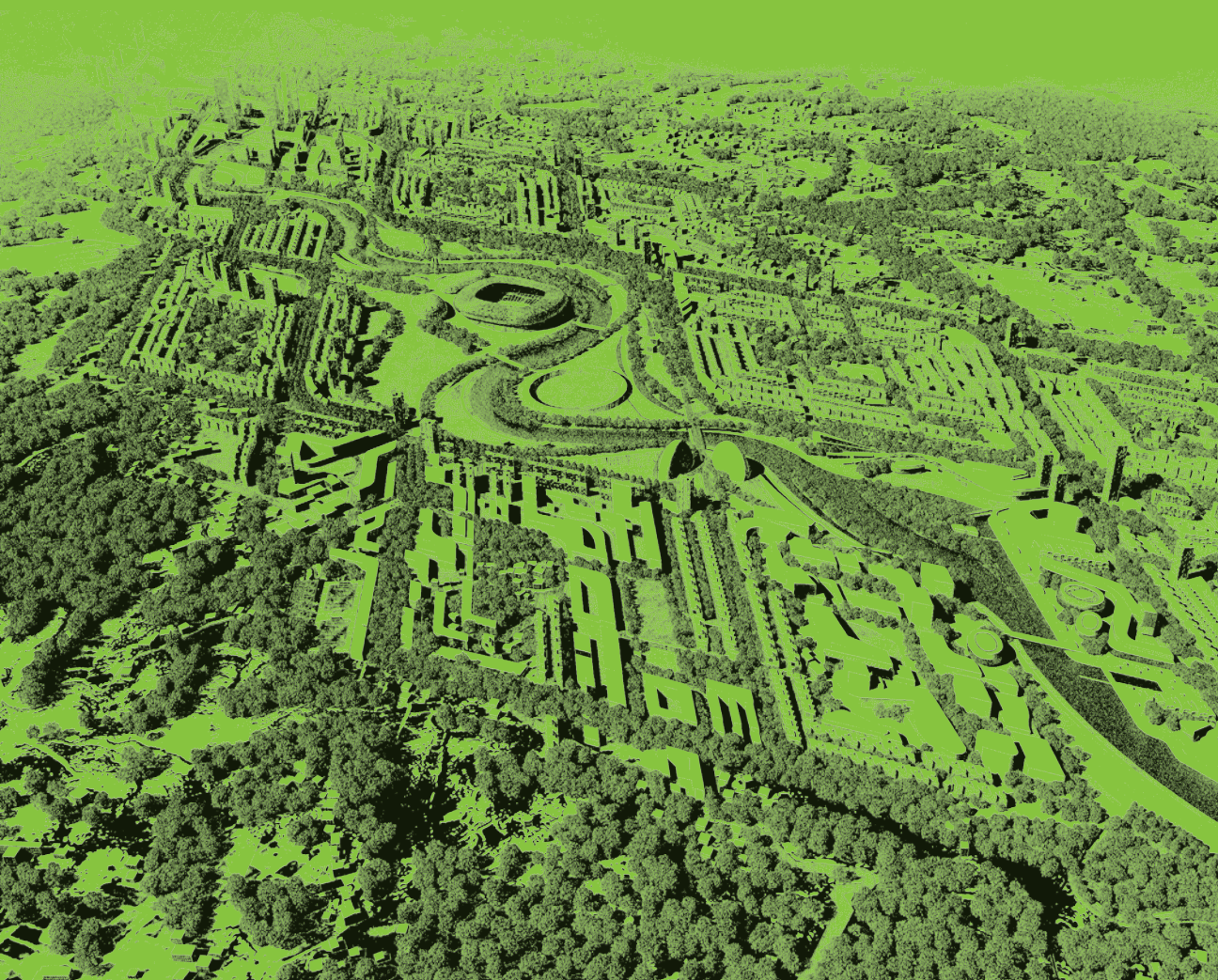
MAP

MASTER PLANNING



is a collective of creative minds who believe that "Design" has the power to make a better world. Our work bridges dichotomies: Utopian yet functional; Iconic yet integrated; unconventional yet practical; and bold yet implementable. We are more than "problem solvers", we create new possibilities.

Our Work

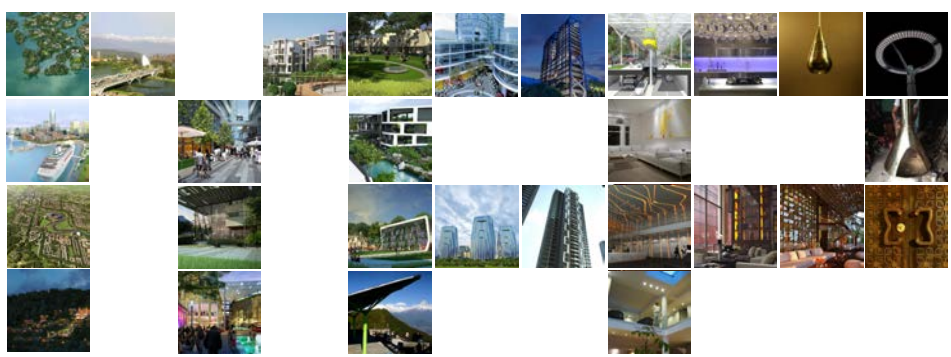
Transcends Typologies and Scales

MAP is engaged in a wide variety of projects at many scales that encompass product design, interior design, individual buildings, urban centers, design of new communities and regional planning. Our work goes beyond 'architecture' in the conventional sense to include the design of the built environment in its totality. We address the public environment – transportation, parks and open spaces; and everyday public places that are easily taken for granted, but whose design has a real impacts on the way that we live, work and play.

MASTER PLANNING

ARCHITECTURE

PRODUCT DESIGN



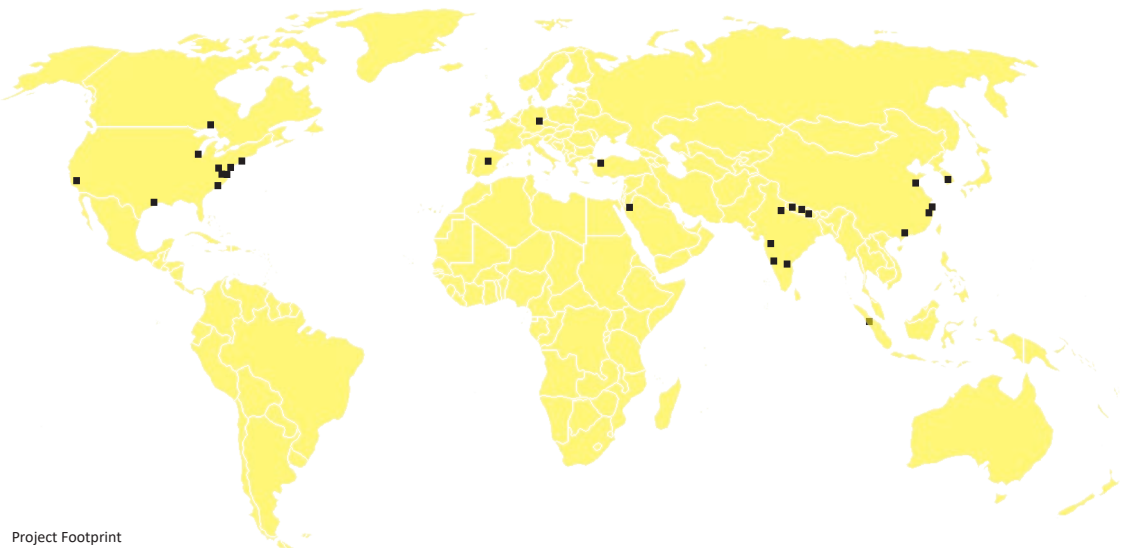
LANDSCAPE DESIGN

INTERIOR DESIGN

A Global Experience
with Local Sensibilities

Our planning projects are spread across the world in the US, Brazil, Germany, Spain, India, Nepal, Jordon, Kingdom of Saudi Arabia and Vietnam. Diversity in work - both in terms of locational context and project typology – is key to the creativity and technical depth of our practice. We aspire to collaborate in diverse economies and cultures, creating opportunities to cross-pollinate ideas and spark innovation. International best practices are as important to our work, as the integration of local heritage and culture.

We are located in four countries, USA, Nepal, India & China. Our Washington DC Studio presides over the entire design and planning process - from Research and Development (R&D) and initiation of concepts, to making decisions that lead up to project implementation. This centralized, decision-making is reinforced with a multi-faceted knowledge base, advanced design infrastructure, and tested design management expertise - all working cohesively to deliver the highest quality of projects.



Project Footprint

Planning Approach
Sense of Place

From the hills of Himalaya, deserts of Arabia, beaches of South America, backwaters of South India to urban quarters of Capitals, the location of our planning projects cover diverse development portfolio covering infrastructure, tourism, and real estate sectors. 'Implementability' while being a prerequisite in all our designs, creating the 'wow' and 'sense of place' are the driving force. This central purpose sets apart all our work: delivering startegies that are distinct and striking. None of our planning projects are similar – they are tailored to the location, economy, climate and culture.

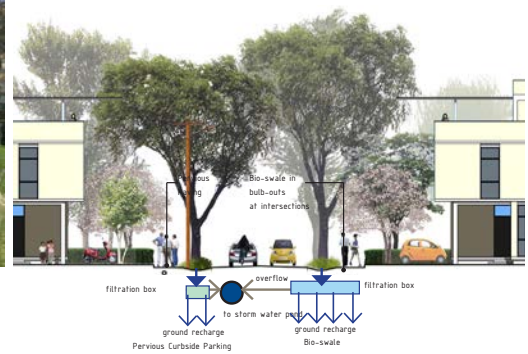
Context Specific Plans
Climate Dependent Master Plans

Our designs are guided by a fundamental belief: Ecologically-progressive solutions are not only affordable, but more economical in the long run, when designed to the local climate.

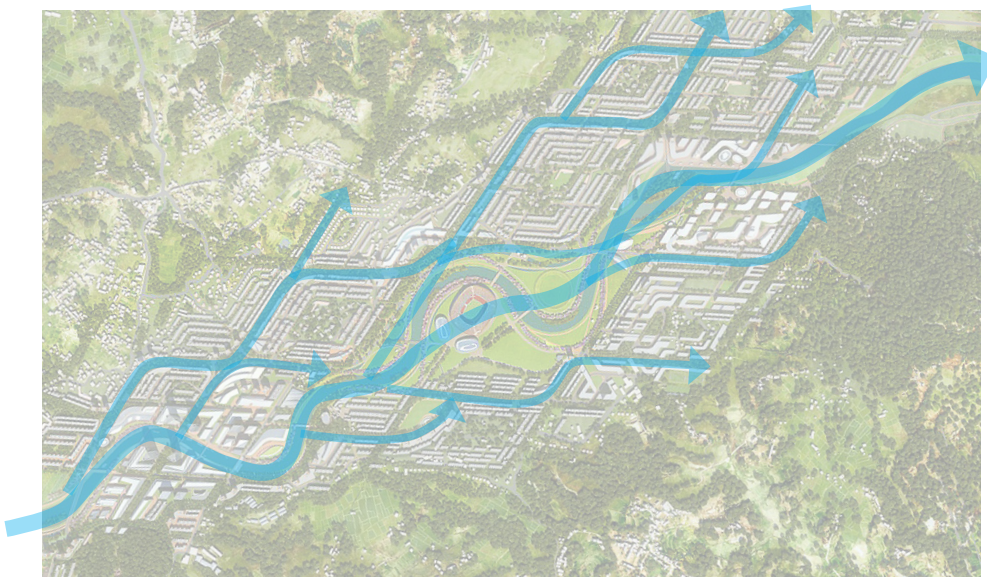
Central to this thesis underlies our spirit of inquiry, challenging preconceptions and testing conventions of 'planning and large-scale design'. The process of 'reinvention' distinguishes all of our work – past and present – and provides a purpose for our future.

Our prerogative is to craft developments that thrive on free, predictable and clean energy sources – sun, wind and rain. The application of advanced modelling and climatic simulations are implicit in our designs. The integration of indigenous landscape and natural features with the built form are equally vital to us in acheiving the overall sustainability and unique character for a project.

Sun: Orchestrating massing to maximize solar orientation



Rain: Using streets and open spaces to capture rain and treat it naturally for reuse



Wind: Devicing a master plan to maximize free flow of summer breeze

NEOM

Kingdom of Saudi Arabia, 2016

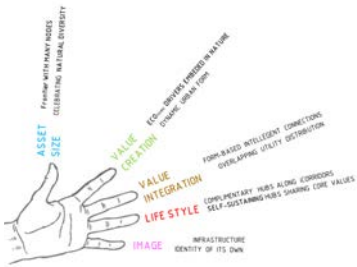
Site area: 6,774,394 Acre

SERVICES
Theming Strategies
Hub Visioning

A region with spectacular array of natural assets – ranging from coral reef, magnificent sand dunes, and oasis valleys to rocky mountains often snowcapped during the winter is – is being transformed into series of "futuristic" hubs that shall catapult the Kingdom of Saudi Arabia (KSA) into a world stage of prominent economic powerhouses.

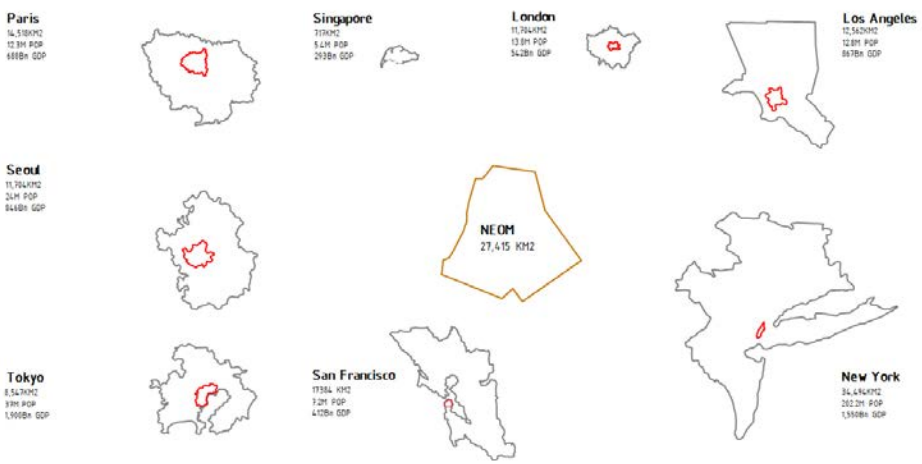
The physical development supporting 7 major economic sectors, with tourism being one of the prominent drivers, are conglomerated in the form of compact hubs that would minimize the disruption of the pristine landscape while preserving and enhancing its unique qualities – geography, climate and heritage (natural and cultural). Looking beyond the existing sustainable paradigms, the strategies identify deployment of future technologies (associated with mobility, energy, farming and water management) to further reduce the environmental footprint while decreasing the capital expenses and operating costs of such an ambitious undertaking. Ten overarching development principles respond to 5 major challenges associated with the initiative:

a. Size and diversity of the site;
b. Value creation (economics);
c. Value integration (infrastructure);
d. Life-style; and
e. Identity

