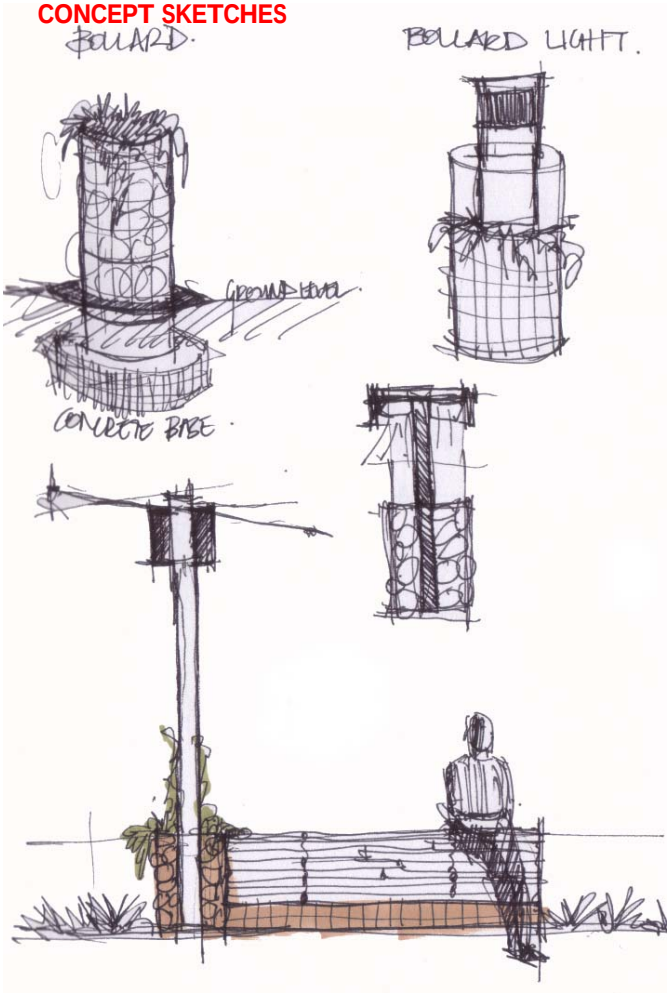


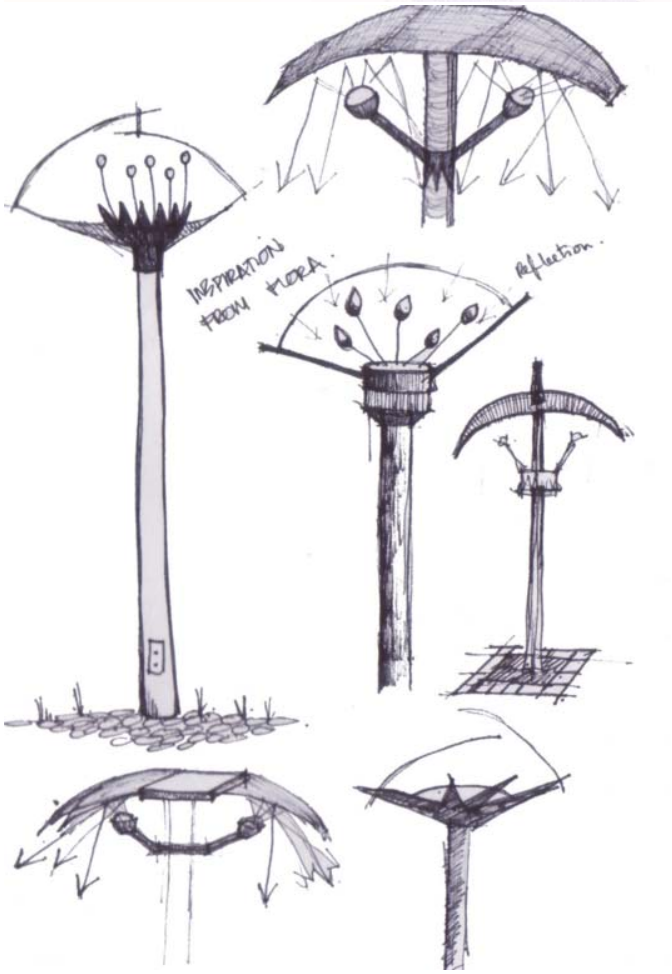


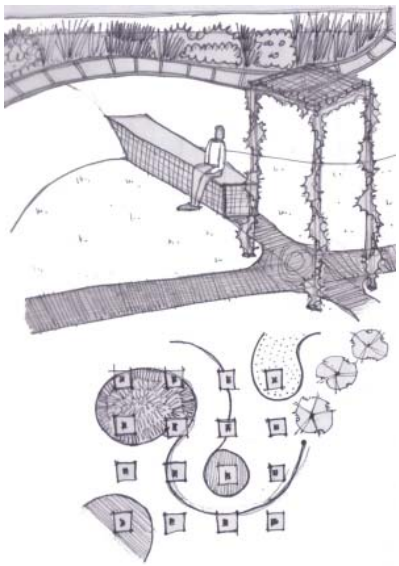


