RESOLUTION NO. 2014-

A RESOLUTION OF THE VILLAGE COUNCIL OF THE VILLAGE OF KEY BISCAYNE, FLORIDA, APPROVING AN AGREEMENT WITH THE CORRADINO GROUP, INC. FOR THE PREPARATION OF A MOBILITY STUDY WITHIN THE VILLAGE; PROVIDING FOR AN EXEMPTION OF COMPETITIVE BIDDING; PROVIDING FOR AUTHORIZATION; AND PROVIDING FOR AN EFFECTIVE DATE.

WHEREAS, the Village of Key Biscayne (the "Village") Village Council recognizes that during certain peak hours of the day there is traffic congestion as well as other mobility issues affecting roadways within the Village; and

WHEREAS, the Village Council desires to conduct a study to determine exactly what the existing traffic conditions are like, which facilities are performing poorly, which can be fixed, and what it would cost to fix them (the "Study"); and

WHEREAS, the Village Council finds that this Study is exempt from competitive bidding as a professional service because it will be performed by professional traffic planners with an American Institute of Certified Planners (AICP) certification; and

WHEREAS, the Village Council desires to engage The Corradino Group, Inc. to prepare the Study and approves the agreement in substantially the form attached hereto as Exhibit "A;" and

WHEREAS, the Village Council finds that this Resolution is in the best interest and welfare of the residents of the Village.

NOW, THEREFORE, BE IT RESOLVED BY THE VILLAGE COUNCIL OF THE VILLAGE OF KEY BISCAYNE, FLORIDA, AS FOLLOWS:

Section 1. **Recitals Adopted.** Each of the above stated recitals are hereby adopted, confirmed and incorporated herein.

Section 2. **Competitive Bidding Exemption.** The Village Council finds that the Study is being performed as a professional service and is exempt from competitive bidding pursuant to Section 2-87(2) of the Village Code of Ordinances.

Section 3. **Agreement Approved.** The Village Council hereby approves the agreement with The Corradino Group, Inc. in substantially the form attached hereto as Exhibit "A."

Section 4. **Village Manager Authorized.** The Village Manager is hereby authorized to execute the agreement, in substantially the form attached hereto as Exhibit "A," with The Corradino Group, Inc. for the Study, subject to approval as to form, content, and legal sufficiency by the Village Attorney.

Section 5. **Effective Date.** This Resolution shall be effective immediately upon adoption.

PASSED AND ADOPTED this ___ day of _____, 2014.

_____
MAYOR FRANKLIN H. CAPLAN

ATTEST:

_____
CONCHITA H. ALVAREZ, MMC, VILLAGE CLERK

APPROVED AS TO FORM AND LEGAL SUFFICIENCY:

_____
VILLAGE ATTORNEY

PROFESSIONAL SERVICES AGREEMENT

BETWEEN

THE VILLAGE OF KEY BISCAYNE

AND

THE CORRADINO GROUP, INC.

THIS AGREEMENT (this "Agreement") is made effective as of the ____ day of _____, 2014 (the "Effective Date"), by and between the **VILLAGE OF KEY BISCAYNE, FLORIDA,** a Florida municipal corporation (hereinafter the "Village"), and **THE CORRADINO GROUP, INC**., a foreign profit corporation (hereinafter the "Consultant").

WHEREAS, the Consultant and Village, through mutual negotiation, have agreed upon a scope of services, schedule, and fee for professional planning services for the preparation of a mobility Study for the Village (the "Project"); and

WHEREAS, the Village desires to engage the Consultant to perform the services and provide the deliverables as specified below.

NOW, THEREFORE, in consideration of the mutual covenants and conditions contained herein, the Consultant and the Village agree as follows:

1. **Scope of Services.**

   1.1. The Consultant shall furnish such professional services and provide deliverables (the "Services") as described in the Scope of Work or Work Authorization attached hereto and made a part hereof as Exhibit "A" (the "Plan").

2. **Term/Commencement Date.**

   2.1 This Agreement shall become effective upon the Effective Date and shall remain in effect until Consultant completes the Services described herein, which Services are scheduled to be completed in accordance with the schedule set forth in the Plan and attached hereto as Exhibit "A", but not to exceed one (1) year from the Effective Date of this Agreement, unless earlier terminated in accordance with Paragraph 8.

   2.2 Consultant agrees that time is of the essence and Consultant shall complete the Services within the timeframes set forth in the Plan attached hereto as Exhibit "A" and as provided in this Agreement, unless extended by the Village Manager.

3. **Compensation and Payment.**

3.1 Compensation for Services provided by Consultant shall be in accordance with the compensation or fee schedule set forth in the Plan attached hereto as Exhibit "A."

3.2 Consultant shall deliver an invoice to Village no more often than once per month detailing Services completed and the amount due to Consultant under this Agreement. Fees shall be paid in arrears each month, pursuant to Consultant's invoice, which shall be based upon the percentage of work completed for each task invoiced. The Village shall pay the Consultant in accordance with the Florida Prompt Payment Act after approval and acceptance of the Services by the Village Manager.

4. **Subconsultants.**

4.1 The Consultant shall be responsible for all payments to any subconsultants and shall maintain responsibility for all work related to the Project.

4.2 Consultant may only utilize the services of a particular subconsultant with the prior written approval of the Village Manager, which approval may be granted or withheld in Village Manager's reasonable discretion.

5. **Village's Responsibilities**

5.1 Village shall make available any maps, plans, existing studies, reports and other data pertinent to the Services and in possession of the Village.

5.2 Upon Consultant's request, Village shall reasonably cooperate in arranging for access to any real property as required for Consultant to perform the Services.

6. **Consultant's Responsibilities**

6.1 The Consultant shall exercise the same degree of care, skill and diligence in the performance of the Services for the Project as is ordinarily provided by a consultant under similar circumstances. If at any time during the term of this Agreement or within two (2) years from the completion of the Project, it is determined that the Consultant's deliverables or services are incorrect, not properly rendered, defective, or fail to conform to the Services for the Project, upon written notification from the Village Manager, the Consultant shall at Consultant's sole expense, immediately correct its deliverables or Services.

6.2 The Consultant hereby warrants and represents that at all times during the term of this Agreement it shall maintain in good standing all required

licenses, certifications and permits required under Federal, State and local laws applicable to and necessary to perform the Services for Village as an independent contractor of the Village.

7. **Conflict of Interest.**

7.1 To avoid any conflict of interest or any appearance thereof, Consultant shall not, for the term of this Agreement, provide any consulting services to any private sector entities (developers, corporations, real estate investors, etc.), with any adversarial issues in the Village. For the purposes of this section "adversarial" shall mean any development application where staff is recommending denial or denied an application, or an administrative appeal or court action wherein the Village is a party.

8. **Termination.**

8.1 The Village Manager, without cause, may terminate this Agreement upon five (5) calendar days written notice to the Consultant, or immediately with cause.

8.2 Upon receipt of the Village's written notice of termination, Consultant shall immediately stop work on the Project unless directed otherwise by the Village Manager.

8.3 In the event of termination by the Village, the Consultant shall be paid for all work accepted by the Village Manager up to the date of termination, provided that the Consultant has first complied with the provisions of Paragraph 8.4.