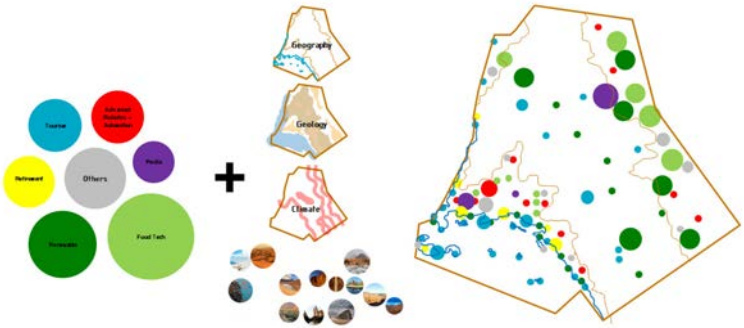


5 Challenges : 10 Theming Strategies

The Site is at a scale of a Region which can fit many centers and hubs



Endowed with diverse ecology, climate, geography and geology



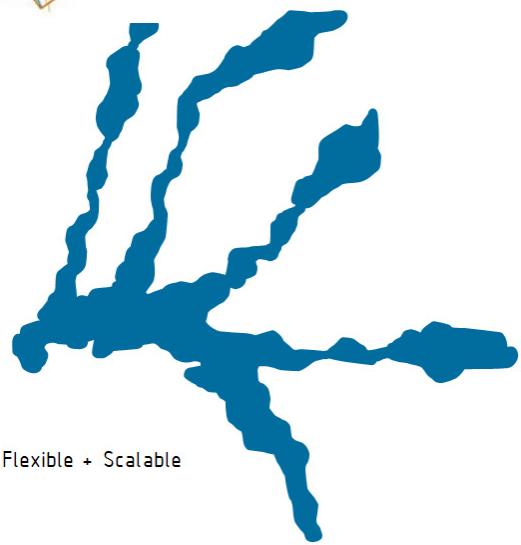
Seven Economic Drivers embeded in Nature

Linear

+

Radial

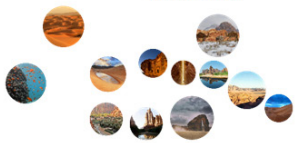
=



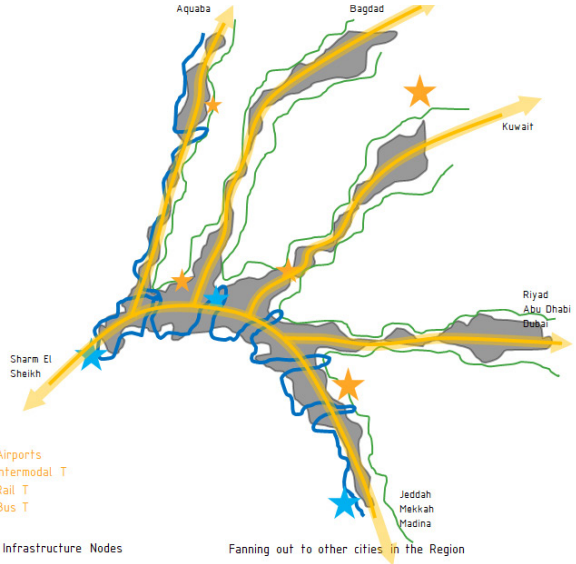
Flexible + Scalable

Combining the efficiency of Linear city form with Flexibility of Riadial form : Resulting in a Dynamic development pattern

Major economic activities and infrastructure to be planned along Intelligent Corridors



Preservation of Environmental + Cultural resources



Canals
Marinas
Ports
Cruiseship

Airports
Intermodal T
Rail T
Bus T

Allows space for Major Infrastructure Nodes

Fanning out to other cities in the Region

COMPACT NODE

Managed to prevent negative impacts on environment and natural resources The boundaries could be physical and or land use driven.

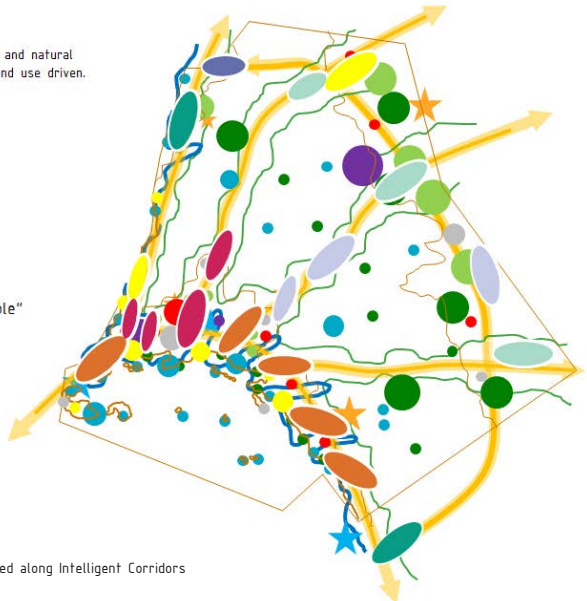
These Hubs could share other attributes

NODES

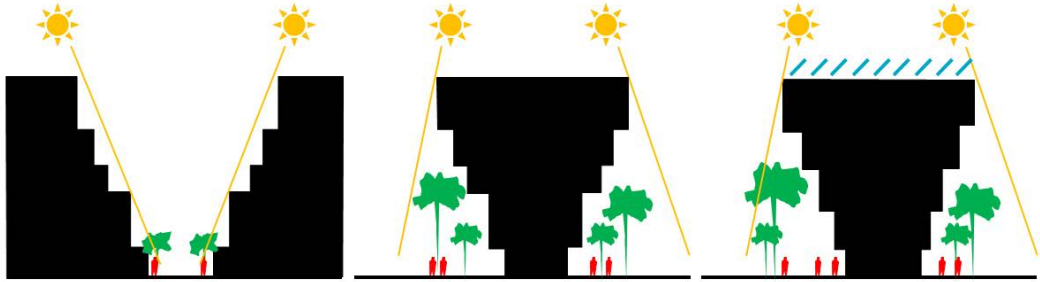
Residential, retail, education, recreation built around or next to economic drivers Along iCorridors

Catering to diverse life styles and economic agendas

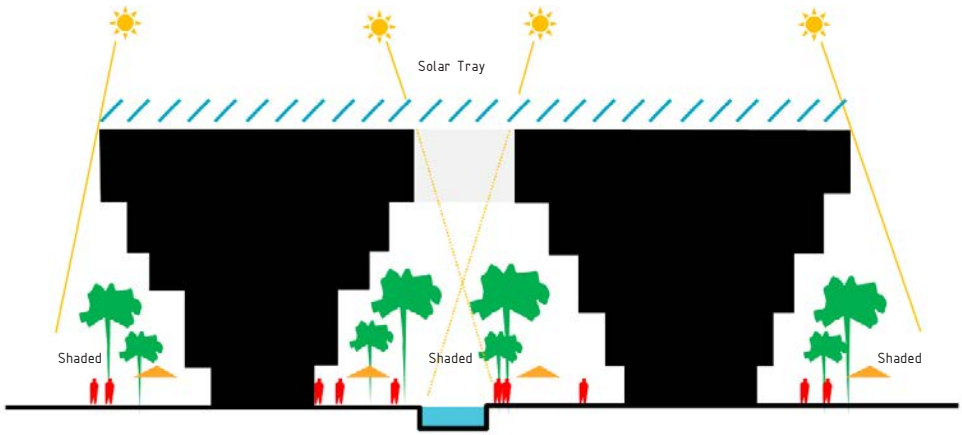
All working together to create a bigger "Whole"

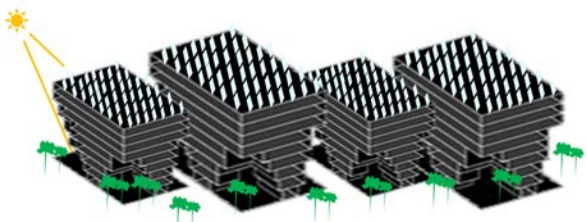


Major economic activities and infrastructure to be planned along Intelligent Corridors



The zoning for the development to respond to the local climate to create a unqiue and suitable urban form that provides shade





Riverse pyramidical form provides more roofspace to be used as solar tray

NEOM

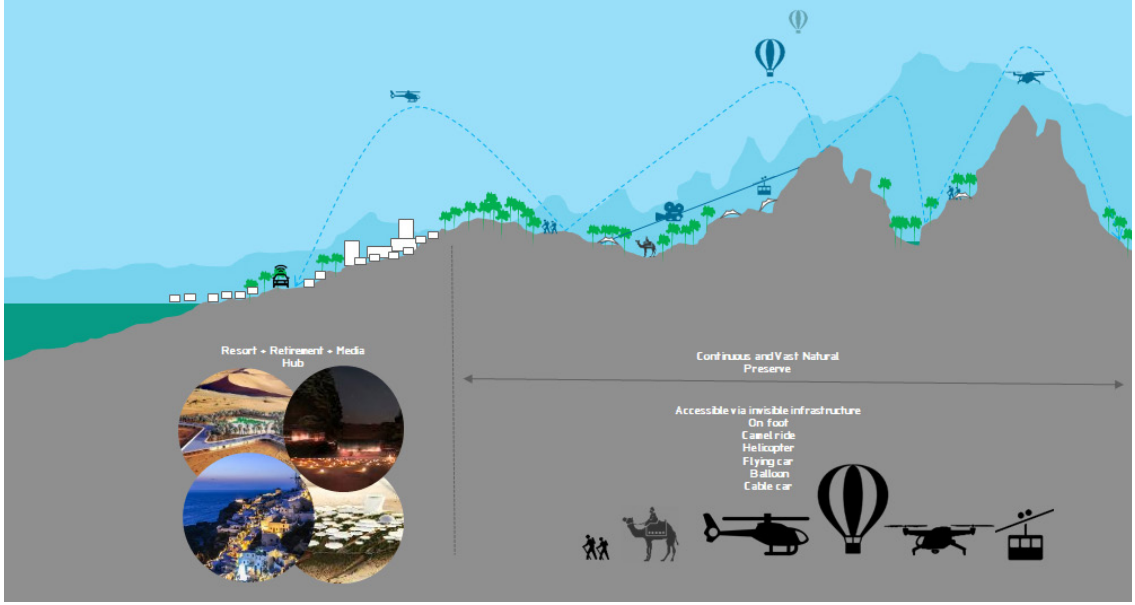
TOURISM + MEDIA HUB STRATEGY

Given the NEOM's natural splendor, tourism and media activities would be one of the prominent economic sectors. With the need to preserve and enhance the landscape, the development pattern refers to compact, vernacular settlements of the region. At the same time, they are envisioned to be built using advanced construction technologies (such as 3D printing the local materials) which would provide an opportunity to create a unique development identity while comfortably nestled in the raw landscape.

Tourism destinations are diverse and dispersed, suggesting the need for low-impact transportation infrastructure that successfully combines modes ranging from medieval period all the way to technologies of the future.

STRATEGY

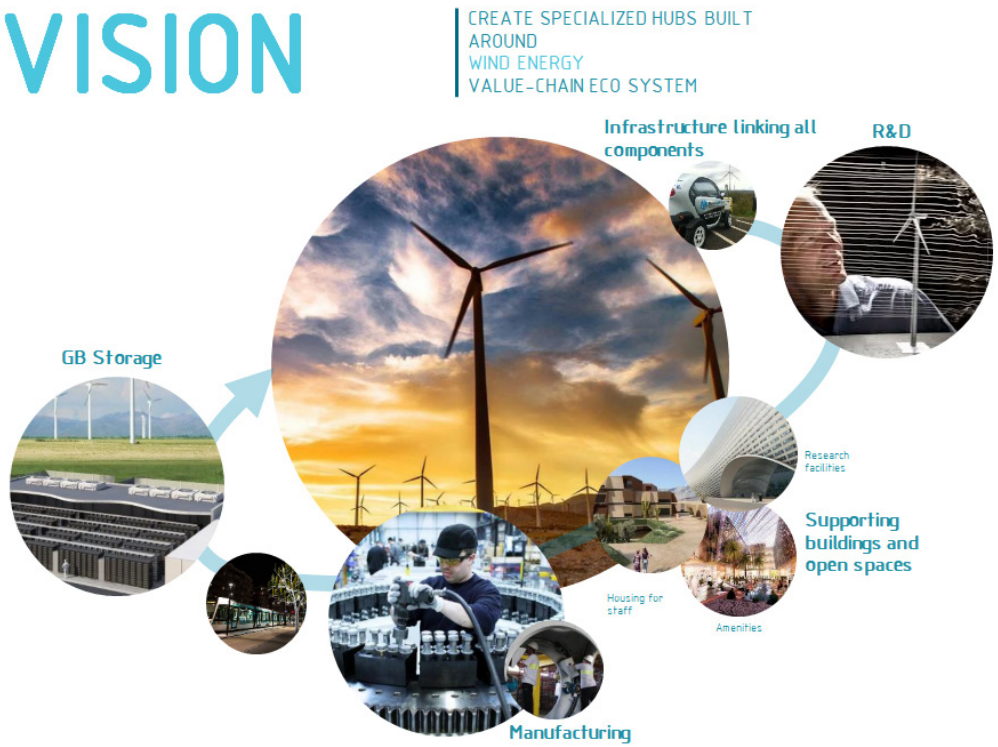
BRING TOGETHER TOURISM + MEDIA TO CREATE COMPELLING **ECONOMIC HUB THAT ALSO HELPS PRESERVE THE LANDSCAPE**



NEOM

WIND FARM HUB STRATEGY

Wind will play an important role in not only providing a clean energy in NEOM, but also in opening a new industry in KSA – vertically integrating Research and Development, Manufacturing, and Distribution into a critical mass big enough to compete in the global arena. To support this critical industry, several hubs shall be created that will attract world-talent, ex-pats along with brightest of the KSA residents. Therefore, the design of the hub would play a big role defining the quality-of-life of the residents. The big idea behind the hub development is to eliminate the distribution line between the wind farm and settlement, and replace it with Gigabyte battery storage structure.

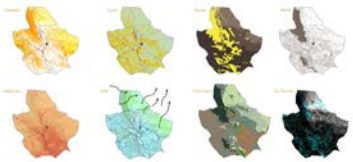


AL ULA TOURSIM DEVELOPMENT

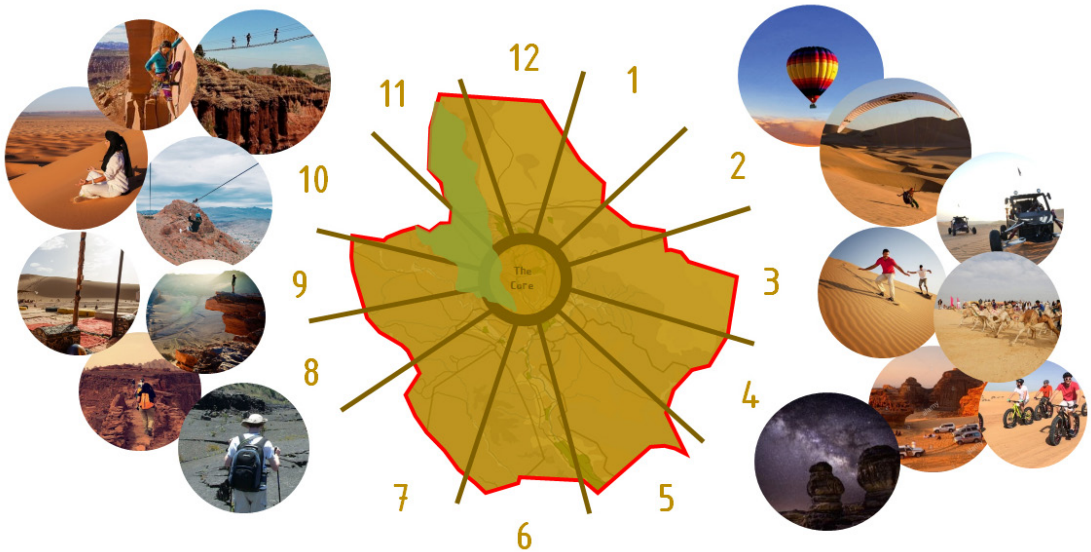
Kingdom of Saudi Arabia, 2018

Site area: 5930530 Acre

SERVICES
Mapping
Zone Theming Strategies
Connectivity Strategies
Toursim Asset Strategies



The 23,301 SQM ancient crossroads of Al'Ulā represents one of the lead initiatives of KSA's Vision 2030. As stated by HH Prince Badr, Governor of the Royal Commission for Al'Ulā, "Al'Ulā is a hidden jewel in north western Saudi Arabia. A historic location that spans millennia, it has evidence of major civilizations dating more than 4,000 years to the first millennium BC, including most notably the Lihyan and the Nabataean kingdoms. Al'Ulā valley is a place of extraordinary human and natural heritage and a natural crossroads and saw bustling commercial centers develop along what became the Incense Route from Southern Arabia. Al'Ulā is a gift to be shared with the world. Inspired by Vision 2030, that provides an opportunity for all, a tolerant country welcoming to everyone,, " MAP has been involved in the feasibility, strategic and financial planning, and tourism development of Al'Ulā.


