The Electrowave Shuttle is a successful local transit service that operates on clean electric power. The City of Miami Beach desires to extend Electrowave Shuttle service to both Middle and North Beaches in the future. Therefore, the city is looking to develop a permanent home and Intermodal Facility for the shuttle vehicles, to create an ease of transfer between various modes; provide incentive to ride transit; create economic development opportunities; serve as a site for storing, charging, and maintaining the electric shuttle vehicles; as well as develop a facility that is fitting as a design centerpiece in one of the world’s most popular resorts.

This project focuses on analyzing these sites for their ability to house new facilities and function at optimal standards. It examines the merits of separate and joint facilities. The following is a summary of the Intermodal Feasibility Study.
Introduction
The following sites were analyzed as potential sites for a permanent Intermodal Facility:

- 5th Street and Michigan Avenue
- 5th Street and Alton Road
- West Avenue and Dade Boulevard
- Convention Center Lot
- City Hall Parking Lot
- Dade Boulevard and Pine Tree Avenue (heavy maintenance only)
- Indian Creek and Collins Avenue
- 83rd Street and Collins Avenue North
- 83rd Street and Collins Avenue South
- 17th Street and Washington Avenue
- City Hall Lot East
Recommendations

Each site has been evaluated based on the following criteria:

- Potential Rail Connection
- Minimum Size Requirements
- Ability to Accommodate Intermodal Transfer
- Ability to Accommodate Electric Shuttle Maintenance and Storage
- Ability to Accommodate Parking
- Ability to Facilitate Joint Development
- Ability to Serve Historic District Hotels
- Ability to Serve Convention Center
- Proximity to Shuttle Routes
- Ability to Serve MOTA Routes
- Cost of Land Acquisition
- Impacts on Residential Areas
- Ability to Facilitate Service to Middle-Beach
- Ability to Serve High Density Development
- Effects on Existing Traffic Congestion
- Potential Negative Environmental Impacts

Separate Facilities

Separating the Intermodal and Maintenance facilities is an important consideration as each serves a different function. The Intermodal facility is a high profile, centrally located facility oriented to the public. It will be a gateway and showpiece for the city, thus, representing Miami Beach’s progressive attitude toward transportation, mobility, and quality of life for residents and tourists. The Maintenance Facility serves a less glamorous role and will not be a prominent building. Its primary purpose will be to service and store the Electrowave vehicles and will not directly serve the public.

Best Sites for Intermodal Facility

1. Convention Center Lot
2. 17th and Washington
3. 5th Street and Alton Road

The Convention Center lot is most appropriate for the Intermodal Center and parking garage due to its size and location. It accommodates intermodal transfer from self contained parking, existing MOTA and Electrowave transit routes, and potential future rail transit and has adequate connections with Middle Beach. The 17th and Washington site may be equally suited for such a facility with more space and fewer potential conflicts with Convention Center uses. Both sites are owned by the City and could service the Convention Center area, city center offices and entertainment functions of Lincoln Road and Washington Avenue as well as a large portion of the areas hotel rooms. Some modification to existing zoning may need to take place to maximize joint venture opportunities that would be permitted in the GU District.

