PUBLIC

GREATER ORLANDO AVIATION AUTHORITY

MCO

ORLANDO INTERNATIONAL AIRPORT

Master Plan Update

Volume 3

Capital Improvements Plan

Appendices

2002-2022




August 2004

IMPORTANT NOTICE -- PLEASE SEE NOTES BELOW

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MASTER PLAN UPDATE

ORLANDO INTERNATIONAL AIRPORT

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Prepared for:
GREATER ORLANDO AVIATION AUTHORITY

Prepared by:
The URS Team

August 2004

Preface

This Airport Master Plan Update was undertaken by the Greater Orlando Aviation Authority (GOAA) to document the operational capability, enhance safety and security, and identify capital improvements for Orlando International Airport (MCO). This document serves as a management tool to guide future airport development, taking into consideration changes that have occurred in the air transportation industry, the airport, and surrounding communities since completion of the previous Master Plan. In this study, the Airport Master Plan planning period for MCO extends twenty years through FY 2022. Where applicable, analyses have been updated to reflect the new runway and other airport capacity related facility improvements. The previous Airport Master Plan Study was completed in 1995.

This Master Plan Update Study began in 2000. As a result of the events of September 11, 2001 and other aviation industry related issues, the project was delayed until late 2003. Initial sections of the Airport Master Plan Update were written as a snapshot in time. For example, the Fourth Runway (Runway 17L/35R) was not operational when the Demand/Capacity and Facility Requirements analyses were conducted and completed.

Furthermore it would be noted that nearly all the Airport Master Plan Update related technical planning analyses were completed prior to Hurricanes Charley, Frances, and Jeanne impacting the Central Florida region during August and September 2004.

MASTER PLAN UPDATE

ORLANDO INTERNATIONAL AIRPORT

SECTION 11.0

CAPITAL IMPROVEMENT PLAN

Prepared for:
GREATER ORLANDO AVIATION AUTHORITY

Prepared by:
The URS Team

August 2004

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Section 11.0

CAPITAL IMPROVEMENT PLAN

11.1 Introduction

This section of the airport master plan update presents the Capital Improvement Plan (CIP) for Orlando International Airport (MCO) (Appendix Q). For the purposes of this Master Plan Update, the CIP is presented in two timeline periods. The first section is a 1- to 15-year period that addresses the FY 2004-2019 time period. The second section is referred to as an ultimate plan that proposes development beyond 2019.

Typically, airport master plan studies are developed for 20-year time planning; recommended improvements are identified for 5, 10, and 20 year periods. Instead of using time periods, the Greater Orlando Aviation Authority (GOAA) prefers to use demand-driven opportunities such as projected million annual passenger (MAP) activity levels to program their CIP. For the purposes of this Master Plan Update, GOAA has established the following planning horizons: 30 to 39 MAP (0 to 5 years approximately), 40 to 49 MAP (6 to 10 years approximately), and 50+ MAP (10+ years approximately).

For GOAA, the goal was to prepare a 15-year detailed CIP that was financially feasible and easily implemented. This effort included preparing detailed line item project descriptions and cost estimates. GOAA senior staff prioritized projects, and working closely with its financial department, established a 15-year CIP. As the CIP plan was finalized in August 2004, several projects from a cost standpoint fell outside the 15-year timeframe. These projects are identified as "beyond 2019" long-term projects. The entire GOAA CIP is printed as an appendix to this section.

In addition to the 15 year CIP, an ultimate CIP has been prepared. These ultimate CIP projects have been identified as viable future airport projects that are truly long-range and those airport facilities are demand-driven as well as tenant-driven development. These projects have not been defined in detail and no cost estimates have been prepared for these ultimate projects.

11.2 CAPITAL IMPROVEMENT PLAN

11.2.1 15-YEAR CAPITAL IMPROVEMENT PLAN (FY 2004-2019)

To accommodate the projected annual demand of 50 MAP by FY 2019, a multi-year airport CIP has been developed for MCO. The CIP's emphasis is on access capacity, environmental, intermodal, reconstruction, safety, security, and other aviation-related development.