12
1
2
3
4
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6
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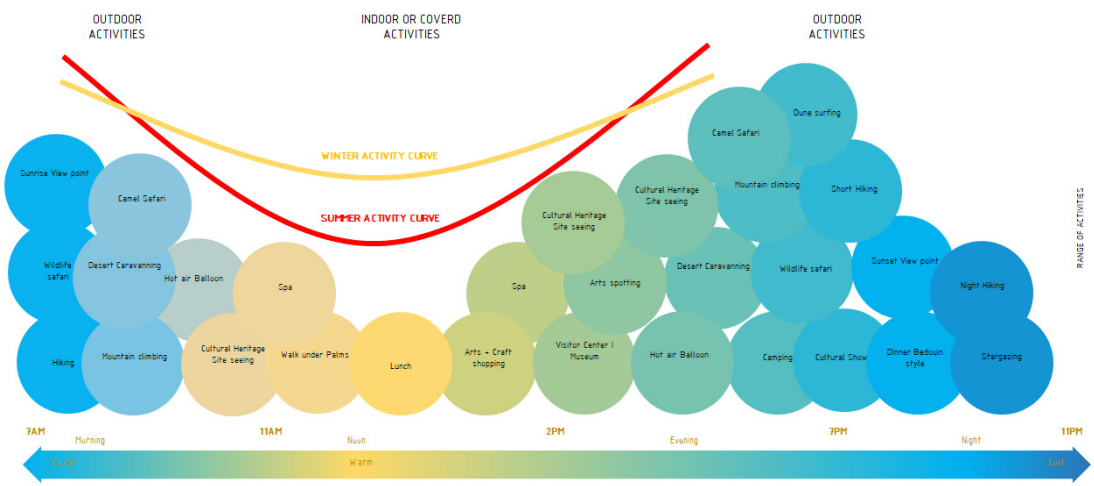
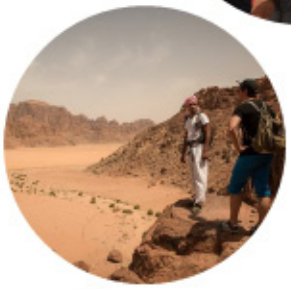
8
9
10
11
The Core


OUTDOOR ACTIVITIES
INDOOR OR COVERD ACTIVITIES
OUTDOOR ACTIVITIES
WINTER ACTIVITY CURVE
SUMMER ACTIVITY CURVE
Sunrise View point
Camel Safari
Wildlife safari
Desert Caravanning
Hot air Balloon
Spa
Hiking
Mountain climbing
Cultural Heritage Site seeing
Walk under Palms
Lunch
Arts + Craft shopping
Cultural Heritage Site seeing
Spa
Arts spotting
Visitor Center I Museum
Hot air Balloon
Camel Safari
Dune surfing
Mountain climbing
Short Hiking
Cultural Heritage Site seeing
Desert Caravanning
Wildlife safari
Sunset View point
Night Hiking
Camping
Cultural Show
Dinner Bedouin style
Stargazing
RANGE OF ACTIVITIES
7AM
Morning
11AM
Noon
2PM
Evening
7PM
Night
11PM
Cooler
Warm
Cool

Mountain Trails

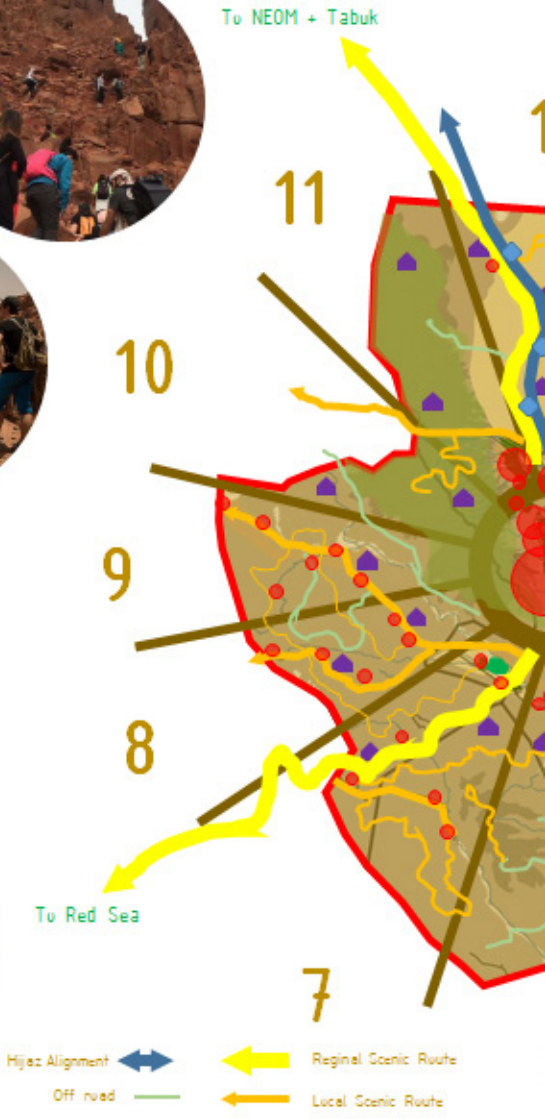
Desert Trails



Skyline Trails

Cliffside Trails

Pedestrian and non-motorized tracks (existing and DMMO recommended) traversing through various terrains, landscapes, heritage sites and local communities



Heritage Trails

Pilgrimage Trails

Oasis Trails

Milky way Trails

12

1

2

To Hail

3

4

5

To Madina

6

New Tourism Assets

Trails

Kathmandu Valley Toursim Development Plan

Kathmandu Valley, Neapl, 2010

Site area: 6,774,394 Acre

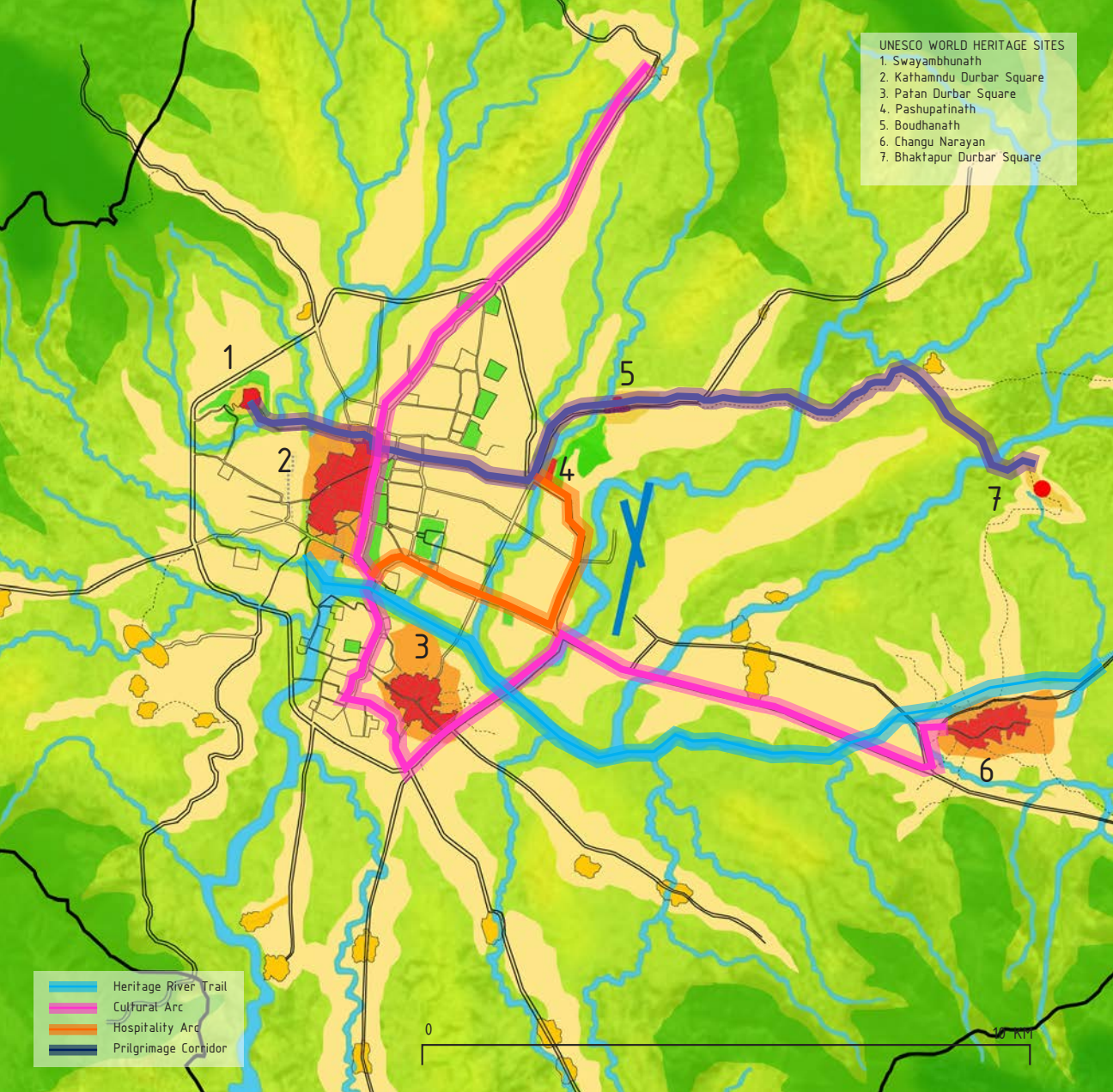
SERVICES
Land Use Plan
Transportation Plan
Nature Preservation Plan

Nepal is known for adventure tourism, especially the mountain climbing and white water rafting. Being a landlocked country with a single International Airport located in the Capital, Kathmandu will function as the gateway to Nepal for a foreseeable future. Although a small region surrounding by hills, Kathmandu Valley is not only the economic and political backbone but is also endowed with seven UNESCO World Heritage Sites – perhaps inheriting one of the highest concentration of cultural and archaeological destinations.

At the center of the Regional Plan is the outline of the character of the development that will essentially guide all the real estate growth and infrastructure expansions.

Corridors of varying character and function establishe seamless connections to the World Heritage Sites while preserving and enhancing the open spaces that would be enjoyed by tourists and locals. The overall strategy is to closely align the land use pattern with sustainable transportation networks while heightening the tourist experience along with the local economic growth – both necessary in preservation of unique cultural heritage. A flexible guidelines for the selective corridors expand a well-managed real estate development focusing on hospitality, modernization of infrastructure and transportation systems, creation of local markets and Convention venues combined with modern amenities – exponentially expanding job opportunities in the hospitality and tourism sectors.

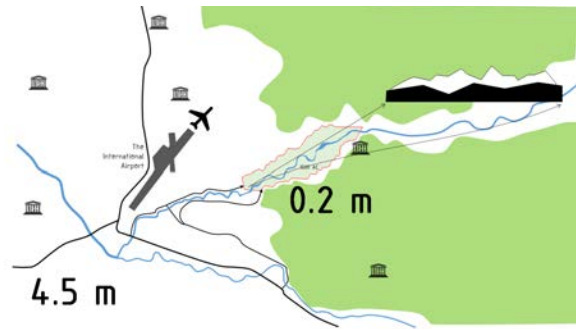
7 WORLD HERITAGE SITES :
1 VISION

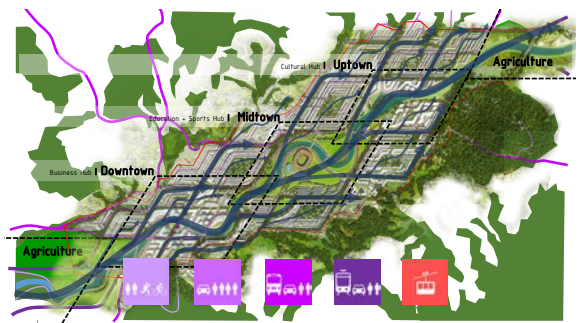

UNESCO WORLD HERITAGE SITES
1. Swayambhunath
2. Kathamndu Durbar Square
3. Patan Durbar Square
4. Pashupatinath
5. Boudhanath
6. Changu Narayan
7. Bhaktapur Durbar Square
1
2
3
4
5
6
7
Heritage River Trail
Cultural Arc
Hospitality Arc
Prilgrimage Corridor
0
10 KM

Green City

Kathmandu, Nepal 2012– Ongoing

Site area: 1200 Acre
FAR: 0.5
Height limit: varies
Overall Development GFA: 24,281,140 SF
Open space: 65%





The site for Green City is located amongst three municipalities, World Heritage Zones, and the International Airport, giving it an inherent advantage. Running across the middle of the site is the Manahara River, which is envisaged as the social, environmental, and transportation backbone. Four major districts – prioritizing commerce, education, recreation, and culture – are envisioned as pearls in a necklace along the river belt. Residential and other compatible uses are interspersed throughout the township, assimilating the districts into a cohesive mini-city.

The 'weaving' city form – derived from combining the winding alleyways of medieval towns and the modern city grid – stems from the forces of wind patterns, site drainage, open space systems, and the river itself. The development blocks, with the building mass generally stepping down towards the river, are oriented and organized to maximize solar exposure, summer breeze, and waterfront views, and visually connect to the Himalayan range beyond.

Although automobiles are part of the mobility mix, walking, bicycling and transit are given priority; vehicular rights of way, on the other hand, are circuitous by design. The radiating green spaces constitute recreational and ecological systems; they converge at the riverfront parks and aid in creating neighborhood clusters. Residents do not have to cross more than two streets to get to a green space, making the design of the township a regional precedent.