<table>
<thead>
<tr>
<th>Criteria</th>
<th>5th/ Michigan</th>
<th>5th/Alton</th>
<th>West Ave/ Dade Blvd.</th>
<th>Convention Center</th>
<th>City Hall Lot</th>
<th>City Hall East</th>
<th>17th/ Washington</th>
<th>Dade Blvd/ Pine Tree</th>
<th>In</th>
</tr>
</thead>
<tbody>
<tr>
<td>Potential Rail Connection</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td></td>
</tr>
<tr>
<td>Accommodate Intermodal Transfer</td>
<td>●</td>
<td>○</td>
<td>○</td>
<td>○</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>○</td>
</tr>
<tr>
<td>Accommodate Maintenance</td>
<td>○</td>
<td>●</td>
<td>○</td>
<td>○</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>○</td>
</tr>
<tr>
<td>Accommodate Parking Structure</td>
<td>●</td>
<td>○</td>
<td>○</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>○</td>
</tr>
<tr>
<td>Facilitate Joint Development</td>
<td>○</td>
<td>●</td>
<td>○</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>○</td>
</tr>
<tr>
<td>Serves Ocean Drive Hotels</td>
<td>○</td>
<td>●</td>
<td>○</td>
<td>○</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>○</td>
</tr>
<tr>
<td>Serve Convention Center</td>
<td>○</td>
<td>○</td>
<td>○</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>○</td>
</tr>
<tr>
<td>Proximity to Shuttle Routes</td>
<td>●</td>
<td>●</td>
<td>○</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>○</td>
</tr>
<tr>
<td>Serve MDTA Routes</td>
<td>●</td>
<td>○</td>
<td>○</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>○</td>
</tr>
<tr>
<td>Cost of Land Acquisition</td>
<td>○</td>
<td>○</td>
<td>○</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>○</td>
</tr>
<tr>
<td>Impacts on Residential Areas</td>
<td>○</td>
<td>○</td>
<td>○</td>
<td>○</td>
<td>○</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>○</td>
</tr>
<tr>
<td>Facilitate Serving Mid-Beach</td>
<td>○</td>
<td>○</td>
<td>○</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>○</td>
</tr>
<tr>
<td>Serves High Density Development</td>
<td>○</td>
<td>●</td>
<td>○</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>○</td>
</tr>
<tr>
<td>Existing Traffic Congestion</td>
<td>○</td>
<td>○</td>
<td>○</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>○</td>
</tr>
<tr>
<td>Potential Negative Environmental Impacts</td>
<td>○</td>
<td>○</td>
<td>○</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>○</td>
</tr>
</tbody>
</table>
**Best Sites for Maintenance Facility**

1. **Dade Boulevard and Pine Tree Drive**
2. Convention Center Lot
3. 5th Street and Alton Road

The Dade and Pine Tree site is the best site for the Maintenance Facility because it is currently used for similar activities. Additionally, the site is owned by the city and is in close proximity to both proposed Intermodal Sites. The site is insulated from public view and will have minimal impact on surrounding residential neighborhoods.

**Best Sites for Combined Facilities**

1. **17th and Washington**
2. Convention Center Lot
3. 5th Street and Alton Road
4. Dade Boulevard and Pine Tree Drive

The consultant does not recommend the combined option.
A figure ground drawing helps to identify the spaces between buildings. This exercise illustrates the quantity of public space and building density for a particular area. In the example of Miami Beach, the figure ground demonstrates how the two proposed sites for the Intermodal Center will fit in the context of the downtown area.
Project Descriptions & Design Issues:

The two schemes proposed in the feasibility study address important civic and urban issues relating to public space. The main terminal's open floor plan will create a destination where passengers become as much of an attraction as the terminal itself. As a result, the terminal will serve dual roles as a public gathering space and an intermodal transfer station to eventually become an identifiable point of reference and landmark in Miami Beach.

The Intermodal Center program will include a light maintenance component, storage for 20 buses and their bateries, and passenger amenities, as well as a dispatch room, employee restrooms, common rooms and changing areas. Heavy maintenance will occur at the Dade / Pinetree site which currently functions as the city's maintenance yard.

17th Street and Washington Avenue Site

The 17th Street and Washington Avenue is bound on the north by 17th Street; on the east by Washington Avenue; on the west by Pennsylvania Avenue and on the south by Lincoln Lane. The site accommodates a variety of different uses in addition to the Intermodal Center. These uses include ground level retail along Washington Avenue and 17th Street, and parking for 1600 cars. The north-south orientation of the terminal building reinforces the pedestrian connection between 17th Street and Lincoln Road. The link is created by enhancing Drexel Avenue as a pedestrian-friendly through street that addresses both the main terminal to the east and a linear mixed-use building to the west.
Convention Center Site

The Convention Center / City Hall site is bound on the north by the current Convention Center parking lot; on the west by a row of residential buildings; on the east by the Convention Center and on the south by City Hall and its parking lot. The main terminal is located between Meridian Avenue and Convention Center Drive. This east-west orientation will create a public street to directly link the intermodal facility and City Hall. This newly reclaimed public thoroughfare will enhance both the pedestrian and vehicular experience of what could be an emerging civic center. The project also includes parking spaces for 1000 cars and accommodates the City Hall expansion.
Market Analysis

The market assessment analyzed the current and estimated future demand for key real estate uses, including office, residential, retail and hotel, studio/industrial uses. This analysis considered regional economic and demographic trends, inherent strengths and weaknesses of the Miami Beach area, as well as competitive implications of real estate activity in surrounding areas.