8.4 The Consultant shall transfer all books, records, reports, working drafts, documents, maps, and data pertaining to the Services and the Project to the Village, in a hard copy and electronic format within fourteen (14) days from the date of the written notice of termination or the date of expiration of this Agreement.

9. **Insurance.**

9.1 Consultant shall secure and maintain throughout the duration of this Agreement insurance of such types and in such amounts not less than those specified below as satisfactory to Village, naming the Village as an Additional Insured, underwritten by a firm rated A-X or better by A.M. Best and qualified to do business in the State of Florida. The insurance coverage shall be primary insurance with respect to the Village, its officials, employees, agents and volunteers naming the Village as additional insured. Any insurance maintained by the Village shall be in excess of the Consultant's insurance and shall not contribute to the

Consultant's insurance. The insurance coverages shall include at a minimum the amounts set forth in this Section 9 and may be increased by the Village as it deems necessary or prudent.

9.2 Commercial General Liability coverage with limits of liability of not less than a $1,000,000 per Occurrence combined single limit for Bodily Injury and Property Damage. This Liability Insurance shall also include Completed Operations and Product Liability coverages and eliminate the exclusion with respect to property under the care, custody and control of Consultant. The General Aggregate Liability limit and the Products/Completed Operations Liability Aggregate limit shall be in the amount of $2,000,000 each.

9.3 Workers Compensation and Employer's Liability insurance, to apply for all employees for statutory limits as required by applicable State and Federal laws. The policy(ies) must include Employer's Liability with minimum limits of $1,000,000.00 each accident. No employee, subcontractor or agent of the Consultant shall be allowed to provide Services pursuant to this Agreement who is not covered by Worker's Compensation insurance.

9.4 Business Automobile Liability with minimum limits of $1,000,000 per Occurrence, combined single limit for Bodily Injury and Property Damage. Coverage must be afforded on a form no more restrictive than the latest edition of the Business Automobile Liability policy, without restrictive endorsements, as filed by the Insurance Service Office, and must include Owned, Hired, and Non-Owned Vehicles.

9.5 Professional Liability Insurance in an amount of not less than One Million Dollars ($1,000,000.00) per occurrence, single limit.

9.6 **Certificate of Insurance.** Certificates of Insurance shall be provided to the Village, reflecting the Village as an Additional Insured (except with respect to Professional Liability Insurance), no later than ten (10) days after award of this Agreement and prior to the execution of this Agreement by Village and prior to commencing any Services. Each certificate shall include no less than (30) thirty-day advance written notice to Village prior to cancellation, termination, or material alteration of said policies or insurance. The Consultant shall be responsible for assuring that the insurance certificates required by this Section remain in full force and effect for the duration of this Agreement, including any extensions or renewals that may be granted by the Village. The Certificates of Insurance shall not only name the types of policy(ies) provided, but also shall refer specifically to this Agreement and shall state that such insurance is as required by this Agreement. The Village reserves the right to inspect and return a certified copy of such policies, upon written request by the Village. If a policy is due to expire prior to the completion of the

Services, renewal Certificates of Insurance shall be furnished thirty (30) calendar days prior to the date of their policy expiration. Each policy certificate shall be endorsed with a provision that not less than thirty (30) calendar days' written notice shall be provided to the Village before any policy or coverage is cancelled or restricted. Acceptance of the Certificate(s) is subject to approval of the Village.

9.7 **Additional Insured.** Except with respect to Professional Liability Insurance, the Village is to be specifically included as an Additional Insured for the liability of the Village resulting from Services performed by or on behalf of the Consultant in performance of this Agreement. The Consultant's insurance, including that applicable to the Village as an Additional Insured, shall apply on a primary basis and any other insurance maintained by the Village shall be in excess of and shall not contribute to the Consultant's insurance. The Consultant's insurance shall contain a severability of interest provision providing that, except with respect to the total limits of liability, the insurance shall apply to each Insured or Additional Insured (for applicable policies) in the same manner as if separate policies had been issued to each.

9.8 **Deductibles.** All deductibles or self-insured retentions must be declared to and be reasonably approved by the Village. The Consultant shall be responsible for the payment of any deductible or self-insured retentions in the event of any claim.

9.9 The provisions of this section shall survive termination of this Agreement.

10. **Nondiscrimination.**

10.1 During the term of this Agreement, Consultant shall not discriminate against any of its employees or applicants for employment because of their race, color, religion, sex, or national origin, and to abide by all Federal and State laws regarding nondiscrimination

11. **Attorneys Fees and Waiver of Jury Trial.**

11.1 In the event of any litigation arising out of this Agreement, the prevailing party shall be entitled to recover its attorneys' fees and costs, including the fees and expenses of any paralegals, law clerks and legal assistants, and including fees and expenses charged for representation at both the trial and appellate levels.

11.2 In the event of any litigation arising out of this Agreement, each party hereby knowingly, irrevocably, voluntarily and intentionally waives its right to trial by jury.

12. **Indemnification**.

12.1 Consultant shall indemnify and hold harmless the Village, its officers, agents and employees, from and against any and all demands, claims, losses, suits, liabilities, causes of action, judgment or damages, arising from Consultant's performance or non-performance of any provision of this Agreement, including, but not limited to, liabilities arising from contracts between the Consultant and third parties made pursuant to this Agreement. Consultant shall reimburse the Village for all its expenses including reasonable attorneys' fees and costs incurred in and about the defense of any such claim or investigation and for any judgment or damages arising from Consultant's performance or non-performance of this Agreement.

12.2 The provisions of this section shall survive termination of this Agreement.

13. **Notices/Authorized Representatives.**

13.1 Any notices required by this Agreement shall be in writing and shall be deemed to have been properly given if transmitted by hand-delivery, by registered or certified mail with postage prepaid return receipt requested, or by a private postal service, addressed to the parties (or their successors) at the following addresses:

For the Village:
John C. Gilbert
Village Manager
Village of Key Biscayne
88 West McIntyre Street
Key Biscayne, FL 33149

With a copy to:
Stephen J. Helfman, Esq.
Village Attorney
Weiss Serota Helfman Pastoriza Cole & Boniske, P.L.
2525 Ponce de Leon Blvd., Suite 700
Coral Gables, Florida 33134

For The Consultant:
Joseph Corradino
The Corradino Group, Inc.
4055 N.W. 97th Avenue
Miami, Florida 33178

14. **Governing Law**.

14.1 This Agreement shall be construed in accordance with and governed by the laws of the State of Florida. Venue for any litigation arising out of this Agreement shall be proper exclusively in Miami-Dade County, Florida.

15. **Entire Agreement/Modification/Amendment.**

15.1 This writing contains the entire Agreement of the parties and supercedes any prior oral or written representations. No representations were made or relied upon by either party, other than those that are expressly set forth herein.

15.2 No agent, employee, or other representative of either party is empowered to modify or amend the terms of this Agreement, unless executed with the same formality as this document.

15.3 Consultant represents that is an entity validly existing and in good standing under the laws of Florida. The execution, delivery and performance of this Agreement by Consultant have been duly authorized, and this Agreement is binding on Consultant and enforceable against Consultant in accordance with its terms. No consent of any other person or entity to such execution, delivery and performance is required.