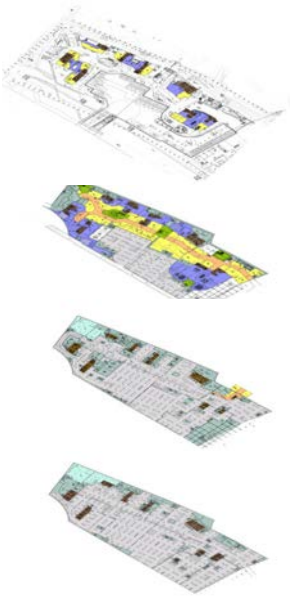

AGRICULTURE ZONE
BUSINESS DISTRICT
RECREATION DIS


UNESCO World
Heritage Site
STRICT
EDUCATION DISTRICT
CULTURAL DISTRICT

Huishan North Bund

Shanghai, China – Ongoing

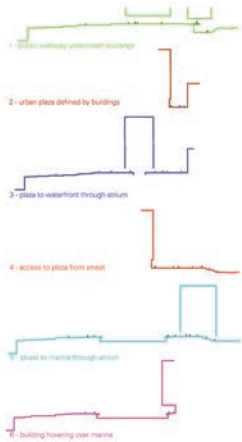
Qian Li as Senior Associate at Ehrenkrantz Eckstut & Kuhn Architects

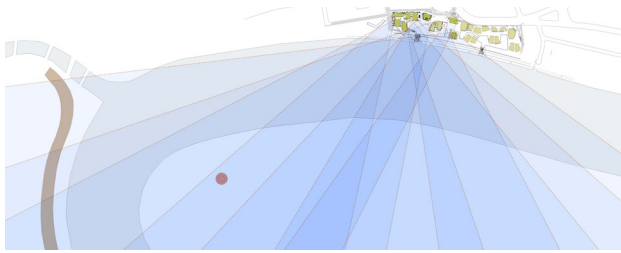


Huishan North Bund is the centerpiece of an extensive waterfront revitalization which extends for nearly 3 kilometres along the Huangpu River in Downtown Shanghai. This project is an anchor redevelopment for the transformation of the long neglected Hongkou District of Shanghai.

Huishan North Bund extends the riverfront esplanade of the historic, Neo-Classical Bund further eastward, while leveraging the site's valuable waterfront asset. It supporst a multi-building, office-led, mixed-use development that enjoys unparalleled views of both the historic Bund, and the commercial towers of Pudong lying directly across the river. The public plaza that abuts the many buildings varies in design and character, is enlivened by retail activity at both the plaza and concourse levels, and is "porous" along its landside edges---inviting people to easily access and enjoy the riverfront setting. The development further facilitates public access by making convenient ferry, subway, and bus connections. Acknowledging Shanghais' and Hongkou Districts' long lived history as a busy river port, Huishan North Bund features two marinas, accommodating yachts up to 30 meters in length, as the showpiece and feature attraction of this unique, waterfront neighborhood.

Huishan North Bund consists of six sites, totalling 27 Acres of land in Hongkou District on the Huangpu River. The sites extend for approximately 800 meters along the riverfront. The development features a generous Public Plaza that unites all the buildings around the west and east Marinas. Directly beneath the podium plaza are placed a retail concourse and two levels of parking, totalling 2.8 Million s.f. of floor area. Rising from the plaza, the master plan envisions 16 low-rise buildings and 4 high-rise buildings, totalling approximately 3.2 Million s.f. of floor area. The buildings contain office space; plaza, concourse, and street level retail space; hotel/serviced apartments; and a new shipping exchange and a trading hall. The buildings are placed on the site such that lower structures are closer to the river, and the taller structures to the northern half of the site, thereby insuring that all the building occupants enjoy expansive views of the Huangpu River, the historic Bund, and the Pudong skyline.enant office building, it contains 35,000 SQM of floor area arranged around a series of 3 story tall, stacked atriums.






SITE A
SITE B
SITE C
MARINA
PROMENADE
PLAZA
PEDESTRIAN ENTRY POINT TO PLAZA FROM STREET
VEHICLE ENTRY RAMP TO B1 PARKING


PIL

Bayside

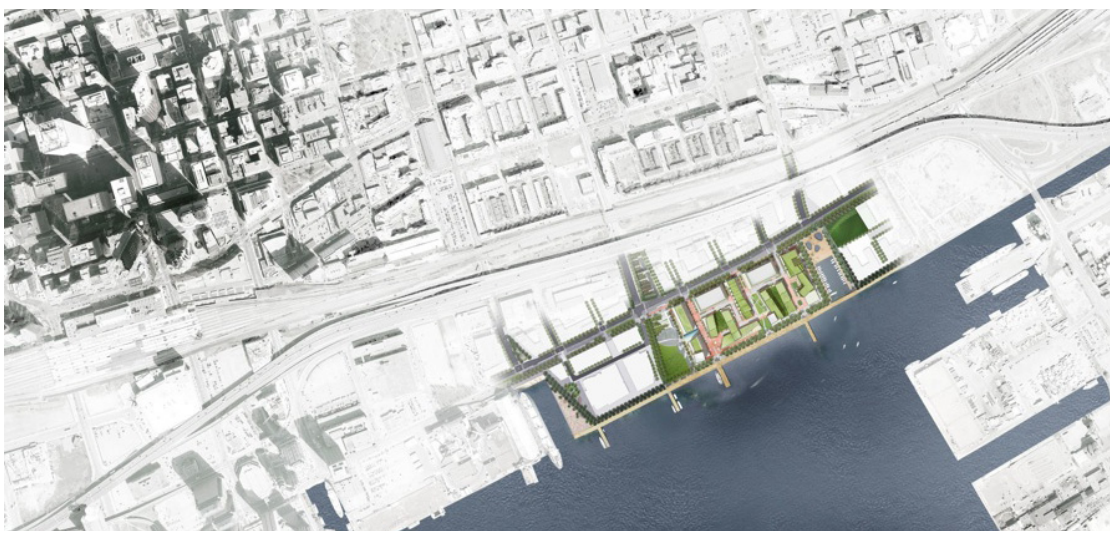
Toronto, Canada 2009

Kiran Mathema as Design Director at Ehrenkrantz Eckstut & Kuhn Architects
In partnership with Pelli Clarke Pelli Architects

INVOLVEMENT
Master Planning and Community Design
Open Space Concept Design
Design Development of a Mid-rise Apartment Building

In a city of great neighborhoods, Bayside will be Toronto's next "destination" district. As the first downtown neighborhood on the lake, it welcomes all and provides the Torontonians a waterfront community that is mixed-use, high-density, and has the urban fabric offering a host of different "places".

Here, the buildings and open spaces share a symbiotic relationship. The buildings perpendicular – with their 'saw-tooth' design – to the water's edge maximizes the exposure of open spaces to the winter sun and summer breeze, at the same time providing uninterrupted views of and public access to the lake front from the landside. In contrast, the lower bar buildings (parallel to the water's edge) shield the very open spaces from harsh winds coming off the lakeside and northwest direction.




Queens Quay Boulevard


QUEENS QUAY E
RETAIL
RETAIL
RETAIL
RETAIL
RETAIL
RETAIL
RETAIL
BONNYCASTLE STREET
EAST MEWS
SMALL STREET
NORTH COURT
WEST MEWS
BAYSIDE HALL
RETAIL
RETAIL
AITKEN PLACE PARK
SMALL STREET PLACE
LAKEFRONT SQUARE
RESTAURANT
HEALTH CLUB
DAY CARE
CULTURAL USE
YACHT CLUB
LAKE ONTARIO
(INNER HARBOUR)

Winter garden: A lantern in the park setting

Office mews: Even active after office hours

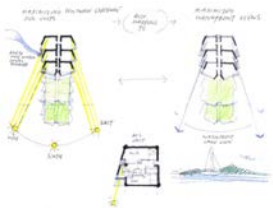
A mixed-income waterfront precinct of the highest quality, Bayside can be used and enjoyed in all seasons and all times of the day, with a broad mix of daytime and evening activities. The open spaces offer a great variety of environments and experiences, while always maintaining an intimate human scale. Residents and visitors alike will be charmed by the neighborhood's small, intricate alleyways, courts and mews that provide a continual source of visual surprise and delight. These are all interlinked yet diverse - defined by a series of lively places and destinations, including retail-lined streets, parks, courtyards, public terraces and interior winter gardens, and an enhanced promenade.

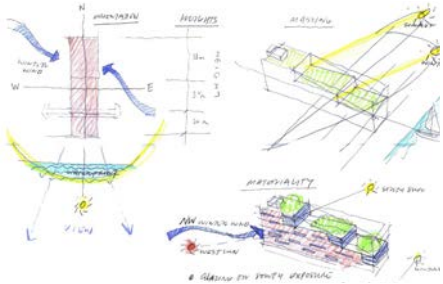
With its lively street life, place-specific architecture, and proximity to the water, Bayside offers a rare combination of urban excitement and dynamic liveability. There is no other like it - unique, original, and distinctly Toronto.

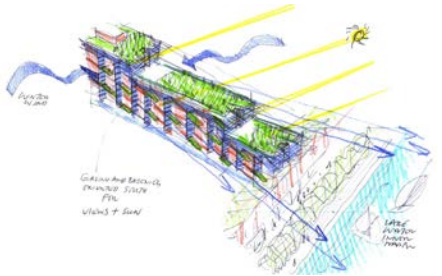
Bonnie Castle Street: more than a land-to-water connector; it is the heart of the community.

The neighborhood is experiential even during the cold winter months.

Here, the buildings and open spaces share a symbiotic relationship. The residential buildings perpendicular – with their 'saw-tooth' design – to the water's edge maximizes the exposure of open spaces to the winter sun and summer breeze, at the same time providing uninterrupted views of and public access to the lake front from the landside. In contrast, the lower bar buildings (parallel to the water's edge) shield the very open spaces from harsh winds coming off the lakeside and northwest direction.







AnTing City Center

Shanghai, China 2008-Under Construction

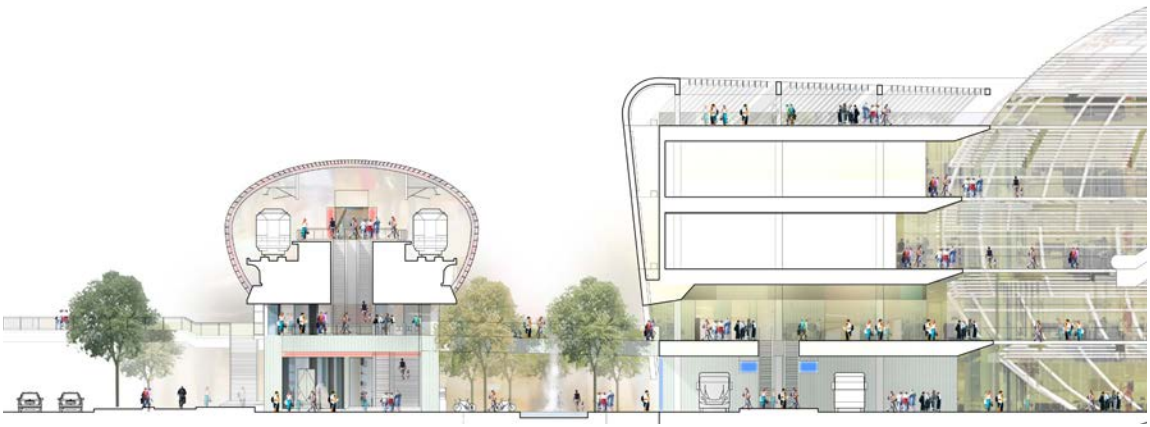
Kiran Mathema as Design Director in Ehrenkrantz Eckstut & Kuhn Architects

INVOLVEMENT
Master Planning and Community Design
Open Space Schematic Design
Schematic Design for High-rise Residential Towers
Schematic Design for Non-Residential buildings

As China's 'Motor City', AnTing stands positioned to be at the forefront of global development. The vision for AnTing City Centre is to create a prime destination in Jiading, a new 'Place'. It will be a place offering both residents and visitors alike a vibrant commercial and civic hub, leveraging new public infrastructure projects to connect to the larger metropolitan region. The site occupies a prime location in the city, with both pedestrian and vehicular access in addition to superb transit connections.

The project comprises almost 5 million SF of development across 7 city blocks, and over 2 levels of underground parking. It includes a system of both public and private green spaces about a central retail spine that seamlessly integrates various blocks and programmatic functions into a single grand place.

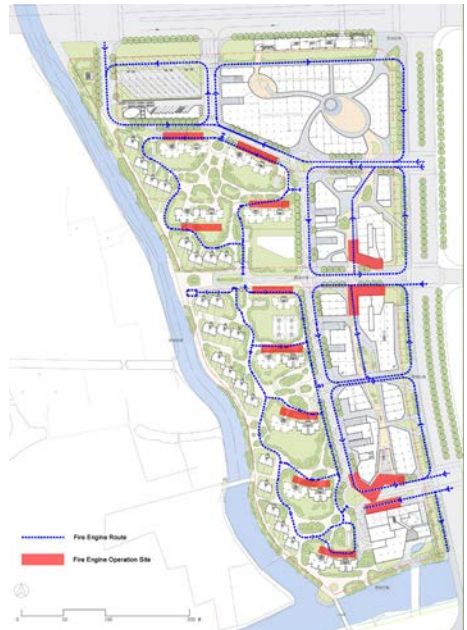
This multimodal intersection not only provides dynamic transit, but opens the door to creating vibrant public crossroads, with lasting public and economic benefit.



Building on the local typologies of private courtyards, dense and vibrant streets, and open public places, this Centre will offer a variety of environments and uses, creating not only a unique mixed-use development but one that makes it a world-class place to live, work and play. A five-star hotel complex, residential apartments, class-A office spaces, and public gathering venues are woven together, connected by a continuous retail promenade that is simultaneously a public passage and a destination.

The development team's concerns for sustainability drives the design response: a strategic mix of uses and density, the orientation of buildings to respond to the climate, and the use of high life-cycle, locally available materials. This approach ensures that AnTing City Centre will thrive, and be truly sustainable in every way – environmentally, socially, and financially. Designed to maximize solar exposure and greenspaces, the residential component is a self-sustaining collection of carefully sited 'towers in the park', with limited and necessary ground floor retail, a dedicated primary school and playground, and a softer edge of 4 storey waterfront town homes. This arrangement allows for a maximization of both density and variety, within a natural and environmentally sensitive context.

Adding to both the simplicity of concept and variety of texture, the 'towers in the park' are a collection of 3 schemes; 1 that is a simple floorplate mirrored over alternate levels, that provides and 2 of which share a common and proven floorplan, but differentiated via facade treatments, and the play of open, and enclosed balconies . This variety, based on simple principles, with a sensitivity of massing and materials, create a richness of texture that is both impressive and engaging, and creates the foundations of a great and vibrant place.



