MANCHESTER | URBAN DESIGN | LAB

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MANCHESTER URBAN DESIGN LAB 2021

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YEARBOOK

2021

Edited and designed by:
Dr Taki Eddin Sonbli
Dr Philip Black

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Planning and Environmental Management
University of Manchester

Cover image: Retrieved from *The Urban Design Process* (Black & Sonbli, 2019)

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Contents

MUD-Lab YEARBOOK 2021

This Yearbook has been designed to showcase the urban design project work from the MSc Urban Design & International Planning programme within the Manchester Urban Design LAB [University of Manchester]. All graphics are student's own work.

The Yearbook is divided into project types based on the core urban design modules that students undertake, covering proposals on neighbourhood analysis; small city centre design interventions; large/medium scale masterplans; and research focused design dissertation projects. The graphics and images from each student are only a small selection of the submitted proposals and are intended to be for illustrative purposes only.

The projects have been chosen by the MUD-Lab teaching team here at Manchester to represent the most accomplished projects and unfortunately due to space constraints not all student work is able to be included.

A MESSAGE

As this Yearbook would not have been possible without the hard work of all the students involved, the MUD-Lab teaching team would like to take this opportunity to thank each student, regardless of inclusion in this document, for their energy, enthusiasm, and willingness to engage and learn. Given the issues of 2020 and the COVID pandemic it is particularly impressive the work each student managed to produce. Well done to all on a successful year and we wish each and every one of you success in your future careers!

The MUD-Lab Team.

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THE MUD-Lab
The Manchester Urban Design LAB is a new venture within the University of Manchester. This Lab has been set up to reinforce a studio design-culture; provide increased visibility to the urban design work happening at the University; to act as a resource for staff in research and teaching; and brand the wealth of resources both physical and digital we offer all students who choose to come and study with us.

CULTURE
We promote and teach an applied studio-based technical approach to urban design, using traditional design skills across multiple scales. We achieve this through our dedicated staff and wide ranging resources.

RESOURCES
We offer both staff and students a range of world-class physical and digital resources including our design studio, 3D model workshop, printer studio, MUD-Lab Toolkit, Urban Design Live, Applied Technical Skills, and a growing list of published research and work including peer-reviewed articles, books, and podcasts.

PROFESSIONAL FOCUS
At MUD-Lab we aim to educate students ready for the world of professional practice. To achieve this we work closely with the industry and have relationships with a number of major design practices in the UK and internationally including Pegasus Group; LDA Design; Turley; WYG; Gillespies; AECOM; Atkins Global; and OPEN.

MUD-Lab DIRECTOR / UDIP Programme Director
Dr Philip Black

MUD-Lab Manager / Technical Lead
Dr Taki Sonbli

Lecturers
Mr Robert Phillips (Practitioner)
Dr Razieh Zandieh
Dr Ian Mell

Studio Assistant
Ms Aya Badawy

INFORMATION
If you are interested in a career in urban design or wish to find out more about MUD-Lab please visit:
www.manchester.ac.uk/planning
Or contact MUD-Lab Director
Dr Philip Black
philip.black@manchester.ac.uk

DIGITAL RESOURCES
The Manchester Urban Design LAB has a strong digital offering for both staff and students. This includes a series of initiatives such as the MUD-Lab Toolkit; Urban Design Live; Online technical series; research and other outputs.

These digital resources sit alongside our extensive physical facilities to ensure we are providing a first-lass learning environment and student experience. Our aim at the MUD-Lab is to allow students to learn and engage in a variety of different ways, recognising that each individual responds in their own unique way.

MUD-LAB TOOLKIT
Explained in greater detail elsewhere - MUD-Lab Toolkit is a one-of-a-kind series of booklets and videos that provide an accessible resource to assist students urban design software skills and develop their techniques in a wide range of core urban design techniques, approaches, and methods.

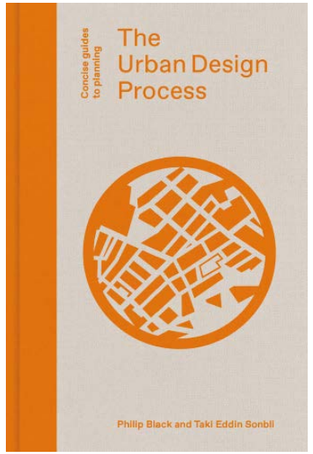
URBAN DESIGN LIVE
A new initiative a response to the 2020 COVID pandemic and the need for increased remote teaching. Urban Design Live was designed to provide students with a series of skills based videos that showcase urban design analysis techniques. These You-Tube style tutorials proved a success and have been retained as a critical learning resource for 2021.

RESEARCH AND PUBLISHING
The staff within MUD-Lab includes a number of world-class academics publishing at the forefront of urban design, planning, governance, healthy cities, and green infrastructure. This research and the associated publications shape much of the teaching on the MSc UDIP programme. Two recent examples of this in practice are the podcast series 'D+L Tapes'; and the 2019 book 'The Urban Design Process'.

D+L TAPES
A 10 part podcast series lead by MUD-Lab staff Dr Philip Black and Dr Ian Mell and sponsored by Pegasus Group. Looking at the relationship between urban design and landscape across major cities in the UK through a series of case study discussions and interviews.

THE URBAN DESIGN PROCESS
Published in 2019 by Lund Humphries Ltd. this text, by Dr Philip Black and Dr Taki Sonbli] was the MUD-Lab response to the need for a structured, yet flexible, framework that enable students to practice urban design within a limited year-long time-frame of the MSc programme. The process structures a contextually responsive approach to understanding and designing place, and allows students to develop projects along a logical pathway, yet still requires flexible and creative approaches, thinking and a full commitment to engage and deliver. The process acts as a road map for student designers that informs and provides contextual information and clues to help shape design, as well as a robust framework for evaluating design decisions. It seeks to better equip the designer with the necessary contextual detail to make appropriate decisions and avoid generic or context-less results.

The purpose of urban design education should be to produce the next generation of well-equipped knowledgeable and passionate urban designers who will make a genuine contribution to the health of the planet and quality of life for those who inhabit it. Cities are complex and constantly evolving organisms and designers must be ready to respond to existing and emerging challenges. Here at the MUD-Lab we aim to prepare students to face issues of today, and tomorrow.



PHYSICAL RESOURCES
At the Manchester Urban Design LAB we are proud to offer a wide range of physical resources for our students and staff to utilise. These physical spaces are managed by the MUD-Lab team - should you have any queries in relation to them please contact MUD-Lab Manager Dr Taki Sonbli [taki.sonbli@manchester.ac.uk]

These facilities ensure Manchester Urban Design LAB is offering a world-leading urban design experience and education. We are continually upgrading and enhancing these resources and in conjunction with our digital resources and other outputs ensure MUD-Lab remains at the cutting edge of technology and pedagogy.

THE DESIGN STUDIO
The MUD-Lab has a dedicated studio space for urban design students within the Humanities Bridgeford Street building that provides a consistent space to work on projects and collaborate with peers. Students are encouraged to work regularly in the studio to engage in critique with fellow students. The studio space includes a full range of equipment to assist in design and delivery including light boxes, drawing boards, technical equipment, panel boards to present work, personal storage facilities, and state-of the art teaching screens and software.

The studio also acts as a space of MUD-Lab students to relax and work privately and in groups on their projects.

Design teaching takes place predominately in the studio and students work on their projects weekly under the supervision of the teaching team. Sessions involve short interactive lectures, technical workshops, and applied project based examples in which students work in groups to actively learn and develop core skills.

COMPUTER CLUSTERS
Adjacent the MUD-Lab Studio we have a 100 seat computer cluster teaching room. This space allows us to teach all the necessary software skills in an ideal learning environment. Each of the 100 computers is pre-loaded with the main software required. Our Technical Lead [Dr Taki Sonbli] assists students through their technical development with support by a range of qualified studio assistants.

MUD-Lab also provides all enrolled students with their own personal year-long licences in Adobe Creative Suite; AutoCAD; and Sketch-Up to allow them to work independently and effectively off campus.

MUD-Lab MODEL WORKSHOP
In past years the MUD-Lab has worked closely with B.15 Model Workshop to allow students to engage in physical modelling as part of their urban design process. As of 2021 however we have secured funding to design, develop, and launch our own Manchester Urban Design LAB Model Workshop, positioned opposite our existing Studio and computer clusters.

The workshop is equipped with world-class model making machinery and materials including a large-format laser cutter; 3D printer; spray booth; and a wide range of other tools and resources.

PRINT STUDIO
A dedicated printer resource studio is equipped with A0+ plotter; A0+ paper guillotine; binding machines; and presentation panels. This studio ensures all students have the support to print their design projects and present professionally at both crits and final submissions and defences.

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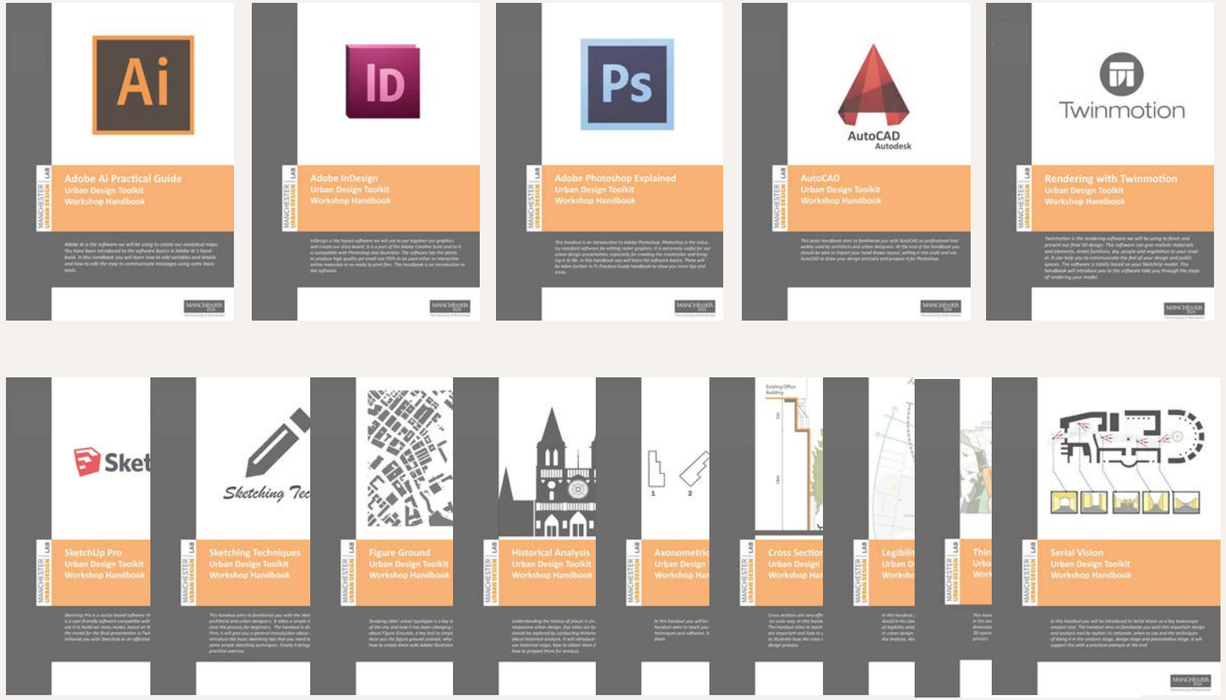


MUD-Lab TOOLKIT

The MUD-Lab toolkit is a bespoke series of hand-outs and videos designed to provide University of Manchester students with a free to use accessible resource to assist their urban design software skills and develop their techniques in a wide range of core urban design techniques, approaches, and methods. The Toolkit offers students outside the classroom learning opportunities in how to develop urban design analysis, ideas, and proposals.

The toolkit includes simple to use step-by-step guides through the core design software packages, including Illustrator, Photoshop, InDesign, Sketch-Up, Twin-Motion, and AutoCAD. It also has extensive hand sketching/ drawing and technical drawing guidance. This is a unique and invaluable resource for students and is continually being updated and added too.

To compliment the toolkit urban design students are also provided with a series of technical workshops to develop their competencies in the core design software. These workshops are aimed at beginners and are designed to present how software is utilised in an urban design professional practice setting.

TOOLKIT AUTHORS
Dr Taki Eddin Sonbli
Mr Robert Phillips
Dr Philip Black

TOOLKIT SERIES EDITOR
Dr Philip Black

TOOLKIT GRAPHICS EDITOR
Dr Taki Eddin Sonbli

URBAN DESIGN APPLIED SKILLS

TECHNICAL SESSIONS

The urban design applied technical skills sessions are a year-long series of bespoke workshops that take students through the various techniques of visualising information. The workshops are more than simply software sessions, with sketching and technical drawing playing a key role also. They are directly relevant to the materials presented in the urban design studio lectures in which students learn how to visualise what they learned.

The sessions are split between the urban design studio and the dedicated computer clusters. Students use the softwares provided free by the university and have access to a range of equipment and tools.

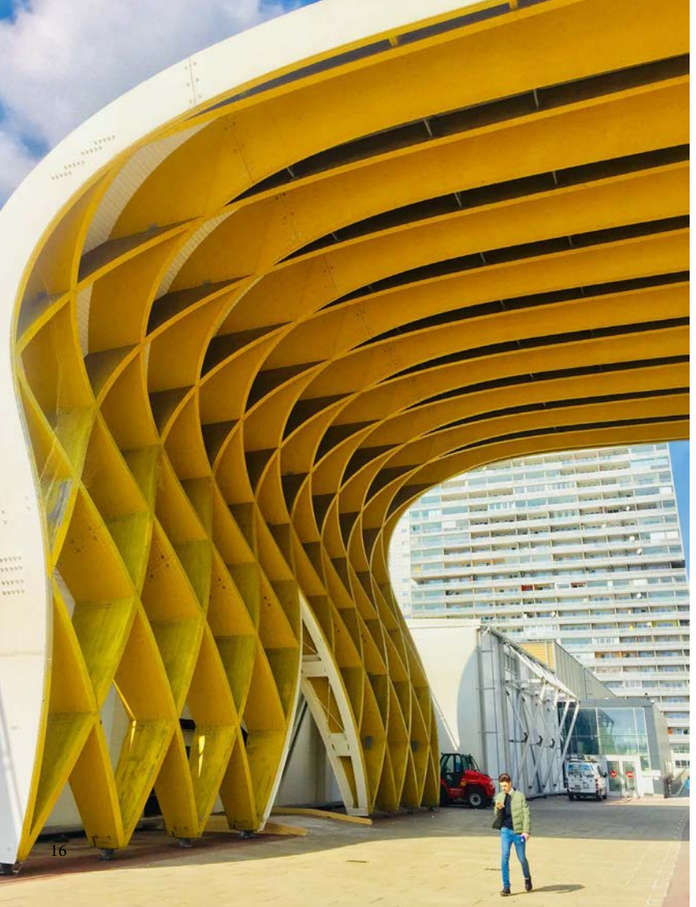
TECHNICAL SUPPORT

The urban design team here at University of Manchester has a full-time Technical Lead to assist students through their technical requirements. This involves the opportunity for one-to-one sessions; personal mentoring; and an online advice and guidance service for general trouble-shooting and more specific problems encountered.

All studio sessions are supported by our Technical Lead and a number of qualified studio assistants to ensure students have year-round support on all technical matters.

TECHNICAL LEAD

Dr Taki Eddin Sonbli



URBAN DESIGN & INT. PLANNING

MSc UDIP

Launched in September 2015 our MSc Urban Design and International Planning programme has gone from strength to strength. In our 6th year we now accept 60+ students each year to study with us, and have graduated more than 200 students.

The MUD-Lab's MSc UDIP at University of Manchester is a 1 year [2 year P/T] fully RTPI accredited programme that focuses on a specialist understanding of the relationship between urban design and planning and provides students with the core competencies and knowledge to specialise in the discipline of urban design.

The programme centres around an applied studio-based approach to teaching and learning, equipping students with the fundamentals of design, skills in design development and delivery across multiple scales, and technical knowledge within the core software's utilised in professional practice.

Students get to choose a specialist pathway when they enter semester 2 of their studies - focusing on either a balance of urban design and planning, or a full urban design experience including a design dissertation. Each student on MSc UDIP will develop their own personal design portfolio upon completion of the programme.

CORE MODULES

Urban Design Studio
International Urban Design
International Planning Systems
Urban Design Project
UDIP Study Tour
Dissertation [Regular OR Design]

OPTIONAL MODULES

Masterplan Studio
Design for Healthy Places
Urban Regeneration
Land and Economy
GI and Sustainable Cities
Cities of the South
Future Cities
Infrastructure Planning
Design Futures Studio

PROGRAMME DIRECTOR

Dr Philip Black

SITE VISITS

2020 proved a difficult year for effectively bringing students onto site and visiting case studies and best practice examples. The COVID pandemic certainly tested our imagine in how we ensured students experienced their sites and understood the importance of first-hand observation and evaluation.

We introduced a series of digital study tours to allow staff to break down projects from across the world and expose students to an array of different contexts and design approaches. Our great hope is that 2021 will allow us to get back on site and back to exploring our great places and spaces in Manchester and beyond!

UDIP STUDY TOUR +

All MUD-Lab students who enrol on the MSc UDIP programme get to opportunity to join us on a core Study Tour - in the past we have visited Barcelona, Berlin, and Vienna. This module sees us explore urban design responses within international contexts, considering differences in development policies and planning frameworks. It is also the chance to continue developing skills regarding culturally sensitive and contextually responsive urban design approaches.

The most recent trip to Vienna had a particular focus on heritage and conservation aspects. We were hosted by a wide range of local academics and practitioners.

The official European study tour is not the only time we venture beyond the studio! We have regular walking tours within Manchester - a living laboratory of urban renewal and development schemes; we have an annual residential trip to another major UK city to expose students to urban design ideas and principles, recent trips include Newcastle, Belfast, and Edinburgh; and through our semester opening ateliers we take day trips to consider sites outside of Manchester - with Liverpool a favoured destination.

MUD-Lab attracts students from all over the globe and each brings their own unique experience and enhances the wider learning for all.

Pegasus Group Award

Since 2020 Pegasus Group have kindly sponsored the MUD-Lab **Best Urban Design Project** at University of Manchester . The award this year was assessed by Andrew Gilsenan, Urban Design Associate at Pegasus Manchester.

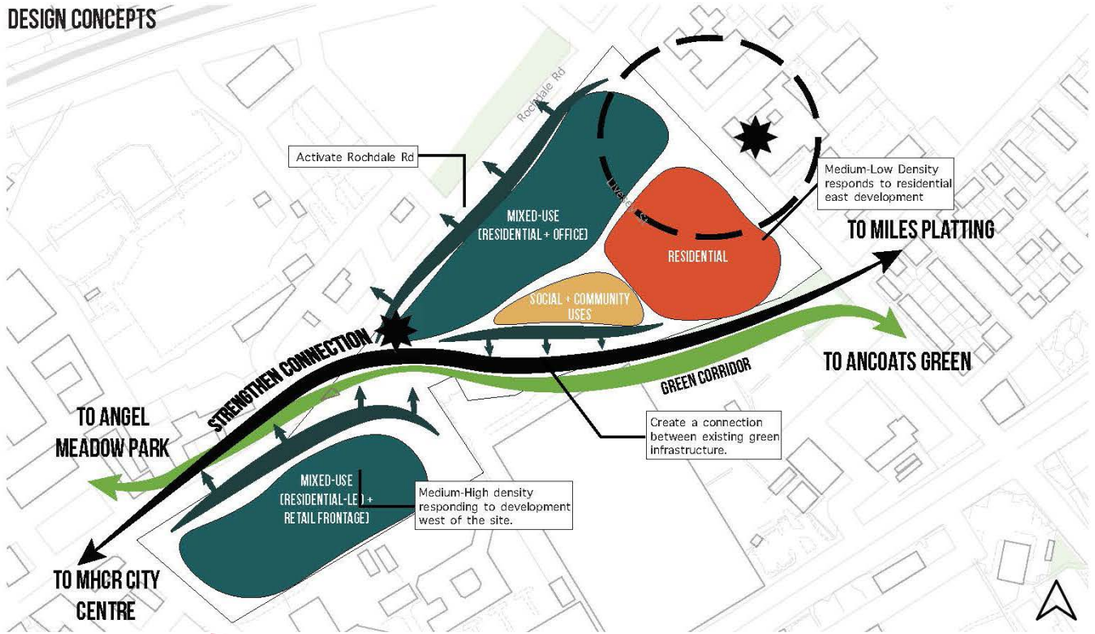
Pegasus Group is a leading national development consultancy specialising in planning, design, environment, economics and heritage. Its masterplanning and urban design team excellence in providing distinctive, integrated, and sustainable developments that are based on a firm understanding of existing movement networks, the existing landscape and the surrounding urban fabric.

The winning project and commendations are presented on the following pages.

WINNER 2021
Anita Collins

COMMENDATIONS 2021
Yusong Zhou
Megan Swift

DESIGN CONCEPTS



LOCAL COMMUNITY HUB (MIXED-USE)

This concept approach is to create something for the local area to push economic growth and a range of recreational spaces for different use.