16. **Ownership and Access to Records and Audits.**

16.1 Consultant acknowledges that all inventions, innovations, improvements, developments, methods, designs, analyses, drawings, reports and all similar or related information (whether patentable or not) which relate to Services to the Village which are conceived, developed or made by Consultant during the term of this Agreement ("Work Product") belong to the Village. Consultant shall promptly disclose such Work Product to the Village and perform all actions reasonably requested by the Village (whether during or after the term of this Agreement) to establish and confirm such ownership (including, without limitation, assignments, powers of attorney and other instruments).

16.2 All records, books, documents, maps, data, deliverables, papers and financial information (the "Records") that result from the Consultant providing the Services to the Village under this Agreement shall be the property of the Village.

16.3 The Village Manager or his designee shall, during the term of this Agreement and for a period of three (3) years from the date of termination of this Agreement, have access to and the right to examine and audit any Records of the Consultant involving transactions related to this Agreement. In addition, the Consultant agrees to comply specifically with the provisions of Section 119.0701, Florida Statutes.

16.4 The Village may cancel and terminate this Agreement immediately for refusal by the Consultant to allow access by the Village Manager or his designee to any Records pertaining to work performed under this

Agreement that are subject to the provisions of Chapter 119, Florida Statutes.

17. **Nonassignability.**

17.1 This Agreement shall not be assignable by Consultant unless such assignment is first approved by the Village Manager. The Village is relying upon the apparent qualifications and expertise of the Consultant, and such firm's familiarity with the Village's area, circumstances and desires.

18. **Severability.**

18.1 If any term or provision of this Agreement shall to any extent be held invalid or unenforceable, the remainder of this Agreement shall not be affected thereby, and each remaining term and provision of this Agreement shall be valid and be enforceable to the fullest extent permitted by law.

19. **Independent Contractor.**

19.1 The Consultant and its employees, volunteers and agents shall be and remain an independent contractor and not an agent or employee of the Village with respect to all of the acts and services performed by and under the terms of this Agreement. This Agreement shall not in any way be construed to create a partnership, association or any other kind of joint undertaking, enterprise or venture between the parties.

20. **Compliance with Laws.**

20.1 The Consultant shall comply with all applicable laws, ordinances, rules, regulations, and lawful orders of public authorities in carrying out Services under this Agreement, and in particular shall obtain all required permits from all jurisdictional agencies to perform the Services under this Agreement.

21. **Waiver**

21.1 The failure of either party to this Agreement to object to or to take affirmative action with respect to any conduct of the other which is in violation of the terms of this Agreement shall not be construed as a waiver of the violation or breach, or of any future violation, breach or wrongful conduct.

22. **Survival of Provisions**

22.1 Any terms or conditions of either this Agreement that require acts beyond the date of the term of the Agreement, shall survive termination of the Agreement, shall remain in full force and effect unless and until the terms or conditions are completed and shall be fully enforceable by either party.

23. **Prohibition of Contingency Fees.**

23.1 The Consultant warrants that it has not employed or retained any company or person, other than a bona fide employee working solely for the Consultant, to solicit or secure this Agreement, and that it has not paid or agreed to pay any person(s), company, corporation, individual or firm, other than a bona fide employee working solely for the Consultant, any fee, commission, percentage, gift, or any other consideration, contingent upon or resulting from the award or making of this Agreement.

24. **Public Entity Crimes Affidavit**

24.1 Consultant shall comply with Section 287.133, Florida Statutes (Public Entity Crimes Statute), notification of which is hereby incorporated herein by reference, including execution of any required affidavit.

25. **Counterparts**

25.1 This Agreement may be executed in several counterparts, each of which shall be deemed an original and such counterparts shall constitute one and the same instrument.

[Remainder of page intentionally left blank]

IN WITNESS WHEREOF the parties hereto have executed this Agreement as of the date written below their signatures.

CONSULTANT:

THE CORRADINO GROUP, INC.,
a foreign corporation

By: _____
Name: _____
Title: _____

Date Executed: _____

IN WITNESS WHEREOF the parties hereto have executed this Agreement on the day and date first above written.

VILLAGE:

VILLAGE OF KEY BISCAYNE, a Florida municipal corporation

By:_____
John C. Gilbert, Village Manager

Date Executed: _____

Attest:_____
Conchita Alvarez, Village Clerk, CMC

Approved as to Form and Legal Sufficiency:

_____
Village Attorney

EXHIBIT "A"

(ATTACH SCOPE OF SERVICES/WORK AUTHORIZATION)

Key Biscayne Mobility Master Plan
Scope of Services

Introduction

This proposal is born out of the need to understand traffic, congestion and mobility in Key Biscayne. In essence this mobility study seeks to find out exactly what the existing conditions are like, which facilities are performing poorly, which can be fixed, and what it would cost to fix them.

The study represents a scientific planning analysis of needs, through the evaluation of the multi-modal transportation system in the Village, by examining the existing conditions, projecting those conditions out a decade, discovering system failures, and determining the cost to remedy them. Concurrently, the study includes a more subjective analysis of aspirations, through the interaction between technical staff, management, decision makers and community stakeholders to determine the perception of the system and preferred methods of mitigating deficiencies. Because this is a planning analysis it will be conducted by Corradino's team of urban planners. No Professional Engineers will be used on this contract.

An examination of this nature represents a progressive approach in the development of multimodal mobility not only on Key Biscayne, but in Miami-Dade County as a whole. Out of necessity, many communities are focusing on providing options for people as they travel from one place to another. This expands the capacity on their roadway (or right of way) networks. Communities understand that little if any more space can be dedicated to the single occupancy automobile. The capacity that exists on our roads can be enhanced and expanded without building significant new lane miles. By using the roadways differently, thereby incentivizing golf carts, transit, and bicycle and pedestrian mobility, communities can minimize congestion and enhance the quality of life for its residents, businesses, and workers.

Basic research has been done into how Key Biscayne functions. All in all Key Biscayne is:

- Compact
- Dense
- Geographically Isolated
- Growing
- Diverse
- Either very young or growing older
- Affluent
- Educated
- Mobile
- Flexible in how they allocate their time
- Creative in evaluating solutions to problems

Facts about Key Biscayne

Key Biscayne has a population of about 13,000 people, in about 4,300 households. Yet each day this population shrinks as about 4,000 workers leave the community, and about 2,700 come in to work. Only 477 residents also work on Key Biscayne, not including those who report working from home. This means the working population is highly mobile creating congestion. It also means that on any given day 2/3 of the total population does not follow regular commuting patterns, which shows that peak hours may be different than in traditional communities. At this point, nearly 60 projects are under construction, drawing construction workers and their equipment.

Over the past decade the Village has seen a significant increase in population (10,507 pop, in 2000), partially due to the fact that the economic downturn was not as pronounced in the area, evidenced by construction of several condominium complexes in that time period.

Key Biscayne, in regards to transportation planning, has 4 distinct populations:

1) Local residents (and their subdivided groups, including students),
2) Seasonal residents,
3) Tourists/visitors (which may be further subdivided into those with Key Biscayne as a destination and flow-through traffic to Bill Baggs State Park to the south), and
4) Workers.

