

Revitalised Intersections, VOL. 1

By YP Mudaly

Introduction

01.

General to micro strategies and issues contained in the Durban Port



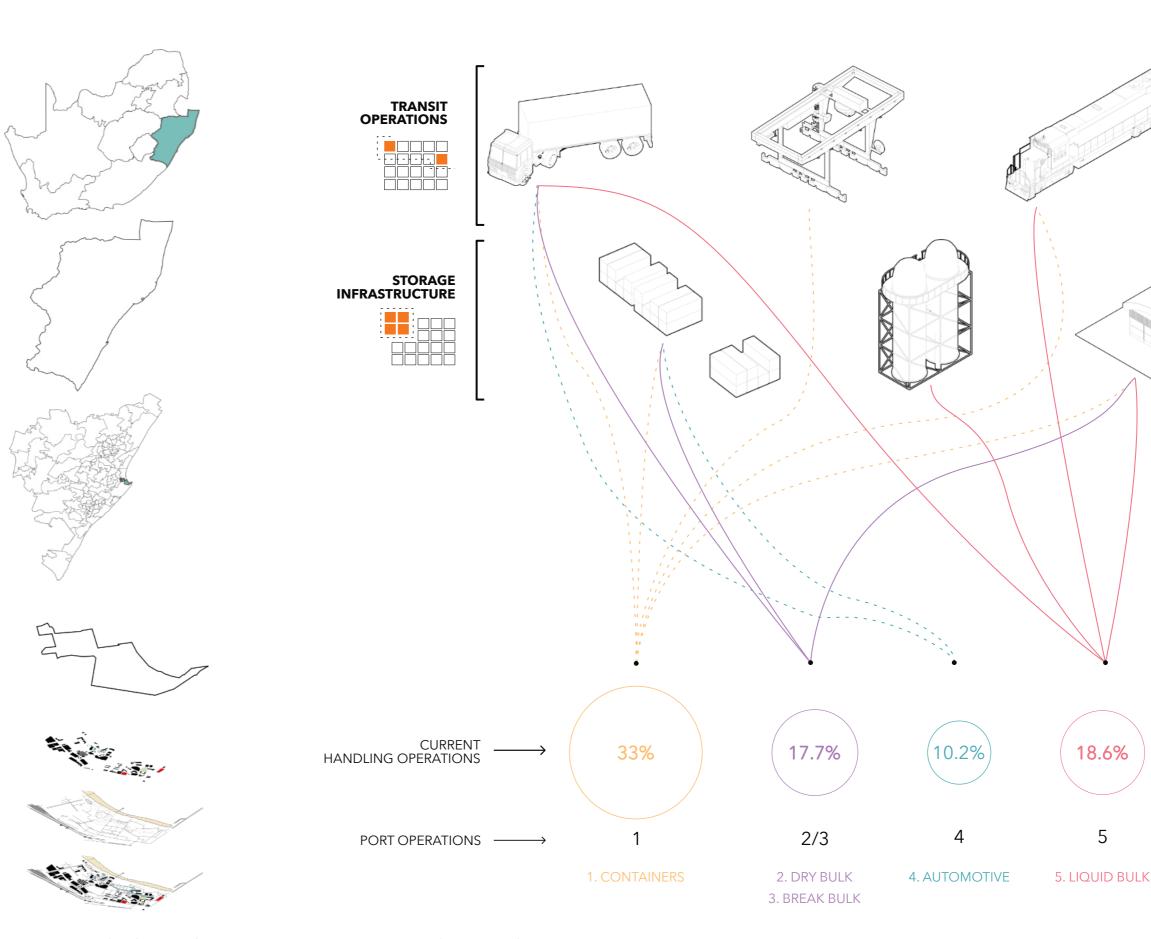
In a reading of contextual sites of enterprise and historical significance, the narrative of most post modern harbours are described as outdated places that are frequently desolate or heavily industrialised (Davis 2014). Many harbours are now disassociated from cities they used to breathe life into and from this perspective through the lens of inefficiency and misaligned planning one sees the demise of the port and greater context.

General Breakdown

Maritime operations in Durban's port are degrading (Rodrigue, Cooper and Merk 2014: 44) due to capacity constraints and the relocation of many programmes to Richards Bay and the southern basin new port dugout (Tnpa 2019). Internationally, the issue of inefficiency has come about from a combination of changing market circumstances being the globalisation of trade and greater participation of China (Dray et al. 2006: 32-22). This operational mentality is negative because as much as it negates the need to upgrade infrastructure to facilitate programme - the acceleration in cargo volumes of which is container handing and bulk capacity becomes overwhelmed. However, a further reading on the development of port-cities by Cheung and Yip (2011) assert that the impact of deindustrialising urban nodes post 1980 decentralised many activities away from the fringe of the harbour mouth to the hinterland, forcing the port to lose its identity and create brownfield sites.