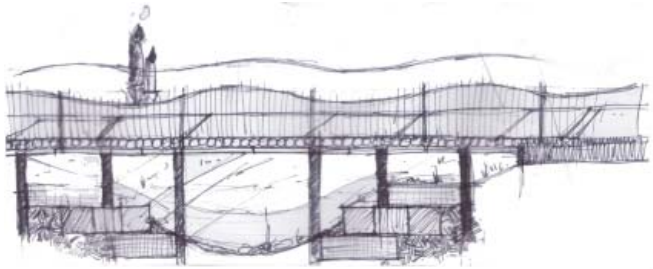
CONCEPT SKETCHES

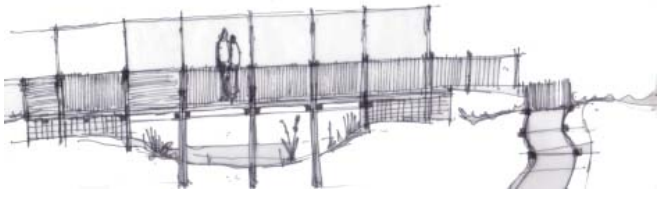


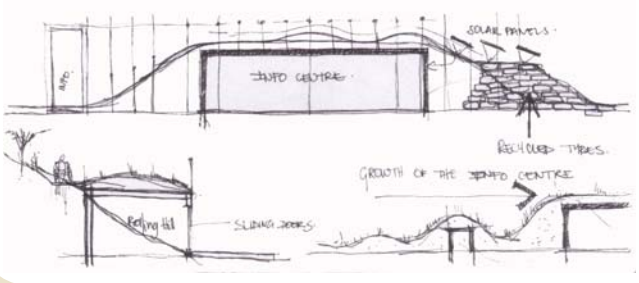