Age

Typically on Key Biscayne you will find the young and the not so young. The population distribution of Key Biscayne shows a community with families and then the elderly: approximately 30% of the population is persons 18 and younger (the children), and approximately 37% of the population is persons between the ages of 35 and 59 (the parents of the children). The population of persons aged 60 and older is 22.7% (the parents of the parents). Young professionals, those aged between 20 and 34, (typically single, or married without children) are 8.5% of the population.

The median age is 41.3. 40.4% of households have at least 1 person under 18, and 33% of all households have at least 1 person 65 and older. The demography of the community is what would be generally expected in a community with the property values held in Key Biscayne.

Income

Key Biscayne is a wealthy community. Median household income is extremely high in the community, at $145,313, with the mean income at $252,008. Per capita income is $76,719. Key Biscayne boasts a highly educated community; 76% of the population 25 and older has a college degree; at least 90% have attended some college.

Vehicle Ownership

Of the 4,347 households, all but 166 of them have cars. 2,766 households, or 63.6% of all households, have at least 2 cars. This is not unusual given the lack of or perceived lack of transportation options, and the need for vehicles may be further exacerbated by the fact that Key Biscayne, given its low altitude and exposure to the Atlantic Ocean, is generally one of the first communities to be evacuated in hurricane weather.

Workforce Characteristics

Only about 37% of the population of the Village is in the workforce. Key Biscayne has a population of 8,894 persons 16 and older; of these, 4,843 constitute its resident commuting workforce. Inflow/Outflow analysis of the community indicates that only 477 of this commuting population work and live in Key Biscayne. There is a net outflow of people in the community when it comes to the workforce, with 2,737 people coming into the community but 4,183 people leaving for work; however, Key Biscayne is and is surrounded by state parks which are popular tourist destinations, and thus has a large population coming in from outside of the community.

The workforce above vary in terms of modes, 70.6% drive alone, 4.1% of the overall population carpool. At approximately 75% of workers driving, this trend is less than that experienced outside of Key Biscayne, while the carpool population's percentage is consistent with trends seen outside of Key Biscayne.

Public transportation usage is low, at 1.0%.

3.7% walk, which is somewhat consistent with areas outside of Key Biscayne.

15% of the population work at home according to the Census, which is a significantly higher percentage than the rest of the county.

Community Dimensions and Land Use:

Key Biscayne is a small community approximately 1.4 miles in length N-S and E-W at its widest points. Crandon Boulevard provides the only main arterial for the community. Attached map shows that most of Key Biscayne is within the 1/2 mile radius of Crandon Boulevard, indicating that if the correct destinations exist, there should theoretically be high levels of pedestrians coming from in and out of the neighborhoods.

Majority of the road network are small residential streets; in addition, Harbor Drive is a 2 lane road as well.

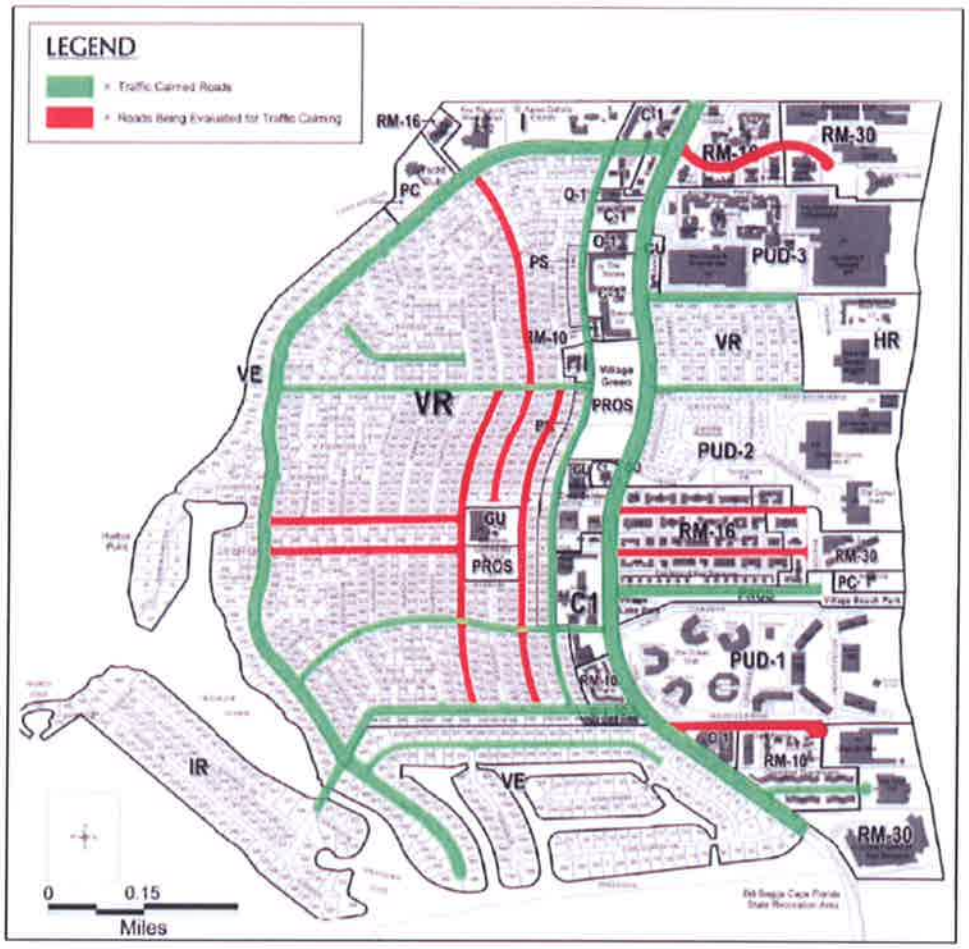
The commercial area primarily exists along Crandon Boulevard. Configuration of the commercial area is primarily strip mall in design, with parking lots in front. Crandon provides an

E-W split in land use. The west side of the island are more detached family housing and low density in nature, with the east part of the island primarily consisting of medium and high density single family residential and hotel uses. Existing land use and Future Land Use map for 2025 show no change for the community. Though technically built-out, continuous construction/reconstruction of housing currently brings additional workers into the area.

Transportation:

Traffic (Vehicular):

Vehicular traffic in and off the island of Key Biscayne is through the Rickenbacker Causeway. Vehicular traffic in Key Biscayne is constrained to 30 mph or 20 mph speed limits. Key Biscayne recently completed a Traffic Calming Master Plan, with implementable projects to reduce speeding along certain roads. A large portion of the roads have traffic calming measures (Green lines in map below) already in place.