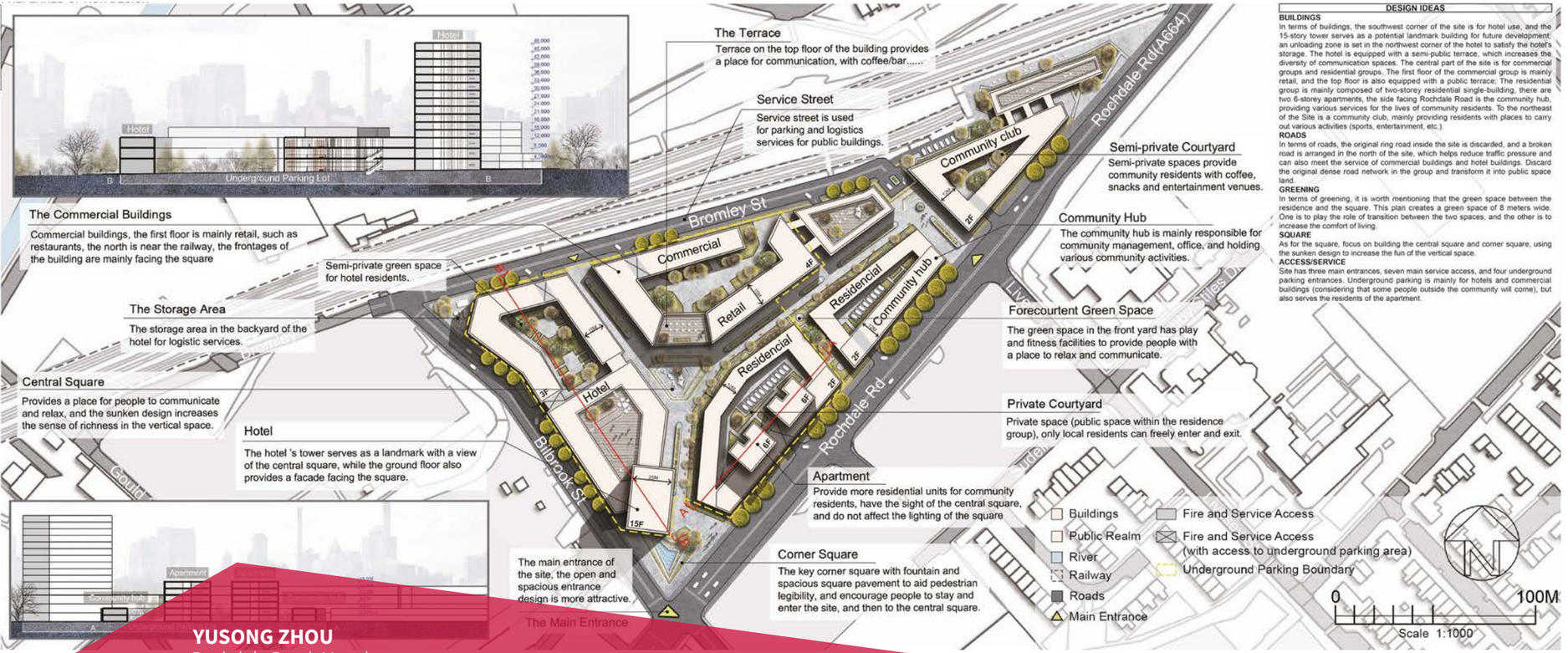
- Allows for mixed residential typologies
- Medium-high density
- Community uses more integrated
- Connects to green space network
- Connects to public realm network
- Stronger city center views

ANITA COLLINS
Rochdale Road, Manchester

Pegasus Winner Group 2021

This year the **winner** of the Pegasus Group Award for Best Urban Design Project goes to **Anita Collins**

"*This is a well-presented plan showing detailed analysis and context that has positively informed the final design for the site. The use of space works well with public space offering a meaningful contribution to the urban fabric, and private space well defended and properly located. The final design is well considered, effectively communicated and demonstrates excellent knowledge of the design process. It is therefore a worthy winner of this year's Pegasus Group Award.*"
Andrew Gilsenan, Pegasus Group Manchester



DESIGN IDEAS

BUILDINGS

In terms of buildings, the southwest corner of the site is for hotel use, and the 15-story tower serves as a potential landmark building for future development; an unloading zone is set in the northwest corner of the hotel to satisfy the hotel's storage. The hotel is equipped with a semi-public terrace, which increases the diversity of communication spaces. The central part of the site is for commercial groups and residential groups. The first floor of the commercial group is mainly retail, and the top floor is also equipped with a public terrace; The residential group is mainly composed of two-storey residential single-building, there are two 6-storey apartments, the side facing Rochdale Road is the community hub, providing various services for the lives of community residents. To the northeast of the Site is a community club, mainly providing residents with places to carry out various activities (sports, entertainment, etc.)

ROADS

In terms of roads, the original ring road inside the site is discarded, and a broken road is arranged in the north of the site, which helps reduce traffic pressure and can also meet the service of commercial buildings and hotel buildings. Discard the original dense road network in the group and transform it into public space land.

GREENING

In terms of greening, it is worth mentioning that the green space between the residence and the square. This plan creates a green space of 8 meters wide. One is to play the role of transition between the two spaces, and the other is to increase the comfort of living.

SQUARE

As for the square, focus on building the central square and corner square, using the sunken design to increase the fun of the vertical space.

ACCESS/SERVICE

Site has three main entrances, seven main service access, and four underground parking entrances. Underground parking is mainly for hotels and commercial buildings (considering that some people outside the community will come), but also serves the residents of the apartment.

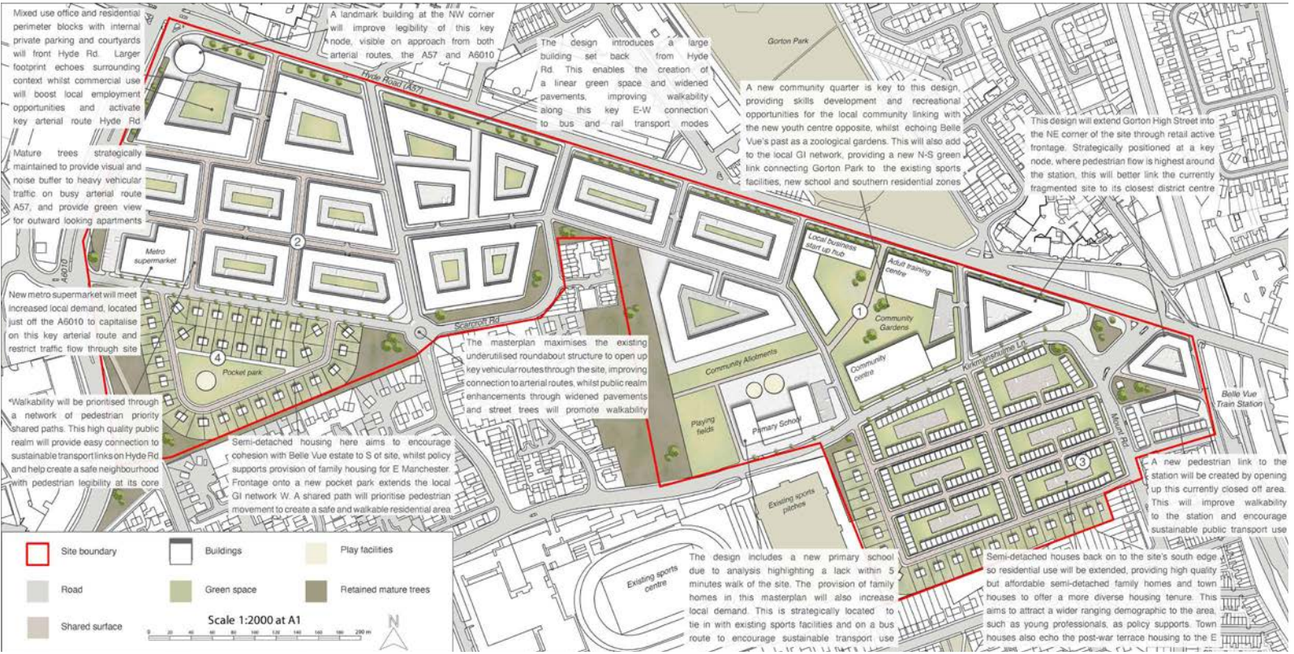
YUSONG ZHOU
Rochdale Road, Manchester

Pegasus Group Commendation 2021

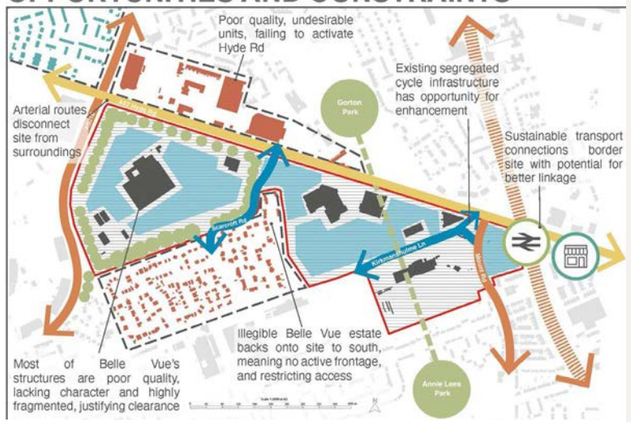
This year Pegasus Group have awarded two **special commendations** for projects shortlisted for the Pegasus Award for Best Urban Design Project.

The first of these commendations is awarded to **Yusong Zhou**

"*This project used fantastic visual design to show the potential design of the site, demonstrating a clear understanding of well-designed urban neighbourhoods. The massing and layout afford clear legibility, enhancing the sense of place.*"
Andrew Gilsenan, Pegasus Group Manchester



OPPORTUNITIES AND CONSTRAINTS



OPPORTUNITIES

- West Gorton regeneration acts as local best practice, with opportunity to link Belle Vue into this local development context
- Lack of buildings on site means ease of clearance for new high quality, sustainable development
- Opportunity to enhance existing routes to improve local connectivity
- Close proximity to Gorton high-street providing good retail offer and closest active frontage
- Close proximity to Belle Vue station provides easy connection to Manchester Piccadilly and New Mills
- Existing mature trees edge site, acting as noise and visual buffer to busy roads
- Site lies between Gorton Park to the north and Annie Lees to the south, with opportunity to enhance local GI network

CONSTRAINTS

- Poor quality buildings border site to N and S
- Railway line restricts pedestrian movement east to Gorton centre, due to limited crossings
- Busy arterial routes surround the site on several sides, prioritising vehicles at the expense of pedestrian legibility
- Site is heavily fragmented, therefore lacking enclosure and character

BOTH

- Busy Hyde Rd (A57) is a barrier to pedestrian movement but also allows good connectivity, given its role as a key arterial route into Manchester city centre, alongside sustainable transport links

MEGAN SWIFT
Bell Vue

Pegasus Group

Commendation 2021

This year Pegasus Group have awarded two **special commendations** for projects shortlisted for the Pegasus Award for Best Urban Design Project.

The second of these commendations is awarded to **Megan Swift**

"*This piece demonstrated a great understanding of the design analysis process and created a logically and well-designed scheme. The ideas are well communicated with good use of visual aids to communicate the vision for the site.*"
Andrew Gilsenan, Pegasus Group Manchester

LDĀDESIGN
Prize

LDA Urban Design Dissertation Prize

Since 2020 we have worked closely with LDA Design to offer the **LDA Urban Design Dissertation Prize**.

LDA Design are an independent consultancy of urban designers, landscape architects and planners with a single mission: to create great places and shape the world around us for the better.

The top design dissertations from the year are nominated for consideration before being assessed by a dedicated team at LDA Design led by Mark Graham.

This year LDA Design awarded both a winning project, and given the quality of the submissions also a commendation. The winning project and commendation are presented on the following pages.

WINNER 2021
Joseph Greenhalgh

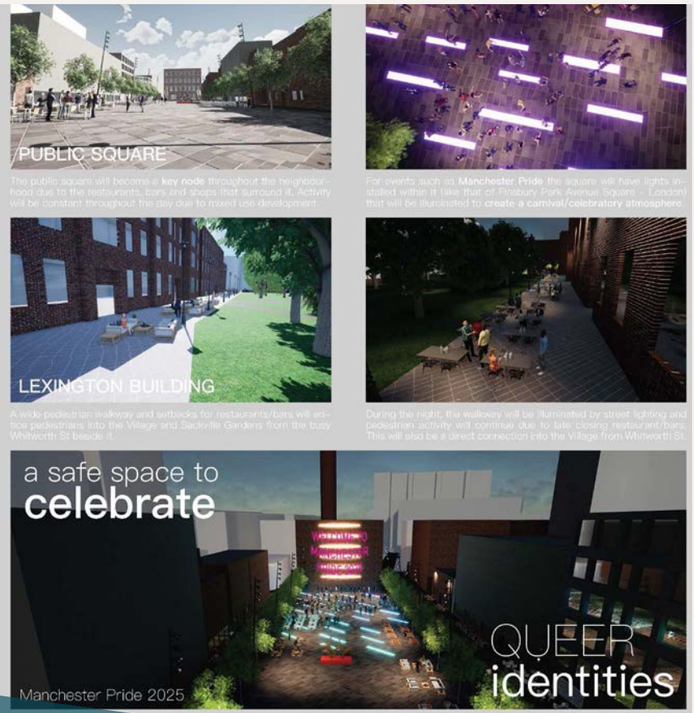
Commendation 2021
Zhuotong Shen

JOSEPH GREENHALGH
Queer-Led Regeneration - Manchester

Queer-Led Regeneration
Supervisor: Dr. Philip Black

Winner 2021

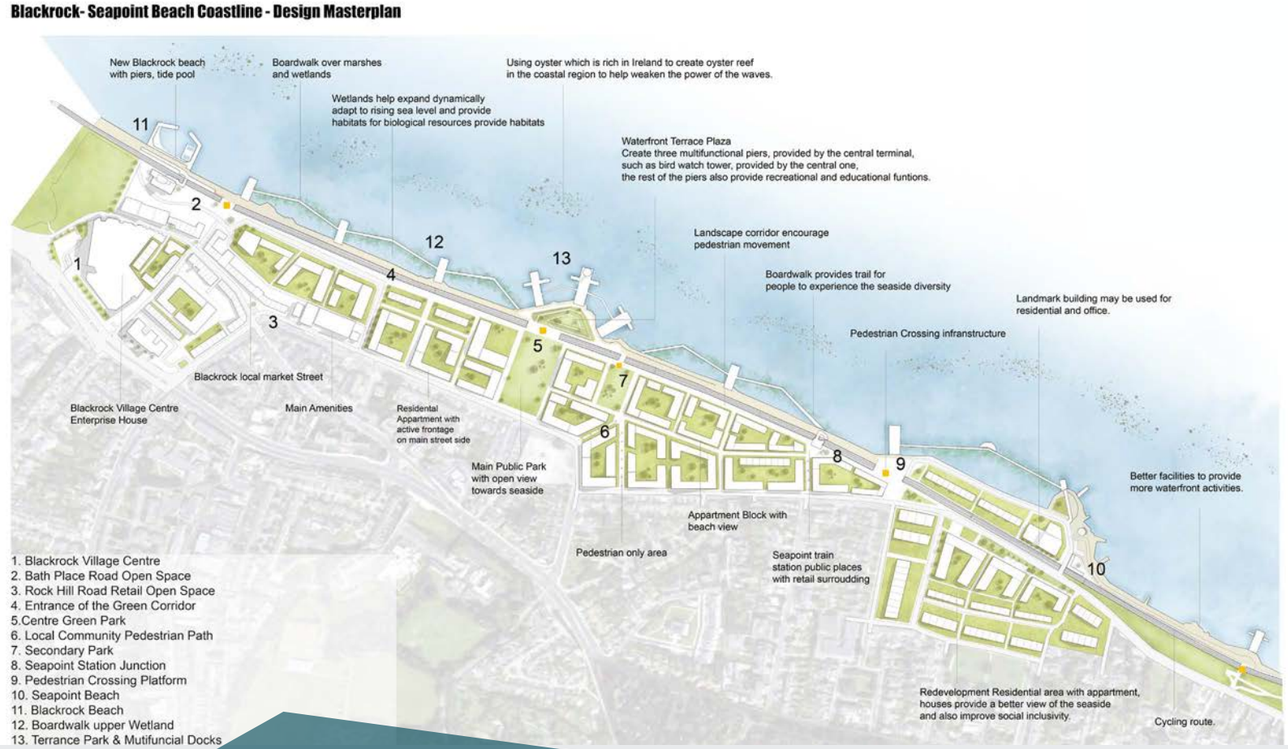
LDĀDESIGN



Dissertation Title
Queer-Led Regeneration in Manchester's Gay Village

The study aimed to build on culture-led regeneration but with a specific focus on the sub-culture of queer urban communities. The overarching aims of the project were identity and safety. Gay Villages have a strong and unique character that are often overlooked in literature on urban identity.

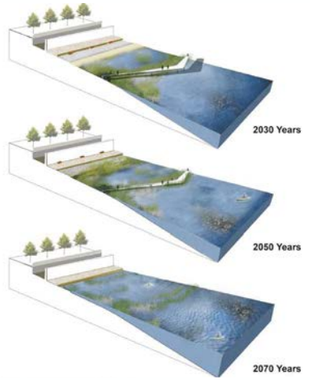
The historic oppression of queer communities has made these spaces vital in the fight for equality, and whilst attitudes towards queer communities have relaxed in many developed nations in recent years, homophobia and transphobia are still rife, even in the UK with hate crimes on the rise. The challenge of this design dissertation is to demonstrate how Manchester's Gay Village can be sensitively regenerated ensuring the identity and safety of the queer community is not only maintained, but strengthened, whilst integrating into the city's wider development.

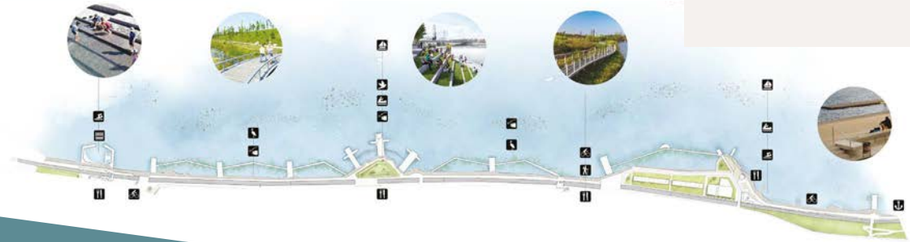


ZHUOTONG SHEN
Design for Coastal Resilience - Ireland

Design for Coastal Resilience

Supervisor: Mr. Mark Graham





Commendation 2021

LDĀDESIGN

Dissertation Title

Design for Coastal Resilience: Blackrock-Seapoint Beach, Dublin, Ireland

In the face of the challenges posed by climate change, climate resilience-based solutions are often viewed as the most effective climate adaptation strategy. Climate resilience covers a number of aspects related to coastal protection engineering and landscape design. This design dissertation aimed to explore the contribution of urban design and planning to coastal responses for cities at risk, including the introduction of resilient green and blue infrastructure, and the provision of walk-able safe public spaces for people and communities in these areas - seeking to provide more robust, future-proof liveable neighbourhoods. The case study site is the coastline from Dun Laoghaire - Rathdown, in southeast Dublin, Ireland.

URBAN DESIGN STUDIO

This studio based module aims to introduce students to basic urban design analysis, it provides a framework of critical urban analysis at multiple scales and sets the foundations for the formation of urban design principles and practice. Students are expected to develop design, graphical and presentational skills to communicate urban design analysis and design proposals, as well as begin to think critically on form, space and process.

The project involves a detailed design assessment of a neighbourhood within the Greater Manchester region were students illustrate a detailed understanding of the current condition and character of the location culminating in broad urban design opportunities and constraints model.

Each Yearbook entry is for illustrative purposes only as only selected graphics/images from the full design proposal submission could be showcased.

UNIT CONVENERS
Mr Robert Phillips
Dr Philip Black

TECHNICAL LEAD
Dr Taki Eddin Sonbli

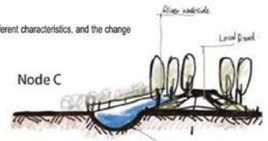
STUDIO ASSISTANTS
Ms Aya Badawy

THE SPECIFIC NODE IN THE SITE

The four roads face the site, but the roads around have different characteristics, and the change in height impedes the accessibility of the site

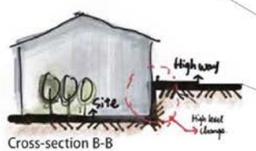
NODE C

The road at node C is located at the junction of the site and the river, with abundant green vegetation, but few people walk because of its low sex.The street scale is 1:1, with sidewalks and street parking.



NODE B

Node B is one of the intersection points between the road in the site and the expressway outside.
However, due to the change of elevation difference within the site, there is a large elevation difference between the site elevation at this node and the highway elevation, and only pedestrian stairs are connected at this node, so cars cannot be connected.
There is no disable accessibility system.



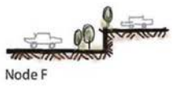
Cross-section B-B

CROSS-SECTION A-A

Section A_A is the east-west site profile, showing the height difference between the site and the external environment.The eastern part of the site is the highest point of terrain, while the western part is a river.

The terrain decreases from east to west. The site is in a low-lying area with a risk of flooding

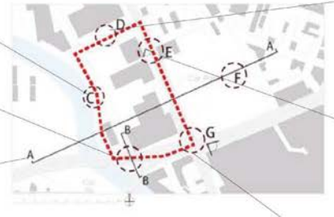
Cross-csection A-A

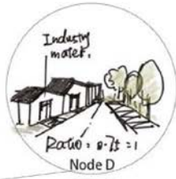


Node F

NODE F

Node F is at the topmost point in the east of the site, where there is a steep ridge of nearly 3m.It limits the accessibility of pedestrians and vehicles.Lack of accessibility design.

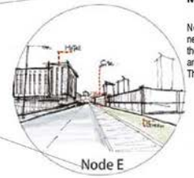




NODE D

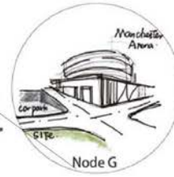
Node D road is located to the north of the site, as can be seen from townscape, passing through the site from the city centre to the north into the industrial area.

The road features at this node are different from the other three sides.The street ratio is 0.75 to 1, and the surrounding buildings are mostly one-story old industrial buildings.



NODE E

Node E is the main road connecting the neighborhood around the site.Unlike the D node, the hotel and parking area is not a pure industrial area, but a mixuse area.
The street ratio is about 0.75 to 1, with wider roads



NODE G

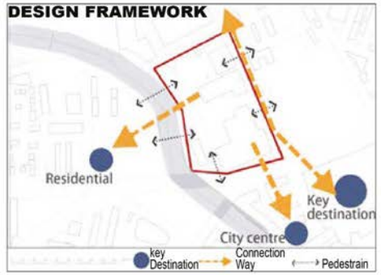
As the intersection between the industrial area of the site and the city center, node G is one of the most important nodes.The Manchester Arena, as an important landmark, is the key visual field of the site, making the area around the site recognizable.

The node also serves as the intersection between the industrial area and the downtown area.

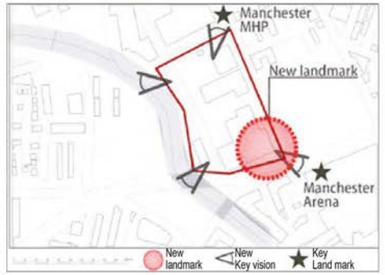
At this node, the change of site elevation difference as shown in section A-A can be clearly seen

SIQI RUAN
IRWELL, MANCHESTER

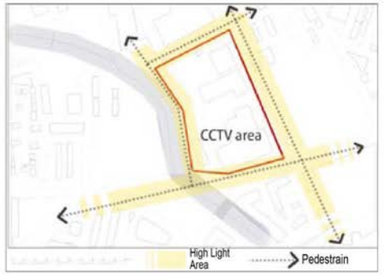
DESIGN FRAMEWORK



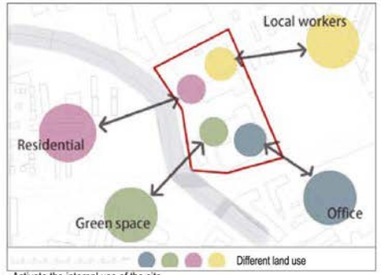
- Break the barrier of the southern highway, establish the connection system, strengthen the connection between the site and the city center.
- Enhance pedestrian links to the site



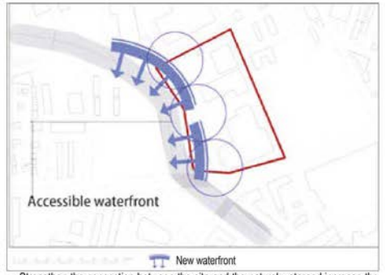
- Enhance views of the site and existing landmarks.
- Create a waterscape based view of the site
- Create markers in one corner of the site to enhance site legibility



- To enhance the lighting intensity of the pedestrian street, the road is more suitable for walking in the dark.
- Strengthen the camera monitoring facilities, make the site more safe to walk



- Activate the internal use of the site
- Incorporating a mixed-use into the site activates the site.create the site more possible.