1.1.2. Potential of Brownfield Sites

Brownfield sites offer developmental potential in socio-cultural and recreational programme to facilitate a boost in 'absent' space that aid in identity restructuring. This rebranding of port identity offers up the potential of examining abandoned brownfield port district nodes, revitalising them back to public use through comprehensive strategies of regeneration (Dündar et al. 2014). The author Ryan Centner enterprises that the priority becomes "a more narrow environmental sustainability alongside sociopolitical participation and economic competitiveness, which lead to the fragmented projection of conflicting landscapes" (Centner 2009: 2).



Macro to Micro map analysis diagram (Author 2021)

Fig. ii. Port operational management diagram pertaining to Durban Harbour and scale of operations (Author 2021)

1.1%

7. [MSC]

2.1%

6. SBM

1.2. Urban Issue : Misalignment of planning

Historically, the nature of a waterfront/portcity has always been identified as a prominent economic interface to the greater reaches the city. They not only act as the economic centres for many water bordered cities but also act as important civic quarters for activity from the central points of the city. Port-cities not only allocate programme which facilitate economic sustainability but are a vital urban quarter which holds sociocultural success in many sectors of the zoned site. This organisation of private operational space to public co-operative space is a key denominator in the development/operation of the context, however, it may cause spatial or commercial conflict where the roles and responsibilities of parties involve overlap and do not

1.2.1. General Breakdown

Due to the accelerated growth, Durban's port is a major hub in Africa for container traffic and commercial passenger threshold so a major redesign of infrastructure to widen the port and improve programme is necessary. They are the object of comprehensive planning without yielded success, despite TNPA (Transnet 2019) and eThekweni (Mkhize 2016) making local area plans, they isolate each other in conflict of interest and disagreement of land parcel allocation.

Durban port being a historically significant seaport, from its genesis in docking in a

coincide (Dündar et al. 2014: 4).

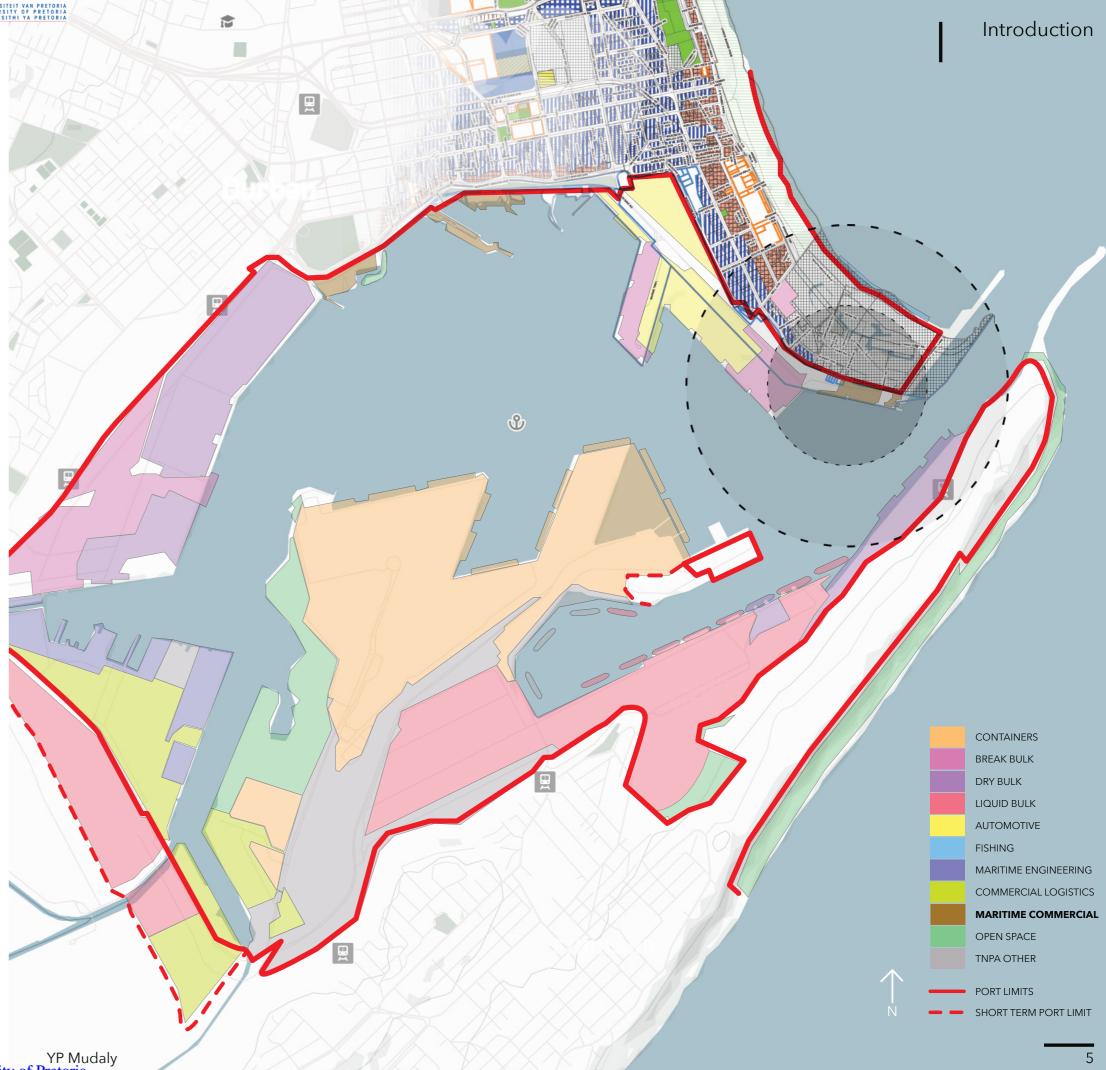
The main author of 'New Faces of Harbour Cities' Şebnem Dündar (2014: 3) contributes to the position stipulating the importance of the waterfronts and its unique urban quality by stating that "developing port cities have increasingly become the most important element of the world economy, parallel to the development of international trade through the neoliberal free market and industrialisation". This position advances the rhetoric that because of their distinctive identity in the urban context, waterfront hold important transit nodes, urban development or civic genii loci that set them apart from other cities world confirmed by Peter Bosselman's book Adaptations of the