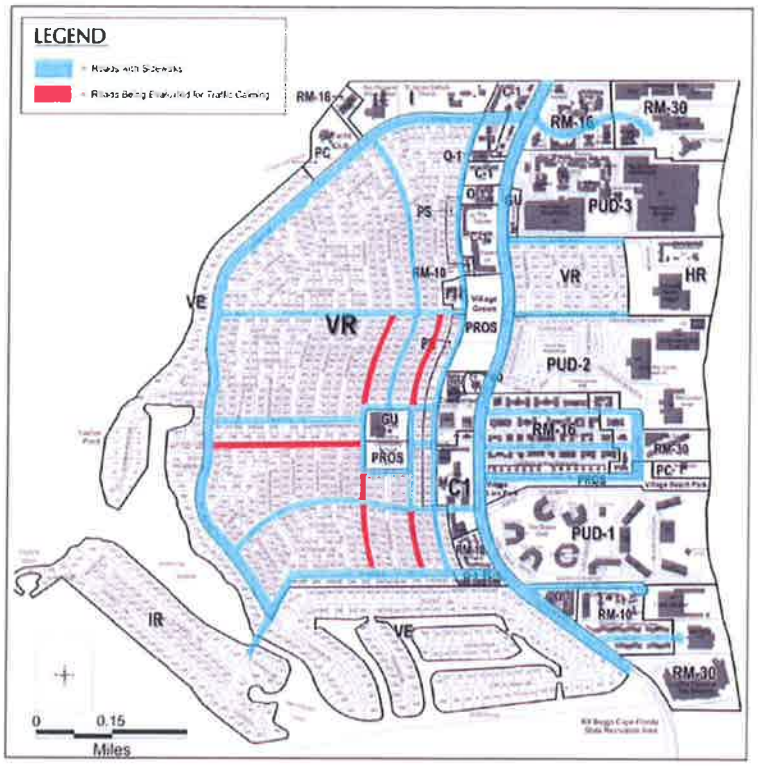


Crandon Boulevard operates at LOS C. Vehicular traffic, however, is more aptly measured not by Crandon Boulevard, as legally required and present in the Village's Comprehensive Plan, but by evaluation of Rickenbacker Causeway as a "bottleneck," which is outside of the Village's limits.

AADT counts for Key Biscayne Roads were 11400 at the junction of Harbor Drive and Crandon Boulevard, 4000 on Harbor Drive immediately west of this particular junction, and 1600 on West Mashta Drive. These numbers imply that approximately 7400 vehicles travel down Crandon Boulevard for all or a portion of this road, either to destinations within Key Biscayne or to Bill Baggs Cape Florida State Park.

Key Biscayne has instituted a Golf Cart ordinance which allows golf carts; this ordinance has won an award.

Traffic (Pedestrian):
Roads with sidewalks exist (See map below, blue lines, from Traffic Calming Master Plan), but the sidewalk network is virtually nonexistent through an overwhelming majority of Key Biscayne.



Key Biscayne has some good pedestrian designs utilized as part of traffic calming, such as differences in coloration and materials for pavement at certain points. Higher pedestrian traffic is expected along Crandon given its connections as an N-S connection between state parks, access to commercial areas, and as the point of origin and departure for public transit in Key Biscayne. General reports indicate low pedestrian traffic flow from Key Biscayne west residential neighborhoods. Pedestrian vehicular conflicts should be a concern now and in the future. This concern would be intensified with more pedestrian traffic that multi-modal transit development may produce, and mitigating techniques may be necessary.

Traffic (Bicycling):
Key Biscayne is well connected through the current bicycling system through paths which run along Rickenbacker Causeway, and Bike lane/shoulders exists along Crandon Boulevard, connecting the State park to the south. Attached map shows existing Miami-Dade bicycle routes in relation to Key Biscayne. Key Biscayne has noted issues with bicycling safety in the past, with collisions resulting in injury/loss of life, and had explored the possibility of requesting barrier erections for safety purposes, with the costs being paid for via a new toll for bicyclists. Bicycling/vehicular conflicts are a demonstrated source of concern for the community. Residential roads could feasibly be adapted for bicycling, with higher appeal for this mode of transit especially if traffic calming measures work.

Public transportation:
One MDT bus line runs into Key Biscayne – Route B. This route leaves the Brickell Metrorail Station and travels south to either Cape Florida State Park or Mashta Drive in Key Biscayne, and runs on a 30 min peak headway. Route map is attached. The route has several bus stops with benches, generally off of, but connected to sidewalk right-of-way, with benches.

Ridership range runs anywhere from 45-61k riders a month. It is important to note that during construction of Rickenbacker Bridge, which closed two lanes, ridership held steady from the prior year for much of the year. Peak season is in March, which makes sense given the tennis matches in March, though as a whole, peak season generally runs January-May for ridership.

Other facilities:
A Yacht Club exists in the north of the island, and is used for recreational activities.

Background

This Mobility Plan will be focused on taking the basic understanding of the Village and the linkages to it, extrapolating them into the future so that the impacts to the transportation infrastructure are quantified. The deficiencies and surpluses of individual components of the mobility system will become evident, as will the costs and benefits of their mitigation. Focus will be placed on further linking all modes of transportation together to ensure that roadways have the multimodal capacity for modes in addition to the automobile, including personal mobility devices like golf carts, pedestrian, bicycle and transit, thereby developing synergistic options for ameliorating service deficiencies. In doing so, each mode will be examined to determine their level of service on each street and projects will be developed to enhance mobility and connect the modes.

The following proposed scope of work and budget incorporates extensive data collection and analysis, an assessment of existing conditions and future needs, development of mobility projects, and an implementation plan. Further, it addresses the spatial requirements of elements necessary for effective, safe and secure multi-modal transportation solutions integrated into normal roadway operations.

Performance of the analysis will depend heavily on quantifying conditions and system performance in all categories of transportation. Traffic counts, transit ridership data, parking occupancy and operations, as well as field observations, will lead to the discovery of level of services conditions on roads, at intersections, transit routes, as well as bicycle and pedestrian facilities. An examination of existing ordinances and codes will take place to determine if issues can be addressed legislatively. Research will be done examining what other similar communities have done nationally to address these issues.

The issue relative to transportation here and in other areas of the county continues to be the lack of roadway capacity. While thousands of drivers converge on the Village each day, the system lacks the capacity to maintain an adequate level of service. Many communities in similar situations have begun to solve this through adding capacity into the system by using alternative modes of transportation. By assessing transit, bicycle and pedestrian usage and linking the modes together, multimodal transportation can be addressed, greater mobility can be achieved, and the quality of life for the citizens and businesses in Key Biscayne will be improved.

The study will result in a plan that is both visionary and strategic. It will balance the community aspirations within the physical and fiscal constraints of Key Biscayne. The plan will identify fixes to roadways and intersections while examining existing bicycle, pedestrian, and transit infrastructure to identify and recommend improvements to these components of the system.

The goals of the project are to:

- Understand the existing levels of service
- Determine which components of the system do not function appropriately
- Ascertain options for mitigating the deficiencies and the cost to do so
- Determine the desires of the community
- Develop an implementation plan, which has prioritized the top projects
- Ultimately promote safe and secure multi-modal transportation
- Enhance the quality of life
- Study effectiveness of traffic signalization

Scope of Services

The following is a detailed scope of services, schedule, and cost estimate of the project. Seven tasks are proposed including:

Task 1:	Public Involvement
Task 2:	Review of Background Information and Previous Studies
Task 3:	Data Collection
Task 4:	Analysis
Task 5:	Project Development
Task 6:	Implementation Strategy
Task 7:	Reporting

The entire project can be accomplished for a cost of $80,000 in a time frame of nine months.