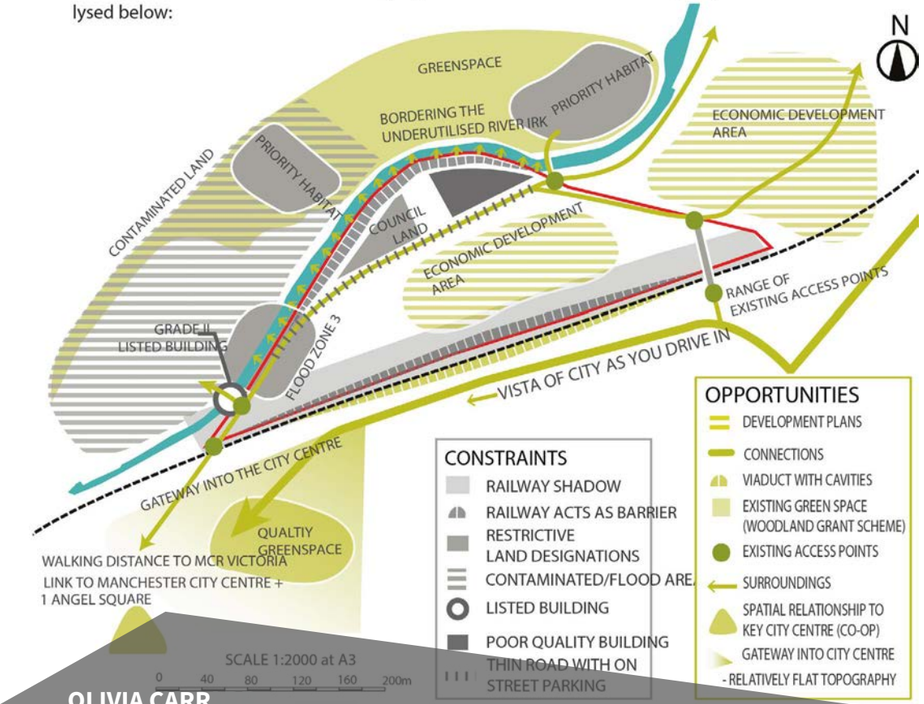


- Strengthen the connection between the site and the natural waterand increase the river accessibility
- Create a diverse water landscape

- Create a new open space in the site to form a complete urban spatial system.
- Improve the accessibility of the site

OPPORTUNITIES AND CONSTRAINTS

Relationship between viaduct and road on Bromley Street. A train line runs to the southern boundary of the site. Some archways under the viaduct has offered unique spaces for business to run from. The quality of these viaducts is ana
lysed below:



OLIVIA CARR
Bromley St. , Manchester

CHARACTER AREA ASSESSMENT

HOW BUILDING TYPE DIFFERS DEPENDING ON CHARACTER AREA

As you move from the city centre towards the site and other peripheral neighbourhoods, size and scale r
also changes drastically from modern to more old.

ST CHAD'S CHURCH
- Gothic Style Architecture 1846
- Grade 2 Listed Building

VICTORIA DENTAL HOSPITAL
- Victorian Style Architecture
- Red/Yellow Brick
- Turquoise dome roof

1 ANGEL SQUARE
- New Millennium Architecture
- Post-modernist Style

SOUTHERN GATEWAY
- Links to city centre, based on main road
- Retail-led with active frontages
- Red brick developments
- Legible due to landmarks

FINE GRAIN MIXED USE
- Mixed use
- Limited landmarks in the area
- Lots of open, disused space

SOUTHERN GATEWAY
- 1:2 street ratio
- Large 2 storey buildings- Warehouse/Industrial
- Lacks open space + densely developed upon
- Inactive frontages

MODERN CENTRE
- Contemporary architecture
- Mixed use consisting of many Skyscrapers
- Compact grain. More newly developed
- Many landmarks, legible

RETAIL STRIP
- Mainly commerical use - active frontages
- 2-3 Storey red brick buildings
- Surrounding primary road

DERELICT SPACE
- Built up but disused
- Some large industrial buidlings

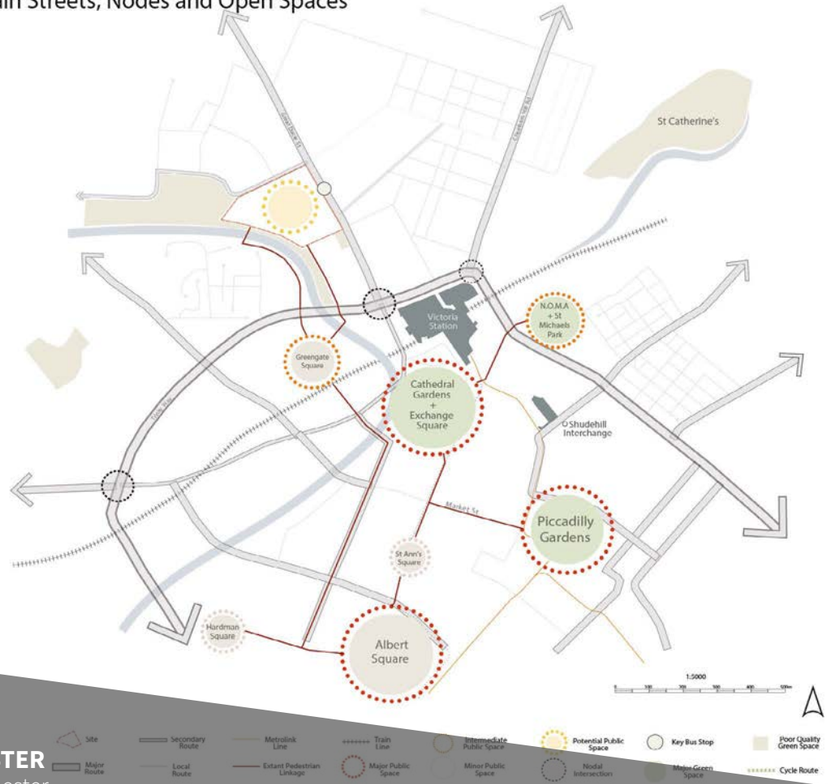
SOUTHERN GATEWAY
- Links to city centre - based on main road
- Retail-led, Active frontages
- Red brick developments
- Legible due to landmarks

FINE GRAIN MIXED USE
- Fine grain
- Primarily white buildings
- Terrace housing / semi-detached

POST INDUSTRIAL
- Disused land
- Some old car-parks
- Fine grain and open

Present Networks: Main Streets, Nodes and Open Spaces

- Manchester possesses a number of public realm and spaces of green infrastructure, with varying degrees of quality.
- The strategic positioning of Irwell Embankment, as well as its advantageous natural features make for the ideal opportunity to connect the space into a broader urban network.
- The site is easily accessible by various transport modes, with a bus stop along its Eastern edge, as well as pedestrian links to



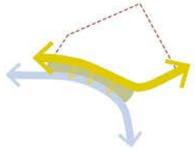
LUCY CHESTER
Irwell, Manchester

Strategies

A Connections

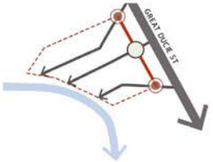
Attract footfall through a legible design featuring a landmark building at the site's southern corner as well as through creating accessible pedestrian routes.

B Waterfront



Activate the Space adjacent to the River, improving existing green space and adding a corridor of high quality public realm

C Networks and Access

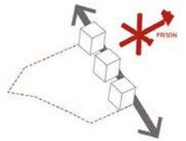


Create interest along Great Ducie Street through clear access points and active frontage. Ensure that these routes connect to other nearby destinations

D Usage

Consider the sites' strategic position close to the city centre. Accordingly, incorporate a mixture of uses with a focus on high-quality residential dwellings

E Massing

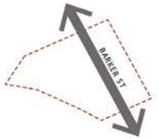


Counterbalance the imposing frontage of the HMS Prison walls through ensuring buildings along Great Ducie Street are of a suitable height. Ensure these are not residential due to undesirable view.

F Key Views

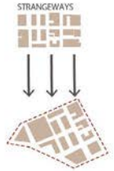
Take advantage of key western views.

G Barker Street



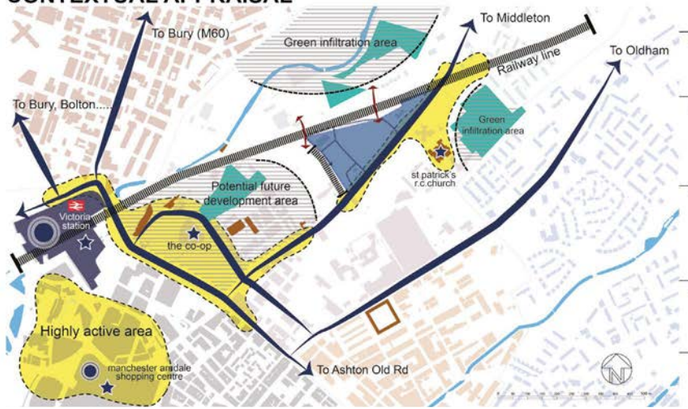
Aim to retain Barker Street. Its positioning makes for a suitable vehicular service route.

H Orientation



Maintain grid morphology and retain extant street layound where possible

CONTEXTUAL APPRAISAL



Vitality node
- The vitality points around the site are mainly distributed in the railway station and arndale city center, which are the most crowded points.

Public space
- There is a lot of open space in the site , and there is a lot of public space available outside the site.

Landmarks
- There are some landmark buildings around the site, within a range of 100M from the site, there is a church, and a little further there are victoria station, the co-op, etc.

Barrier
- The northwest railway and the southwest fence of the site have hindered the development of the site.

Main connection
- The site is located around a series of transportation lines, including trains and trams from Victoria, and is close to the main road. There are 2 bus stops within the site, which has good connectivity with the city center.

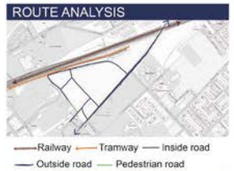
Key listed building
- There are some listed buildings around the site, but the closest is a church, a heritage asset that may bring vitality and development opportunities to the adjacent site.

Potential channel
- The railroad barrier blocked the north-south connection, but the site has two underground passages, which to some extent makes up for the north-south connection.

Edge of character area
- There are green infiltration areas around the site and areas with potential for future development.

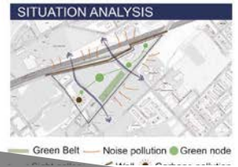
Inside road
- The site's vehicle network system is relatively complete, but the roads are somewhat damaged.

Highly active area
- At present, there are more people in these areas, which belongs to highly active areas.



—The southeast side of the site is close to a main road of traffic, and the northwest side is close to a railway. It is in a cross-triangle zone.

—There are many challenges and opportunities because it is close to the city center.

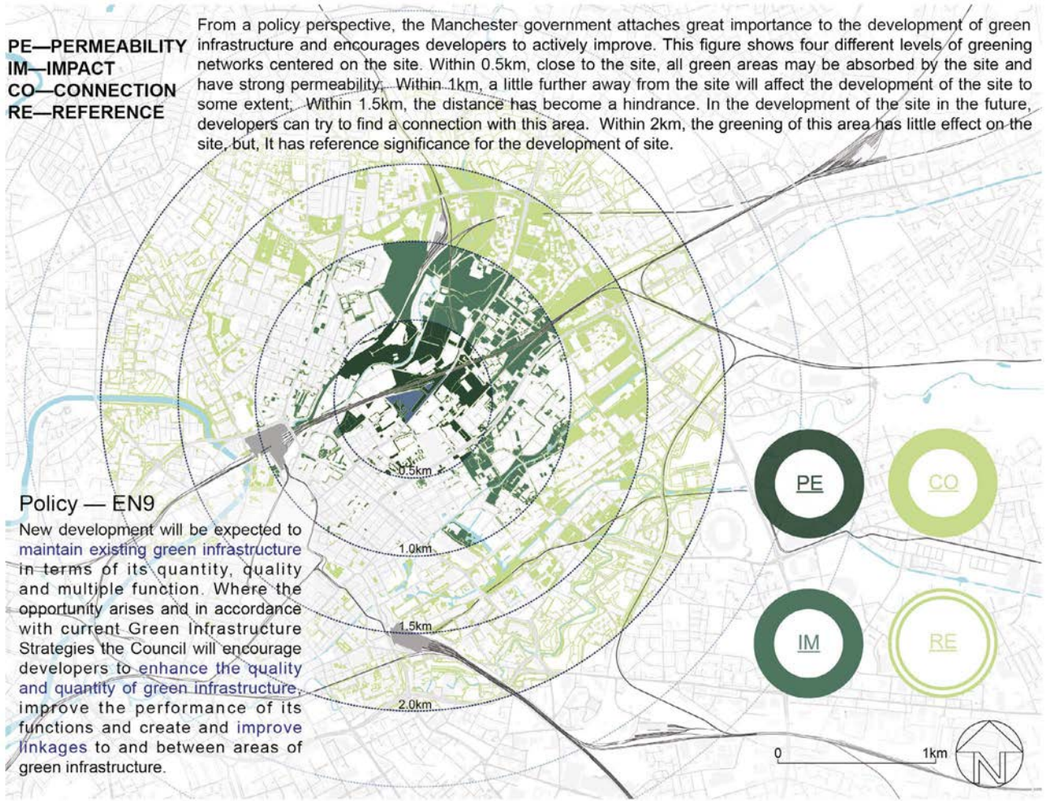


YUSONG ZHOU
Rochdale Road, Manchester

GREEN NETWORK VALUE ANALYSIS

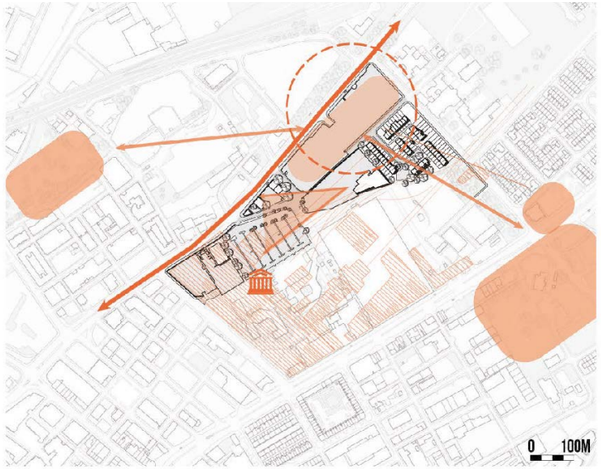
PE—PERMEABILITY
IM—IMPACT
CO—CONNECTION
RE—REFERENCE

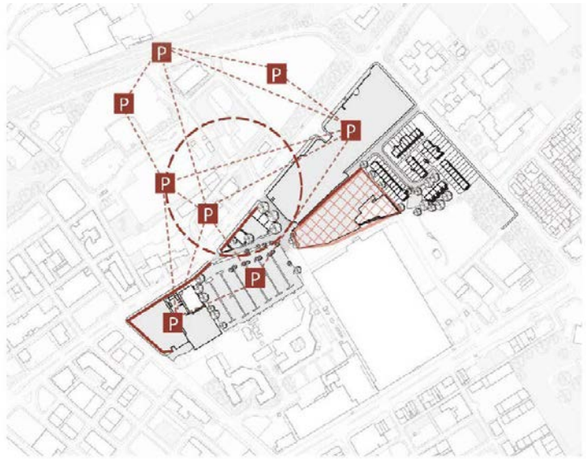
From a policy perspective, the Manchester government attaches great importance to the development of green infrastructure and encourages developers to actively improve. This figure shows four different levels of greening networks centered on the site. Within 0.5km, close to the site, all green areas may be absorbed by the site and have strong permeability. Within 1km, a little further away from the site will affect the development of the site to some extent. Within 1.5km, the distance has become a hindrance. In the development of the site in the future, developers can try to find a connection with this area. Within 2km, the greening of this area has little effect on the site, but, It has reference significance for the development of site.



Policy — EN9

New development will be expected to maintain existing green infrastructure in terms of its quantity, quality and multiple function. Where the opportunity arises and in accordance with current Green Infrastructure Strategies the Council will encourage developers to enhance the quality and quantity of green infrastructure, improve the performance of its functions and create and improve linkages to and between areas of green infrastructure.





Vista of city skyline should be highlighted.

Develop a pedestarized space to create a public realm network.

The site has a historical significance of Goods train station and should highlighted in the design.

Rochdale road is used as a main artery for entering and exiting the city centre and this brings the opportunity to enhance this road as a gateway.

The are a lot of paths converging to the site and mixed uses surrounding the site giving the potential for the development of a new hub.

The car dominance of a major road, car servicing business and car lots creates a vehicular node, depreciating the public realm value.

A network of surface car lots creates a fragmented space, undefined and absent of pedestrian activity.

There are a series of sites and buildings in and around the site that are of poor quality creating a weak character within the site and making it undesirable.

There are a series of brick walled barriers bordering the site. The lack of visual access into the site is a pedestrian deterrent and the entrance into the site is less animated.

ERIN MASON
Lower Irk Valley, Manchester

SITE FEATURES

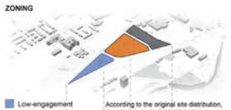
challenges

ACCESSIBILITY

Vehicle Access
Pedestrian Access

It can be seen that there are a number of entrances and exits for vehicles and pedestrians around the site. According to the size of the sign, the capacity and flow rate of each entrance and exit can be judged. The larger the circle, the more frequently it is used.

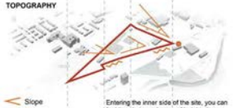
ZONING



Low-engagement
Core Area
Fragmented Area

According to the original site distribution, the whole area is divided into three parts, the blue area is low participation, it is located at the intersection of the road and the track, the Orange area is the center of the site, and the gray area is connected to the south of the site.

TOPOGRAPHY



Slope
Steep Change in
Lowest Point

Entering the inner side of the site, you can feel the obvious change of height, the Arrow points to reflect the change of height, there are many slopes in the site, the circle represents the lowest point of the site, here is the most likely to make rainwater collection, creating unnecessary low-lying areas.

BARRIER

Major Barrier
Secondary Barrier
Enclosure

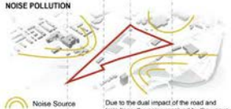
The obstacles to the site are obvious and are affected by the carriageways and train tracks, which are the biggest problems and difficulties, on the west side of the site, there is a high wall, which is also an obstacle that can not be ignored.

BUILDING USE

Car Park
Company
Derelict
Factory
Public Use
Residential

There are almost no buildings in the site, and the site is located in the fragmented area, the surrounding area of single-purpose buildings, mostly industrial and low-density residential.

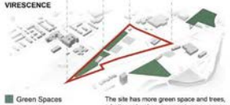
NOISE POLLUTION



Noise Source

Due to the dual impact of the road and train lines, the noise received by the venue is very large, it is difficult to avoid, especially the continuous noise pollution generated by trains and trams.

VIRESCENCE



Green Spaces

The site has more green space and trees, a better natural environment, green space around more, the most famous is St Michael's Flags and Angel Meadow Park.

ROAD HIERARCHEY

Major Road
Secondary Road
Traffic Road
Site

At present, the site is a car park with convenient vehicular access, and secondary roads are mainly used for walking. Near the main trunk roads of traffic, you can take buses and other means of transportation to reach the city center and other areas, but the road network leading to the north side of the site is lacking.

THE SITE

The red arrow shows a main landscape route. It starts from the site, mainly by Rochdale Road, passes through several important landmarks and attractions, and finally reaches Arndale and city center. The whole journey is about 1km.

CHARACHATER AREA

1. Located near Arndale, the area is predominantly commercial and retail, with a high density of buildings and close connections to each other.

2. The area is known as the N.O.M.A block and has iconic buildings such as the coop building, with wide views and scattered building densities.

3. The area, dominated by retail, is an old neighborhood that draws a lot of people.

4. This area is a private residential area, most of the residential ground floor even row, building density is very low.

5.The area is predominantly office and residential and is a mixed use area with a high floor area ratio.

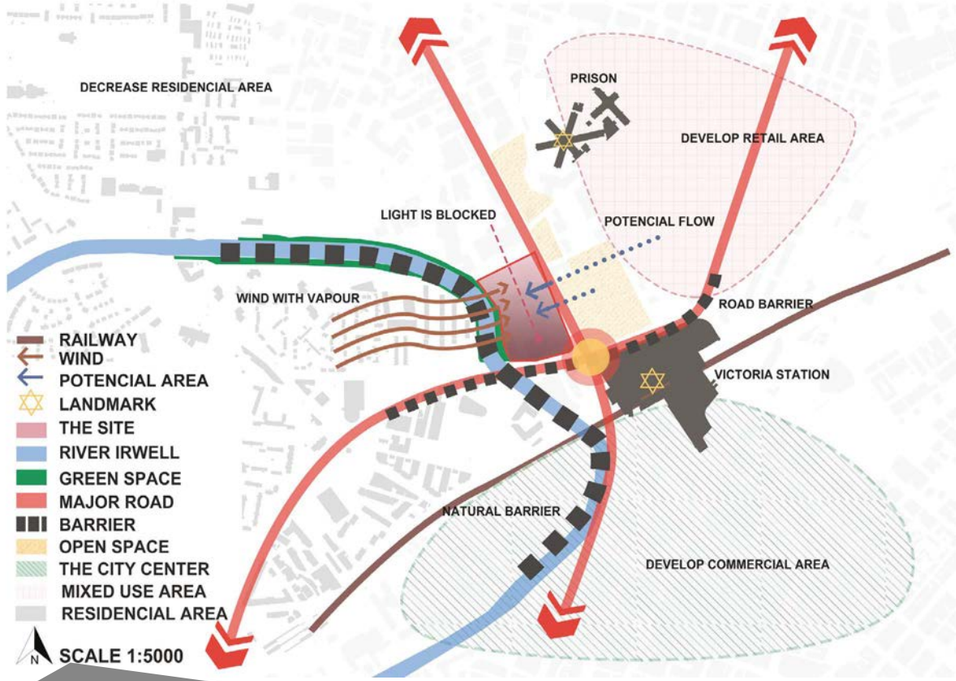
6. Located at Victoria Station, this large building is also the main tourist area.