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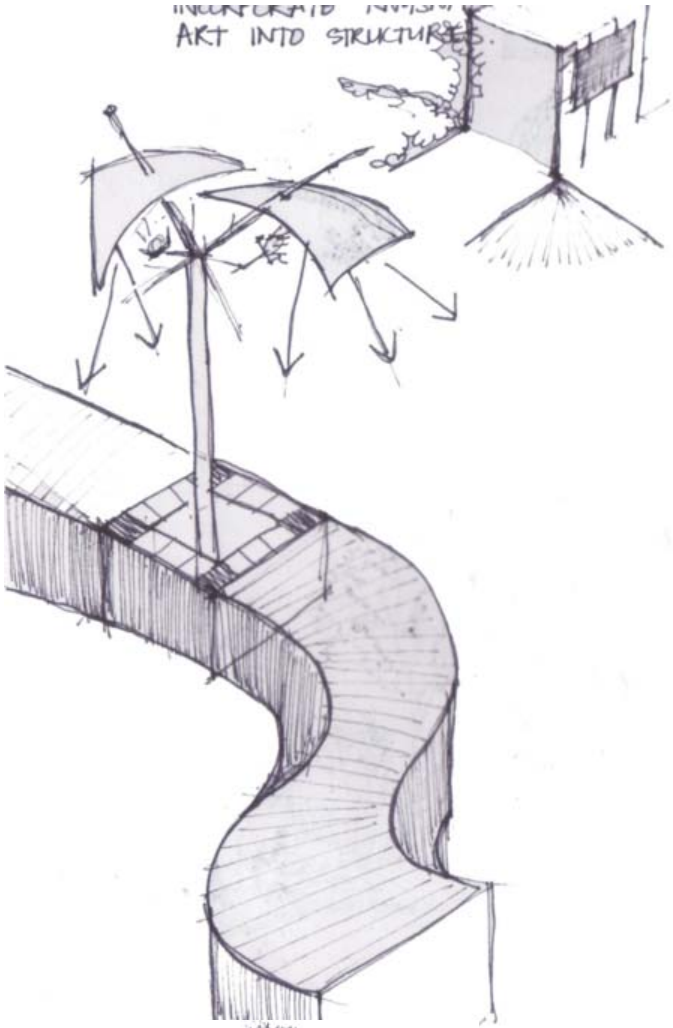
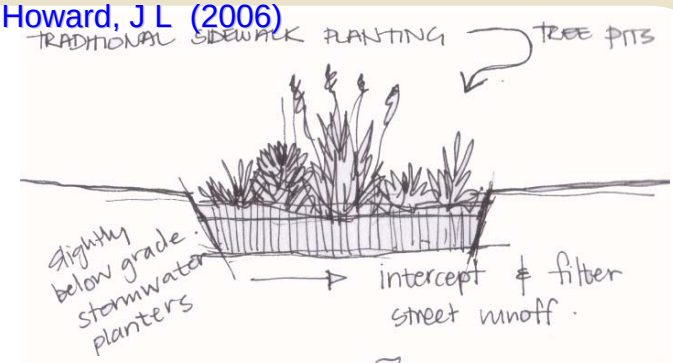