90+80+80+90-C

170+170-C

Duplex-3rd Floor-180

Duplex-1st Floor-190

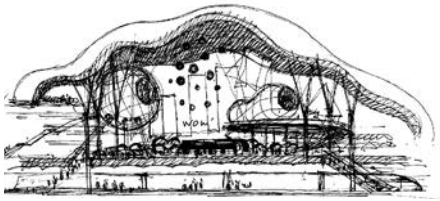
Duplex-4th Floor-180

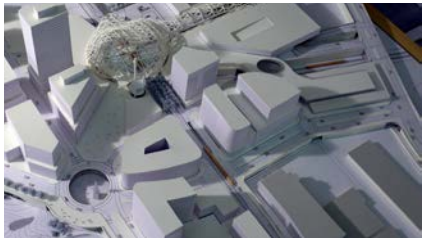
Duplex-2nd Floor-185

Intermodal Station

Houston TX, USA 2010

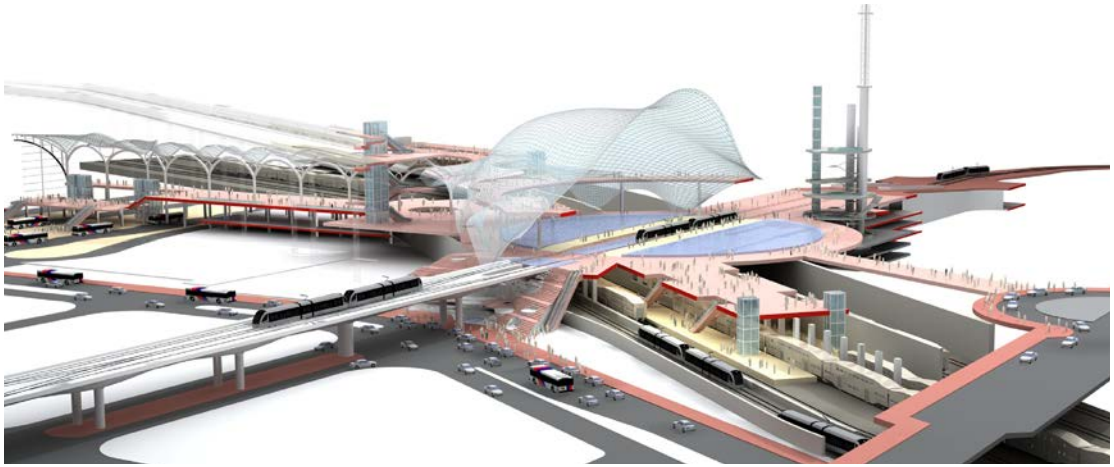
Kiran Mathema as Design Director in Ehrenkrantz Eckstut & Kuhn Architects





The Intermodal will be the cornerstone of a vibrant, new, mixed-use district. Created as a Joint Development involving public and private
participants, this will be a compact, high-density neighborhood with pedestrian-friendly streets and blocks that extend the urban fabric of
downtown Houston. Within the new district, residents and visitors will have easy access to public transit when traveling to other parts of the city, thus reducing urban sprawl and reliance on automobiles. Creating a successful, transit-oriented community around the Intermodal is the most important benchmark for sustainability.

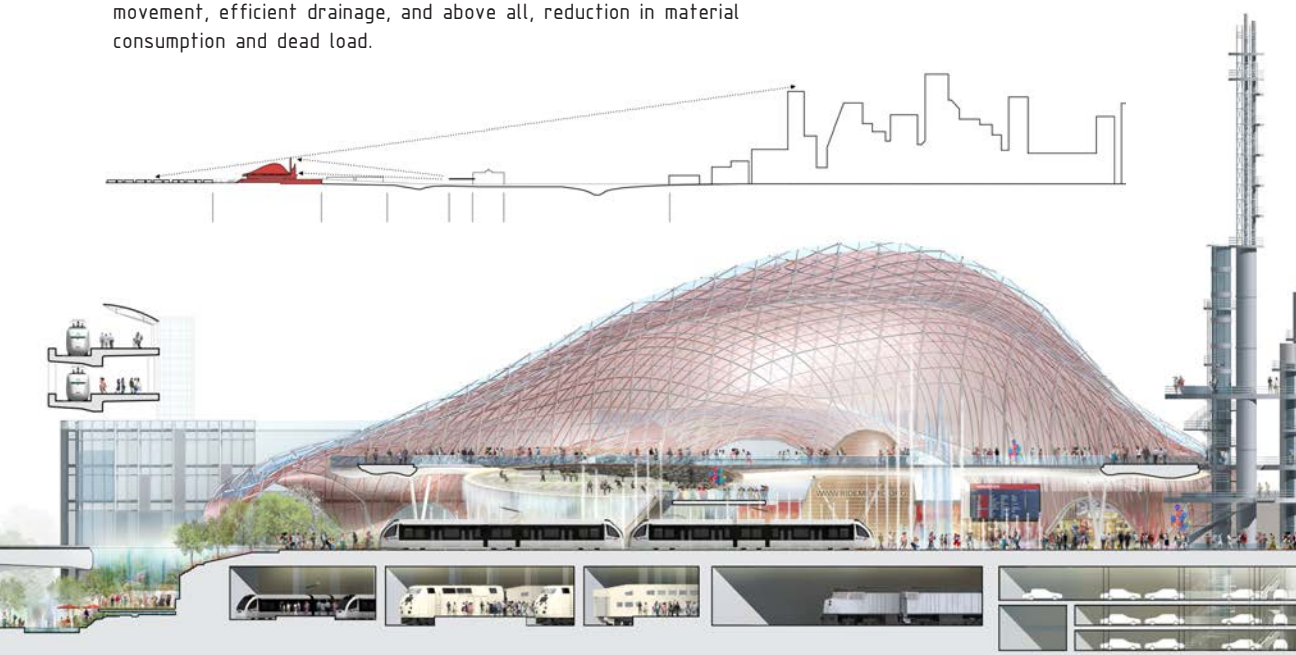
The Station itself integrates seven different modes of transportation into a singular place, making it the largest intermodal station in the US. The design of the Station goes beyond building a utilitarian transportation hub to making a new civic destination in Houston. It fully integrates the station area



with private developments to provide direct access, generate revenue, and create a year round place.

The main concourse houses not only light rail platforms and waiting/ ticketing areas, but also entertainment venues, retail and front doors of the private development, all under a signature roof, 3.5 acres in surface area.

The roof form is a function of numerous environmental responses: to harness solar energy and admit natural light, capture rainwater, induce a chimney-effect to cool the space below, and to block strong winds during hurricanes. Behind its complex form, underlies a simple structural logic that is constructed from modular and highly repetitive, prefabricated members. Each member is crafted to the smallest detail ensuring structural movement, efficient drainage, and above all, reduction in material consumption and dead load.




HOUSTON


WWW.RIDEMETRO.ORG


METRO

Qingdao Harborfront

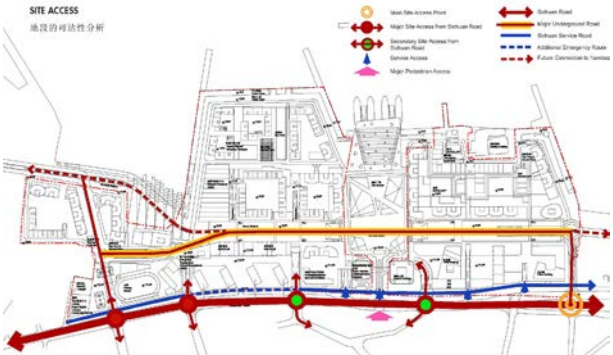
Qingdao, China 2011

Kiran Mathema as Design Director in Ehrenkrantz Eckstut & Kuhn Architects

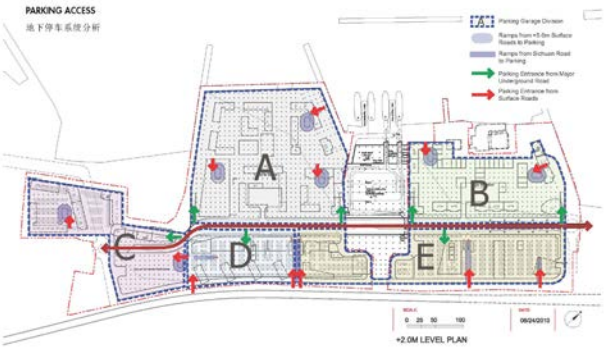
INVOLVEMENT
Master Planning and Community Design
Open Space Schematic Design
Schematic Design for High-rise Residential Towers
Schematic Design for Non-Residential buildings

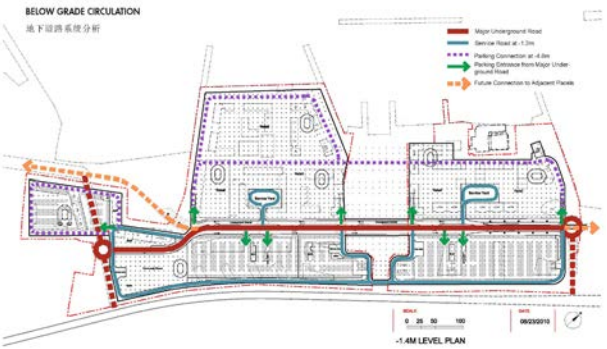
The vision for the development is of a "gateway" to Qingdao, to create the most sought-after urban, waterfront community that has places to live, work, play, shop, and invest. In order to ensure that the Qingdao Harborfront becomes a signature front door and destination for the City, the Plan tightly integrates the new development quarter into the existing industrial fabric, street network and transport systems.

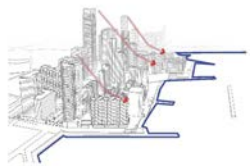
Phase one of the redevelopment includes five mixed-use quadrants that are organized around four major public investment areas: Cruise Ship Terminal, Repurposed Dry Docks, Ferry Terminal, and Monorail Retail.



The redevelopment sits on an integrated parking and service podium, freeing the ground level for a continuous and exciting pedestrian experience. A major vehicular spine that links all the quadrants is assimilated with the underground podium providing easy access to parking garages. The super structures of the redevelopment have a strategic massing to create an unique and undulating skyline. Additionally, the massing also allows winter sun to permeate while blocking the winter winds from the bay.

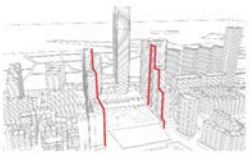


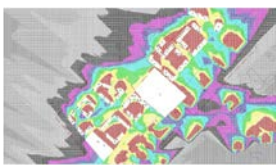


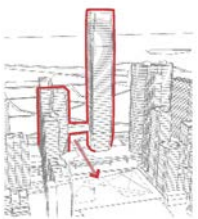

HEIGHTS STEP DOWN TO WATER'S EDGE

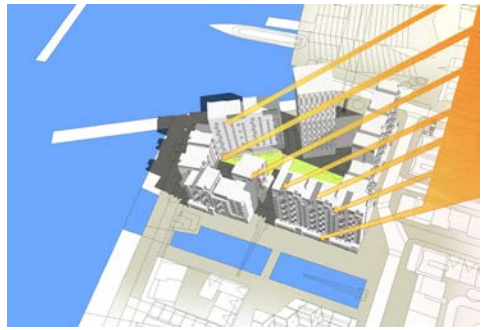

SKYLINE ARTICULATION ON SICHUAN ROAD TO ANNOUNCE THE DEVELOPMENT

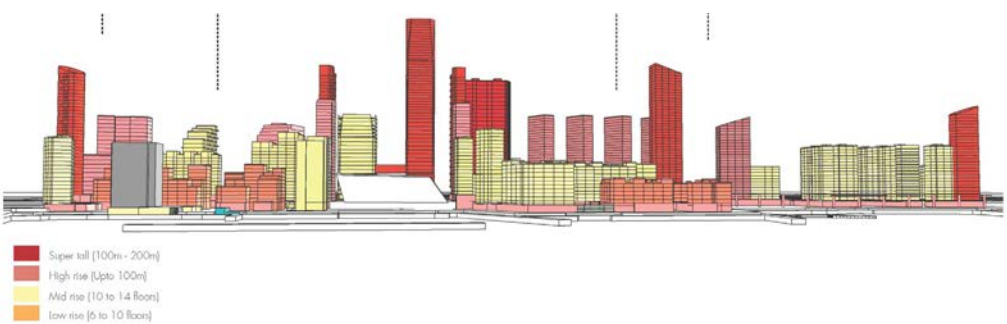

MARQEE TOWERS DEFINE ENTRY TO QINGDAO LANDING


CLUSTER OF TALL BUILDINGS ON EITHER SIDE OF CITY SQUARE HELP DEFINE



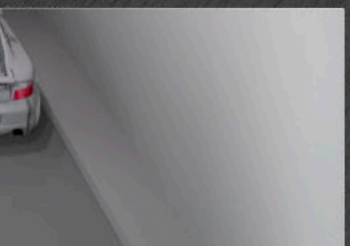

SIGNATURE TOWERS DEFINE ENTRANCE PRIMARY ENTRANCE FROM SICHUAN ROAD




Super tall (100m - 200m)
High rise (Upto 100m)
Mid rise (10 to 14 floors)
Low rise (6 to 10 floors)

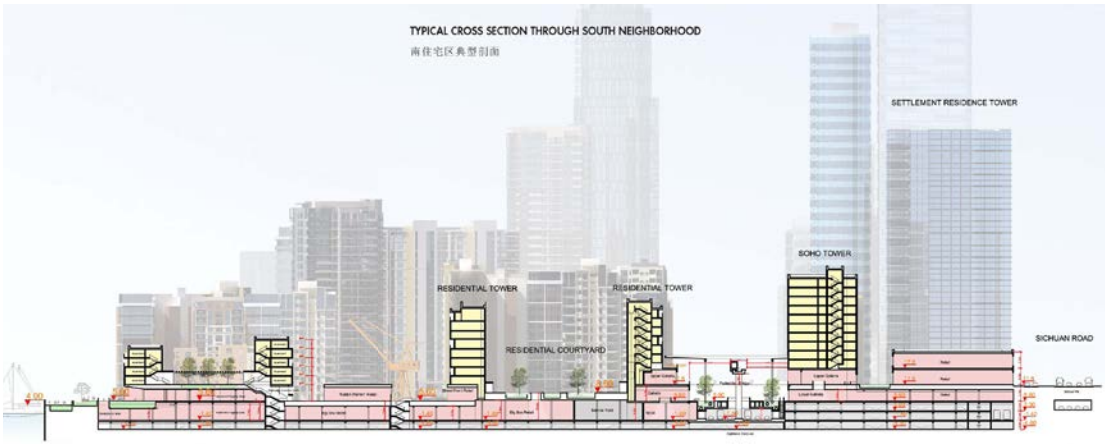
The quadrant around the Cruise Ship Terminal located at the northeast corner, mostly consists of hotels, retail and a repurposed industrial shed – an anchor for large and diverse F&B venues and boutique shops.

The quadrant around the repurposed dry docks are residential in nature with convenience retail at the ground level. Industrial elements, including the lifting cranes, are preserved to create a unique waterfront and inland experience. The western part of this quadrant is integrated with the new Ferry Terminal, which has a green roof to serve as a major city park filled with activities.



The two quadrants on the south abut a major city artery, and are mostly commercial parcels, with exception of few residential towers. At the pedestrian level, all five quadrants (landside and bayside) are tightly integrated with a centralized retail spine that is served by an iconic monorail system. The retail spine, covered with ETFE roofing system becomes a year-round activity hub.

On the bayside, a publically accessible promenade strings all the waterside quadrants, and can be accessed from perpendicular streets emanating from downtown. The promenade is designed as a multilevel venue where various pedestrian activities unfold. This public right away is also partially used as vehicular access for private and emergency vehicles.