7. The area is mainly industrial, retail distribution of the streets on both sides, neatly arranged.

8. The area, dominated by retail and apartments, is evenly built and has complex streets.

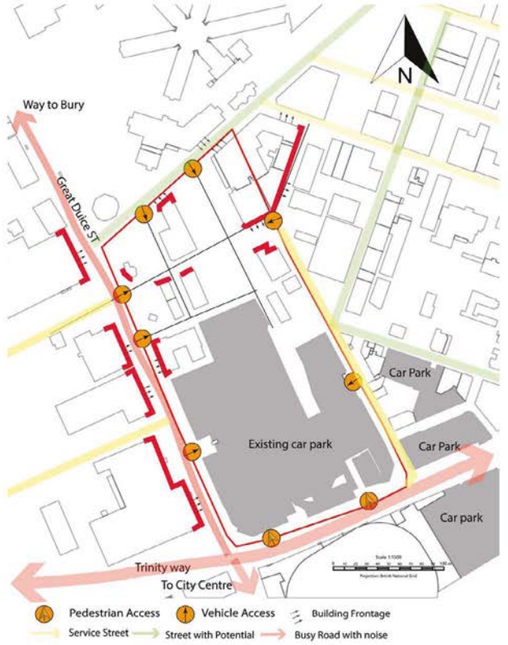
MINGZE HUANG
Rochdale Road, Manchester

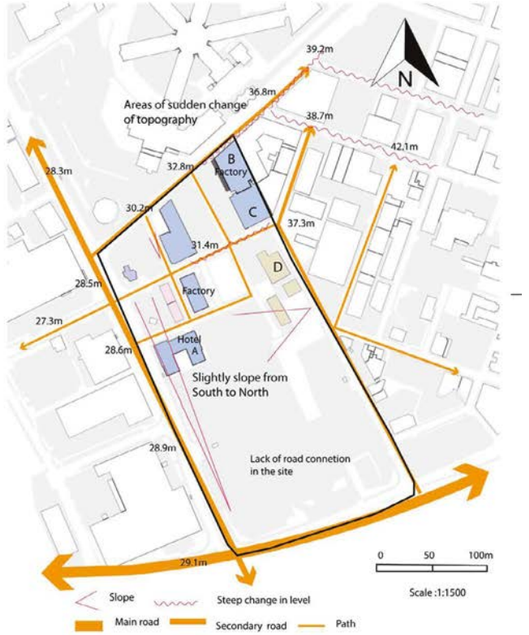
CONTEXTUAL APPRASIAL



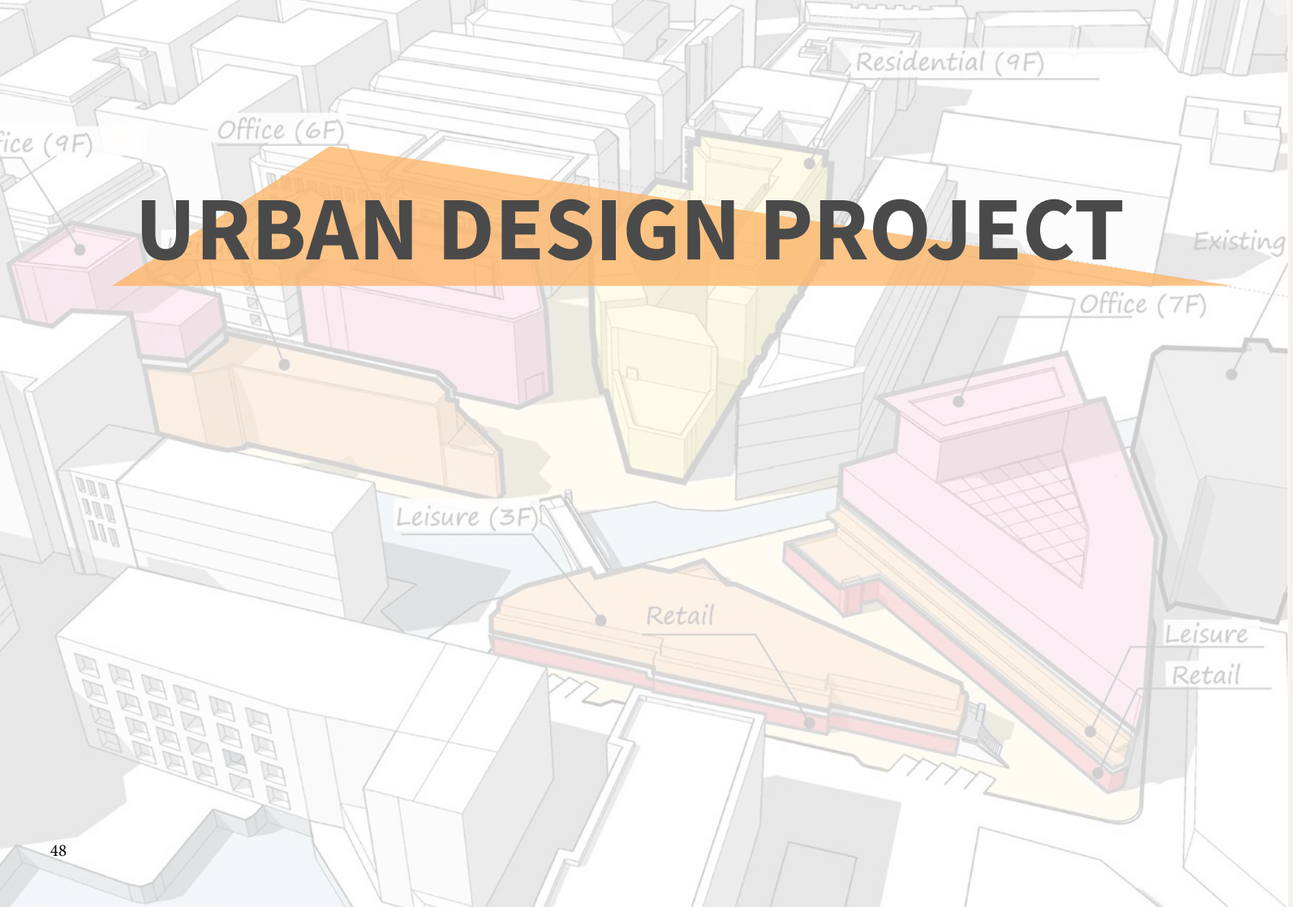
WEI QU
Irwell, Manchester

Access and service





ZICHUN YE
Trinity Way, Manchester



URBAN DESIGN PROJECT

This studio based module aims to reinforce, through applied practice, the main principles of urban design; skills of architectural observation and description; techniques for analysis of urban space; design policy and guidance; design and access statements; and urban design proposals and schemes. The project involved the delivery of a detailed urban design proposal on a city centre site (approx. 3-5 ha.) and a 3D physical model.

The unit aims to allow students to develop a project-oriented approach to urban design; apply site analysis techniques to support urban design proposals; explore urban design principles and their relationship with practice; design and communicate an urban design scaled intervention; and develop skills of design, presentation, and 3D physical modelling.

A series of crits throughout the year assist students in progressing their analysis, ideas and eventual designs, and the final project must include a technical scaled drawing of the design scheme at 1:1000 or 1:500 scale and a 3D physical model.

Each Yearbook entry is for illustrative purposes only as only selected graphics/images from the full design proposal submission could be showcased.

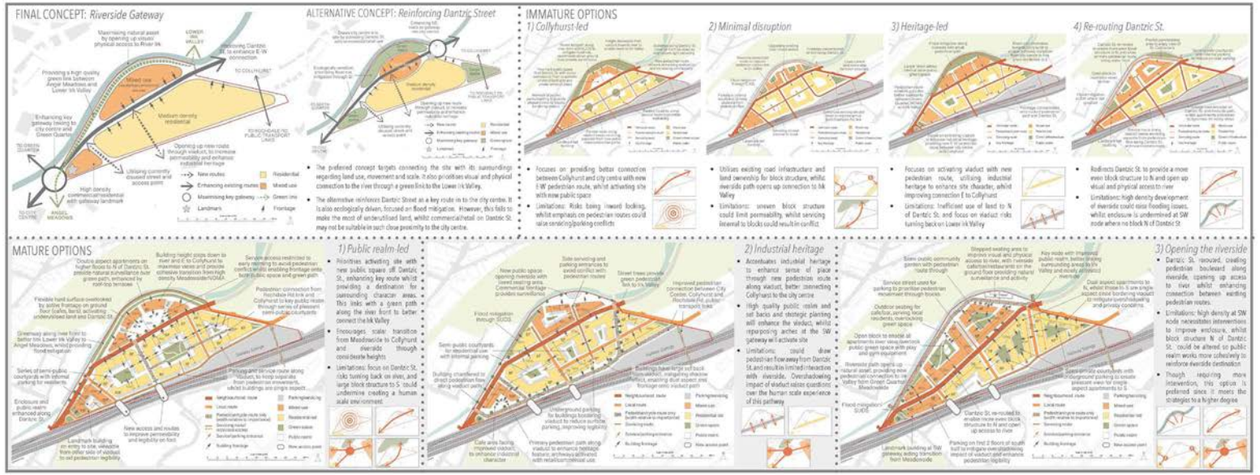
UNIT CONVENOR
Dr Philip Black

DESIGN TUTOR
Mr Robert Phillips

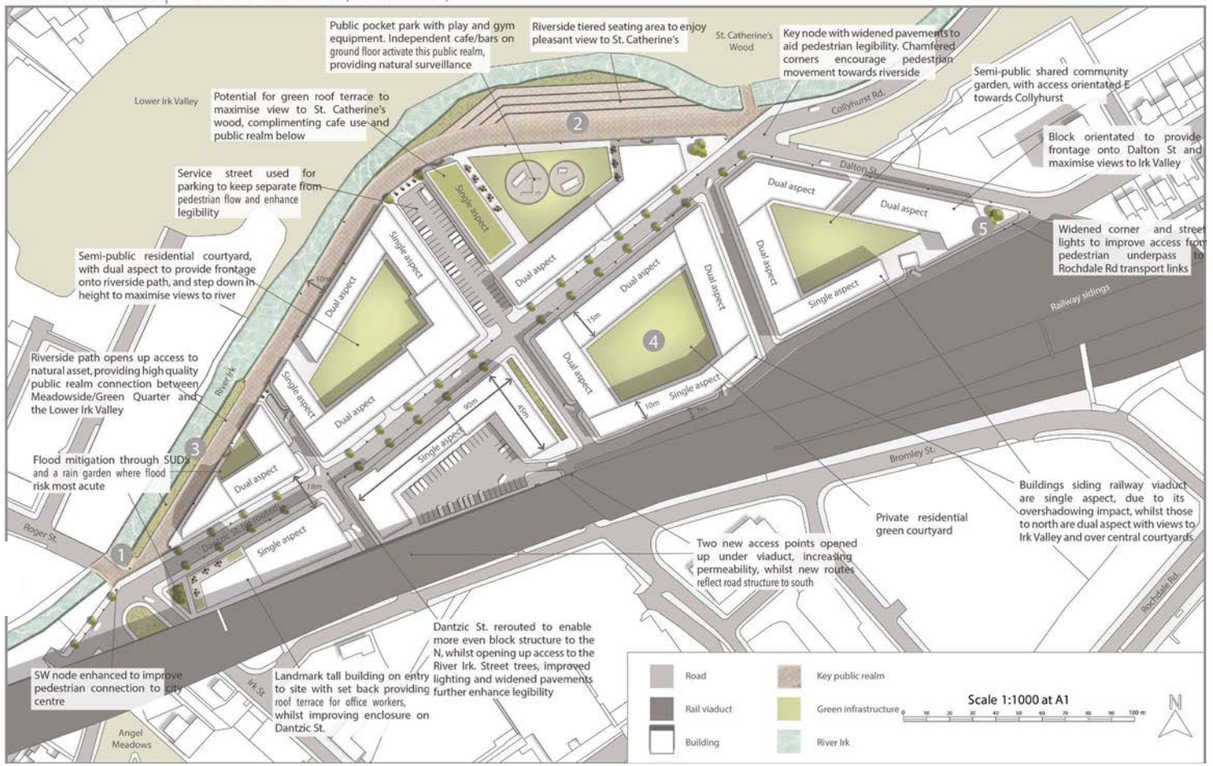
TECHNICAL LEAD
Dr Taki Eddin Sonbli

STUDIO ASSISTANTS
Ms Aya Badawy

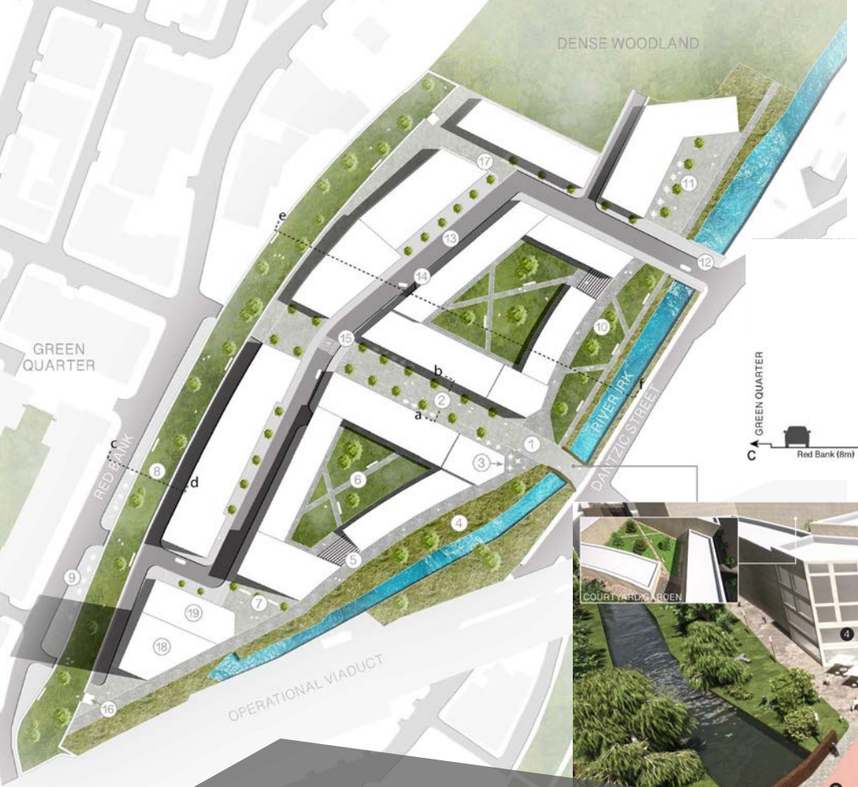
OPTIONEERING

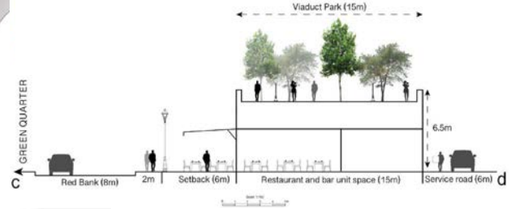


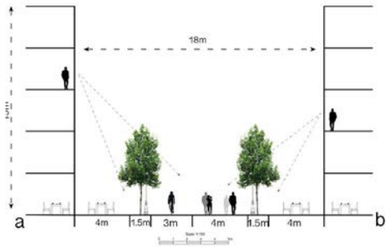
FINAL MASTERPLAN | TECHNICAL DRAWING (1:1000 AT A1)



MEGAN SWIFT
Dantzic St, Manchester







ger Street is the proposal's is principal pedestrian space which spans the width of the site. nnecting Red Bank and Dantzic Street. This street lends itself to **Strategy D** since the space edestrian-centric and is lined by active restaurant/bar frontages. **Strategy E** is also satisfied ce the street provides a coherent and legible streetscape. The building-street ratio is circa which is optimum, for providing a well enclosed public space. The street has excellent nat- surveillance from those at ground level using the public realm and from those living in the artments above the restaurants.

JOSEPH GREENHALGH
River Irk, Manchester

UNION BRIDGE GATEWAY

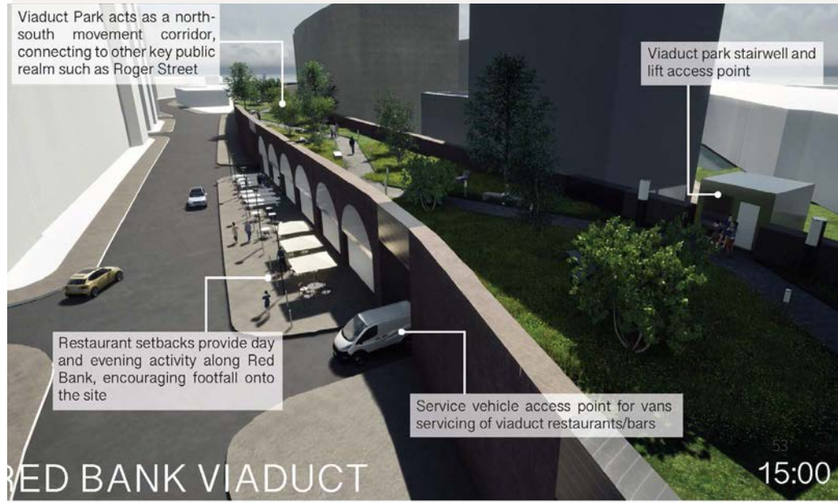
15:00 May

DESIGN SUMMARY

Viaduct Place has come about as a result of rigorous analysis and urban design process that tested different ideas. The result is a site that has taken several of it's original constraints (disused viaduct and River Irk) and turned them into opportunities it can capitalise on.

The sites vision was to become a place of significant activity that linked the River Irk Valley to the bustle of city life. This vision will be achieved under the proposals since the design has responded to the unique context of the site between two diverse landscapes.

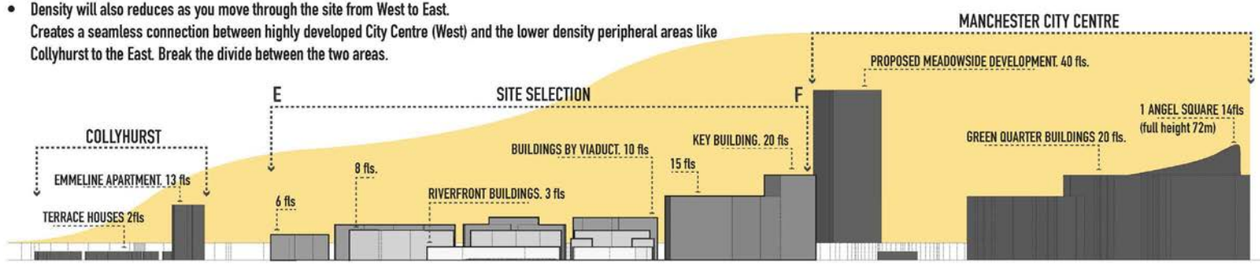
The objectives set out in the design framework have also been satisfied through close adherence to some of the core urban design principles, particularly in relation to the sites signficant legibility and permeability challenges.

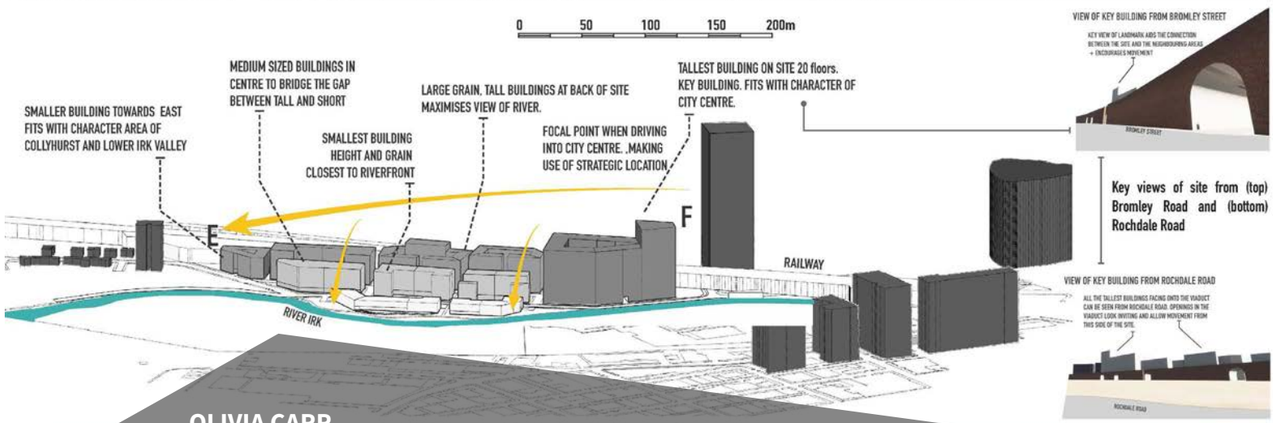


RED BANK VIADUCT

15:00

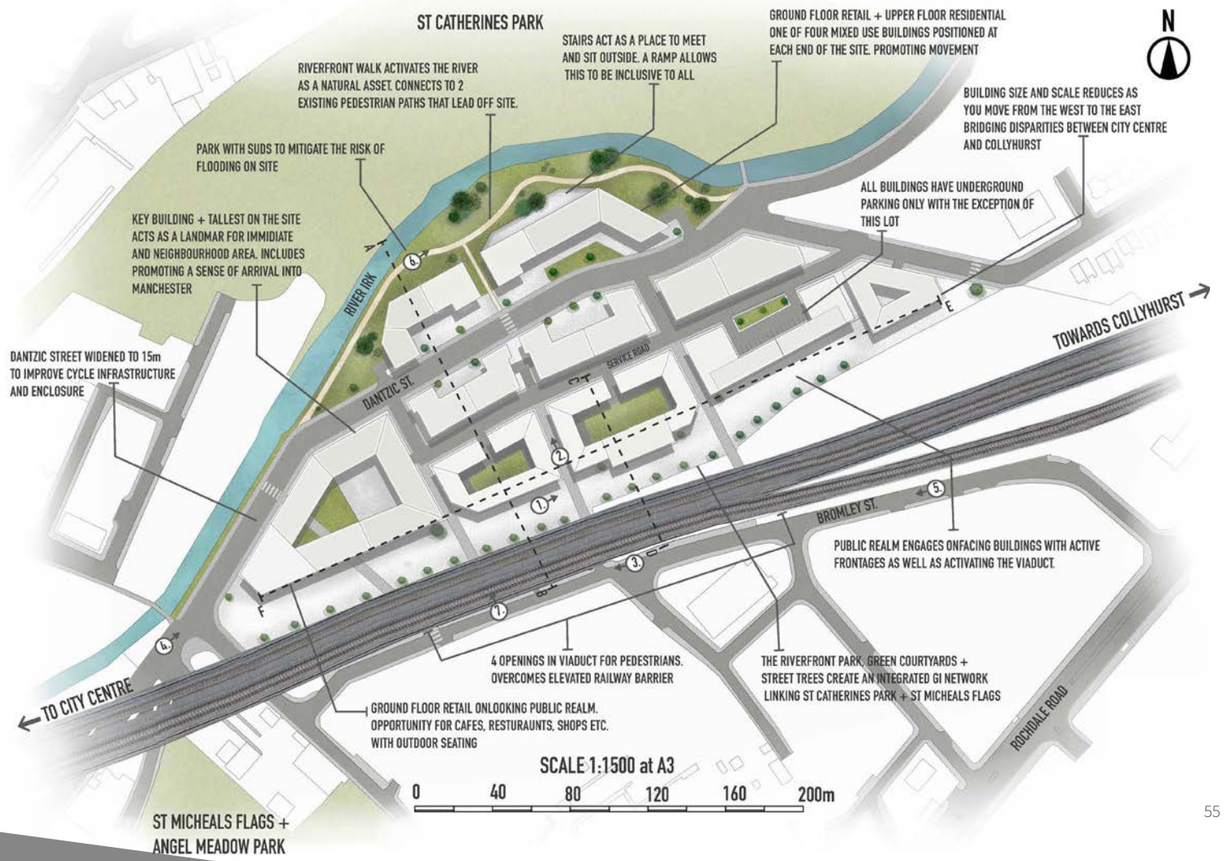
- Building height and density reduces as you move towards the river front, this activates the river by maximising the view
- Adheres to the natural slope of the land being a valley.
- Density will also reduces as you move through the site from West to East.
  Creates a seamless connection between highly developed City Centre (West) and the lower density peripheral areas like Collyhurst to the East. Break the divide between the two areas.



