Eastpoint Planning Study
and Zoning Plan

Public Presentation to the
People of Curacao

30 October 2012
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Approach

1. Preparation of an *Environmental and Ecological Assessment Report* and an *Infrastructure Assessment and Sustainability Report*.

2. Preparation of a *Site Analysis* to provide a basic understanding of the site, both potential development areas as well as sensitive areas to be designated as conservation / open lands.

3. The reports and *Site Analysis* were used in the evaluation of preliminary development scenarios.

4. Preparation of Environmental Principles and Development Objectives influencing the proposed plan.


6. Preparation of recommendations for sustainable development in order for Eastpoint to be as self supporting as possible.
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Site Overview – Salinja Cabes (near Awa di Oostpunt)
Site Overview – Oost Seinpost looking east to Seru Grande
Site Overview – View from Oost Seinpost over Fuik area towards the Duivelsklip and the Caribbean Sea
Site Overview – Fuik Baai looking east
Site Overview – North coast plateau
Environmental Assessment

The planning teams' literature search and field investigations culminated in the development of an Environmental Assessment Report which addressed the following broad subject areas:

• Topography
• Natural resources constraints
• Geology
• Watersheds
• Wetlands and surface water features
• Vegetation and vegetation communities
• Cultural resources
• Wildlife, including threatened and endangered species
• Offshore coral reefs

The report is based on research, review of the existing scientific literature, and meetings and discussions with the landowner and local experts.

The planning team also conducted site visits as follows:
• Langan International (Feb. 8 – 11 and March 26, 2011, 10 man-days total spent on site by Langan scientists and engineers)
• Wolff Landscape Architecture and EcoPlan (five additional man-days spent on site by WLA and EcoPlan planners and landscape architects)
Results of Environmental Assessment

Research, field investigations, studies and surveys enabled documentation and more accurate identification of critical natural resources including but not limited to:

- Significant and previously undocumented freshwater wetlands
- Stable vegetated riparian corridors
- Network of intermittent stream channels
- Sinkholes and disappearing streams
- Freshwater ponds
- Further refinement of vegetative community types and boundaries
- Significant native bat population along the northeastern coast as confirmed by daytime and nocturnal bat surveys
- Extensive mudflats, salinas, and mangrove swamps
- Field identification of wildlife species including but not limited to: Crested Caracara; American Kestrel; Caribbean Flamingo and White-tailed Hawk
- Coral reefs

This research enabled the team to identify potential existing and future threats to the resources and develop preliminary conservation recommendations to protect and conserve these important natural resources as part of the overall Planning Study.
Infrastructure Assessment

Water
- Aqualectra have stated that they have capacity expansion plans and expect to be able to serve future Eastpoint demand

Power Supply & Renewable Energy
- Aqualectra have stated that they have capacity expansion plans and expect to be able to serve future Eastpoint demand
- Eastpoint is considered an excellent location for wind energy
- Deep seawater cooling is considered a potential technology for use

Telecommunications
- UTS have stated that they are able to expand facilities to serve future Eastpoint demand

Solid Waste
- Selikor have stated that they have landfill capacity and will expand collection service as necessary to serve future Eastpoint demand

Wastewater
- Wastewater would be collected and treated within the Eastpoint developments and would likely be re-used as irrigation water
Infrastructure Assessment (continued)

Stormwater
• Proposed development would manage and control stormwater volumes and flow rates so as not to increase existing discharges to receiving waters
• Proposed development would manage and control stormwater runoff quality so as to minimize erosion and sedimentation to receiving water
• Goal would be to capture and re-use rainwater as much as possible

Traffic and Transportation
• As demand increases through the course of development the access roads from the Ring to Eastpoint will be gradually widened from 2 to 4 lanes along the two major routes:
  • Santa Rosaweg / Weg Naar Montana / Kaminda Hose P. Liberia / Weg Naar Sta. Barbara
  • Caracasbaaiweg / Kaminda Duvert Boy Nicolina / Weg Naar Montana / Kaminda Jose C. Anthonia / Weg Naar Fuik
Site Analysis
Site Analysis – Enlargement
North section of Eastpoint, including St. Joris Baai, Landhuis Klein St. Joris, and portion of north coast
Site Analysis – Enlargement
Southwest section of Eastpoint, from Fuik Baai to Awa Blanku, including Oost Seinpost and Seru Grande
Site Analysis – Enlargement
Southeast section of Eastpoint, Awa Blanku to Oostpunt / Awa di Oostpunt and portion of north coast
Environmental Principles