The total estimated cost for these projects included in the CIP is approximately $3.3 billion. These projects are to be funded through a combination of various project funding sources (FAA, Florida Department of Transportation [FDOT], and local, including PFC funds). Individual project profiles are provided both in unescalated cost and escalated cost by funding source. A description and summary of these proposed airport capital improvements by category is also provided in Appendix Q.

The projects within the 15-year CIP are organized according to the following five categories. These categories include the following:

Terminal - Improvements related to the main landside terminal and airside buildings (North Terminal Complex), components of the future South Terminal Complex and other passenger service-related facilities. Facility improvements to enhance airport security and to accommodate New Large Aircraft

11.2.1.3 Roadway and Parking Projects

Roadways

- Interim Widening of South Access Road (from 2 lanes to 4 lanes)
- Cargo Road Extension (Airport Boulevard to Old Terminal Building, 2 lanes)
- Widen Exit Road (add one lane from Cargo Road to State Road 528)
- Construct Terminal A Exit Weave
- Heintzelman Boulevard Extension to Wetherbee Road/Boggy Creek Road (2 lanes)
- East Airfield Secure Road Extension
- Dowden Road Extension (4 lanes)
- Cut-Through Traffic Related Improvements
  - North Terminal Braided Roadway; South Terminal Braided Roadway
- Widen Entrance Road (State Road 528 to Cargo Road)
- Widen and Realign Tradeport Drive
  - Widen Tradeport Drive from Beeline Expressway to Bear Road (6 lanes); Realign Central Tradeport to West Property Line (Bear Road to Binnacle Road); Realign Central Tradeport from Binnacle Road to Boggy Creek Road
- Existing Bear Road Widening (Cargo Road to Tradeport Drive, 2 lanes to 4 lanes)
- Secure Service Road (West Airfield)

11.2.1.4 Other Projects

Miscellaneous

- Implement Environmental Projects
- Purchase U.S. Army Reserve Property - Tradeport
- Perishables Center Modifications and Rehabilitation
- Art Program
- Demolish Old U.S. Navy Commissary Warehouse
- Demolish Two-Story Building located on former FAA Parcel #5 at Tradeport
- U.S. Postal Service (USPS) Facility Demolition
- OIA Master Plan Update
- South Tradeport Stormwater Drainage Improvements
- Demolish Old Terminal (Buildings 607 and 608)
- Land Development/Mitigation and Site Preparation (airport-wide)
- Construct GOAA Warehouse Facility Expansion (30,000 square feet)
- Construct GOAA Office Building at FAA TRACON site

Asset Preservation/R&R Projects

Numerous R&R projects are recommended between FY 2004 to FY 2014. These projects are to preserve, upgrade, and/or enhance existing airport assets and infrastructure. The estimated costs for these R&R Projects are reflected in the appropriate project categories.

11.2.2 Ultimate Capital Improvement Plan (Beyond FY 2019)

The CIP, as described in Section 11.2.1, identifies GOAA's implementation program through FY 2019. The Master Plan Update also depicts development items that are beyond the 20-year (2022) Master Planning period. In the preparation of this overall Master Plan Update, consideration was given to the ultimate build-out scenarios of major airport facilities and development areas. These major components depict potential total build-out design configurations of key projects which may include the ultimate South Terminal Complex, the ultimate airfield system, and the ultimate surface transportation (roads and rail) network.

Projects identified as part of the ultimate CIP will be accomplished when activity demand levels can justify the project. At this time, it is estimated that when the annual passenger activity levels reach approximately 55 MAP, these projects could be implemented. It should also be noted that these ultimate projects are only identified for future programming considerations. Many of these projects will be evaluated in greater detail, reviewed, and updated with the next Master Plan Update.

These ultimate projects are shown on Figure 11-2. The ultimate CIP items are defined under the four main airport project categories: Terminal, Airfield, Roadway/Parking, and Other.

The cost estimates for the ultimate CIP projects have not been developed. These projects extend beyond the 20-year planning period and are subject to change and could be advanced.

11.2.2.1 Terminal Projects

Based on the Terminal Plan described in Section 6.0, Airside 2 may need to be expanded to accommodate gate requirements in the North Terminal Complex for 131 gates by 2020.