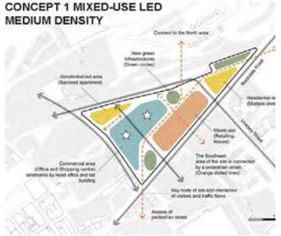


OLIVIA CARR
Dantzic St, Manchester

PREFERRED OPTION



CONCEPT 1 MIXED-USE LED MEDIUM DENSITY



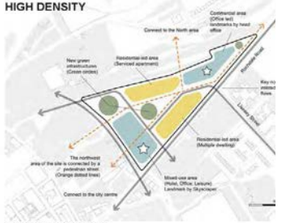
PLAN AND EXPECTATION:

The plan is to create a mixed-use, high-density site with commercial, C
apartment and entertainment facilities. Create A high-rise hotel landma
of the Rochdale Road to increase the local attraction.

1. Increase land use in the site.
2. Efficient provision of a large number of walking systems.
3. Through the mixed use of land, improve the function of the area.
4. To separate people and vehicles.

1. Less consideration of the relationship between the buildings.
2. Less consideration of the northern connectivity of the plot.

CONCEPT 2RESIDENTIAL & OFFICE LED HIGH DENSITY

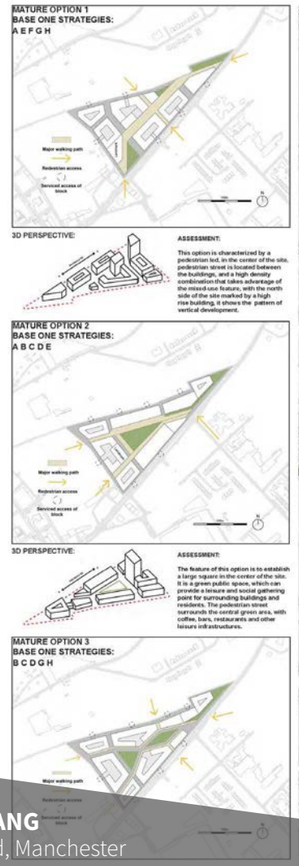


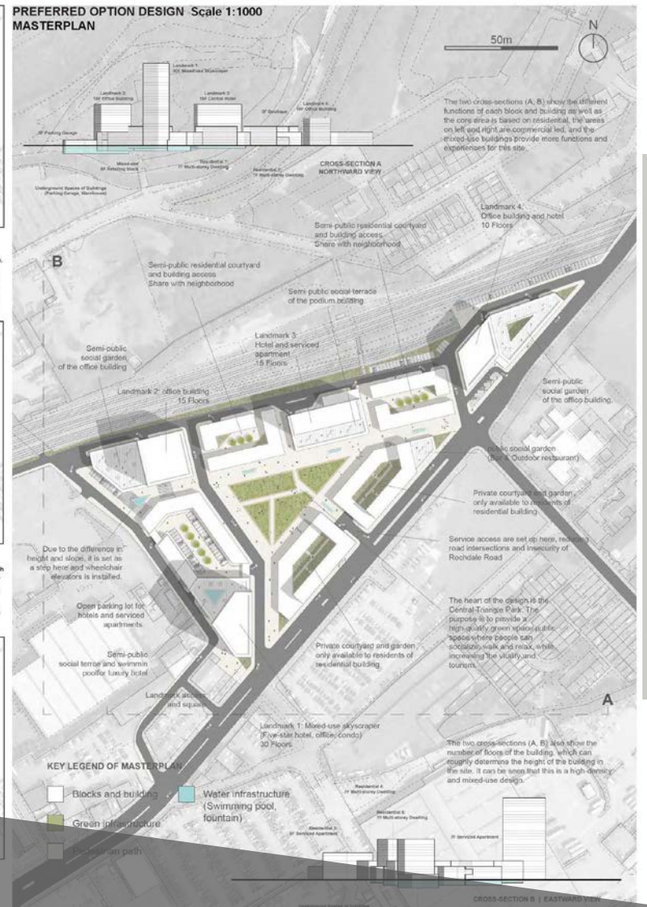
PLAN AND EXPECTATION:

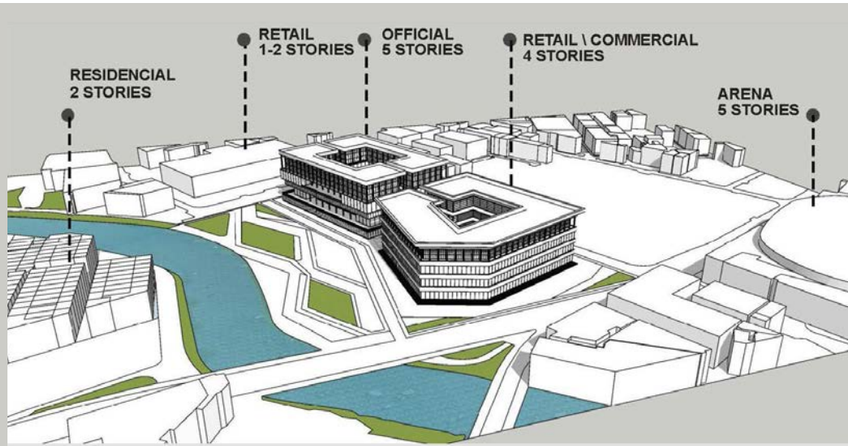
To create a business and office-oriented culture and high-tech industri
creating a public space around the central Green area, it provides a pr
shared space for the citizens who work here.

1. Provide a rich public space.
2. Provide a safe and private office environment.
3. To create a beautiful walking system 4. as the main goal, reduce v
5. Creating cultural landmarks and increasing regional influence.

1. The function is relatively simple and poor accessibility.
2. There are more architectural landscape factors to consider.
3. Lack of contact with the surrounding area of site.







The two buildings in the site are five and four storeys high, which are higher than surrounding buildings, so that passersby can notice the land.

MINGZE HUANG
Rochdale Road, Manchester

WEI QU
River Irwell, Manchester

A B C
D E F
G

-Water feature as an end to the main liner public realm
-A small landmark/node
-Water from GI rain collection

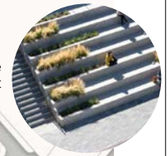
-GI buffer to prevent noise from railway

-Potential landmark

-Roof garden provides key view to green space

-Access to N.O.M.A and green space
-Chamfered corner

Stairs combined with inclusive design to adapt to the height difference



Building details
A
-Two storey
-Retail/cafe/restaurant

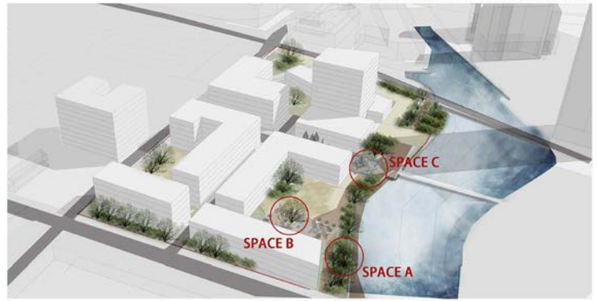
B
-3 storey
-ground floor retail
-1-2 storey office

C
-ground floor leisure
-mix use
-Office/Leisure/Hotel

D
-ground floor retail
-1-3 storey residential

E/F/G
-residential block
-ground floor retail/leisure
- with roof garden and semi private garden

SIJIE WANG
Rochdale Road, Manchester



RIVER SIDE GI AND PUBLIC SPACE. A B C

Space A

The Green belt is along the river, The great walking road beside the river. The GI here is the high quality line park.
The little plaza as the key waterfront destination are designed for people to get close to the river.

This line park is a public realm, all the road avoided disable access which have wheerchair access.

Space B

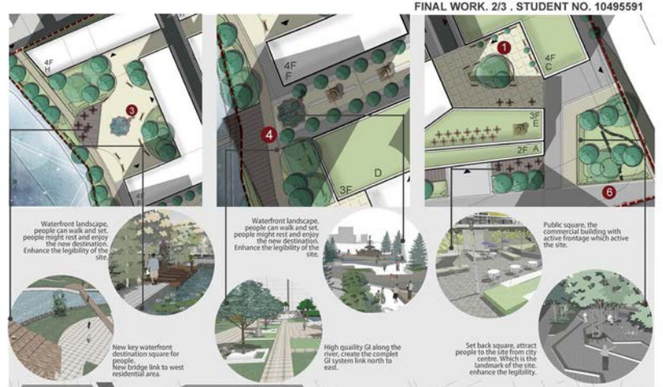
This GI is a semi-public yard which used by both residentials and local people.
The landscape is like a montain which increasing people the sence of living closing to nature.

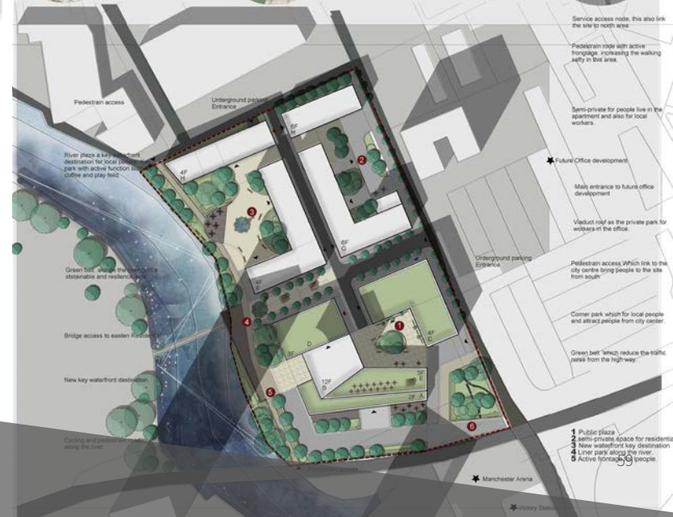
The rest facilities are designed for people to sit and rest here. Also enjoy the waterfront views.

Space C

This space is one of main entrance of the site which link the site to the future development project.

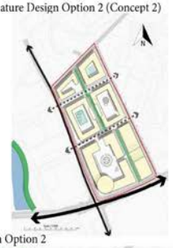
The road is all pedestrain with trees and waterfall. Moreover, This public space might be the new waterfront destination of the whole area.





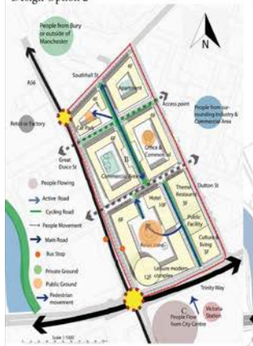
SIQI RUAN
River Irwell, Manchester

Immature Design Option 2 (Concept 2)



Immature Design Option 3

Design Option 2

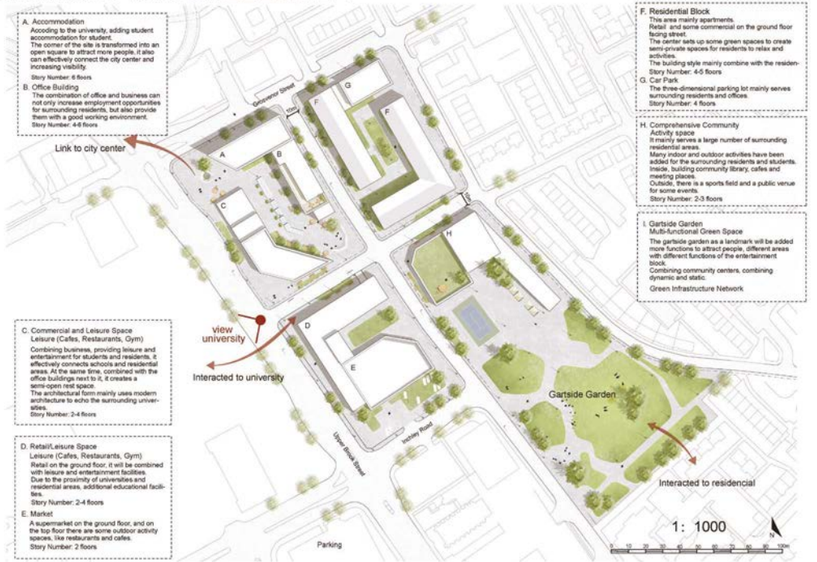


Design Option 3 (chosen design)

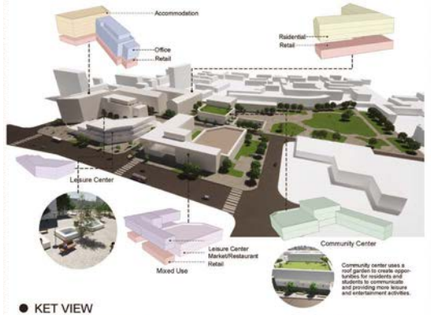
Proposed Design
(Best practice)

ZICHUN YE
Northern Gateway, Manchester

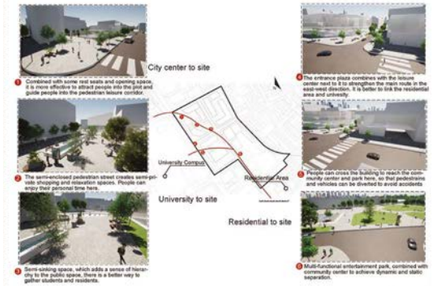
● PREFERRED OPTION DESIGN a b c d e f g h

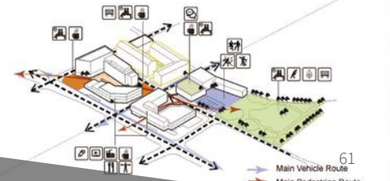


● DESIGN DETAIL



● KET VIEW





HONGLI GUO
Upper Brook St., Manchester

F

The central space makes use of heavily chamfered corners in order to create an area of active frontage. This is strategically located at the node where Dantzic St and the pedestrian street meet, whilst also being directly connected to the linear park.

B C

Dantzic St is retained as an important vehicular route. However, tree lined streets prevent on-street parking and help calm traffic, whilst pavements have been widened to provide more space for pedestrians. This, combined with the strong enclosure, has helped restore the human scale.

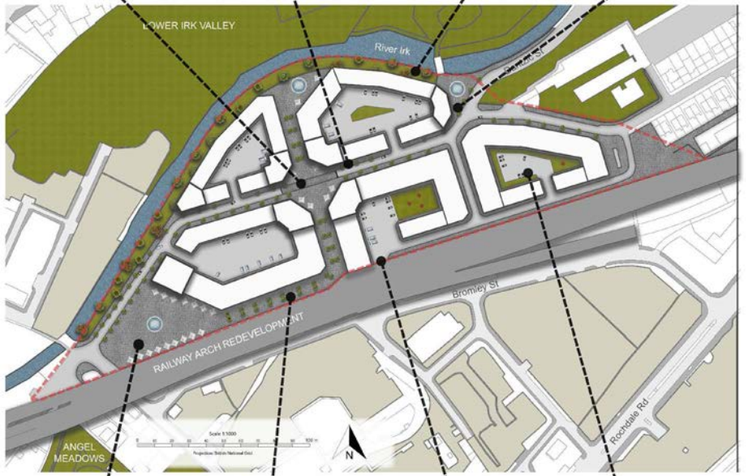
D E G H

A linear park connects Lower Irk Valley to Angel Meadows and Green Quarter, whilst providing vital SUDS to mitigate flooding.

A small public space is created at the node where the linear park and pedestrian path meet. This provides views to Lower Irk Valley and a connection with its future development.

C

Corners are raised in strategic positions to entice pedestrians through the site, whilst increasing enclosure.



Key public space conveniently located at the site's key node. This takes advantage of the railway arches on site which builds on the character of Manchester's wider regeneration.

A raised tower at the north of this green space creates a landmark to attract pedestrians whilst increasing enclosure is the large open space.

The site benefits from views towards NOMA.

C D F

An active, enclosed and green pedestrian street connects the key public space, to the central space, and feeds into the riverside space. This in turn connects to Lower Irk Valley.

An access point is opened for residents along Bromley St, whilst the pedestrian subway access is restored. This boosts south-north permeability.

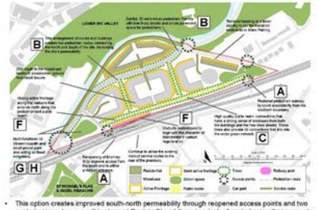
A

A significant residential component helps the transition from the urban core (city centre, NOMA etc) to the residential areas of Collyhurst and Miles Platting. The residential buildings to the east are served by well connected residential streets, increasing the site's permeability.

Where there is space for significant internal green space within the blocks, these residential apartments are dual aspect.

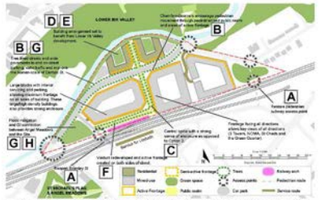
A G

MATURE OPTION 1



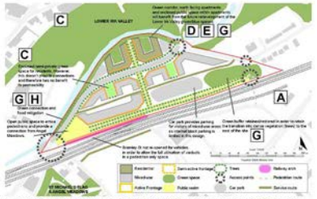
- This option creates improved south-north permeability through reopened access points and two central spines, however, this stops at Dantzic St and there is a lack of central spine that connects to the north of the site.
- The active frontage along the railway arch redevelopment benefits from the corridor opposite and the chamfered corners that create high quality public realm within this area of high activity.
- Inward facing buildings restrict key views to the east and west.
- Linear parks provides a strong GI connection and aids flood mitigation, with tree lined streets further adding to the GI network.

MATURE OPTION 2



- This option utilises internal parking and servicing, therefore maximising frontages and retention of key views. It also reduces fragmentation due to continuous enclosure and active frontage along the central spine. In addition, internal parking means there is no need for a separate car park, allowing more space to be designated to GI and high quality public realm
- A green space to the west of the site further aids flood mitigation within Flood Zone 3, although this lacks enclosure.
- Linear park and semi-private residential green space to the north aid flood mitigation and provide GI connections between Lower Irk Valley and Angel Meadows.
- The pedestrian route is simplified and provides a legible connection between the linear park and active frontages along the railway arches via Dantzic St.
- However, the scale of the buildings is larger than most surrounding developments, such as in Angel Meadows. This questions whether it fits the character of these.

MATURE OPTION 3



- This option maximises the railway arch redevelopment, which has led to compromising south-north permeability as Bromley St is closed off in order to retain pedestrianisation. This extension has allowed an enclosed and active piece of public realm to the south-west corner that will attract visitors from the future Angel Meadows development and beyond.
- The lack of space for car parking for the mixed-use high street means a separate car park is required. This, along with the service road bisecting the site, limits enclosure in parts and leads to potential fragmentation.
- Linear park and tree lined streets create multi-functional GI connections that aid flood mitigation.
- Semi-private residential courtyards overlook Lower Irk Valley, whilst outward facing buildings benefit from key views.

JAMES WALLEY
Dantzic St, Manchester

05. DETAILED MASTER PLAN

- Potential pedestrian connection.
- Lack of space sufficiency.

DESIGN DESCRIPTION:

Proposed Ellen Wilkinson Square: S1, S2, S3, S6
This square is placed at the centre of the site which gives a clear direction to all routes of the site. Stairs surrounded by the monument having tree shades and water features associated with surrounding building uses have made this place a high quality public place for people. It helps to make this area more permeable.

Linear Park: S2,S3
Linear park which is situated adjacent to the historical viaduct emphasizes the history of railway of this particular site and a great source of breathing space for the surrounding community which also helps to integrate with surrounding GI network and retaining key views.

Boulevard Pedestrian: S2, S5, S6
This central pedestrian spine decorated with trees, bushes, water fountains and benches under tree shades have made the entire space a great place to enjoy people. Proper enclosure gives people more comfortable and strong pedestrianization and cycle lanes ensure safety as well as helps to achieve sustainability. The ground floor uses of the building along this street creates active frontages and makes this area more vibrant.

Community Park: S2, S6
Provide an open space for children play area, community and socialization. It also provides a great place for physical and mental development for all age group of people.

Gateways: S1, S4
The land uses near the gateways are well thought in order to attract maximum people into the site.

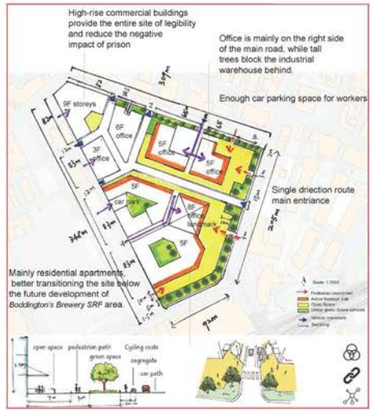
Building Uses: S1, S4
Multiple use of buildings such as commercial, residential, mix use, retail, leisure and refreshment help to activate this dead site and also economically benefited.

Shopping mall:
This the landmark building in this site makes the area more legible and invites people to this site.