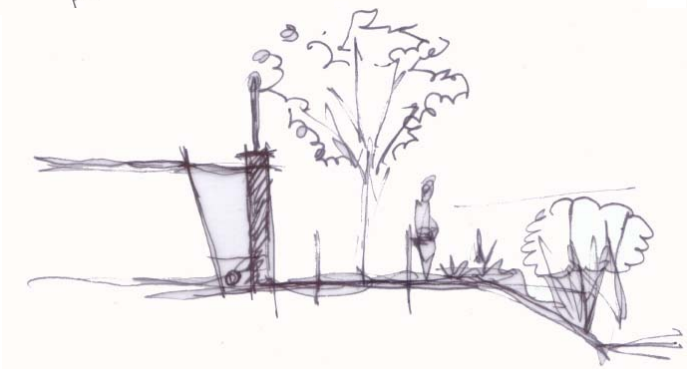
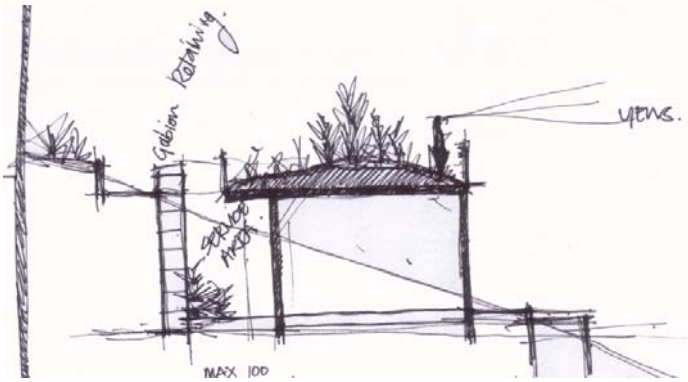
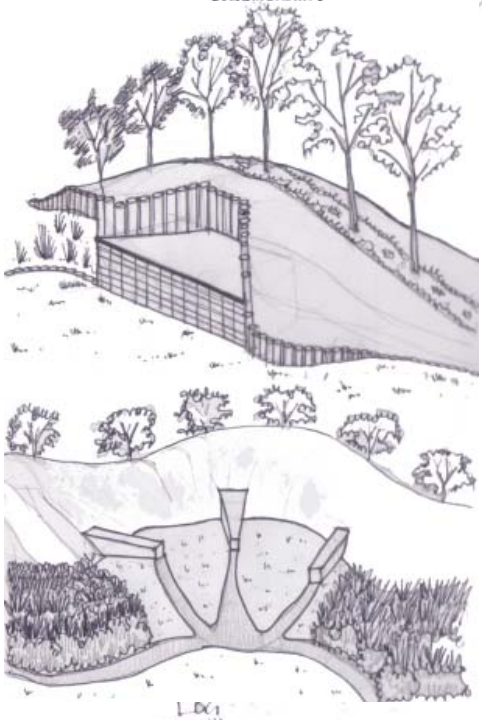
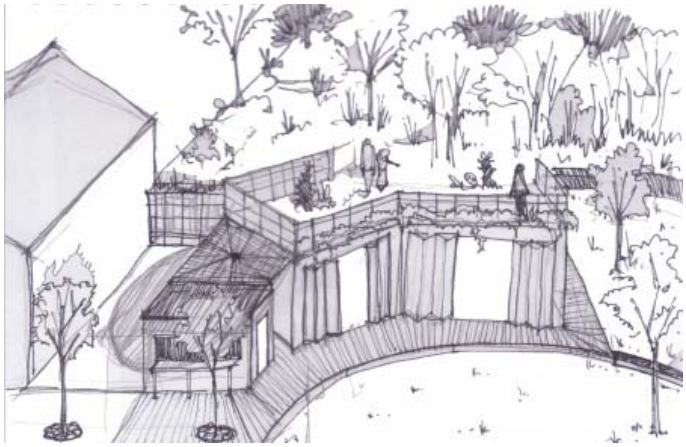