The approach to defining the highest and best use development program for each site considers a number of factors that determine viability including:

- **Market Dynamics** – outlines the economic strength of the region (and appropriate submarkets) that will support various real estate uses.

- **Location** – highlights characteristics unique to each site that promote and/or constrain commercial development including access, compatibility with surrounding uses, and proximity to demand centers and complimentary uses.

- **Physical Characteristics** – highlights notable features that may enhance or impede commercial development with respect to site condition, ingress/egress, exposure and other related features.

- **Development Regulation** – identifies issues [if any] that impact the ability to maximize development opportunities due to existing zoning restrictions and/or governmental regulations.

Recommendation Summary

Considering the development factors outlined above, and based upon the research and analysis conducted herein, a profile of highest and best use for the top three sites is highlighted on the following table. In summary, our findings indicate:

1. General economic and demographic market conditions impacting all of the proposed Intermodal sites (specifically the South Beach sub-market) support moderate new development of office, retail, rental and studio uses.

2. While the locations of all sites are conducive to at least some type of commercial and/or residential development, the Washington Avenue/17th Street site represents the most desirable location to accommodate a multitude of commercial uses, including office, rental, retail and hotel. Convention Center also provides the opportunity to accommodate a wide spectrum of uses, including residential and hotel; however, the site is somewhat limited by its size (less than 2 acres). The Alton Road/5th Street site is best suited for development which is limited to apartment rental and studio use.

3. There does not appear to be any physical constraint such as topography, site configuration/shape and general condition for any of the sites, that would negatively impact near term development. It is important to note, however, that the Alton Road/5th Street site is impeded by access issues (primarily ingress/egress) stemming from the configuration of the interchange which minimizes the potential for certain uses.

The following text describes two of the three best sites with the best development potential:

- Convention Center Lot
- Washington Avenue and 17th Street
# City of Miami Beach Intermodal Facility
## Highest & Best Use Profile

<table>
<thead>
<tr>
<th>Site</th>
<th>Office</th>
<th>Retail</th>
<th>Hotel</th>
<th>Residential</th>
<th>Studio/Industrial</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>17TH STREET &amp; WASHINGTON AVE.</strong></td>
<td>150,000 to 200,000 sq. ft.</td>
<td>10,000 to 15,000 sq. ft.</td>
<td>125- to 150-room limited service</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td></td>
<td>$28 to $32 per sq. ft., fsg</td>
<td>$32 to $36 per sq. ft., net</td>
<td>(business hotel)</td>
<td>$130 to $150 ADR</td>
<td></td>
</tr>
<tr>
<td><strong>CONVENTION CENTER</strong></td>
<td>50,000 to 100,000 sq. ft.</td>
<td>2,000 to 5,000 sq. ft.</td>
<td>75- to 100-room limited services</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td></td>
<td>$25 to $28 per sq. ft., fsg</td>
<td>426 to $30 per sq. ft., net</td>
<td>(business hotel)</td>
<td>$130 to $150 ADR</td>
<td></td>
</tr>
<tr>
<td><strong>ALTON ROAD &amp; 5TH STREET</strong></td>
<td>N/A</td>
<td>1,500 to 3,000 sq. ft.</td>
<td>150- to 200-unit Rental</td>
<td>Music/Film Studio</td>
<td></td>
</tr>
<tr>
<td></td>
<td>(transit retail)</td>
<td>(transit retail)</td>
<td>(mixed income)</td>
<td>(two-bedroom)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>$24 to $28 per sq. ft., net</td>
<td>$24 to $28 per sq. ft., net</td>
<td>$700 to $900 per month</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
**Convention Center Lot**

**USES**

The market dynamics support a multitude of uses at the Convention Center site; however, the optimal uses include office, retail, hotel and residential. Considering the site size, the proposed development program includes:

**Office**

Based upon existing market conditions, and considering the projected demand for office space, a 50,000 to 100,000 square-foot development is deemed viable for this site.

**Retail**

The 1,500 to 3,000 square feet of retail development proposed for this site represents support for the office development and transit retail uses.

**Hotel**

A quality, limited service hotel targeting business, convention and leisure travel may be possible. Further study for this use is recommended.