New Sustainable Township

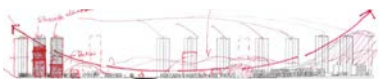
Fo Shan, China 2008 – Under construction

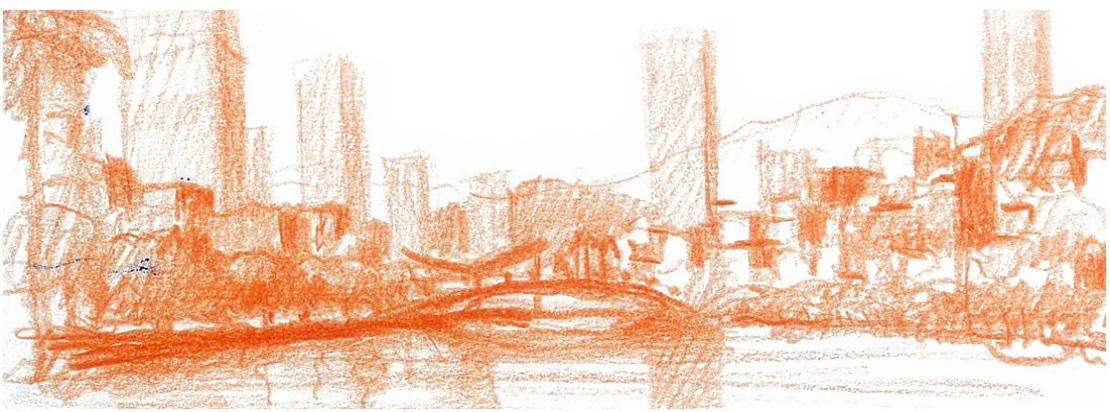
Kiran Mathema as Design Director at EE&K New York

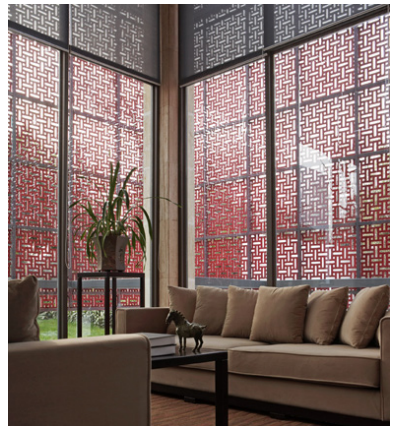
The development creates a year-round community for 20,000 residents spread over 300 acres of land. The township is organized around two distinct natural features: the hillocks, and disparate water bodies consolidated into an intricate lake system. The lake provides an unique vista for various neighborhoods while functioning as the central social, as well as an essential ecological driver.

A system of trails and driveways skirt around the linear water body, linking different housing clusters with amenities such as schools, clubhouses, retail, and recreational venues. The overall land terrain is leveraged to naturally filter the rainwater before it is collected in the lake to be re-used for domestic consumption.

The housing typologies that range from villas, town homes, and mid-rise buildings, to high-rise towers are tightly configured to maximize the views of the water and surrounding hills. The site configuration and unit layouts maximize the solar orientation – all the units receive a minimum of two hours of sunlight during the winter. These simple, large-scale environmental solutions coupled with specific climate-oriented architecture have not only created a highly desirable community to live, but also created a sustainable township.







The water features are central to creating a distinct brand while providing sustainable water management strategies that are economical to build and easy to maintain. The architecture is an outcome of climatic responses – balconies, overhangs, and screens protect large fenestrations of units without blocking the winter sun and prevailing winds.

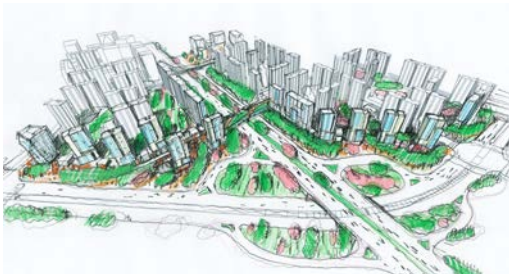
Beiying Gateway

Taiyuan, China 2014

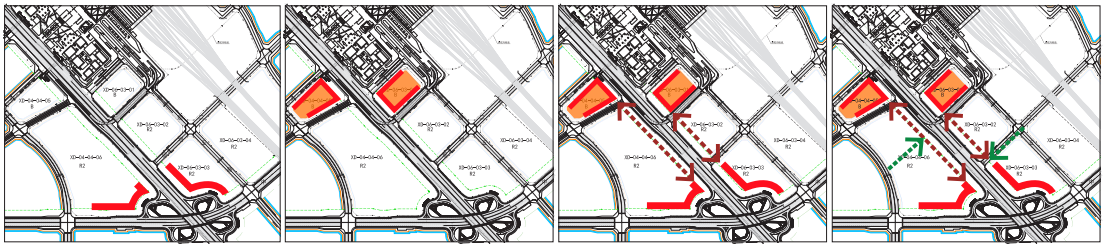
Site area: 366,900 SQM (91 Acre)
FAR: 3.5
Height limit: 66 M
Residential GFA: 678,076 SQM
Commercial GFA: 400,202 SQM
Overall Development GFA: 1,098,477 SQM

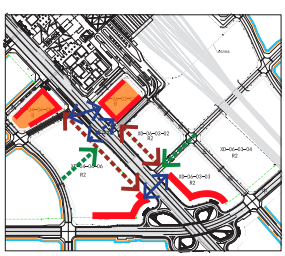
Envisioned as a vibrant precinct, the project leverages its proximity to South Station on the north, and the Airport on the south. Given its strategic location, it is positioned as a 'gateway' project that literally and figuratively serves as an important entry into the City.

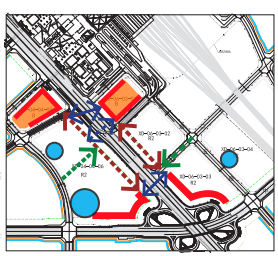
Diverse programs, open space design, architecture and transportation elements are integrated to evolve an iconic urban quarter that is mixed-use, pedestrian-friendly, and transit oriented in nature. An analogy can be made to the structure of a leaf, whereby the New Tai Yu Road serves as the retail and transportation spine , while the perpendicular streets serve as branches feeding the system, from their communities.

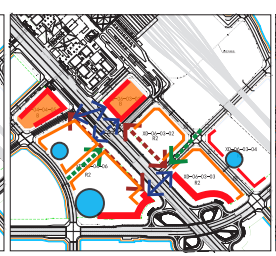


Inspired by bridges over the Fen river, a series of pedestrian crossings straddle Tai Yu Road to unite the parcels on either side. Like all great boulevards around the world, the extent of New Tai Yu Road is defined by two major anchors – a Retail destination on the north (close to the station), and a mixed-use node on the south, facing the cloverleaf interchange.

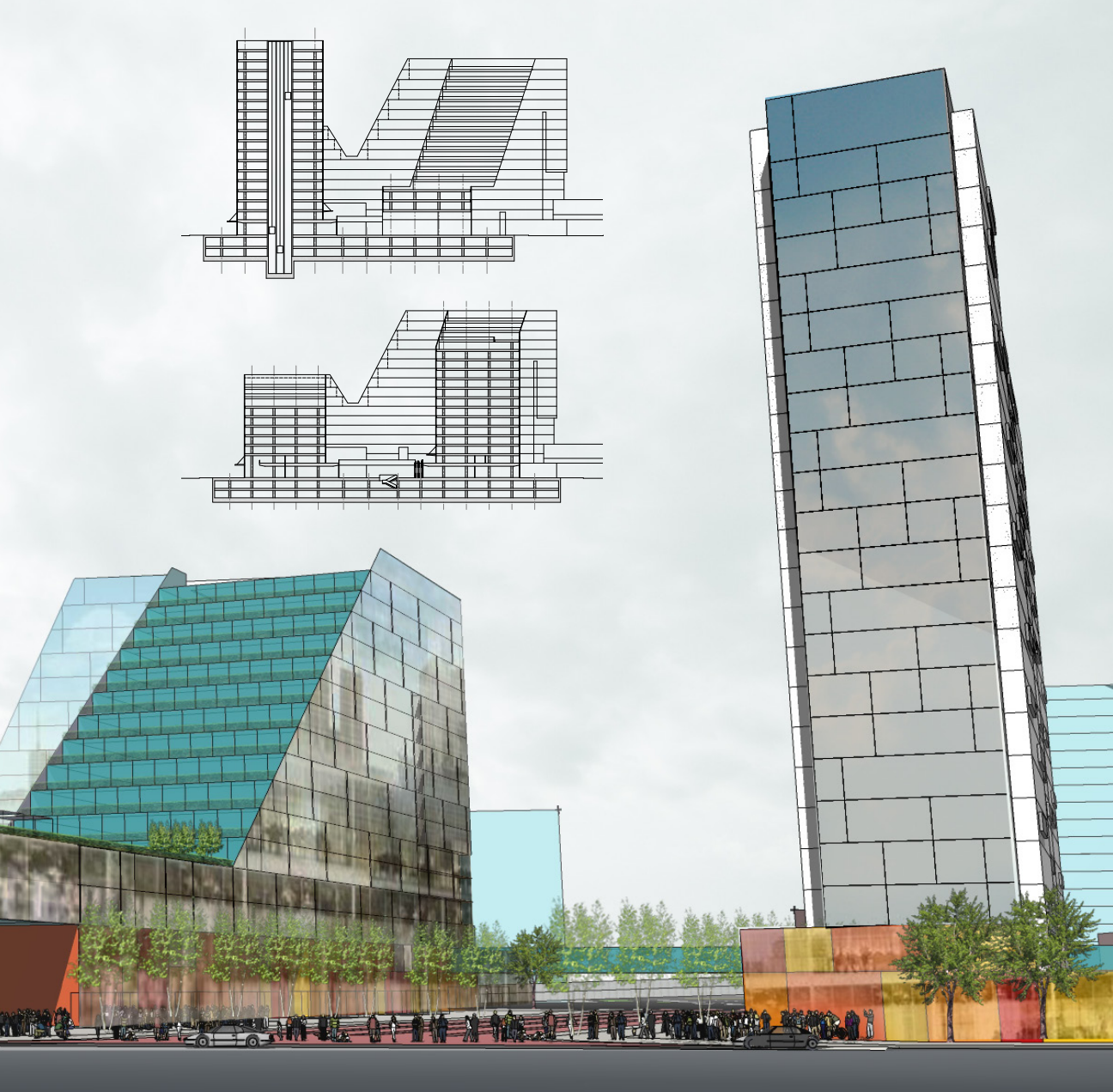








Diverse programs, open space design, architecture and transportation elements are integrated to evolve an iconic urban quarter that is mixed-use, pedestrian-friendly, and transit oriented in nature. An analogy can be made to the structure of a leaf, whereby the New Tai Yu Road serves as the retail and transportation spine, while the perpendicular streets serve as branches feeding the system, from their communities.



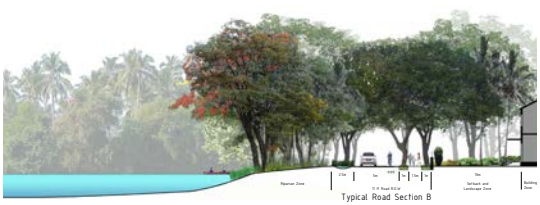
Archipelago

Goa, India 2012 – Ongoing

Site area: 200 Acre
Open space: 30 Acre
Nature preserve: 15 Acre
Marina: 10 slips
Resort land: 8.43 Acre
Private estate land: 97 Acre

Gross Built-up area: 561,710 SF
Resort GFA: 170,640 SF
Private estate GFA: 391,000 SF

Typical Road A

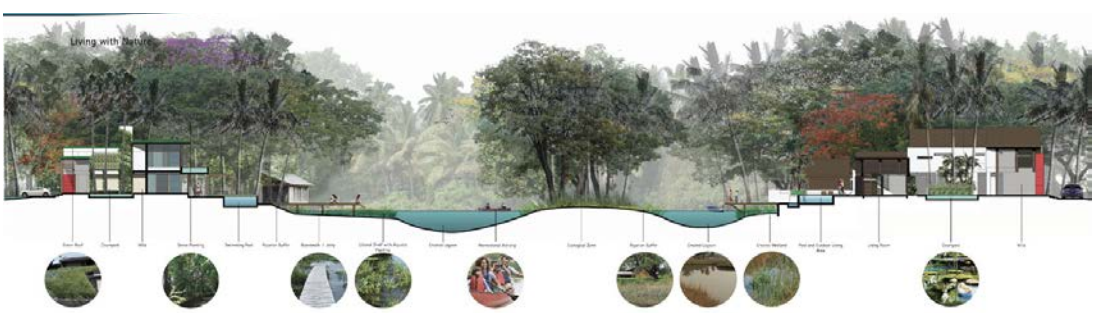


Typical Road Section B

The project is envisaged as an uber luxury, exclusive island development. Due to breaches in the bund wall, and resultant saline water infiltration, agricultural lands on the island have been destroyed. As a result, the local inhabitants lost their means of sustenance, and increasingly left the island, leaving it in a state of disrepair and neglect.

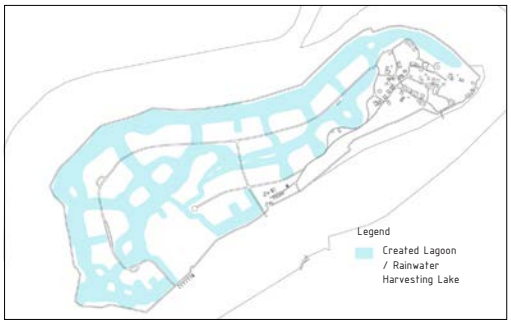
The core planning idea is to preserve the local topography and vegetation through a low impact development that can generate the revenue necessary for infrastructure improvements and economic development on the island. Economic returns and nature re-building share a symbiotic relationship in this case.

Instead of land fill, submerged areas are excavated to create functional waterway depths, and the soil heaped to form island masses for new development. The tropical climate and heavy rainfall patterns transform these excavated areas into a living 'back water' experience. Private islands are interspersed between a network of lagoons and waterways. While the bio-habitat is preserved and enhanced, the monetary value of the development is further strengthened.

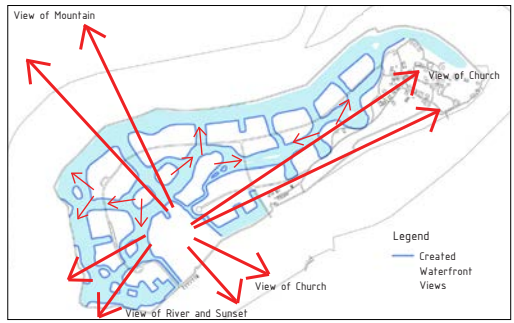


1. Lagoon and the islands created provide exclusivity and a sense of community

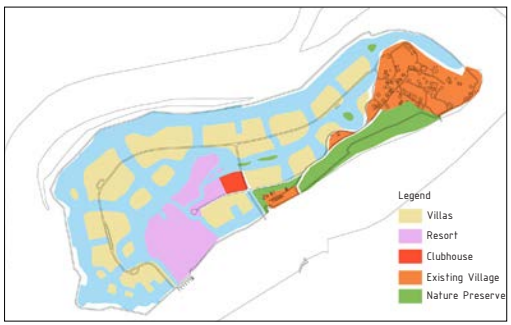
2. Lagoon provides the fill material for the uplands



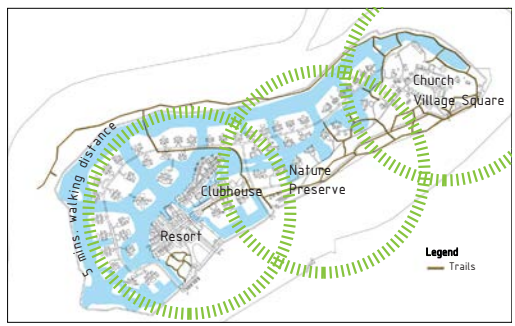
3. Lagoon helps in rainwater harvesting



4. Lagoon is crafted to capture long and short views



5. Lagoon creates value for the interior properties and integrates various landuses.



6. Activity centers planned within walking distances

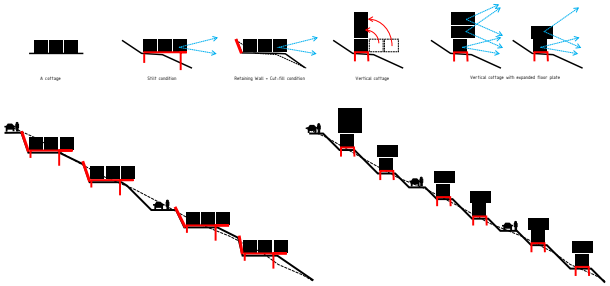
The resort on one side and the restored village on the other anchor the island as attractions with residential villas weaving them into a cohesive archipelago where humans and nature co-exist.