lagoon to its larger expansion, has been an integral part of its international heritage, identity and continuity to the success of the export/import industry in South Africa. Performance of the port is integral for bringing life into the city from operational programme spilling out into commercially viable space which has urban characteristics of threshold and recreation. Investigations on the attitude of space in its proximities and the form of the harbour basin become principle informants to aid the researcher in the approach of the problem.

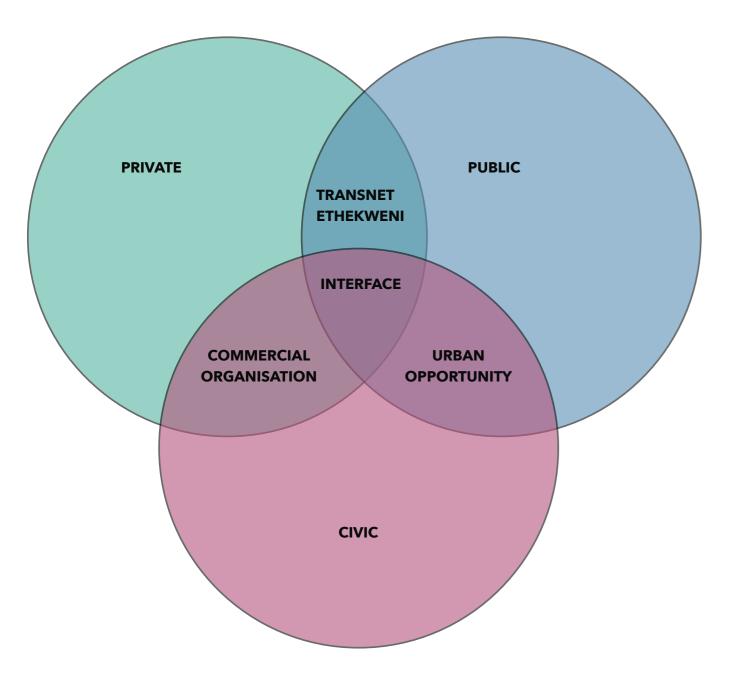
Metropolitan Landscape in Delta Regions (Bosselmann 2018).