No development in tidal, brackish, freshwater wetlands or salinjas.
No development in mangrove swamps.
No development in major drainage swales; 100 m buffer corridor along swales.
Treat natural rainfall as a valuable and precious natural resource.
No development on peaks, hilltops, ridgelines, or other unique and important geological features.
No development on steep slopes.
Limited development within lagoons for water-related uses, such as marinas or south seas type bungalows over the water.
No other development within lagoons.
No development on narrow barrier beaches.
Establish wildlife corridors that connect habitats throughout Eastpoint.
No impacts on the offshore coral reefs.
No impacts on resident bats or resident or migratory birds.
Preserve important historical and cultural artifacts and sites.
No development immediately around Landhuis Fuik or Landhuis Klein Sint Joris.
Planning Principles

Lower elevations without sea views are not well suited for real estate development.

Mountain peaks, crests, and ridgelines should be kept in their natural state.

Lower elevations can be used for minor land uses.

Hotels should be “clustered” since they tend to complement each other.

Hotels must have a beach in order to compete in an island resort environment.

No homes or residential areas should be accessed directly from primary roads.

Retail, entertainment and tourist venues should be located near the hotels.

Main roads to hotels and destination venues should be as direct as possible.

Golf should be “links” type courses, with fairways incorporating natural terrain.

No development in, and minimal disturbance of, natural drainage corridors.

Open space / conservation areas should be contiguous, with few road crossings.

Agricultural uses should be placed in the lower elevations of the site.

Agriculture should be contiguous and have separate access.

Project should be phased such that new construction does not conflict with previously developed phases.
Development Objectives

Plan and develop Eastpoint as a community where locals live, work, and play.
Accommodate locations for “village centers” with mixed-use development.
Realize the site’s real estate potential by locating tourism along the south coast.
Tourist hotels should be adjacent to, and around, the lagoons.
Luxury residential should be near the lagoons and along the south coast.
Locate higher density “urban areas” on the slopes along the south coast.
Plan Eastpoint development according to sustainable design principles.
Provide a marina in Fuik Bay, which already has deepwater access to the sea.
Consider boat access into Lagun Blancu.
Limited development within lagoons for water-related uses, such as marinas or south seas type bungalows over the water. Water in which development is allowed to be designed “Tourism.” Other undeveloped areas to be designated as “Water.”
Maintain Awa Blancu and Awa di Oostpunt without motorized boat access.
Accommodate two “players” destination golf courses on the north coast and one “community” golf course in the interior of the site.
Development Objectives (continued)

Road system to have multiple points of entry, include a main roadway to the south coast, and have internal loops for flexibility and better traffic distribution.

75 hectares to be transferred from the Maal family to the government adjacent to Fuik.
Proposed Zoning Plan

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Proposed Zoning Plan – Enlargement (North)
North section of Eastpoint, including St. Joris Bay, Landhuis Klein St. Joris, and portion of north coast
Proposed Zoning Plan – Enlargement (Southeast)
Southeast section of Eastpoint, Awa Blanku to Oostpunt / Awa di Oostpunt and portion of north coast
Sustainable Development

Water
- Water recapture
- Water-efficient irrigation and “xeriscaping” (use of native or adapted plants)
- Rainwater harvesting (also applies to “Stormwater” below)

Renewable Energy
- Wind power
- Solar power
- Waste-to-energy
- Deep seawater cooling

Telecommunications
- Underground infrastructure
- Cellular installations installed at higher elevations and on buildings

Solid Waste
- Waste reduction, re-use, and recycling
- Composting

Wastewater
- Greywater re-use

Traffic and Transportation
- Mass transit
- Priority parking
Sustainable Development (continued)

Stormwater
- Porous pavements
- Rainwater harvesting
- Stormwater capture and reuse
- Cisterns and rainwater harvesting systems
- Erosion and sedimentation control
- Maintenance of natural features
- Rain gardens
Conclusion

46.1% of the land is designated in the Zoning Plan as “non-developable” (Conservation, Park, Open Lands, or Water)

The Zoning Plan respects the natural systems and environmental areas present on site. In fact, it adds to these by providing new “linkages” to connect existing ecological areas.

53.9% of the land is “developable.” However, this is a bit misleading, as four of the eight land uses are mostly or partly green (Conservation / Tourism Support (golf); Conservation / Rural Habitation Support (wind farm); Agriculture; and Roads, which will be partly green).

Approximately 72% of the site will remain undeveloped and green, which is a remarkably high percentage and high level of commitment to the environment.

The Zoning Plan balances the physical capabilities of the land with the realities of development.