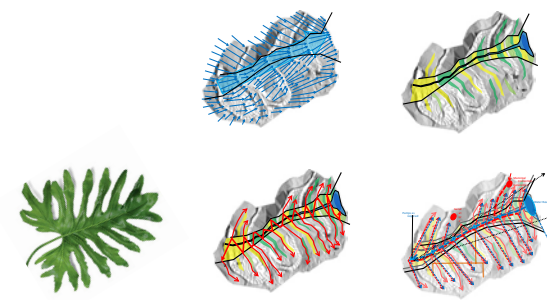
The LEAF

Kathmandu Valley, Nepal 2013-Under Construction

Site area: 10 Acre
Built-up GFA: 163,400 SF
Rooms: 48 keys (20 villas)
F&B: 3 venues
Spa: Himalayan Ayurvedic treatment and pampering

ASIA PACIFIC PROPERTY AWARDS
2014-2015





The Leaf is located on one of the highest hills of the Valley, commanding a magnificent view of the Himalayan range. The Leaf includes 20 branded villas that will be managed by an international operator, as part of a larger hospitality development. Concealed within a dense forest, the arrangement of buildings is placed strategically to reduce environmental impact while maximizing views, privacy and sunlight. An road meanders through the site, providing access to individual buildings and finally culminating at the clubhouse located at its highest point. The central landscape area channels the rain water towards the storm water pond and is subsequently filtered for re-use.

Responding to the environmental sensitivity of the site, the footprint of villas is minimized by stacking floor areas vertically. The narrow building footprint also maximizes daylighting and cross-ventilation during summer, and optimizes solar exposure during winter – all aiding in the reduction of energy consumption. The finishes and fittings are derived from local materials and craftsmanship, creating a development which is in tune with the local climate, economy and ecology.

The LEAF is designed to celebrate mountain living. Natural elements of the site – the hill, forest, springs and views of the Himalayas beyond become part of the everyday lifestyle.

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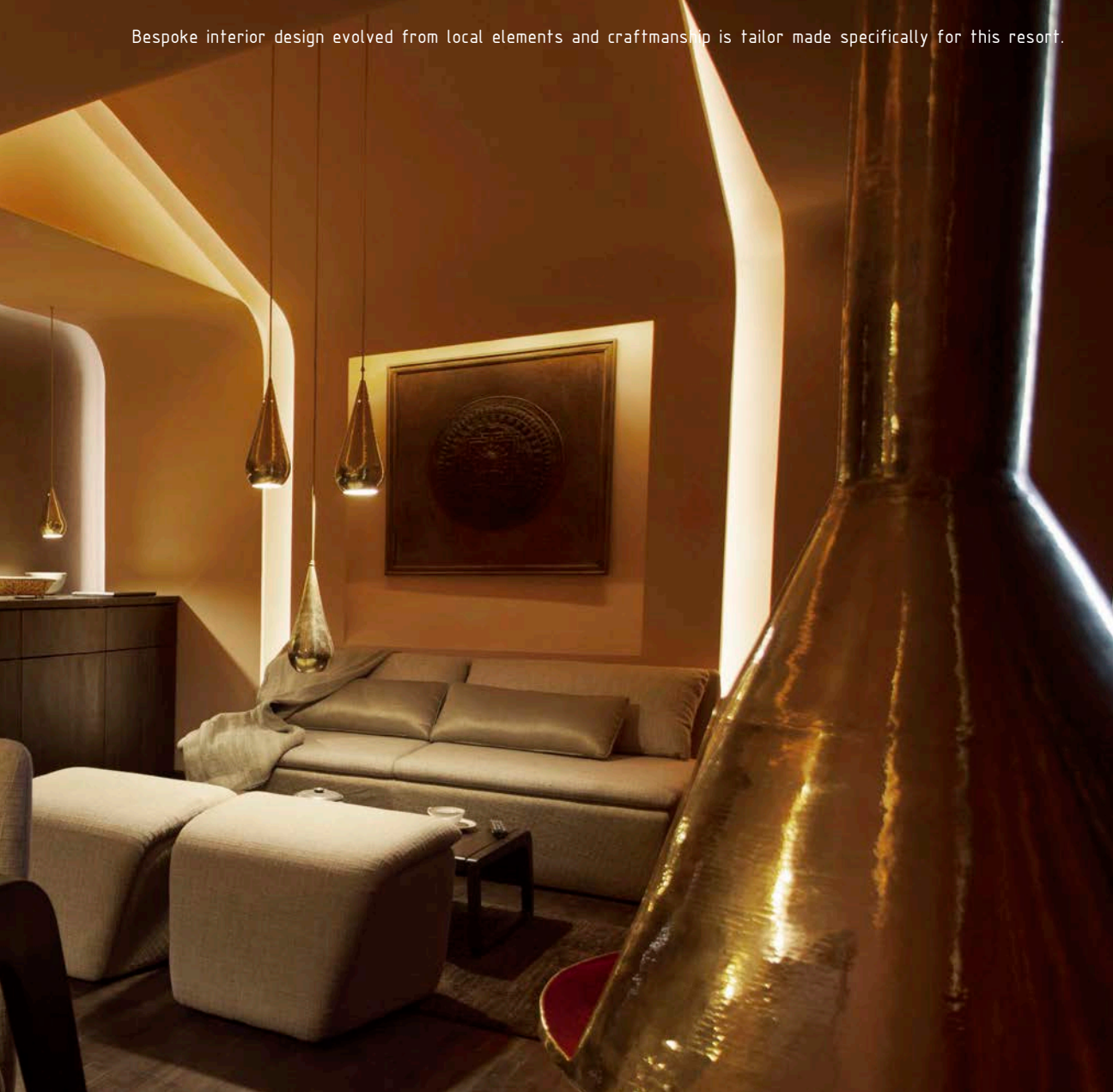
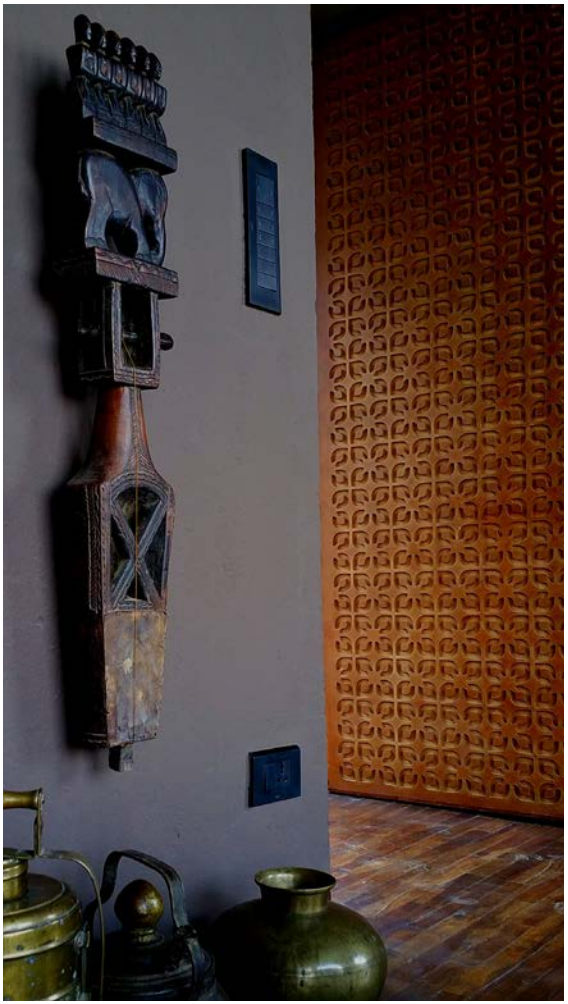
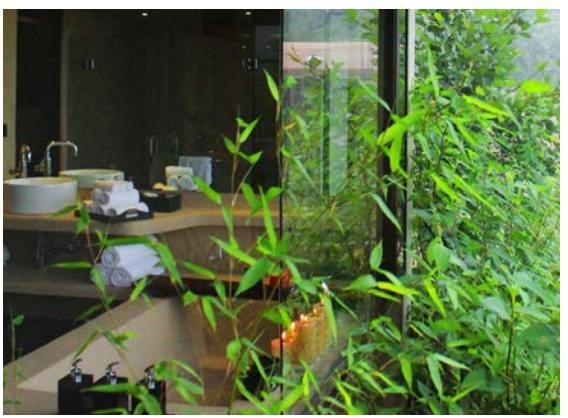
Inspired by the mountain forms, the walls and ceiling come together to create a signature space. Fully transparent on one side, the room magnifies the views from each area defined by the custom designed fireplace. A wide terrace cantilevers out – naturally extending the living floor into the outdoors.



Bespoke interior design evolved from local elements and craftmanship is tailor made specifically for this resort.





Trinity Towers

Hanoi, Vietnam 2016 – Ongoing

Site area: 13.4 Acre
FAR: 3.5
Height limit: varies
Overall Development GFA: 2,100,000 SF
Rooftop public psace GFA: 60,000 SF
Office GFA: 1,680,000 SF
Retail GFA: 338,262 SF
F&B GFA: 60,000 SF
Parking : 1000 Spaces

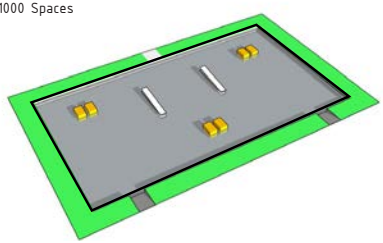
A set of three identical office buildings with a retail podium is set in a dynamic urban setting. The three towers are an important addition to the city skyline, serving as landmark, as they sit within a big park and are visible from a distance. The design of 34 story towers is inspired by the unique mountainous landscape found in Vietnam where vegetation grows on rocktops and within crevasses. The shape of the tower bulges out in the middle – increasing floorplates where rents are optimal.

The curving shear walls, mostly located on the east and west facades of the building, help in the towers structural stability while decreasing the dimensions of internal columns. The shears walls also act as solar barriers, blocking steep summer sunlight from the east and west.

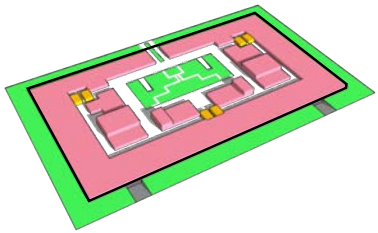
The top of the towers is crowned with a winter garden accessible to the public at large. The winter gardens include multiple venues ranging from cafes, recreational spas, to conference spaces.

A set of three identical office buildings with a retail podium is set in a dynamic urban setting. The three towers is an important addition to the city skyline and serve as way-finding landmark as it is set within a bigger park and is visible from the distance.

1 Multi-level Underground
Parking 1000 Spaces



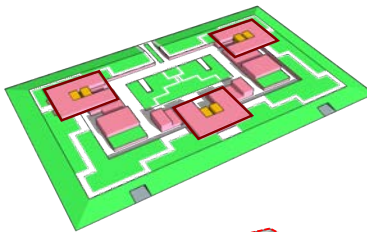
2 Retail Podium 300K SF



3 Tower Footprint not to exceed 15% site area

Served by F&B at the base of the tower 60K SF

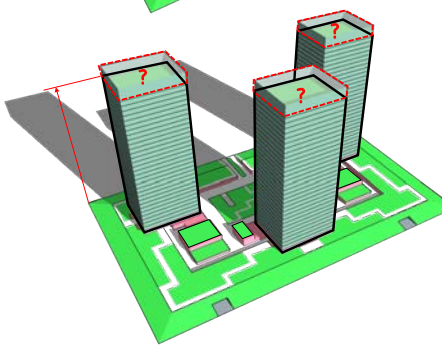
Public space above podium



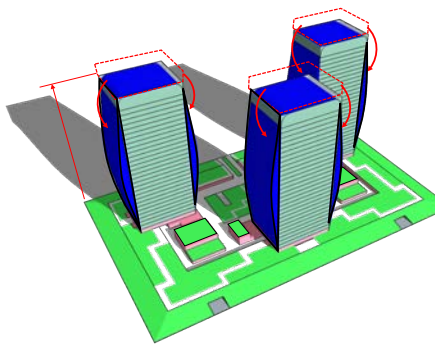
4 Allowed Office area with Mandatory Rooftop Public Space
725K SF on each Tower

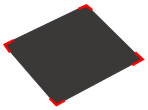
Height restriction

Loss of 2 office floors (50K SF) in each tower due to height restriction



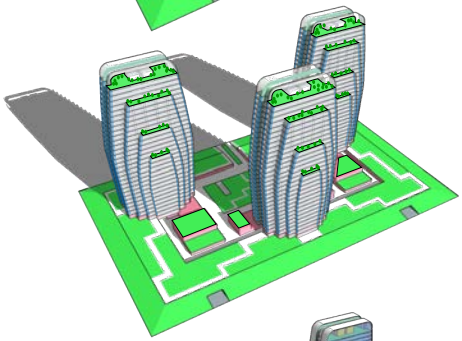
5 Recuperate lost area at the belly of the tower



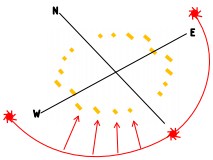


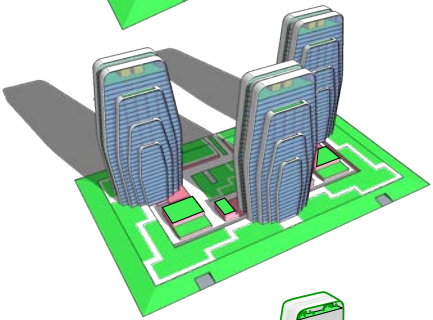
Only 4 Corner offices

6 Sculptural Towers with Regular floor plates



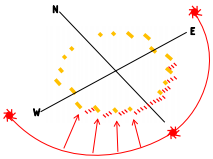
7 Introducing floor plates with more corner offices
and
stepping terraces: More valuable floorplate