Task 1: Public Involvement
Cost: $14,000

Duration: Day 1 – Day 270

In this task an outreach will be scheduled, including internal meetings, interaction with the public in workshops and public hearings, as well as meetings with local transportation funding agencies. Both engaging the public and incorporating public input is a multi-level process that takes place consistently throughout the duration of the plan development. In doing so, ensuring the participation of the public will facilitate the implementation of the proposed projects, and result in a plan that is uniquely tailored to the specific needs of the Village. This task will be ongoing throughout the project.

Task I.I Project Kickoff

Corradino will meet with Village's project management team to formalize the scope of services, schedule, and deliverables.

Task I.2 Workshop #1

After the initial data collection is completed, the first of two interactive workshops will be held to introduce the project to the community and solicit information that can be researched as part of the data gathering effort. This workshop will introduce the project and explain the basics of capacity, mobility, and urban design, so that a common understanding of the direction is held. Past experience has proven that this is an invaluable exercise in moving the process forward. At this workshop formal project goals will be determined.

Additionally the existing and future conditions resulting from the data collection and analysis will be discussed. A photographic inventory of issues and opportunities will be presented. This will show what the existing and future conditions of the community are. It will directly point to specific needs. At this meeting opportunities to focus on specific areas of the community will be provided through "breakout" sessions, where citizens may visit various tables and provide detailed input. The workshop will be held within three weeks of the completion of the data collection to provide time for the existing and future conditions analysis to occur. As a result of this meeting a list of projects both needed as determined by the analysis and wanted as gathered from the public will be listed from the public input and future conditions analysis. This list of projects will be tested in the Project Development task.

Task I.3 Workshop #2

The final workshop will be held once the list of projects has been tested and the results of the analysis are known. These will be presented and initially prioritized. This will focus on a discussion of the projects and prioritization criteria. Each project will then be ranked and prioritized into the most appropriate time horizon.

Task 2: Review of Background Information and Previous Studies
Cost: $6,000

Duration: Day 1 - Day 30

Key Biscayne is relatively unique in that it is a small island community with one ingress and egress point. A review of demographic and economic data shows that it is compact, dense, geographically isolated, growing, diverse, either very young or growing older, affluent, mobile, and flexible in how they allocate their time. Even in Florida, few communities share these characteristics. A peer city comparison will be undertaken to examine similar communities and their solutions to similar problems. This will include yet not be limited to Key West; Miami Beach; Long Boat Key, FL; Kiawah Island, SC; Cape May, NJ; Block Island, RI; Naples, FL; etc. This task will consist of a thorough review of all transportation studies impacting Key Biscayne over the last 20 years. It will assess the regional policy toward multi-modal transportation in this part of the county. All of this will be placed into context through an analysis of local, regional and national trends in the field, including what other communities are doing, what the federal government is incentivizing through the new transportation authorization (MAP 21), and it will provide an unvarnished assessment of our local adherence and performance relative to these benchmarks.

Task 2.1: Research

- Peer Cities
- Previous Transportation Evaluations, Master Plans, Bikeway Plans, Transit Plans

- Key Biscayne Comprehensive Plan, Land Use Element, and Transportation Element (Goals, Objectives, Policies)
- City ROW Data
- Utilities Data
- Public and Private Parking inventory, occupancy and configuration
- MPO Studies impacting the Area
- FDOT Projects for the Area
- Long Range Transportation Plan (LRTP) Projects
- Transportation Improvement Plan (TIP) Projects, Village Capital Improvement Plan (CIP) Projects, Local, Regional and National Trends and Perspective.

Task 3: Data Collection
Cost: $22,000

Duration: Day 1 – Day 90

This task will consist of formal collection of traditional data such as the location, condition and level of service of existing facilities, including roads, bike and pedestrian facilities and transit routes. It shall provide an understanding of geographic placement and context through an examination of origins and destinations of traffic. Level of Service is calculated differently for vehicles than it is for other modes. Vehicular or roadway level of service is a quantitative measure, assessed on how many vehicles can pass a certain point in a certain period of time. Bicycle and pedestrian level of service is qualitative, focused on if, how, and to what quality facilities are provided. Traffic Counts are used to collect vehicular level of service, while personal assessment of facilities is used to collect bicycle, pedestrian, and transit level of service. This project will use existing MPO South East Regional Planning Model Data, supplemented with FDOT and Miami Dade County traffic data to assess vehicular LOS. This effort will focus on collecting the bicycle, pedestrian and transit data through a thorough review of all facilities and routes in the Village. All data will be mapped via Geographic Information System (GIS). Data Collection will include:

Task 3.1: Land Use
Existing and Future land use maps will be examined and areas conducive to multi-modal use will be marked. This will be supplemented with the location of major generators like schools, parks, retail centers, churches, business centers, etc.

Task 3.2: Transit
Supply and demand in the form of ridership, adjusted service frequency (Vehicles/hour), headways and hours of service data will be collected from Miami Dade Transit. Boarding and alighting counts and transfer activity will be reviewed. This will be supplemented with data collected in the field (existing infrastructure: visual analysis of the location of transit stops, transit shelters, signs, route information, bus bays, etc.)

Task 3.3: Bicycle and Pedestrian Level of Service

Roadway characteristics of all roads will be collected from FDOT and the Miami Dade County, supplemented by field visits to obtain typical sections, and a qualitative assessment of the presence and scale of bicycle and pedestrian facilities, lateral separation of facilities from motorized vehicles, spacing of driveways and side streets, signal spacing, pavement conditions, widths of outside through lane, median openings, control devices, speed limits, and main deficiencies that can be addressed by the study. Pedestrian movement, bicycle travel and bus transfer activity will be observed and documented at key locations. Crash and fatality data will be collected. Information on the economic vitality of bicycle and pedestrian communities will be researched.

Task 3.4: Traffic

It is primarily important to understand what the vehicular LOS is on the roadway network. In doing so the MPO LRTP Model Data will be evaluated to determine volumes and capacities on study area links.

Intersections data will be obtained from FDOT and County count stations as well as recent traffic impact analyses provided by developers. For locations where that data cannot be obtained traffic counts will be taken. Fifteen locations have been anticipated.

Desired count locations include:

Rickenbacker Causeway @

- Toll
- Bear Cut Bridge

Crandon Blvd @

- Golf Course
- Tennis Center
- Harbour Dr. / Ocean Lane Dr.
- Sonesta Dr.
- East Heather Dr.
- Grand Bay Dr.
- W. McIntyre St
- Galen Dr.
- Enid Dr. / Sunrise Dr.
- W Wood Dr. / E Wood Dr.
- W Mashta Dr. / E Mashta Dr.
- Bill Baggs Park Entrance
- Ocean Club – 2 Entrances/Exits
- NOAA, Miami Seaquarium, MAST and University of Miami

Harbor Dr. @

- Crandon Blvd
- W Heather Dr.
- W McIntyre Dr.
- W Wood Dr.
- W Mashta Dr.
- W. Enid

Woodcrest Rd. @

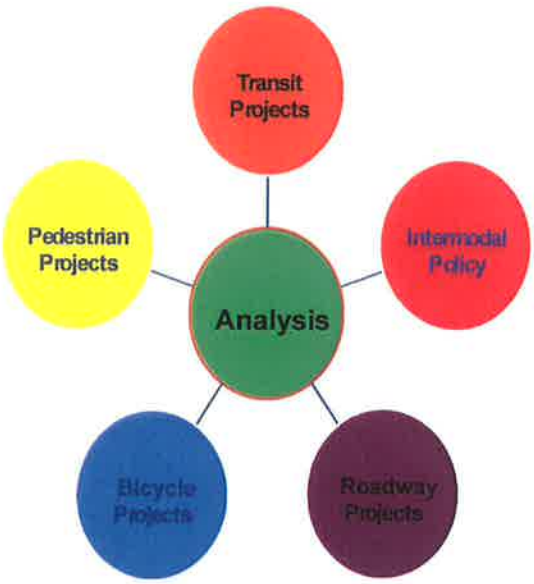
- Crandon Blvd
- W Heather Dr.
- W McIntyre Dr.
- W Wood Dr.
- W Mashta Dr.