From the analysis of typical harbour spaces the main urban issue assessed the critical intersection of the waterfront which lies between the working port and the city as seen in fig. 1 showcasing the Durban Point Waterfront. The area rationalises the circulation of organised sites and public quarters in between operational space where edge conditions and linkages draw in synergies from surrounding areas. By outlining the discontinuity between the city and its waterfront edge, functions such as scale and sensibilities to development are introduced and superimposed onto existing contexts.

Fig. iii. Urban framework map outlining current handing of port import/export and colour coded locality. (Author 2021, Mapbox 2021)

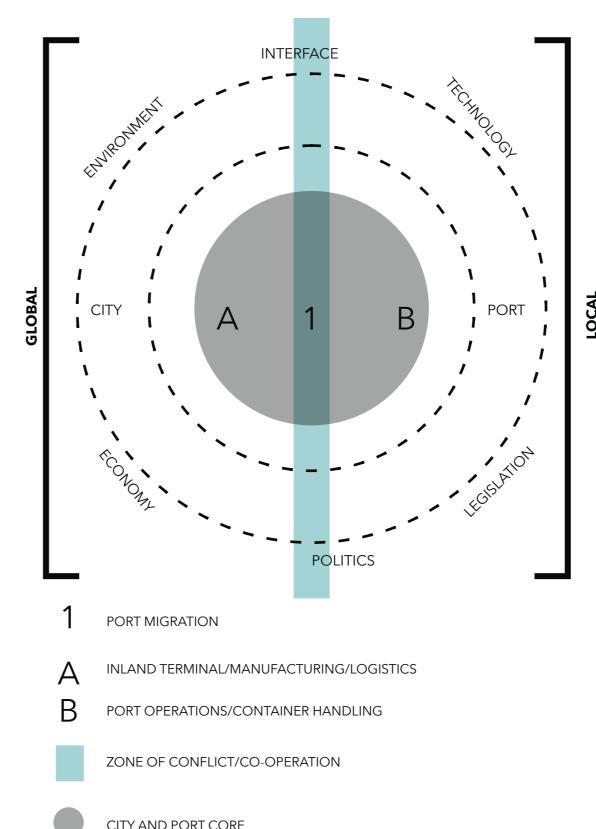


Introduction Introduction



1.2.2. Neoliberal strategy as an informant to urban planning

Strategies of regeneration situate the port city as comparatively different to those pre-1908's industrialisation as the layout seeks a socio-economic mediation. The level of integration is then the complete separation of port and urban structures complying with simple commercial maritime offerings. Since the 1980's, neoliberalism was adopted as a new model of development for port production of which container ports are the spear head. The junction area of the waterfront has the potential to denote maritime identity and port related industry and services (Pardali 2008).



CITY AND PORT CORE

Diagram of neoliberal interface parties (Author 2021)

Fig. v. New faces of harbour cities adaptation diagram (Dündar et al. 2014)

The logistics link is then broken into the following neoliberal strategies by Pardali (2008: 83):

- Emphasis on effectiveness
- 2. Aim of competitiveness of stakeholders involved in the seaport
- 3. Investment into new production of modern facilities
- 4. Public-private partnership (PPP) investment to develop port capacity maximisation
- 5. Maintaining safety and security through ISPS accreditation which is the main security certificate for a port.

Backing the research, the author (Dündar et al.) suggests that the port can then operate as a domain for entrepreneurial/national activity inclusive of new facilitation of programme in the harbour interface. Further progression in port competitiveness is achieved through the institutional cooperation between the port and city with PPP's, through collaboration efforts (Rodrigue, Cooper and Merk 2014: 10).

1.3. Architectural Issue : deindustrialisation and abandonment

During the periods of 1980-2000+ within the reconstruction stage of development of waterfront cities (Dündar et al. 2014: 6), globalisation requires a change in the functional mode and design of port infrastructure and the re-established link with the city (Hein 2012). From this standard previously allocated land was deindustrialised to make way for new developments which left the previous generation of infrastructure to decay and abandonment. The issue here lies the notion that because the new development was more hinterland the observable edge of site lost its identity and strength, desolating the space as non place (Tulsiram et al. 2007).