ARFA ISLAM
Old Ashton Road, Manchester

Mature Options

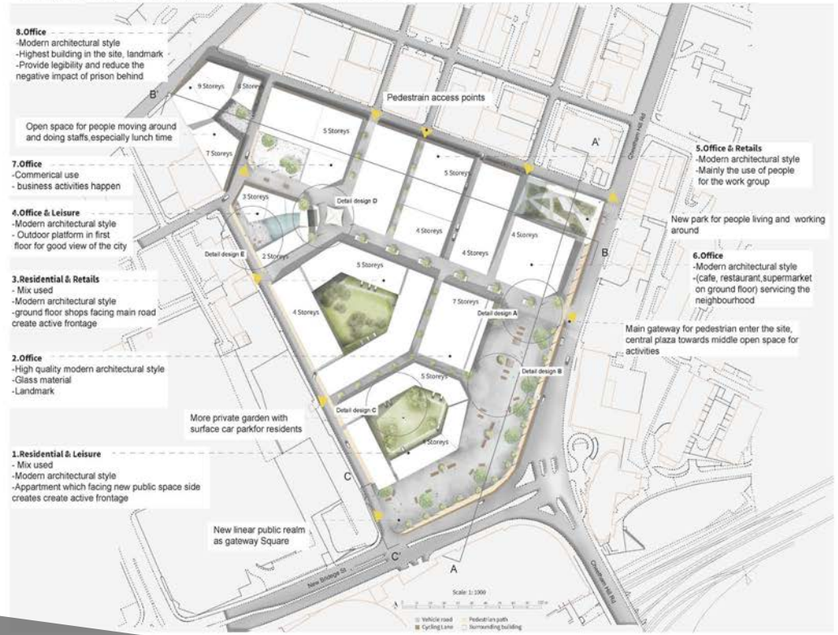
Option 1



Option 2

Masterplan

- The site is surrounded by a good transport network there is not neccessary to have car route. To improve pedestrian connectivity pedestrian zone to facilitate pedestrian movement.
- Linear gateway Square community park and plaza encourage acitvities, while street between building allow local residents and commuters to cross the site conveniently during the day.
- Good pedestrian connectivity allows people to better access to nearby green spaces and public spaces, especially Irwell Riverside.
- Create outstanding retail and leisure services (Bars, restaurants, cafes) with terrain and key view point in the form of an outdoor terrace.
- Office buildings provide more economic development support, while high-rise office buildings help the site create good enclosure, reducing the negative impact of rear warehouses and prisons.
- Gateway Square's high-rise high-quality glass structure creates a landmark for the site.

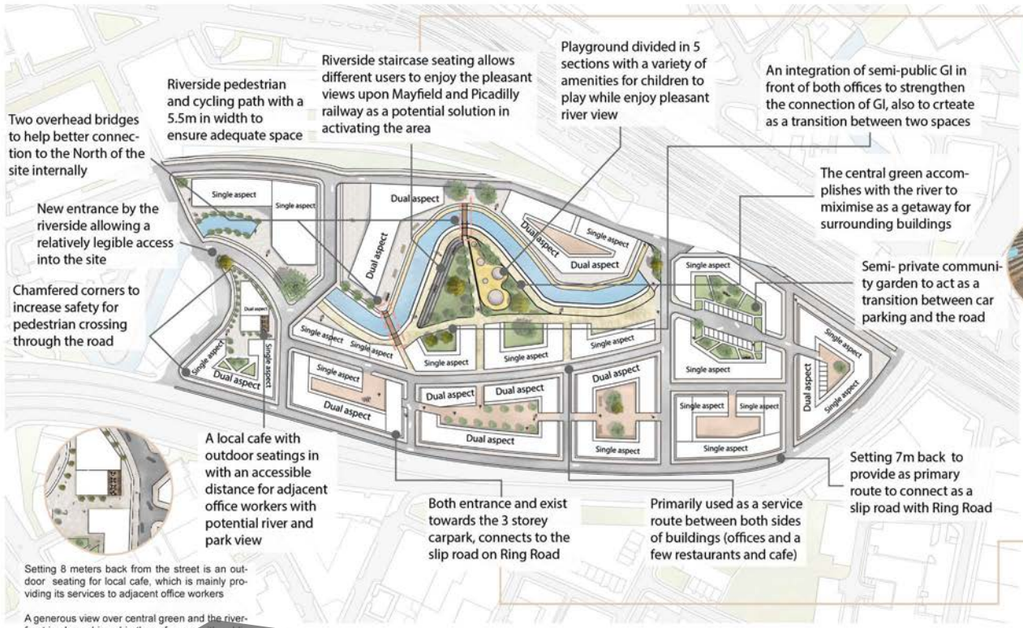


Precedent Images

ZHUOTONG SHEN
Bridge Street, Manchester

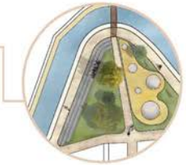
TECHINICAL PLAN (1 : 2000 ON A1)

Scale 1:2000
0 20 40 60 m



Setting 8 meters back from the street is an outdoor seating for local cafe, which is mainly providing its services to adjacent office workers

A generous view over central green and the river-front is also achieved in the cafe area with public seating with a large window at the shopfront



Taking advantages of River Meldock that is locating at the cnetral of the site, the view from and to the river is essentially an important element in delivering high quality public realm and directing key views onto extant landmarks onsite

The fair- faced concrete casted staircase is integrated with the organic flow of river as well as the park. It provides plenty of opportunities for key views and leisure

A close up graphic highlighting the pedestrianised & semi-public courtyard with a small GI that forms strong inner frontage while remain connect with its surroundings with three site entrances

TING-EN WU
Mayfield, Manchester

ti-storey Car park (ECC project,2017)
car park. To save the physical space, create
odern multi-storey car park. The building
green plants, in the middle, there's a bike
close to the sidewalk.

Hotel: the landmark
building to attrct people.
(singapore,2020)

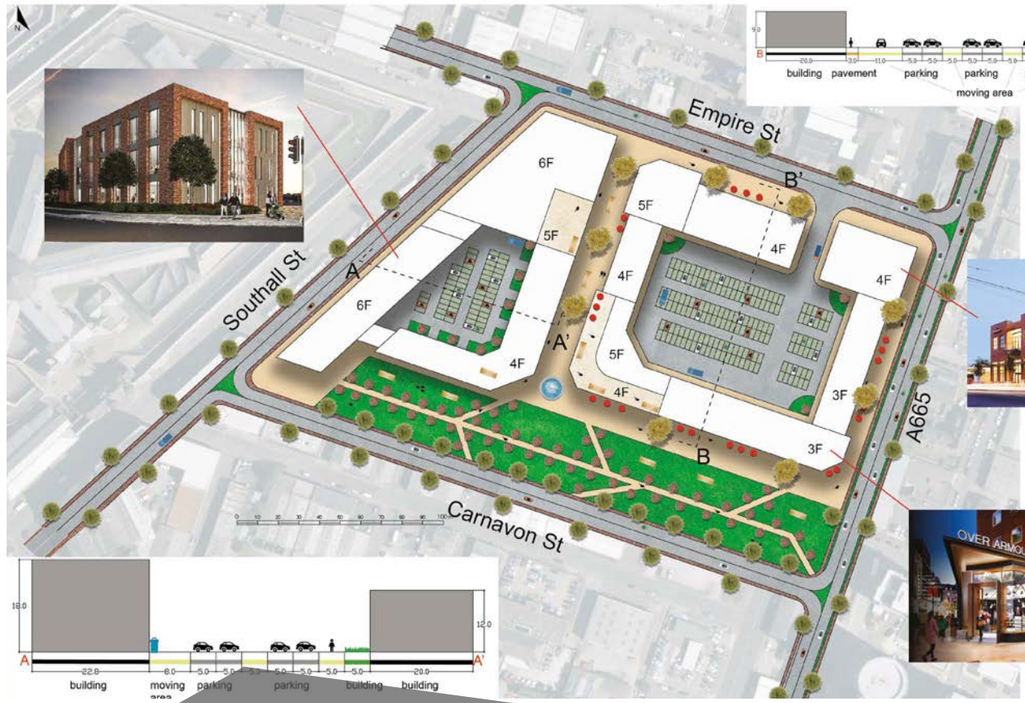
First floor of the hotel is for
commercial that can attrict
people. Frontage design for
people to leisure
rest.

Pedestrian
for sidewalks , cycling and run
· The pedestrian road is 14 metres v
including the sidewalks, cycling r
plastic runways and road designed for
ability. This place is wide enough to
ate a safe and comfortable walking sp
·The function of the road is to r
a walkable green corridor for pe
trian. There are bars and cafe .Pe
can walk, run and cycle in this

Public Playground
Children play

ZICHUN YE
Great Ducie Street, Manchester

PREFERRED OPTION



BICHENG YIN
Carnavon St, Manchester

MASTERPLAN STUDIO

This studio based unit aims to introduce students to the process of masterplanning, providing skills in analysis at larger scales; design option development and testing; working to a brief; and detailing a masterplan project design at 2D and illustrative 3D

.

The unit aims to provide advanced practice in urban design; consolidate the work on the interface of urban design and masterplanning scales; develop advanced graphical and presentation skills to deliver urban design projects; and develop a critical approach to the urban design process and a strong link between the theory and the practice of urban design.

The project asks for the delivery of a spatial masterplan design proposal for a selected 18-25 hectare site. A series of crits assists students throughout the year in developing their analysis and design. The final submission includes a detailed strategic framework, design options, a technical scaled masterplan, 2D and 3D visualisations, and a considered implementation plan.

Each Yearbook entry is for illustrative purposes only as only selected graphics/images from the full design proposal submission could be showcased.

UNIT CONVENOR
Dr Philip Black

DESIGN TUTOR
Mr Robert Phillips

TECHNICAL LEAD
Dr Taki Eddin Sonbli

STUDIO ASSISTANT
Ms Aya Badawy

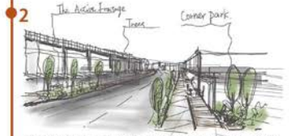
UNIT CONTRIBUTORS
Urban Imprint
Atkins Global
Optimised Environments
LDA Design

KEY ROAD TOWN SCAPE

1

The gate of the site which metro link bring people to the site. The gate way park link the waterfront destination.

2

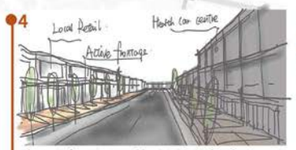


The low street ratio, The local retai is on the right which have active frontage. the 4m area for such as coffee and bar.

3

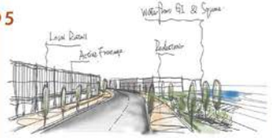
This is an open space which have two public realm. The central park is on the left, the semiprivate yard is on the right.

4



The ratio here is more like 1:0.75, Both side pedestrain have active frontage and the trees. people have an enclosure place to walk.

5



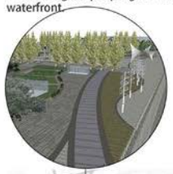
The waterfront park is on the right, 2F local retail is on the right, the street ratio is about 1:0.5. which is a comfortable place for people to enjoy the waterfront park and waterfront pedestrain.

6

Another access node in the site. The gateway park is in the corner which link to the exist Green infrustructure.

PUBLIC REALM & MOVEMENT

This is one of the gate wayi in the site, which bring the people get in to the waterfront.



This square is link to the metro link station. which is the centre square of the site. Rest and leisure facilities in here for people.

This space is the public waterfront destination for people. With set back landscape.

1 5 Gate way park.

As the gateway of the site this park is a liveable and walkable space. some set back land scape which create more space for people to rest.

Also, this park link the site with the exist Green network bring peoplw in to the site.

2 Waterfront walking area

There is a long walking public space along Aston canal, also the cycling road are provide for the cycling fans.

Some rest ficilities as the landscape are also create for people. The buiding facing the canla has active frontage which active the area.

3 Metrolink station square

Metro link is the most important way which bring epople to the site from manchester city centre.

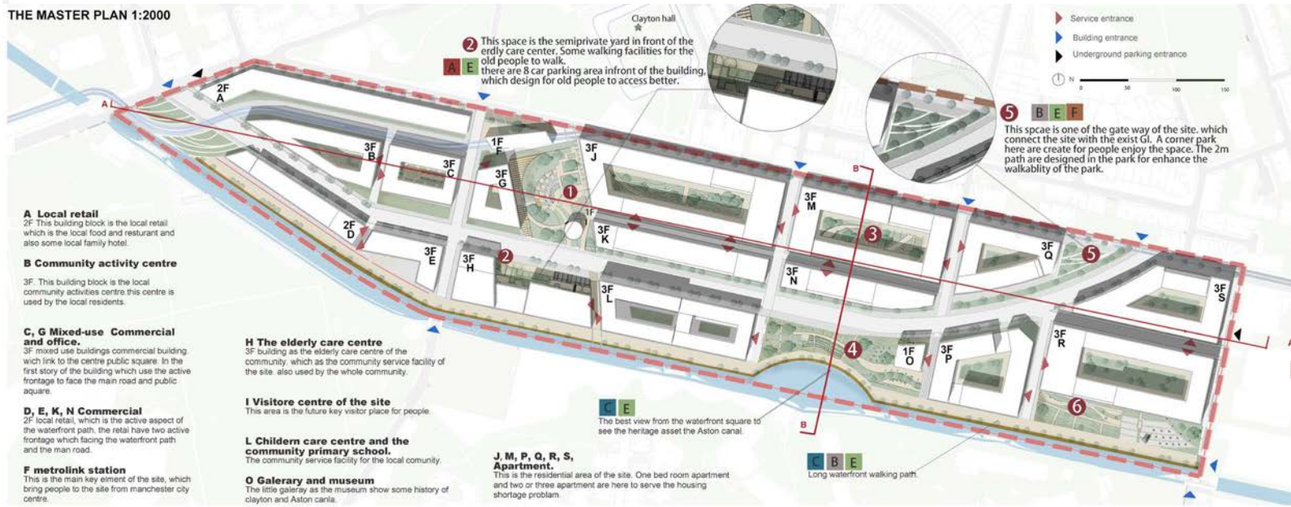
One public square is design to recive the visitors also the visitor center is located in the square. like a musem show the history of the history of clayton and

4 6 Waterfront playing park

The waterfront playing park is located beside the waterfront walking space, which provide people the place to rest and enjoy the canal views.

Green landscape is design as the set back chair, which make this place more liveable and active.

THE MASTER PLAN 1:2000



A Local retail
2F This building block is the local retail which is the local food and resturant and also some local family hotel.

B Community activity centre
3F. This building block is the local community activities centre.this centre is used by the local residents.

C, G Mixed-use Commercial and office.
3F mixed use buildings commercial building. wich link to the centre public square. In the first story of the building which use the active frontage to face the main road and public aquare.

D, E, K, N Commercial
2F local retail, which is the active aspect of the waterfront path. the retail have two active frontage which facing the waterfront path and the man road.

F metrolink station
This is the main key elment of the site, which bring people to the site from manchester city centre.

H The elderly care centre
3F building as the elderly care centre of the community. which as the community service facility of the site. also used by the whole community.

I Visitore centre of the site
This area is the future key visitor place for people.

L Childern care centre and the community primary school.
The community service facility for the local comunity.

O Galerary and museum
The litte galeray as the museum show some history of clayton and Aston canla.

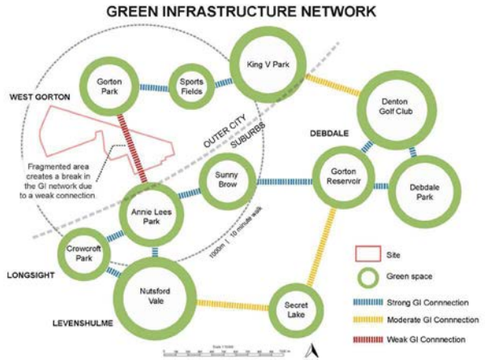
C E
The best view from the waterfront square to see the heritage asset the Aston canal.

J, M, P, Q, R, S, Apartment.
This is the residential area of the site. One bed room apartment and two or three apartment are here to serve the housing shortage problam.

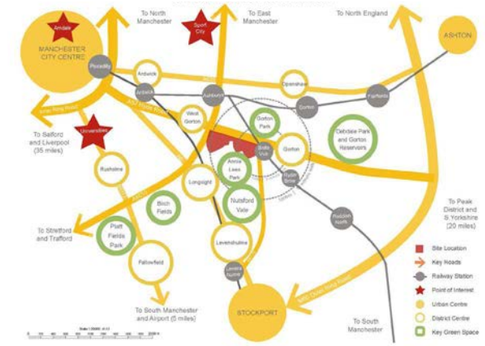
C B E
Long waterfront walking path.

CROSS SECTION B-B

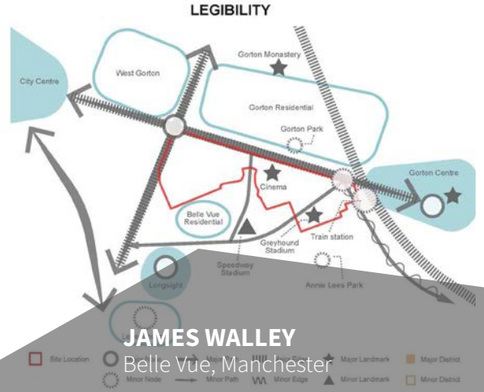
SIQI RUAN
Clayton, Manchester

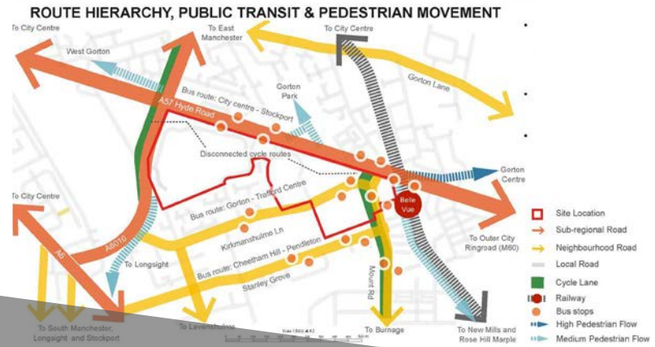


The void in and around the site creates a weak connection between Gorton and Annie Lees Park. As a result, this breaks up the strong regional green network that it is located within.



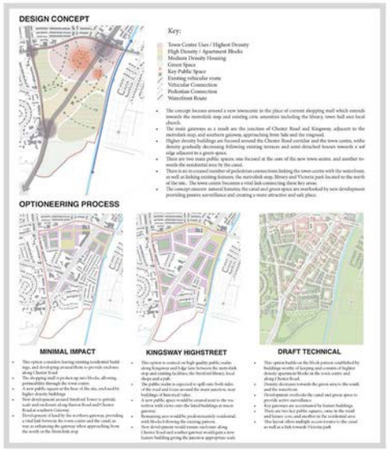
The site is located in East Manchester, connected to the city centre via Hyde Road, Sports City and Trafford via the A6010, and Stockport via B6178 (Mount Rd).
It is next to Belle Vue rail stop, connecting it to the wider rail network, and sits in between Gorton Park and Annie Lees Parks.
District centres within walking distance are Gorton, West Gorton and Longsight.

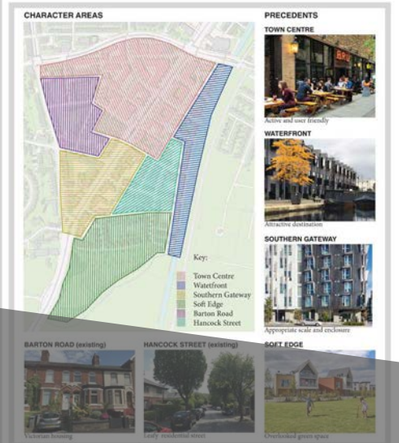


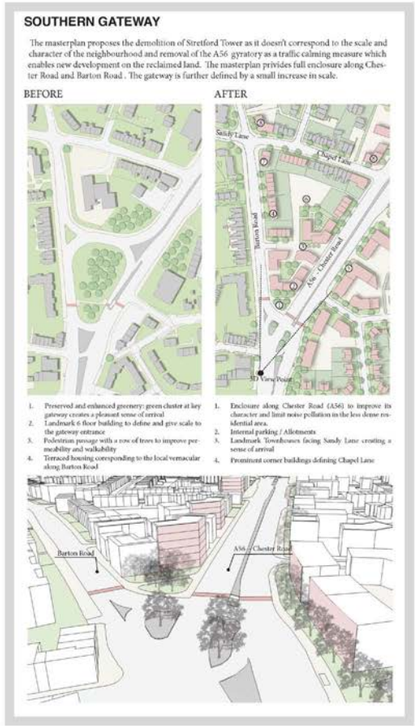


JAMES WALLEY
Belle Vue, Manchester

STRETFORD TOWN CENTRE MASTERPLAN







TOMASZ JAKUBIAK
Stretford, Manchester

HARD & SOFT PLAN

1. National Car Auction
Complex of several buildings taking up approx. half of entire site.

2. Showcase Cinema
Underused and dated cinema. Large car park surrounding it.

3. Bingo hall
Low quality structure. There is also another bingo hall adjacent site further down Hyde Rd.

4. Sports bar
Recently closed sports bar. Low quality and currently not in use.

5. Diamond Lodge
Low cost and low quality hotel. Lack of investment evident.

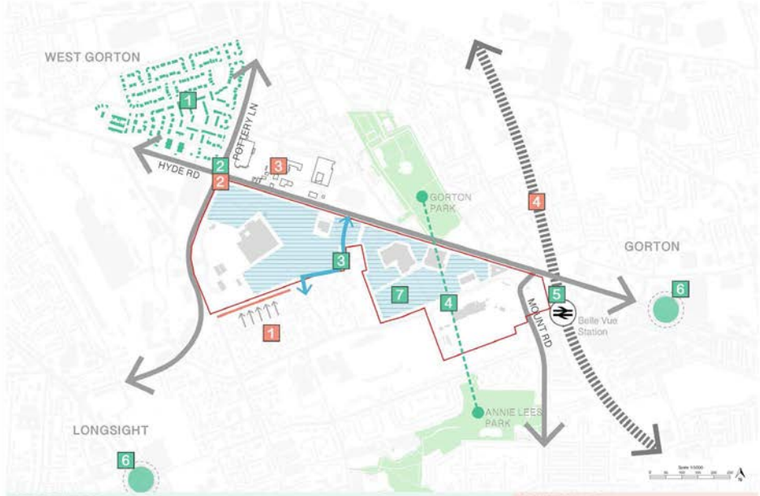
6. Belle Vue Stadium
Recently closed dog racing grounds. Low quality structure and outbuildings.