Fernwood Rd. @

- Crandon Blvd
- W Heather Dr.
- W McIntyre Dr.
- W Wood Dr.
- W Mashta Dr.

Task 4: Analysis
Cost: $ 17,000

Duration: Day 90 - Day 150



The analysis task will use all the collected data to assess the multimodal level of service.
Connectivity between modes will be assed and rated. During this phase of the project the analysis of transit, remaining physical roadway capacity, and pedestrian/bicycle level of service usage will be undertaken. Existing and future conditions will be evaluated here. This will be done by determining the system performance as stated by the Level of Service for the selected roadways and intersections in the existing condition, and the future condition in 2020, and in 2035, in the morning and afternoon peak hours of travel. All

will be determined at a planning level analysis from the FDOT LOS Handbook, Capacity Tables, and by a review of MPO LRTP Model results.

From the results of the analysis and the input obtained from the initial workshop, an initial set of short, mid, and long term multimodal alternatives will be developed. Many of the needs will be gleaned from ideas received in the public involvement portion of the project. This task will develop and recommend a list of future transportation needs, identify concepts to address the needs, and analyze the feasibility of transportation concepts.
Several categories of projects will be developed. These include:

Task 4.1: Transit
This will focus on areas of transit level of service (TLOS, from FDOT's Q/LOS Handbook), as it interacts with areas of existing and planned activity, as well as major trip generators. Focus for transit projects will be at points of concentration like transit stops, adjacent to trip generators – e.g. schools, civic organizations, hospitals, etc. This will focus on the evaluation on the necessity and potential effectiveness of a municipal trolley system, circulator or shuttle. Corradino has implemented many of these in the past several years. A potential route or routes will be developed linking residential/commercial areas and major trip generators. Service characteristics such as capital costs, operating costs, system capacity and headways will be explored. Necessary elimination or consolidation of stops or the rearrangement or modification of routes will be recommended as necessary.

Task 4.2: Pedestrian
This will focus on pedestrian amenities and their levels of service (PLOS, from FDOT's Q/LOS Handbook), particularly as they interface with major trip generators, major intersections, and locations that have level of service issues. Pedestrian and bicycle projects will focus on projects that are interconnected with existing bicycle or pedestrian segments, connect to existing major trip generators, and that improve the level of service for pedestrians and bicyclists. By gaining an understanding of how pedestrian connectivity between origins and destinations can be beneficial to the community on many levels, the Village can change both driver and pedestrian behavior to prioritize the pedestrian. As such a program for the incentivization of these facilities will be provided focusing on evaluation, education, enforcement, and engineering. Design guidelines for pedestrian facilities will be provided.

Task 4.3: Bicycle
This will focus on bicycle amenities and their levels of service (BLOS, from FDOT's Q/LOS Handbook), particularly as they interface with major trip generators, major intersections, and locations that have level of service issues. Bicycle projects will focus on projects that are interconnected with existing bicycle segments, connect to existing major trip generators, and that improve the level of service for pedestrians and bicyclists. A detailed examination of potential projects will be undertaken focused on the improvement on the level of service, the

removal of impediments, or the filling of gaps in the system and the ease of implementation. Design guidelines for bicycle facilities will be provided.

Task 4.4: Policy

This will focus on transportation policy issues as a means of enhancing mobility. As suggested in previous master plans, policy initiatives like transportation systems management or transportation demand management can be incrementally impactful in diminishing congestion. These techniques such as flexible work hours, zip cars, shared bicycles, congestion pricing, car pools and telecommuting will move travel out of the peak hours, therefore immediately impacting congestion. Bicycle, pedestrian and transit policies and programs will be recommended. An examination of creative policy initiatives across the nation which incentivize the desired travel behavior will be undertaken. A listing and explanation of the positive and negative aspects of these polices will be provided.

Task 4.5: Roadway

Projects will be developed to address capacity needs for transit vehicles on the roadway network. The focus will be to evaluate the roadways to determine if methods of aiding transit mobility exist. Examples would be queue jumpers, signal priority, managed lanes, bus rapid transit, bus pull out bays, etc.

Various levels of analysis will be provided. Each is focused on the Level of Service throughout the Town and the ability to quantify and display traffic movement patterns and trends occurring today and in the future. The resulting spread sheets could be used as a basis for a concurrency management system, since they will detail the utilization and capacity of each roadway link. Traffic counts will be displayed in tabular form by facility. This will serve as a handbook to detail the condition of each facility in the Village. Detail will be given to:

- Road
- Number of Lanes
- Existence of a Median
- Road Jurisdiction
- Functional Classification
- Number of Traffic Signals
- Segment Length
- Signals per Mile
- Speed Limit vs. Actual Speed
- Roadway Class
- Existing Level of Service Standard
- Service Volume at Adopted Standard
- Average Annual Daily Traffic
- Peak Hour Volume
- Existing Level of Service
- Remaining Capacity

- Traffic Calming by Type
- Projected MPO Growth Rate (from latest MPO LRTP Mode
- Discussion on compliance with stop, yield and special speed limit signs (accomplished by measurements and observation)