1.3.1. General Breakdown

Compared to other port cities such as Rotterdam, Shanghai, Buenos Aires and San Francisco, Durban was identified as the least integrated in its relation to the water edge and mediation of ground typologies from the working port threshold back to the city. Durban port does not make use of any urban port strategies relative as described in the theoretical framework mentioned in the 'Guide-of-Good Practice' document authored by the AIVP 'worldwide network of port cities' (Aivp 2015: 9-132):

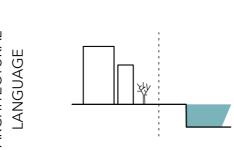
- I. Spatial organisation (13-69)
- 2. Environmental challenges (75-97)
- 3. Economic market strategies (103-114)
- 4. Governance and policy adaptation (117-126)



Durban Point Waterfront







1.4. Research Methodology Problem Statement

Fractures between the city of Durban's enclave into Point Waterfront and the working harbour controlled by the TNPA have created landscapes of heavily outdated places which sit desolate or abandoned. This dissertation aims to focus on the interface of the ports heavily industrialised past through its infrastructure and attempt to catalyse the area to tie the working port back to the city.

1.4.1. Research Question

How do we architecturally, or urbanistically reconnect the diminishing Durban port back to the city in order to create a resilient portcity identity that Durban lacks?

1.4.2. Detailed additional research questions

Further questions were authored by Olaf Merk (2014: 23) - a ports and shipping administrator. In a document published by the eThekweni Municipality, Merk determined that there were further challenges posed as questions:

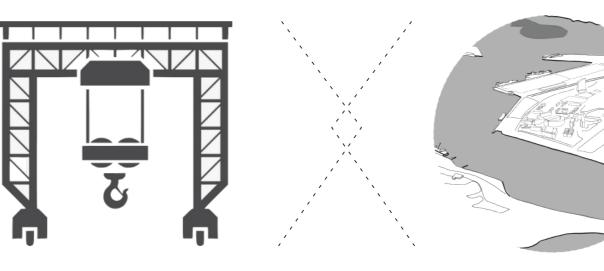
- i. How can the use of neoliberal theory align the economies of the city to the port model to catalyse a resurgence in development and agency?
- ii. How one is able to align global markets to local market ideologies (Municipality 2014: 23) [sic] through the use of neoliberal strategies?
- iii. How one is able to align private interest to public interest through space making and infrastructure?

1.4.3. Research objectives

The structure of the dissertation set into the following objectives in order to determine and break down information. Sectors regarding contextual, functional issues as well as technological issues were investigated.

The objectives were:

- i. To evaluate the efficiency of the port as well as the types of port operations occupied by each land sector and zone of the port in accordance with programme and use;
- ii. To explore the necessity and the reasoning for the expansion of the port and the impact a long term phasing may have on the identity of Durban's port structure; and
- iii. To collect and interpret opinions about whether the current port city typologies are comparatively better or worse to international port city typologies.



PORT OPERATION

PORT-CITY IDENTITY

Fig. vii. Co-operation between port handling and identity diagram (Author 2021)

Fig. vi. Durban point waterfront diagram (Author 2021)

For the Dissertation March (Prof) YP Mudaly
© University of Pretoria



Logistics and its frameworks are crucial to economies of both local and national governments which facilitate business operations of its citizens. Efficient systems are necessary for the global chain link management of these developments

Durban port is a handling facility for such trade and with the current operational conditions, there is a drive to revamp the existing area to deal with the facilitation of trade on the global markets

1.5. Literature and data collection

The aim of the dissertation is to address a contextual and spatial problem regarding the disassociation between the city and the relation to the harbour mouth within the Point Waterfront and analyse the sites infrastructure which sits on the Transnet boundary formally known as Mahatma Gandhi Road (Transnet 2008). These contextual problems are the consequence of port inefficiency relating to operations, programme, socio-cultural activity and governance of the port-city interface. The clarification of the research will be combined through a more qualitative lens established by selection of interviews where groups of representatives from stakeholders in the project address questions posed by the researcher.

As a response to research, a qualitative approach was used in order to get an indepth analysis of data; through interviews and appropriate literature. There was a reflection on operational v theoretical research which underpinned and assessed assumptions of the past, the current and future development of port-cities and the neoliberal implication/assistance.

An interpretivist paradigm analysed the research through the scope of governance and the smart port-city theory within the methodology. The scope of governance

examined the existing dualities of ownership and conflict by stakeholders involved in the project, namely TNPA (Transnet 2019) and eThekweni (Mkhize 2016), the existing interface between land parcels and the exploration of a future collaboration to mediate a solution which satisfies both the roles and responsibilities of parties involved that may serve both economic requirements. The other lens is the smart port-city ideology which was a consequence of the AIVP (Aivp 2015: 9-132) and further writings by the following authors on port-city theory.