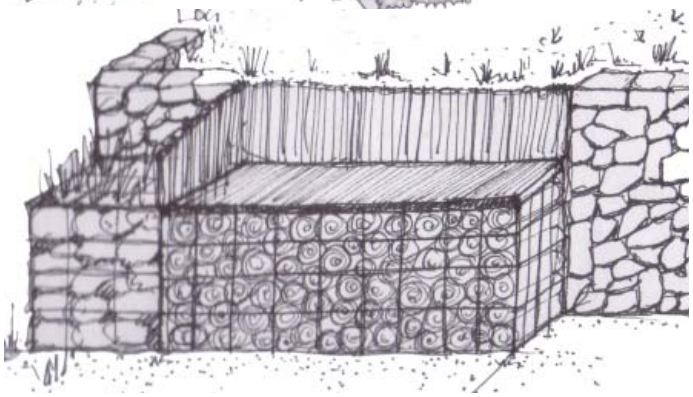


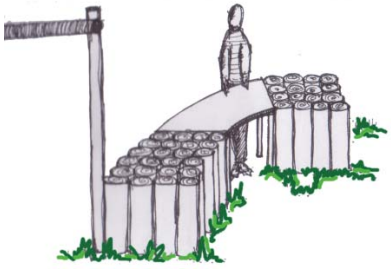








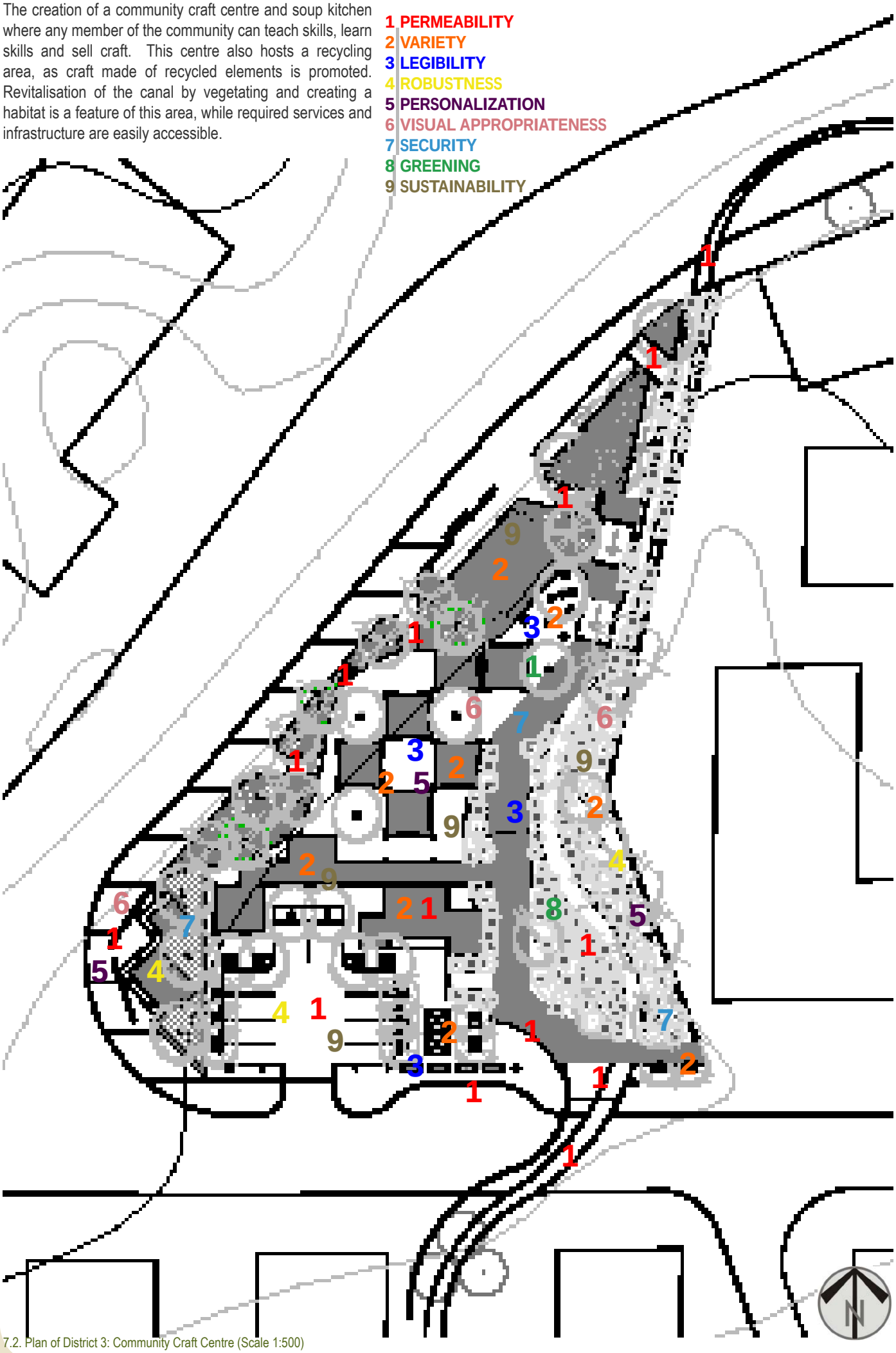




7.3. COMMUNITY CRAFT CENTRE: DISTRICT 3

The creation of a community craft centre and soup kitchen where any member of the community can teach skills, learn skills and sell craft. This centre also hosts a recycling area, as craft made of recycled elements is promoted. Revitalisation of the canal by vegetating and creating a habitat is a feature of this area, while required services and infrastructure are easily accessible.