### CONVENTION CENTER LOT

Highest & Best Use

<table>
<thead>
<tr>
<th>Use</th>
<th>Density</th>
<th>Rates</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Office</strong></td>
<td>50,000 to 100,000 sq.ft.</td>
<td>$25 to $28/sq.ft., gross</td>
</tr>
<tr>
<td><strong>Retail</strong></td>
<td>1,500 to 3,000 sq.ft.</td>
<td>$26 to $30/sq.ft., net</td>
</tr>
<tr>
<td><strong>Hotel</strong></td>
<td>100 to 125 room (business)</td>
<td>$130 to $150 ADR</td>
</tr>
<tr>
<td><strong>Residential</strong></td>
<td>75 to 100 units (rental)</td>
<td>$700 to $900/PUM</td>
</tr>
<tr>
<td><strong>Studio/Industrial</strong></td>
<td>N/A</td>
<td>N/A</td>
</tr>
</tbody>
</table>

**Residential**

Given the demand for moderately priced new rental housing, this particular sight may be well suited to accommodate a 75- to 100-unit complex.

**LOCATION**

The Convention Center site is a desirable location to accommodate office, limited retail and hotel use. Proximity to Lincoln Road and surrounding hotel projects, access to major roadways, and exposure to a major intersection promotes Class B+ office development as a strong opportunity for this site.

**PHYSICAL CHARACTERISTICS**

The site appears to be in “ready-to-build” condition, with no apparent restrictions to ingress/egress.

**OTHER FACTORS**

Densities surrounding the area are conducive to transit as are commercial, governmental and cultural uses in and surrounding the area. The location will provide an influx of patrons to the area, will provide the connection to Ocean Drive and South Beach, is ideal for transfers from MDTA bus routes, and would be the most effective terminus to the proposed light rail. Some conflicts may arise with Convention Center events, more specifically those associated with the Boat Show.
Washington Avenue & 17th Street

USES
The market dynamics support a multitude of uses at the site; however, the optimal uses include office, retail, and hotel. Considering the site's size, the proposed development program includes:

**Office**
Based upon existing market conditions, and considering the projected demand for office space, a 150,000 to 200,000 square-foot development is deemed viable for this site.

**Retail**
The 10,000 to 15,000 square feet of retail development proposed for this site represents support for the office development and transit related retail.

**Hotel**
A quality, limited service hotel targeting business, convention and leisure travel is deemed possible. Further study for this use is recommended.

<table>
<thead>
<tr>
<th>Use</th>
<th>Density</th>
<th>Rates</th>
</tr>
</thead>
<tbody>
<tr>
<td>Office</td>
<td>150,000 to 200,000 sq. ft.</td>
<td>$28 to $32/sq.ft., gross</td>
</tr>
<tr>
<td>Retail</td>
<td>10,000 to 15,000 sq. ft.</td>
<td>$32 to $36/sq.ft., net</td>
</tr>
<tr>
<td>Hotel</td>
<td>125 to 150 room (business)</td>
<td>$130 to $150 ADR</td>
</tr>
<tr>
<td>Residential</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td>Studio/Industrial</td>
<td>N/A</td>
<td>N/A</td>
</tr>
</tbody>
</table>

**Residential**
While residential and/or studio development may be warranted for the area, the use does not maximize the sites potential relative to other uses.

**LOCATION**
The Washington Avenue/17th Street site represents the most desirable location to accommodate office, limited retail and hotel use. Proximity to Lincoln Road and surrounding hotel projects, access to major roadways, and exposure to a major intersection promotes office development as the strongest opportunity for this site.

**PHYSICAL CHARACTERISTICS**
The site appears to be in “ready-to-build” condition, with no apparent restrictions to ingress/egress.

**OTHER FACTORS**
Densities surrounding the area are conducive to transit as are commercial, governmental and cultural uses in and surrounding the area. This site is large enough to accommodate the maintenance facility, a parking garage and an Intermodal Center with joint development or City Offices using air rights. This combination of all uses is not recommended however. The site is well situated for MDTA bus routes, the existing shuttle route, and any proposed LRT line. It is well situated as a destination for Lincoln Road, theaters and the Convention Center. There would be minimal conflicts with peripheral uses associated with the Convention Center.