1.5.1. Research Theory

i) (Dyer 2014) addressed the necessity of the port expansion and its implication on adjacent land parcels.

ii) (Iyer 2012) consolidated the back of port infrastructure movement and the potential for what the existing Durban Point Waterfront harbour site could become.

iii) (Flynn 1991) explains the requirement of temporal continuity in open space and this takes a turn on the evaluation of the Durban Point Waterfront site.

iv) (Meurs 2012) the main urban precedent of Rotterdam.

v) (Dündar et al. 2014) Harbour city theoretical stance on space and contextual change.

vi) (Hoyle 2000) global and local assumptions on port cities.

vii) (DiedrichDahl and Babette 2020) transformation of port city theory.

viii) (CollerMaasdorp and Mavundla 2007) a deep analysis of Durban's Maritime industry.

The methodology informed the research and set up basic design principles to introduce current and future discourses on the subject of harbour development. The relevance of this research-lead-design was to sustain a common narrative existing in the condition of port development and critically scrutinise it so it may present itself as more efficient, urbanely inclusive and address the research question.

Fig. viii. Diagram of Durban Port (Author 2021)

CBD

VETCH'S PIER

VICTORIA EMBANKMENT

POINT WATERFRONT

FRUIT TERMINAL AT POINT

CARGO AND VEHICLE TERMINAL AT POINT

SALISBURY IŞLAND

Introduction

Introduction



1.6. Data collection structure

1.6.1. Interviews

In relation to the case study collection as well as relevant theory collected in the research body, there was a requirement by the researcher to collect and interpret opinions of the working port as well as the waterfront through structured interviews. This was done concurrently with the on going theory postulation on harbour theory (Hoyle 2000, Dündar et al. 2014) as well as port city interface readings (Konvitz 1982, Hein 2012, Meurs 2012).

The willing participants who took place in the study were chosen based off the underlying issue of disassociated planning and cooperation from the two main parties involved in the port; the Transnet National Port Authority (2019) and the eThekweni Municipality (2016) whom have not as of yet updated their local area plan and site vision for the city of Durban's Point Waterfront.

The participants were the following individuals:

I. Captain Justin Adams (2021): represents the TNPA and manages the handling of the working port with its various standard operating procedures and regulations. (Mpuku 2018)

II. Mr Kiran Parthab (2021): represents the Transnet Urban Planning sector

1.6.2. On site data collection

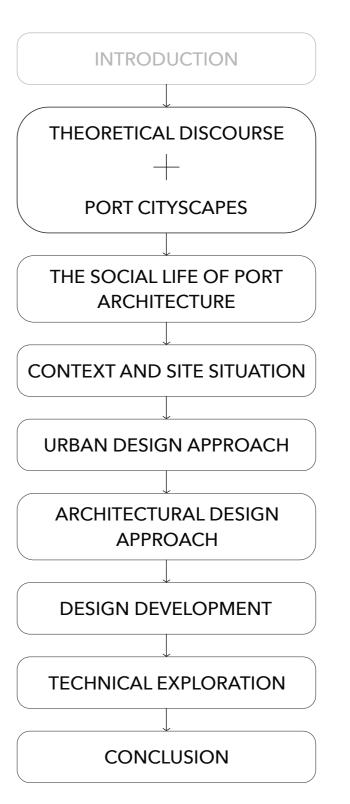
The site acted as an active study and presented itself through active observation, distinguishing how the harbour functioned daily and how the intersection between city and port was handled. This approach was utilised to gain a deeper comprehension of the complex operations the architecture surrounding the port has on the logistical events that define such spaces. This took the form of note taking, site diagrammatic investigation as well as photographs. Furthermore, ancillary data was collected in tangent with the site observations such as planning urban vision documents, journals, books and statistical information.

1.7. Delimitations and assumptions

The dissertation focused on a particular characteristic of the Durban Point Waterfront and its urban conditions between the working port and the Mahatma Gandhi Road threshold. Portions of the work could be implemented in real world development such as the urban development framework and theory.

As the Harbour is privately owned by the Transnet National Port Authority access to the water edge was strictly forbidden and access to the site through the year became difficult as the new cruise terminal for MSC was erected opposite the site. It is acknowledged that these disruptions and developments primarily affected the observations recorded during the area site visits.

1.8. Roadmap



Mrs Mridulekha Allopi (2021):

represents strategic planning for the city of

IV. Mr Nathan Iyer (2021):

development firm IYER who worked on the

The structure of the interview was set into

determine and break down information.

Sectors regarding contextual, functional

issues as well as technological issues were

the following objectives in order to

Representative of private urban

Durban Point Waterfront

eThekweni.

asked.

Introduction