7. Public toilets
Unused public toilet facility. Low quality structure.

8. Power Station
Victorian power station. Oldest structure on site and is still in operation.

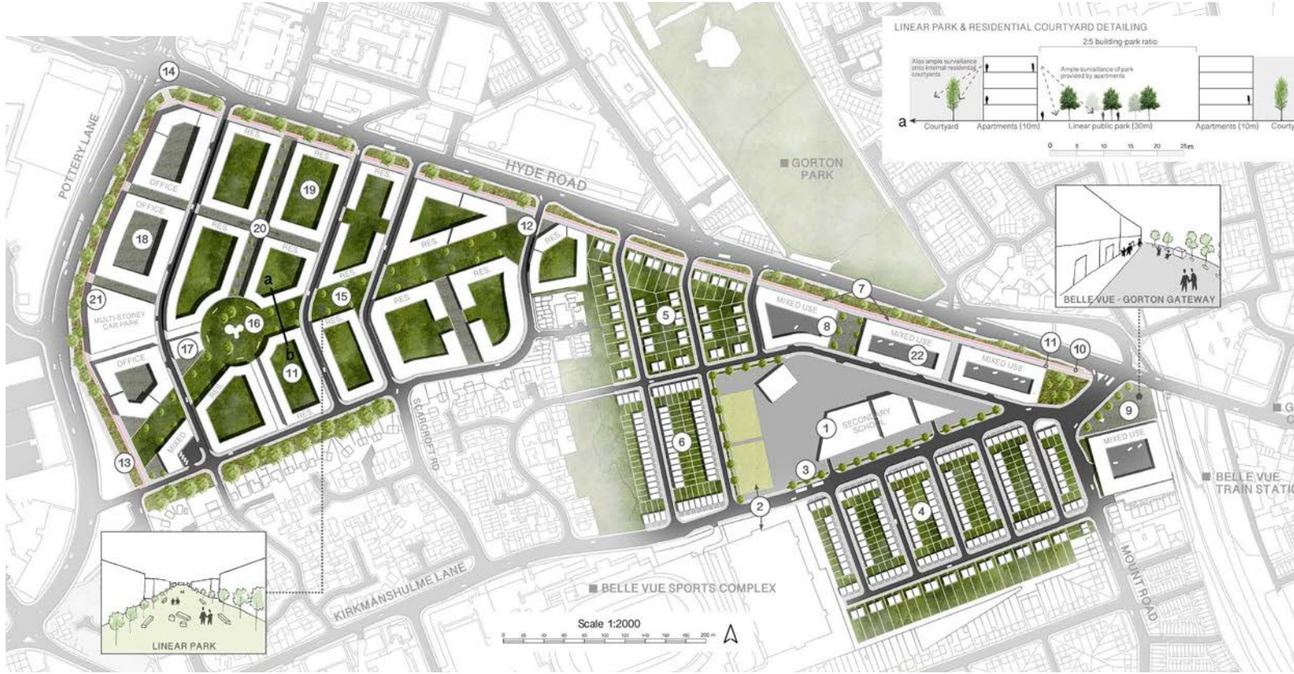
All but one building (the power station) are considered 'soft' and are therefore recommended for demolition. This is due to the poor condition/decline of buildings on the site. It must be noted that with the demolition of the Showcase Cinema, the area will be losing a local landmark.

OPPORTUNITIES & CONSTRAINTS



OPPORTUNITIES:
1. Take inspiration from surrounding regeneration and provide link between them
2. Main roads surrounding the site make the site strategically placed
3. Improve north-south route (Scarcroft Rd) that connects Hyde Rd to Kirkmanshulme Ln
4. Opportunity to provide link between Gorton and Annie Lees Park
5. Belle Vue Station beside site provides rail connections to city centre and Peak District
6. Site lies between both Gorton and Longsight District Centres
7. Lack of buildings on site will ease it's redevelopment

CONSTRAINTS:
1. Site has poor permeability
2. Main roads surrounding site prove significant barrier to pedestrian movement
3. Inactive/poor quality retail frontage facing the site
4. Railway line proves significant barrier to pedestrian/vehicular movement



JOSEPH GREENHALGH
Gorton, Manchester

ANITA COLLINS
Manchester Ship Canal

Masterplan

LUCY CHESTER
Salford Quays, Manchester

MASTERPLAN DESIGN a b c d e f g h

Office Building
As the surrounding area is a large number of residential areas, adding office space to provide a convenient working environment for people. Introduce more people into the site.
Storey Number: 4-6 floors

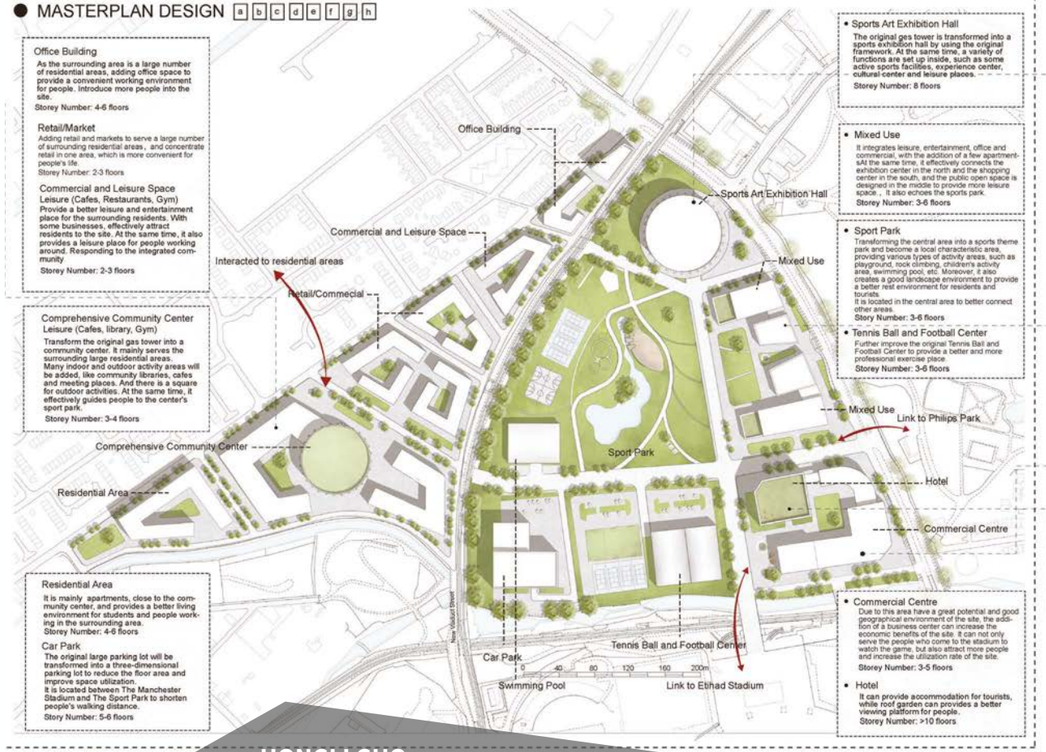
Retail/Market
Adding retail and markets to serve a large number of surrounding residential areas , and concentrate retail in one area, which is more convenient for people's life.
Storey Number: 2-3 floors

Commercial and Leisure Space
Leisure (Cafes, Restaurants, Gym)
Provide a better leisure and entertainment place for the surrounding residents. With some businesses, effectively attract residents to the site. At the same time, it also provides a leisure place for people working around. Responding to the integrated community
Storey Number: 2-3 floors

Comprehensive Community Center
Leisure (Cafes, library, Gym)
Transform the original gas tower into a community center. It mainly serves the surrounding large residential areas. Many indoor and outdoor activity areas will be added, like community libraries, cafes and meeting places. And there is a square for outdoor activities. At the same time, it effectively guides people to the center's sport park.
Storey Number: 3-4 floors

Residential Area
It is mainly apartments, close to the community center, and provides a better living environment for students and people working in the surrounding area.
Storey Number: 4-6 floors

Car Park
The original large parking lot will be transformed into a three-dimensional parking lot to reduce the floor area and improve space utilization.
It is located between The Manchester Stadium and The Sport Park to shorten people's walking distance.
Story Number: 5-6 floors



Sports Art Exhibition Hall
The original ges tower is transformed into a sports exhibition hall by using the original framework. At the same time, a variety of functions are set up inside, such as some active sports facilities, experience center, cultural center and leisure places.
Storey Number: 8 floors

Mixed Use
It integrates leisure, entertainment, office and commercial, with the addition of a few apartments.At the same time, it effectively connects the exhibition center in the north and the shopping center in the south, and the public open space is designed in the middle to provide more leisure space. , It also echoes the sports park.
Storey Number: 3-6 floors

Sport Park
Transforming the central area into a sports theme park and become a local characteristic area, providing various types of activity areas, such as playground, rock climbing, children's activity area, swimming pool, etc. Moreover, it also creates a good landscape environment to provide a better rest environment for residents and tourists.
It is located in the central area to better connect other areas.
Story Number: 3-6 floors

Tennis Ball and Football Center
Further improve the original Tennis Ball and Football Center to provide a better and more professional exercise place.
Storey Number: 3-6 floors

Commercial Centre
Due to this area have a great potential and good geographical environment of the site, the addition of a business center can increase the economic benefits of the site. It can not only serve the people who come to the stadium to watch the game, but also attract more people and increase the utilization rate of the site.
Storey Number: 3-5 floors

Hotel
It can provide accommodation for tourists, while roof garden can provides a better viewing platform for people.
Storey Number: >10 floors

Sports Art Exhibition Hall
By using the original ges tower frame, the sports exhibition hall with steel structure frame is reconstructed, and some sports related entertainment facilities are set inside

Mixed Use

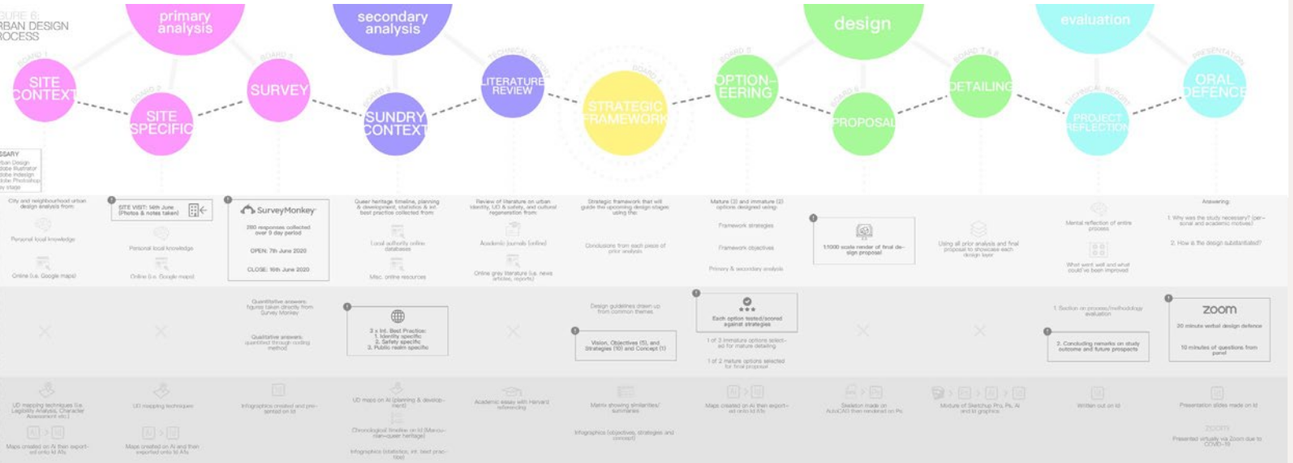
It mainly includes business, office and leisure entertainment. And it combines public space to guide people to the sports park. Some roofs are designed as open spaces to provide people with a better viewing platform for relaxation.

Attract people, it can better guide and connect Manchester Stadium and Sport Park.

Commercial Centre

The high-rise hotel
The high-rise hotel viewing platform can not only provide people with rest and entertainment, but also can watch Manchester stadium and sports theme park, providing a great view.

HONGLI GUO
Salford Quays, Manchester



DESIGN DISSERTATIONS

Design dissertations are focused design projects based on a research-theme. Students identify their site and theme independently.

Design dissertations are presented across 8 A1 Boards; a 3000 word Technical Report; 3D physical model of the final proposal; and a final design defence presentation / crit.

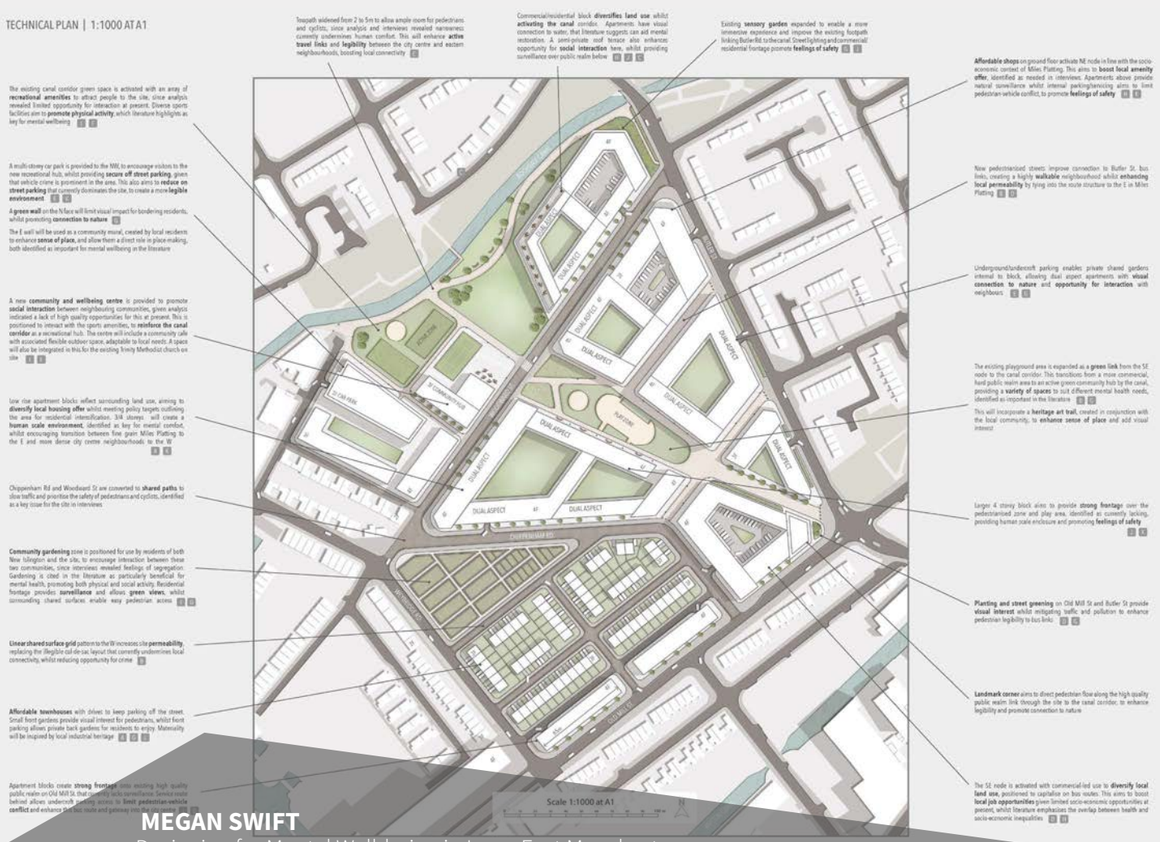
This is the culmination of a full year-long Master's programme and tests the students ability to independently complete a full in-depth design project to the highest standard. They are supported throughout by specialist design supervisors within a studio setting.

Each design supervisor brings a different skill-set to allow students to consult with a variety of professionals including academics and practitioners.

Each Yearbook entry is for illustrative purposes only as only selected graphics/images from the full design proposal submission could be showcased.

DISSERTATION LEAD
Dr Philip Black

DISSERTATION TUTORS
Dr Razieh Zandieh
Dr Taki Eddin Sonbli
Mr Robert Phillips
Ms Lindsay Whitley
Mr Mark Graham
Ms Amanda Briggs



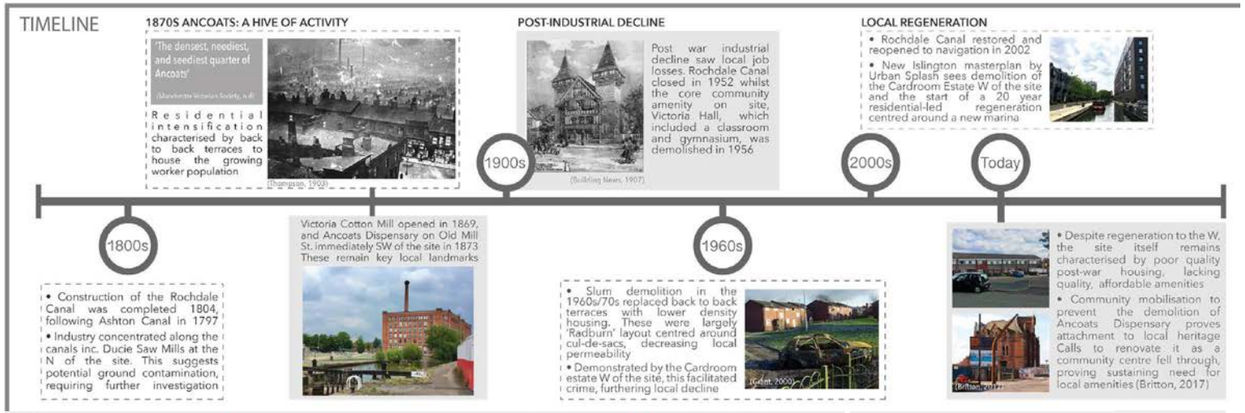
MEGAN SWIFT
Designing for Mental Well-being in Inner East Manchester

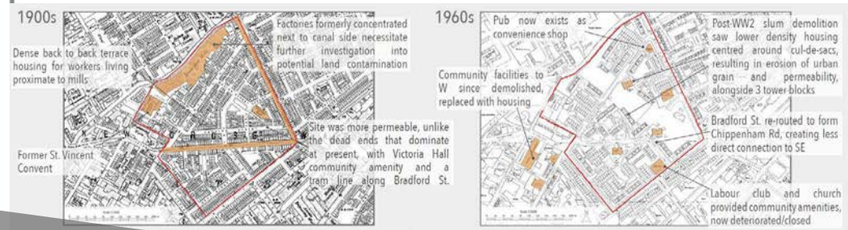
Designing for Mental Well-being in Inner East Manchester (Nominated for LDA Award)

Supervisor: Dr. Philip Black

Manchester's mental health service usage is nearly twice the national average, indicating the need for interventions that promote well-being. This dissertation aimed to regenerate a site within the highest health deprivation area in Manchester focusing on mental well-being-led design interventions.

LOCAL HERITAGE



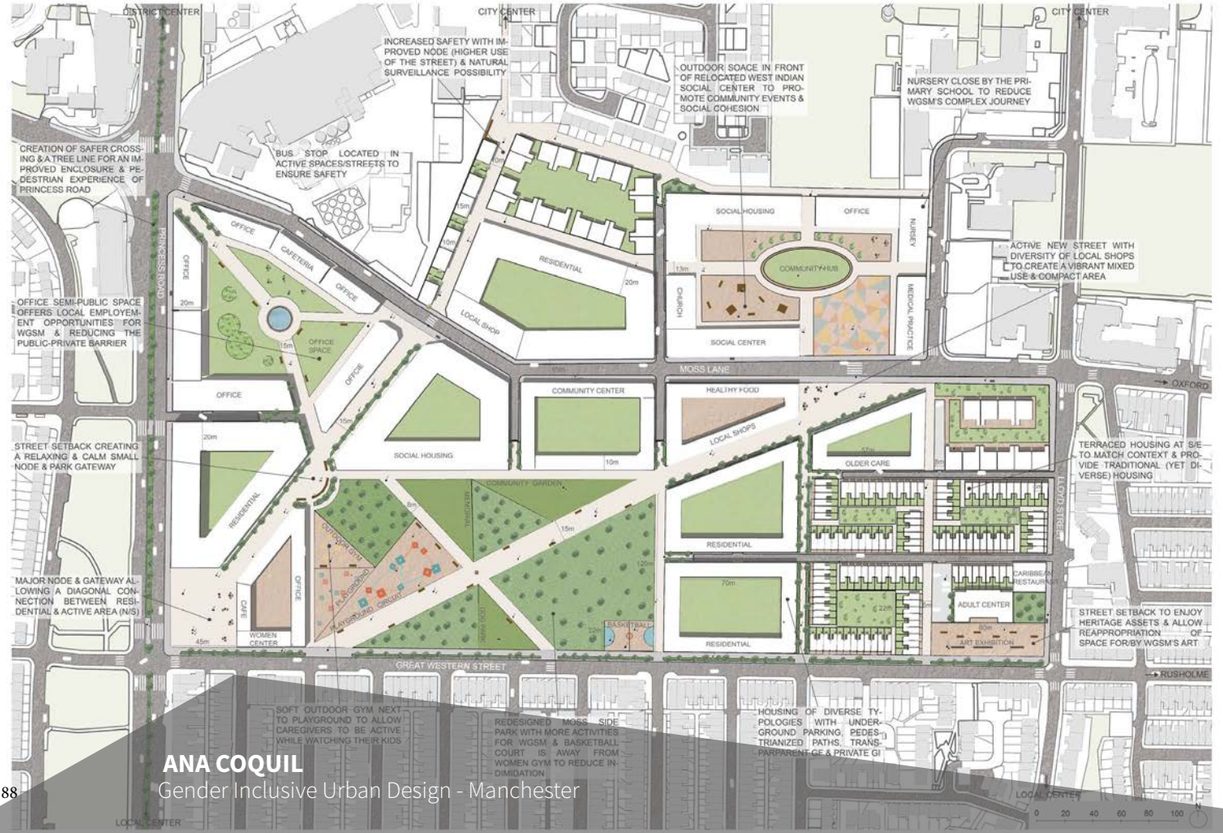


- Historically part of Ancoats, an industrial working class area, site density intensified in the C19th with industrialisation. Subsequently, post-WW2 industrial decline and slum clearance saw the urban grain eroded and permeability reduced
- Though no listed buildings on the site itself, there are many characterful Grade II listed industrial mills in close proximity such as Victoria and Brunswick Mill, alongside Ancoats Dispensary, key to local heritage and providing local landmarks
- Though W of the site has been subject to regeneration, the site itself remains in decline, lacking high quality community amenities

Designing for Dementia (Nominated for LDA Award)
Supervisor: Dr. Philip Black

This study sought to interrogate the potential urban design holds in creating places which empower those with dementia. With a focus on the cognitively impaired, the project underpinning aimed to demonstrate how contextually sensitive, considered and robust urban design principles can create inclusive spaces, suitable for all stakeholders.

The final design proposal was about making the built environment as functional as possible, addressing the challenges for dementia sufferers such as legibility, orientation and accessibility. The result was a project that balanced quality urban design place-making principles and more focused dementia principles.