1 PERMEABILITY
2 VARIETY
3 LEGIBILITY
4 ROBUSTNESS
5 PERSONALIZATION
6 VISUAL APPROPRIATENESS
7 SECURITY
8 GREENING
9 SUSTAINABILITY



7.2. Plan of District 3: Community Craft Centre (Scale 1:500)

7.3.1. PERMEABILITY

- Public transport accessibility - bus stop
- Disabled persons accessibility - site completely accessible by ramps
- Circulation routes take all users into consideration - ramps, steps and material use easily navigable
- Permeability represented by the 'gabion' element - promotion of transparency and seeing into the structure. Gabions used for most elements in this landscape (symbolism)
- Pedestrian traffic promoted - enough space and fluidity of movement
- Primary entrance points have high accessibility and legibility
- Commercial facility (restaurant and community craft shope, and soup kitchen) close to primary access point
- Soil quality and water absorption improved by creating indigenous habitats
- Looking-window walls created to increase security through visual permeability
- Anyone in the community is able to use this site to create craft from recycled elements

7.3.2. VARIETY

- Skills development in a diversity of ways (craft skills, sales, tourism, food preparation)
- Seating provided in variety of positions (shade and sun, views)
- Variety of routes provided
- Spaces created at different scales for various associationis and experiences
- Variety of economic options (craft shop, entrepeneuring, services)
- Variety of endemic vegetation and increased bio-diversity in as many places as possible
- Seating provided in a variety of locations

7.3.3. LEGIBILITY

- Clear legibility between public, semi-public and private spaces by level differences, material changes, vegetation and hard landscaping
- Hierarchy of spaces created by accessibility and function
- Legibility signage legible and forms part of site furniture language

7.3.4. ROBUSTNESS

- Spaces are adaptable to changing functions (large or small gatherings, performances, flea-markets, lectures, fofrmal or informal gatherings)
- Required infrastructure is provided
- Site furniture is robust, being hardy to site conditions and uses
- Planting robust and hardy, being endemic and indigenous to the area
- Parking area can be used for other functions (flea-market)

7.3.5. PERSONALIZATION

- Community allowed to personalize this space by creating personal working spaces in the craft area
- The community may use walls for advertising and community art
- Services offered by this open space to be personalized by the community to add vibrancy and distinctness (tours, products sold in site shop, performances)
- Indigenous vegetation introduced to the community through rehabilitation of habitats and creation of new learning habitats

7.3.6. VISUAL APPROPRIATENESS

- Aesthetic, yet functional site furniture relating to the history of Knysna (nautical), using a mix of materials with corten, stainless steel, wire gabions, rocks, planting and timber
- Each element of site furniture within an overall language
- Lighting pollution minimised by using downlighters and the reflection of light downwards

7.3.7. SECURITY

- This area very well lit for user comfort at all times
- Lighting design to be robust, weather- and vandal-resistant
- Thorny and spined vegetation is used at areas that may be high risk for hide-aways, as well as areas where habitats are to be protected

7.3.8. GREENING

- Trees used to increase human comfort levels (shade and sun)
- Integration of organic and geometric, with organic represented by greening
- Vegetation to be hardy, therefore only a selection of indigenous species to be used
- Planting according to the desired ecological and educational requirements of the design, with the creation of wetland, forest, intermediate forest and fynbos biomes
- Semi-formalised planting at high-use areas

7.3.9. SUSTAINABILITY

- Recycled material drop-off zone, new products created from recycled elements
- Local community services, materials, products and labour to be used in landscape features, structures and elements
- Eradicated trees to be used as a material - poles and lattices
- Runoff from paving to be directed to vegetated areas
- Habitats created (stream and wetland, beneath boardwalk, shaded spots at buildings, informal slope vegetation)

CONCEPT SKETCHES