Sample Project Description Table

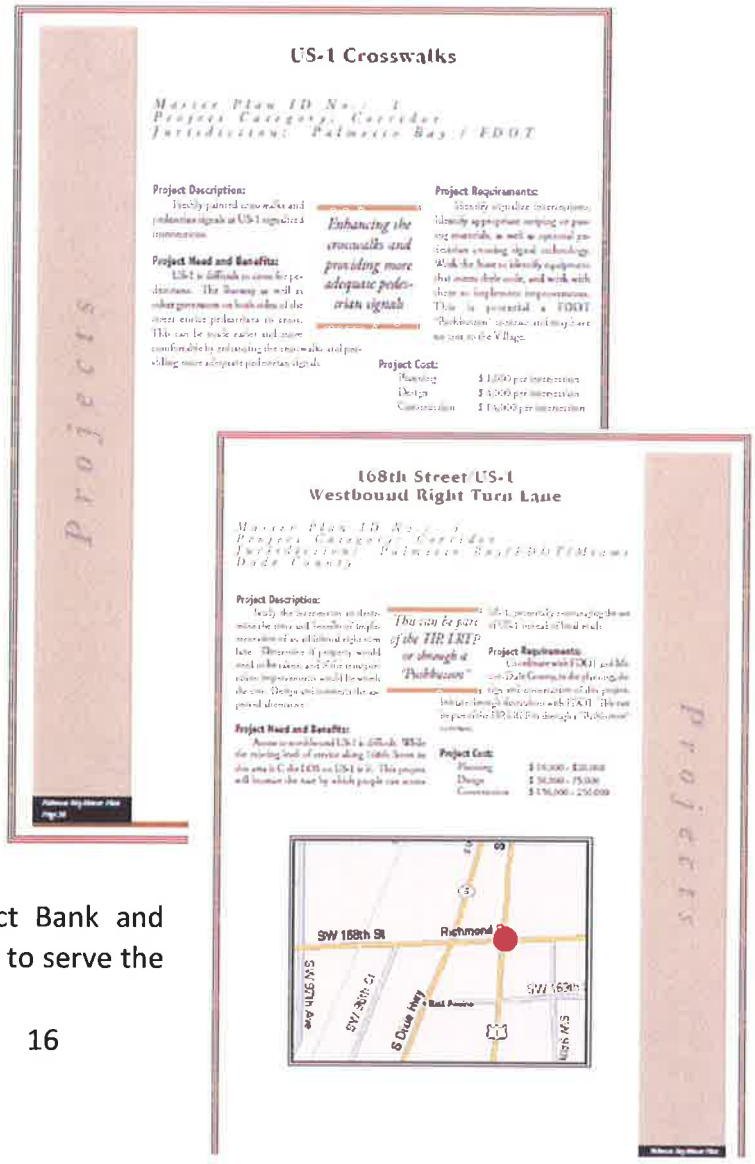
													CURRENT CONDTIONS								
														ADOPTED STANDARD				2005 EXISTING			
#	ROAD	FROM	TO	No. OF LANES	MEDIAN TYPE	ROAD	TYPE	No. of SIGNALS	LENGTH (MILE)	SIGNALS/MILE	SPEED LIMIT (MPH)	CLASS	LOS	C VOLUME	D VOLUME	E VOLUME	GROWTH RATE	AADT	VOLUME	LOS	Available Capacity
1	SW 184 ST	SW 107 AVE	US-1	4	TWLTL	COUNTY	URBAN MINOR ARTERIAL	*	3.0	2.0	35	III	E	1120	1620	1720	1.04	19542	942	C	778
2		US-1	Franjo Rd	4	TWLTL						35	III	E	1120	1620	1720	1.04	20095*	1019	C	710
3		Franjo Rd	SW 92 Ave	2	UNDIVIDED						40	II	E	450	760	810	1.04	14146	682	D	128
4		SW 92 Ave	SW 87 Ave	2	UNDIVIDED						40	II	E	450	760	810	1.04	16459	704	D	106
5		SW 87 Ave	Old Cutler Rd	2	UNDIVIDED						40	II	E	450	760	810	1.04	9199	493	D	317

Task 5: **Project Development**
Cost: **$10,000**

Duration: **Day 150 – Day 195**

Projects that arise from the needs assessment resulting from the analysis and the public ideas will be placed in the "Project Bank." Each project in each of the four categories will be described on a project sheet that includes the following:

- Description of the project
- Purpose and Need
- Location
  - Existing conditions assessment summary
- Cost
  - Planning, Design, and Construction
  - Possible funding sources



All projects will be cataloged by type in the Project Bank report. During this phase the Corradino will work with the Steering Committee to present the Project Bank and schedule the set of meetings that will follow to serve the

consensus building phase. The Project Bank shall be completed by the end of the 5th month of the project.
During this task a second round of stakeholders meetings and a second public workshop will be held.

Task 5.1 Projects will be developed in multiple categories including:

- Roadway
- Bicycle/Pedestrian
- Transit
- Policy

Task 6: **Implementation Strategy**
Cost: **$6,000**

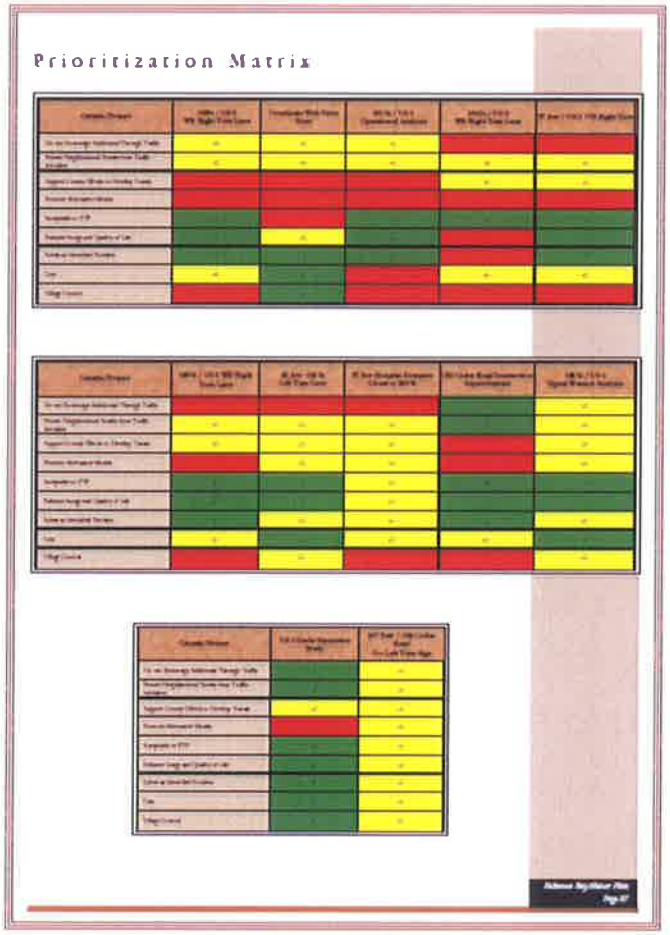
Duration: **Day 195 – Day 240**

The formal implementation plan will prioritize the projects into short, mid and long term efforts and organize them in the Project Bank. Funding sources and strategies will be developed.

All recommended ordinances and resolutions, comprehensive plan amendments, plans, etc. necessary or recommended for implementation of the proposed projects or plans will be mapped out during this phase.

Prioritized projects will be placed into implementation phases and listed.

After this phase, all final public approval hearings, final reports, and presentations will be performed.



Task 7: **Reporting**
Cost: **$5,000**

Duration: **Day 240 – Day 280**

A final report and highly graphic executive summary will be produced as a PowerPoint presentation for purposes of Public Hearings and/or Workshops/Presentations as necessary in the implementation phase. Drafts will be delivered to the project manager for review. After the final presentation, 20 bound copies will be made available at the Village and a digital copy of the executive summary to be available on the Village's website for the Public's availability. This study can serve as a component of the required Capital Improvement Element which needs to be updated annually and will be integral in framing solutions for land use and transportation in the Village and proactively managing the way people move within the community.

$7 MILLION, FIVE-STORY DOWNTOWN GARAGE

Shown is an artist's rendition of the new downtown parking garage, looking southwest from SW 1st Avenue.

Parking plans seen as victory

City parking garage