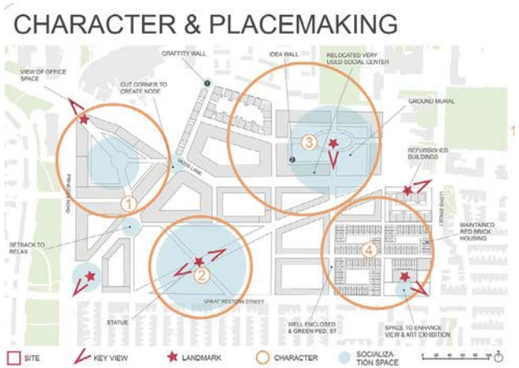


ANA COQUIL
Gender Inclusive Urban Design - Manchester

Gender Inclusive Urban Design (Nominated for LDA Award)
Supervisor: Dr. Razieh Zandieh

A dissertation that aimed to provide quality gender-inclusive urban space in the Moss Side district of Manchester, UK.

CHARACTER & PLACEMAKING



1 GRAFFITY WALL
- Best practice example
- Participation of WGSM
- Versatile & creates vibrancy in space

Women on walls (2013)

2 IDEA SIGN
- Wall to write & collect ideas on possible change
- Allows WGSM to write down their issues
- Cheap & easy method

Author's own

OTHER GENDER-LED DETAILS

O'Donnell (2019)

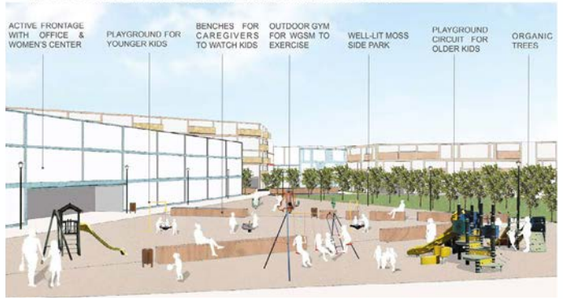
FEMALE STREET
- Implemented in Aspern
- Name street after women to raise awarness about gender issues

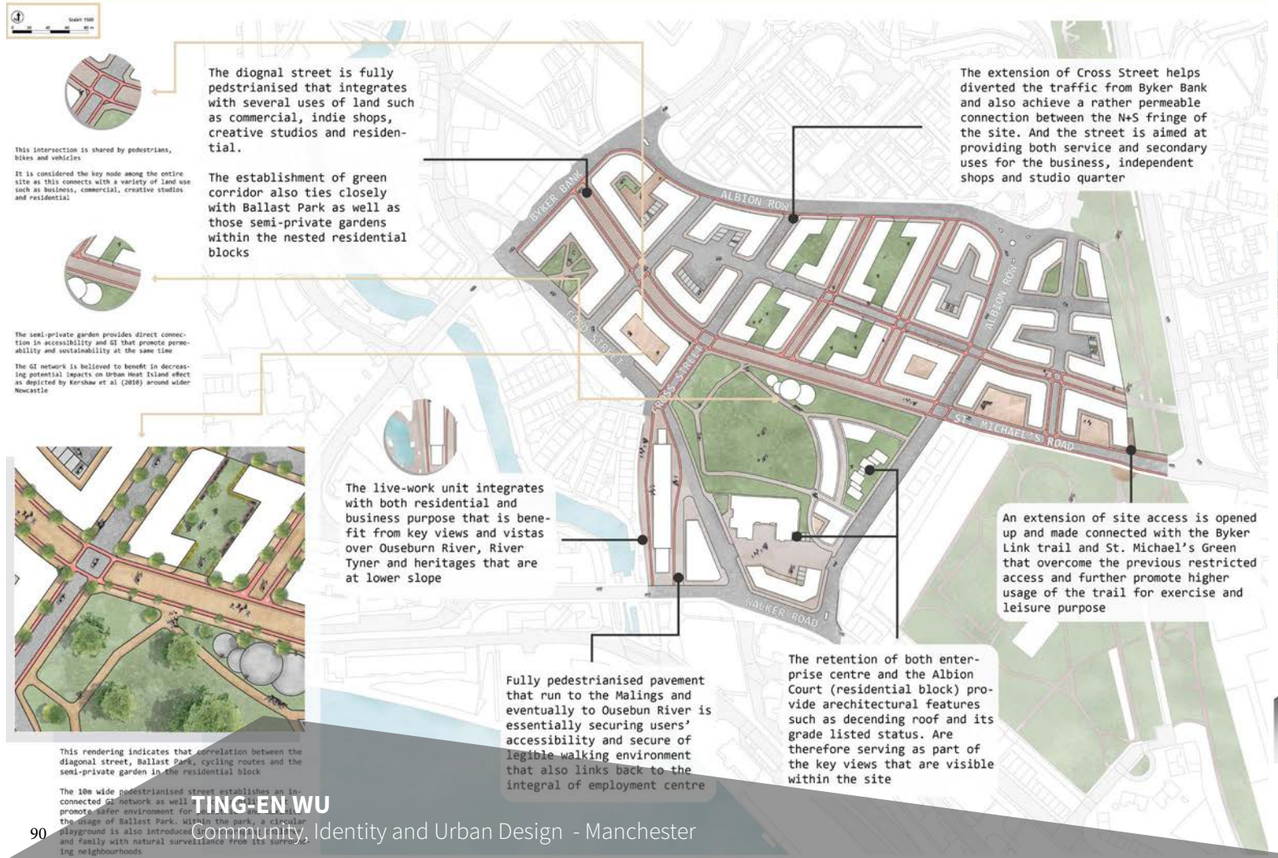
Bournemouth Borough Council (2013)

TACTILE PAVING
- Used at crossing to indicate road
- Slope helps with prams, elderly & disabled

- Community hub is a versitale place, responding to a range of needs (seating, drink, socialize, etc)
- Ground mural (done by community) brings vibrancy, & works as transition / meeting space.
- Natural surveillance in community hub to promote safe social interaction & cohesion

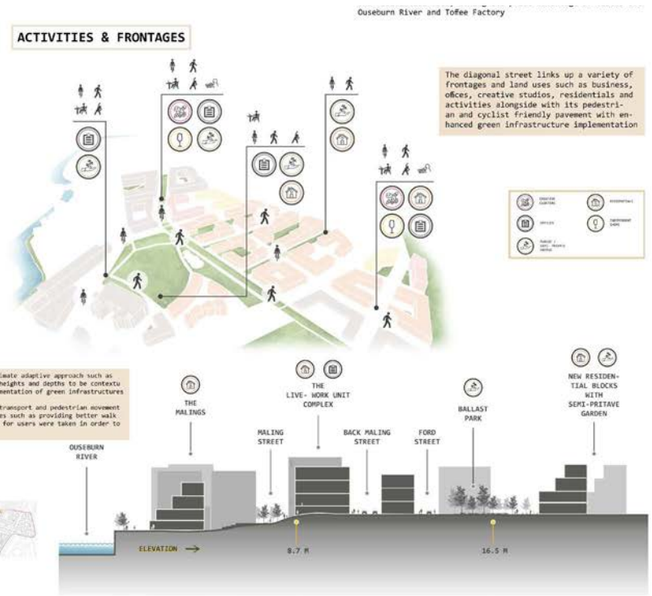
2 MOSS SIDE PARK RECREATIONAL GROUND

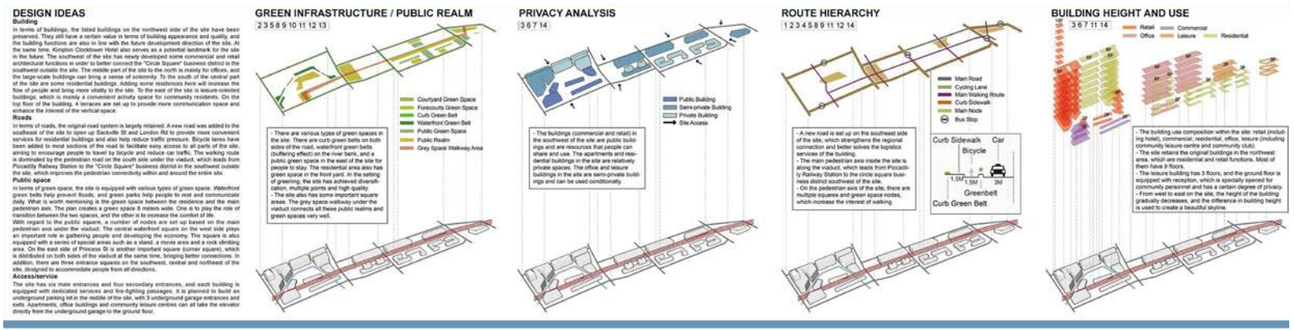


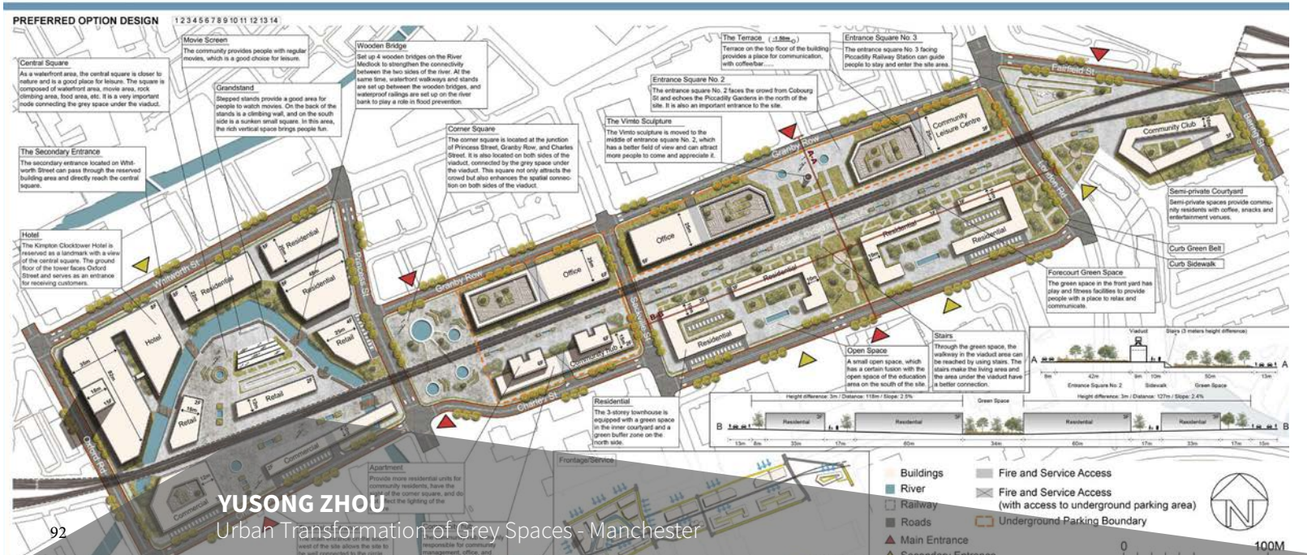


The Byker Regeneration Scheme - A catalyst of Co-Exist Sustainable and Inclusive Neighbourhood (Nominated for LDA Award)

Supervisor: Mr Bob Phillips







YUSONG ZHOU
Urban Transformation of Grey Spaces - Manchester

Urban Transformation of "Grey Spaces": Regeneration of the Manchester Railway Viaduct Area

Supervisor: Dr. Razieh Zandieh

Grey space (under the viaduct)
The regeneration of the grey space under the viaduct needs to be developed in coordination with the surrounding environment. Within the site range, starting from the direction of Piccadilly Railway Station, number the grey spaces under the viaduct, all the way to Oxford Road on the west side of the site, a total of 48 grey spaces worth considering.
The boundaries are London Rd, Sackville St, Princess St and Oxford Rd. From No. 1 to No. 5, mainly retail stores. From No. 5 to No. 25, there are functions such as cultural exchange area, leisure landscape area, old object replacement area and office area. From No. 25 to No. 37, it is mainly based on some sports areas, play areas, and entertainment areas. Combined with the corner square in the middle of the site, it is one of the most important leisure nodes of the entire site. From No. 37 to No. 48, there are mainly some retail spaces based on the central square to the west of the site to coordinate the economic development of the region. Through the functional regeneration of the grey space under these viaducts, combined with the redesign of the surroundings, the site is once again full of vitality. Combined with the "Circle Square" business district in the southwest outside the site, the development prospect of the site is bright.


No.31-34 Play area


No.20-24 Office


No.17-19 The old thing swap area


No.5 Passage


No.39-43 Retail


No.31-34 Play area


No.27-30 Sports area

No.38 River area
(Add some billboards)
No.39-43 Retail
(Add some restaurants, supermarkets, souvenir shops, etc)
No.44 Passage
(Add some display windows)
No.45-47 Storage area
(For the surrounding commerce and retail, provide a temporary shared goods storage area, which is conducive to the turnover of goods)
No.48 River area
(Add some billboards)

No.16 Sight corridor area
(Near the sculpture)
No.17-19 The old thing swap area
(Strengthen social communication between neighbors)
No.20-24 Office
(Provide some office space, and people can obtain temporary use rights through application)
No.25 Passage
(Add some display windows)
No.26 Bicycle parking hub area
(Safe parking spot)
No.27-30 Sports-related facilities area
(Football, basketball, table tennis, etc)
No.31-34 Play area
(Amusement facilities, climbing, skateboard, cave barbecue, etc)
No.35-36 Stage performance area
(To provide people with a stage display area where they can share their talents with others, which is a good opportunity to promote communication)
No.37 Passage
(Add some billboards)

No.1 Passage
(Add some billboards)
No.2 Retail
(Coffee\flower etc)
No.3 Passage
(Add some display windows)
No.4 Retail
(Supermarket)
No.5 Passage
(Add some billboards and shops)
No.6-12 Cultural exchange area
(Football culture, urban history, folk culture, etc)
No.13-15 Leisure landscape area
(Green plant area, light and shadow fountain, etc)

Image Source (2020.08.05)
https://www.japaholic.com/cn/article/27375
https://www.enanyang.my
http://www.nlarchitects.nl/slideshow/82/

LEGEND:

1. Stadium expansion and redevelopment: corners reinforced to improve the interaction with the public realm.
2. Stadium Approach: a wide, enclosed and pedestrianised street utilising the stadium as a vista.
3. On-site green spaces: these are additions to the local GI network that provide a place for rest and help tackle climate-related problems.
4. The pedestrianised area and the space along Elland Rd largely functions as a mixed-use destination, with a strong retail and leisure component that provides extensive active frontage.
5. Recreational hub: an indoor sports centre and outdoor football and tennis courts compliment the existing ice rink in order to provide recreational opportunities for the local population.
6. The Old Peacock Pub: this popular pub remains on Elland Rd as it is an important establishment for locals, both on event days and non-event days.
7. Low quality mixed-use and residential buildings along Elland Rd replaced with buildings with better urban design qualities and a higher amenity value.
8. Conference facility replaced with a hotel and conference centre.
9. Multi-storey car park functions as a Park & Ride on non-event days and visitor parking for event days.
10. Tunnelled motorway allows the integration of Holbeck, Beeston and Beeston Hill and improved permeability through the site and surrounding areas.
11. Continuation of inclusive and affordable terraced housing served by a network of shared streets.
12. Extension of affordable back-to-back housing in order to connect to Elland Rd.
13. Elland Road is transformed into an active, safe and legible shared street.
14. Re-routed vehicular route takes the traffic strain away from the key pedestrian movement routes along Elland Rd.
15. Connection established with the nearby business park, allowing the commercial activity to be relocated along the new vehicular route.
16. Retained ice rink with added active frontage.

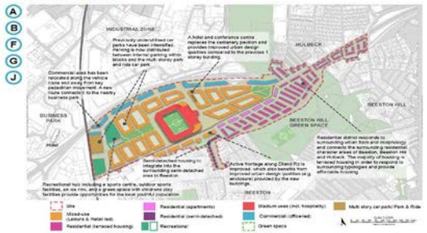
STRATEGY ASSESSMENT:

1. F
2. E F I
3. H
4. A F
5. J
6. F
7. F
8.
9.
10. C
11. B
12. B
13. E F
14. C
15. C
16.

JAMES WALLEY
Sports Stadia Urban Design - Leeds

LAND USE

A B F G J



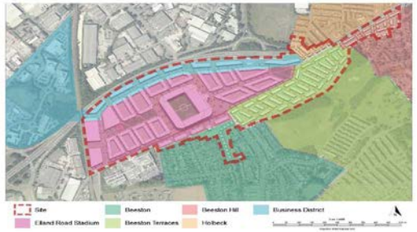
- The pedestrianised zone around the stadium has been intensified to create a mixed-use destination, including a strong recreation component to the west.
- The commercial zone has been relocated in order to be integrated with the business park, whilst the tunnelled motorway allows the integration of the residential area with surrounding residential character areas.

BUILDING HEIGHTS

F I

- Building heights gradually raise towards the stadium, transitioning from the surrounding 2-3 storey residential areas and 2-4 storey commercial areas to the 8 storey raised corners that provide enclosure with the football stadium and associated routines.
- Corners are strategically raised in places to encourage movement between key public spaces.

CHARACTER AREAS



- Existing character areas have been enhanced and integrated to create a more effective urban environment.

Sports Stadia Urban Design: Elland Road, Leeds

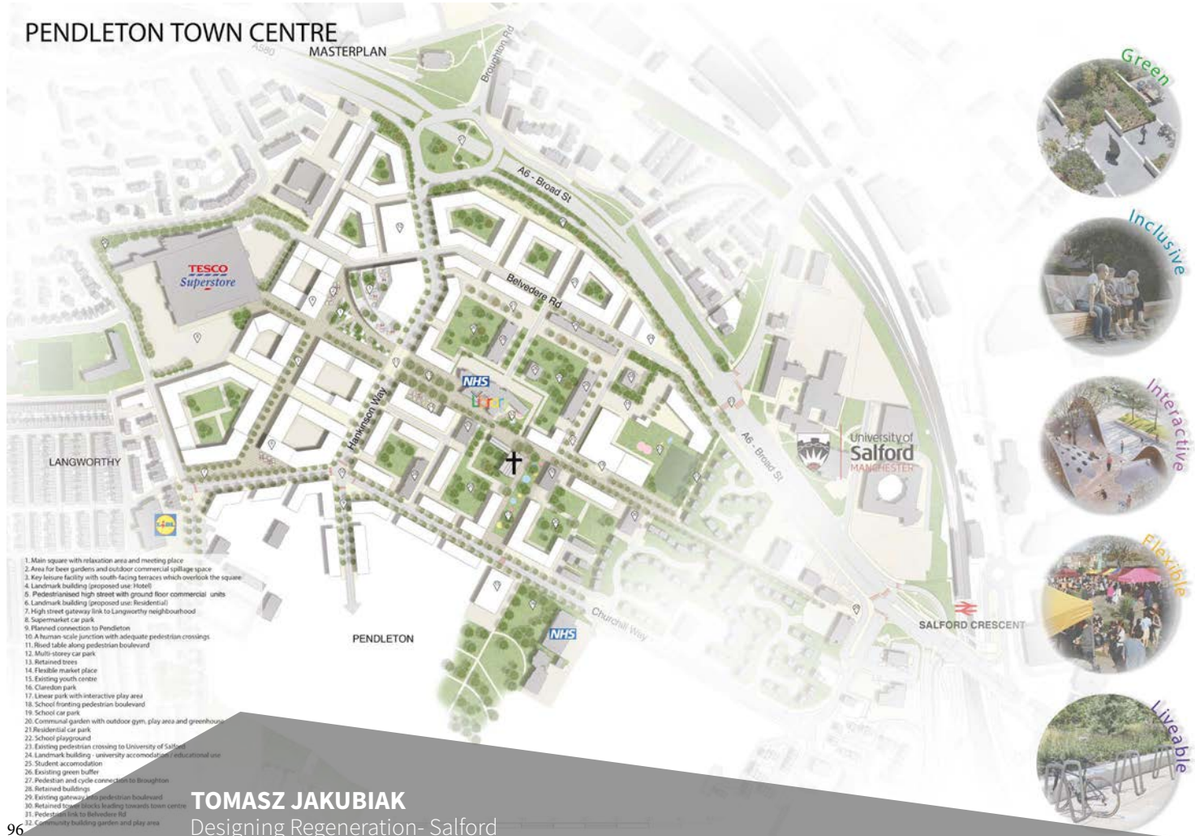
Supervisor: Mrs. Lindsay Whitley

This design dissertation explores the urban design of sports stadia sites, specifically producing a final masterplan for the site of Elland Road, Home to football club Leeds United. It is a unique urban design challenge as it requires interventions to be highly versatile and adapt to different situations as stadia areas must provide high quality space for thousands of visiting people on event/match days, yet also work for local communities on non-match days.

POLICY

Inferences for future development of Elland Road:

- Development should **create jobs** for the local people through **mixed-use development**, helping to reduce poverty and unemployment claimant rates in Beeston and Holbeck.
- Development should make Elland Road a **cultural attraction** that promotes Leeds and Yorkshire. This can be achieved through generating a **strong sense of place**.
- Use of **sustainable transport**, such as buses and cycling, should be encouraged.
- Sustainable infrastructure should be encouraged, such as GI.
- Development should be **accessible by the elderly and disabled**.
- Development should be **walkable**, to promote health and wellbeing.
- Development should be **community focused** and have a **positive benefit on local children**.



TOMASZ JAKUBIAK
Designing Regeneration- Salford

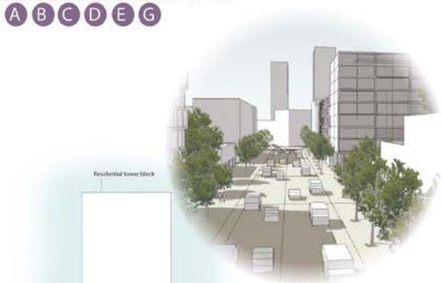
Repairing Modernism: A Design-Led Approach to Regeneration

Supervisor: Mrs. Lindsay Whitley

Exploring the potential of design-led regeneration in a post-war modernist town centre, Pendleton, by proposing a masterplan informed by key urban design theories such as safety, liveability vitality of urban spaces, and place-making.

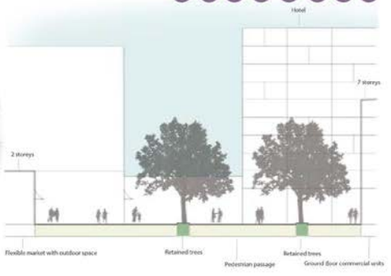
CROSS-SECTION AA: HANKINSON WAY

A B C D E G



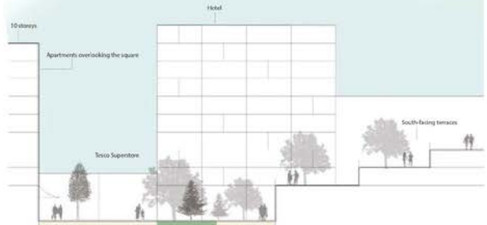
CROSS-SECTION BB: BROADWALK

A B C D E F G H



CROSS-SECTION CC: MAIN SQUARE

A B C D E F G H



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URBAN DESIGN | LAB

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