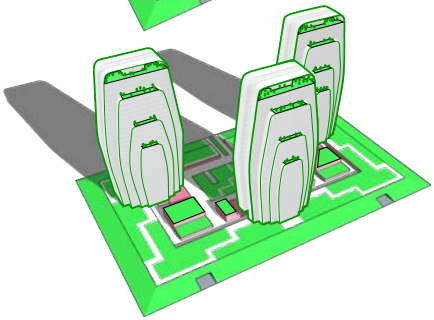




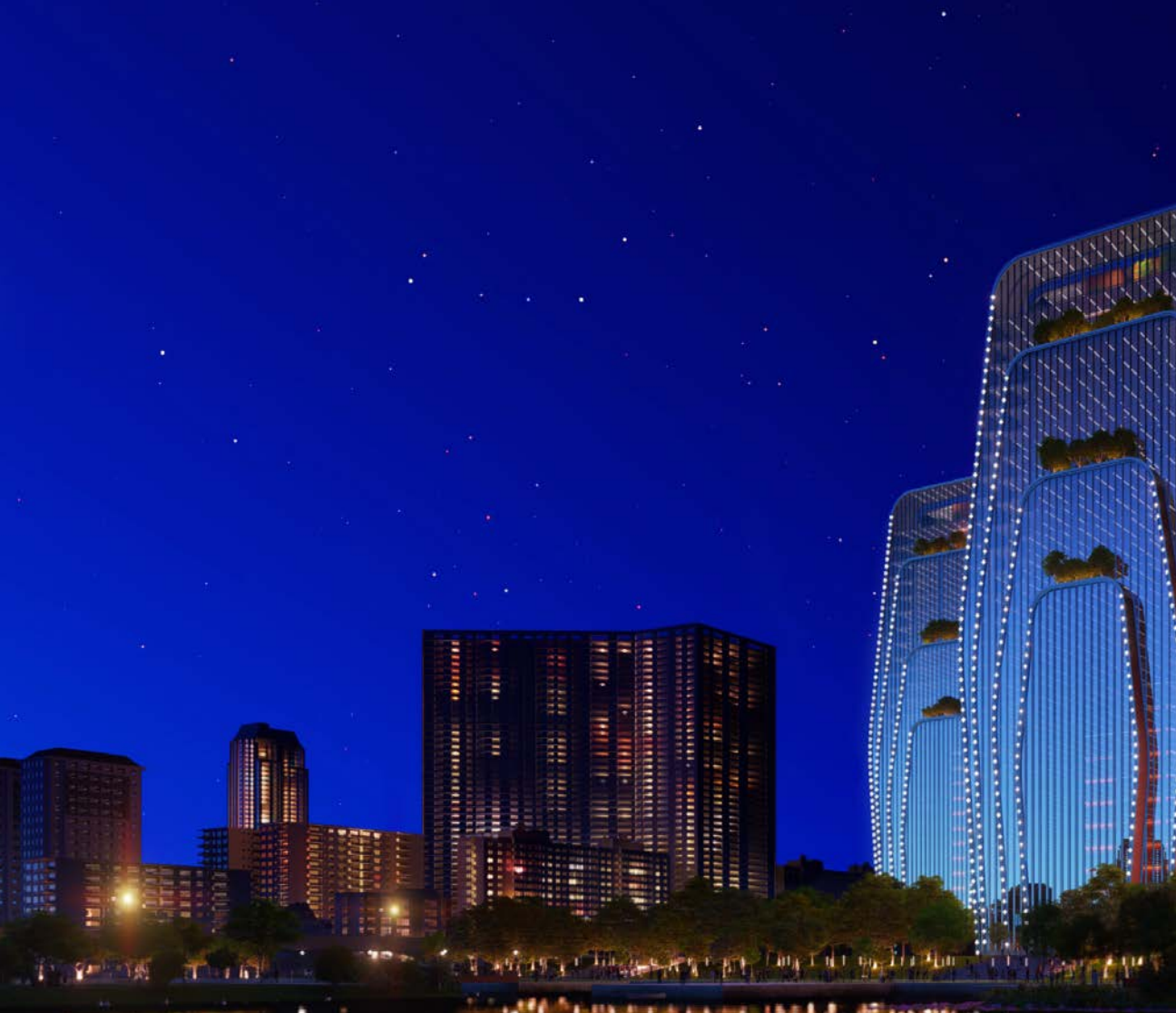
8 Shear wall also acts as shading device blocking east and west solar exposure

Shear wall along east and west facades reduces the internal column sizes





9 Fins like mullions further block the east and west solar exposure

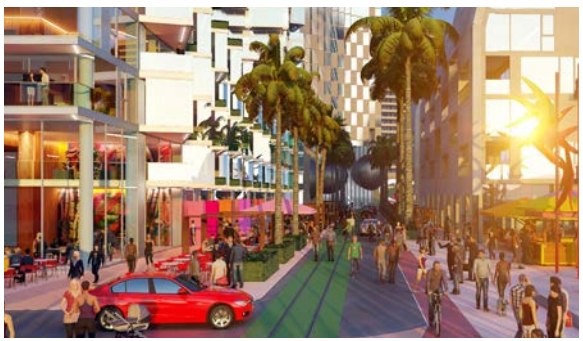


The design of 34 story towers is inspired by the unique mountainous landscape found in Vietnam where vegetation grows on rocktops and within crevasses. The shape of the tower bulges out in the middle – increasing floorplates where rents are optimal.

The Peninsula

Niteroi, Brazil 2018 – Ongoing

Site area: 26 Acre
FAR: 2.0 average
Height limit: 420 FT
Overall Development GFA: 2,264,291 SF
Open space: 60 %



Located northwest of Niterói lies a 26 Acre waterfront site overlooking Guanabara Bay and Rio de Jeneiro skyline beyond. The site connects with Rio via the Costa e Silva Bridge. As part of a new district that extends the City to the Bay, the Peninsula is a vibrant waterfront development with host of land uses ranging from street level retail, offices of numerous formats, affordable to high-end residences, artist lofts, hotels and public market. The massing and heights of the buildings are carefully stipulated to maximize their views, sea breeze and sunlight.

The design of public realm, both at the street level and upper floors of the buildings play a critical role in animating the overall 'vibe' of the place. The central idea has been to emulate the 'energy' of Copacabana promenade in Rio where there is seamless connectivity between water, public beaches and the private developments. Only the difference here is the design of the roadways that has been scaled down to create more retail friendly environment that prioritizes the pedestrian experiences. Privately funded street car will bring the visitors from the eastern edge towards the waterfront minimizing the destination traffic and the parking demand. Series of plazas, courtyards and alleys form a tapestry of airy, breezy and dynamic public spaces open to people from all walks of life – an integral part of modern Niteroi and Rio Metropolitan Area.

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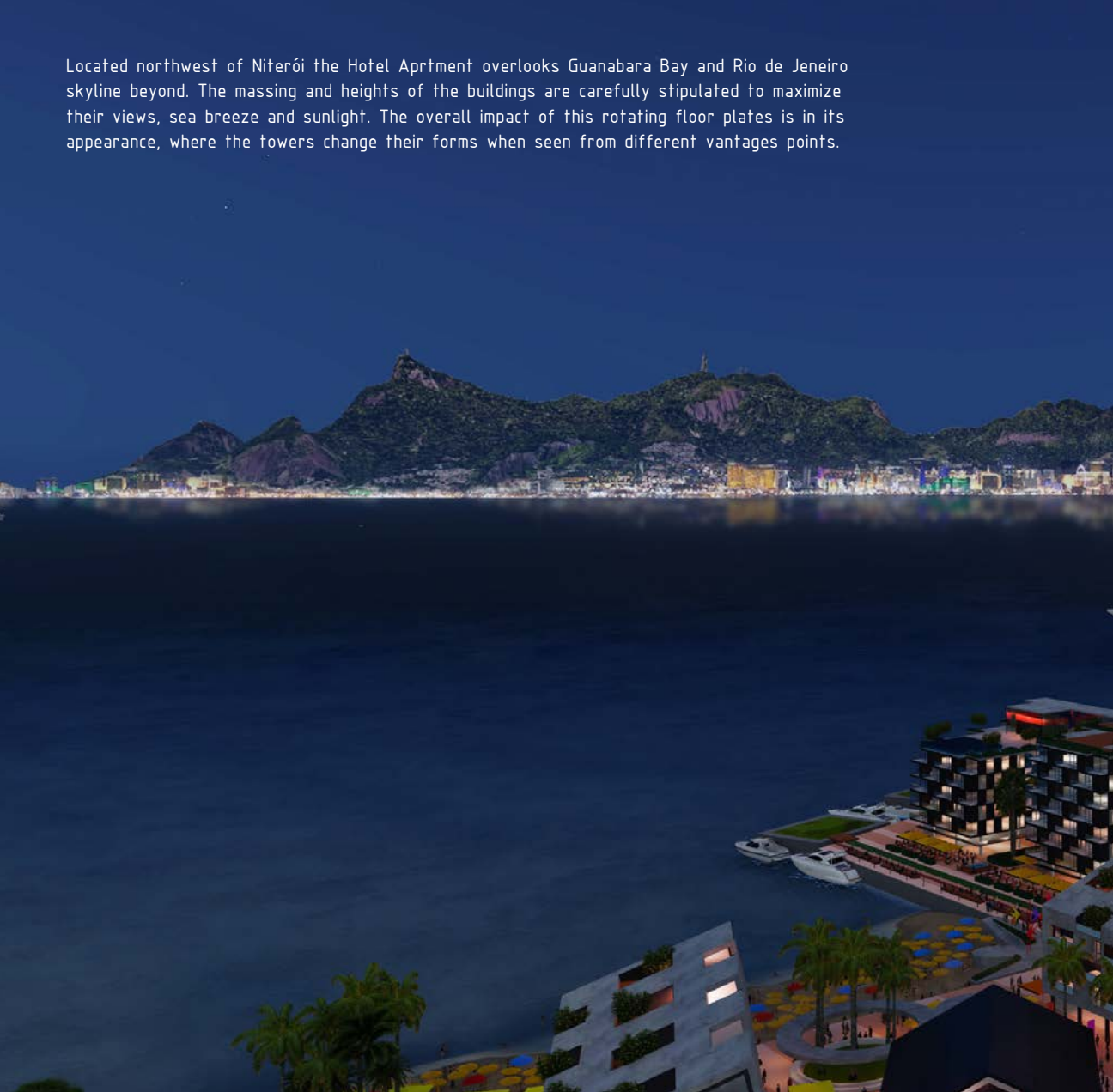
Located northwest of Niterói the Hotel Aprtment overlooks Guanabara Bay and Rio de Jeneiro skyline beyond. The massing and heights of the buildings are carefully stipulated to maximize their views, sea breeze and sunlight. The overall impact of this rotating floor plates is in its appearance, where the towers change their forms when seen from different vantages points.



Leadership

EDUCTAION
Mssters of Science in Urban Studies and Real Estate, 2000
Massachusetts Institute of Technology, Boston, USA

Bachelor of Architecture, 1994
School of Planning and Architecture, New Delhi, India

PRIOR APPOINTMENTS
Design Director + Associate Principal
Ehrenkrantz, Eckstut and Kuhn Architects, NYC, USA

Director of Urban Planning and Design
Michael Baker Corporation, Washington DC, USA

Kiran Mathema

Founding Partner

Design Director

Kiran is an internationally recognized, award winning architect and urban planner whose practice, teaching and re-search have engaged the cities of the US, China, India, Kingdom of Saudi Arabia, Jordon, Turkey, Germany, Spain, Brazil, Singapore and Nepal.

With design experience spanning two decades in leading firms of the US, Kiran brings a distinct cross-disciplinary expertise in the fields of regional/urban planning, architecture, landscape design and public infrastructure. One of his key focuses is sustainable tourism and the hospitality sector where he has been retained by both the public and private institutions in developing tourism-oriented land use and transportation plans to designing of luxury resorts.

The common thread that ties his strikingly wide range of work is his ecologically-sensitive approach, and the rigor with which he designs projects to smallest details. His revolutionary design solutions are based on evolutionary and inclusive process. Divergent goals and interests are integrated to identify unique opportunities – eventually result-ing in designs that are distinct and striking. Spirit of inquiry, challenging preconceptions and testing conventions sets apart all his work.

In addition to his professional practice, Kiran continues to be involved in academia. He served as lecturer, and visit-ing faculty, for numerous graduate and undergraduate programs in the US and abroad.

AWARDS

International Property Awards, Asia Residential Category 2013 - The LEAF, Nagarkot, Nepal.

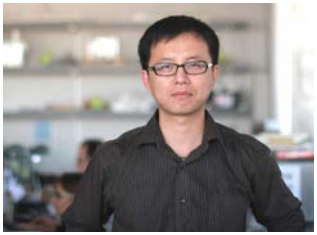
American Institute of Architects, New York Chapter for Sustainability, 2012 – Qingdao Waterfront (Kiran Mathema as Design Director at Ehrenkrantz Eckstut & Kuhn Architects)

American Institute of Architects, National Awards for Sustainability, 2007 – Crown Farm (Kiran Mathema as Design Director at Ehrenkrantz Eckstut & Kuhn Architects)

US Federal Highway Administration, Awards for Environmental Excellence, 2007 – Great Streets Framework Plan (Kiran Mathema as Design Director at Ehrenkrantz Eckstut & Kuhn Architects)

American Planning Association, Regional Awards 2006 - AWI Transportation Architecture Design Standards (Kiran Mathema as Director at Michael Baker Jr. Inc)

American Society of Landscape Architects, Chapter Awards 2005 – H Street NE Transportation and Public Realm Design (Kiran Mathema as Director at Michael Baker Jr. Inc)



Qian Li

Qian Li is a registered architect (New York, USA) with over a decade of experience in large-scale, mixed-use, academic, commercial, industrial and housing projects. As a Partner, Qian shares a joint-responsibility in the design and execution of MAP projects, with a particular focus on China.

After graduating from Columbia University, USA, Qian served as Senior Associate at Ehrenkrantz Eckstut and Kuhn Architects in New York (now part of Perkins Eastman Company), where he was involved in many prominent projects, including Shanghai North Bund Office Complex and Houston Intermodal Transit Center. Shanghai North Bund complex – the overall project – is LEED-CS Gold pre-certified, and one of its buildings is BREEAM certified, the first of its kind in Shanghai. Subsequently, Qian joined Diller Scofidio + Renfro's NYC office, as a Senior Architect where he led the Dongguan Factory Complex project from its concept stage to the construction phase.

Ajaya Mathema

Ajaya spearheads the overall operations, management and financials of the firm and is responsible for Nepal project office. Ajaya received his Bachelor's degree in Accounting from Eastern Connecticut State University and Masters of Business Administration from Georgia State University. Before moving back to Kathmandu, Ajaya worked for several Fortune 500 companies in the US as Senior Financial Analyst. Subsequently, he served as Chief Administrative Officer at Blue Cross Hospital in Nepal.

MAP uniquely benefits from Ajaya's decade long, international experience in management and operations. His expertise is leveraged on a daily basis at the project level - where he works closely with technical teams to streamline project and client management efforts, sequencing of work processes and quality control mechanisms.

Rohit C N Kashyap

Rohit is a Partner overseeing overall Business Development and Operations for the firm in the MEA Region. He has two decades of diverse international expertise in the creation, execution and management of development projects which include cities, mixed use developments and transportation infrastructure.

Rohit spent nearly a decade in New York and Boston working on award winning projects with clients including Samsung, Google, Citigroup, and Newmark Grubb Knight Frank. His key projects include King Abdullah Economic City, KSA, the Chelsea Market Redevelopment, New York, and the Orchard Garden School, Boston.

Rohit has held executive positions with EMAAR Middle East, Ozonegroup India, and Sobha Group UAE. He is a Sloan Fellow of the Massachusetts Institute of Technology (MIT), USA from where he has an MBA. He is a Master of Architecture from Arizona State University, USA, and a Bachelor of Architecture from the School of Planning & Architecture, India. He is a Registered Architect in India, and a member of the Council of Architecture, and the Indian Institute of Architects.

Vinod Singhi

Vinod Singhi is a registered Architect based in New Delhi, India. As a Director of India Operations he is responsible for coordinating local projects in India. He also concurrently serves as Partner-in-charge of Basics Architects, a Architecture & Interior Design firm based in New Delhi.

He completed his degree in Architecture from School of Planning & Architecture, New Delhi & further pursued Master's in Construction Management from UNSW, Sydney. Prior to starting his practice he worked with Sharat Das & Associates and worked on some prominent projects. He later joined as a Partner in Ampersand, a start up firm which were pioneers in Retail Design in India. He has over a decade of experience in projects ranging from Institutional, Hotels and Housing. Combined with his construction management experience, Vinod provides a comprehensive understanding of projects with improved integration between design & construction.

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