A more conservative estimate of future gate requirements, depicted in Table 6-2 of Section 6.0, suggests that MCO could require 143 gates by 2020. With the expansion of Airside 2 already included, the South Terminal Complex would require additional gate expansion beyond the 24 gates anticipated in the South Terminal Complex. A shortfall of 13 gates in the South Terminal Complex could require the initial development of Airside 5 in the northwest quadrant.

The following paragraphs describe the ultimate CIP for terminal development for both the North and South Terminal Complexes.

North Terminal Complex

By the end of the planning period in year 2019, components of the North Terminal Complex will be approaching 30 to 40 years old and will require improvements to extend their service life. The following items have been identified as potential ultimate North Terminal Complex projects:

- Airside 2 Building, Apron, and Automated Guideway Transit (AGT) Rehabilitation;
- Airside 4 Building, Apron, and AGT Rehabilitation;
- Airside 4 Remote Overnight (RON) Parking Apron Expansion;
- NTC Landside Terminal Enplaning and Deplaning Curbfront Improvements (A and B Sides);

- NTC Terminal Road/Service Roads Construction and Improvements;
- North Terminal Complex Rail Station; and
- Hyatt Hotel Expansion.

South Terminal Complex

The layout and configuration of the South Terminal Complex allows the facility to be constructed in a multi-phase development program. With the initial proposed construction of the South Terminal Complex to include portions of Terminal C, Parking Structure C, and Airside 7, the following facilities are ultimate identifiable future phased South Terminal Complex expansion projects:

South Terminal Complex West Side Expansion

- Construct Airside 5 Building, Apron, and AGT;
- Construct Airside 9 Building, Apron, and AGT;
- Landside Terminal C Building Expansion;
- Parking Garage Structure C Expansion;
- Rental Car Agency and Quick Turn Around (QTA) Expansion;
- Terminal Road/Service Roads Improvements; and
- Commuter/Regional Jet Facilities.

South Terminal Complex East Side Development

- Construct Landside Terminal D;
- Construct Parking Garage Structure D;
- Construct Airside 8 Building, Apron, and AGT;
- Intermodal Transportation Systems (ITS) Extension;
- ITS Maintenance Depot;
- Rental Car Agency and QTA;
- Terminal Road/Service Roads Construction and Improvements;
- Construct New Airport Hotel;
- Construct South Terminal Complex Rail Station;
- Construct Airside 6 Building, Apron, and AGT;
- Construct Airside 10 Building, Apron, and AGT; and
- Commuter/Regional Jet Facilities.

South Terminal Complex Support Areas

- Site Preparation/Infrastructure/Utilities/Drainage/Roadways; and
- Airline Cargo, Flight Kitchen, GSE, and Maintenance Facilities.

11.2.2.2 Airfield Projects

Section 4.0 addressed the long-term airfield improvements. With the opening of Runway 17L/35R, no additional runways may be needed during the planning period.

Nevertheless, specific apron, runway, and taxiway enhancements have been identified for ultimate airfield development and are described in the following paragraphs.

Runways

The ultimate plan depicts NAVAID upgrades and the extension of Runway 36R. The ultimate extension of Runway 36R is depicted on the Airport Layout Plan (ALP) and the established length is 16,124 feet. This length was shown on the previous ALP and for planning purposes is considered an ultimate capability. The following list of items identifies several NAVAID upgrades and the Runway 36R extension project.

- Runways 18L and 36L Instrument Landing System/Global Positioning System (ILS/GPS) and Approach Lighting System (ALS) Installations
- Runways 18L and 35L Precision Approach Path Indicator (PAPI) Upgrades
- Runway 18R ILS and ALS Upgrades
- Runway 36R Extension and ALS, NAVAIDs, and Service Road Relocation
- Precision Obstacle Free Zone (POFZ) Improvements Runways 18L and 36L

Taxiways

Taxiways and taxiway connector systems have been identified that are needed to support potential ultimate land development related projects. Taxiway A1 widening would be needed to enhance the Airplane Design Group (ADG) IV-VI capability to and from the West Ramp. Dual North and Mid-Crossfield Taxiway system extensions and the parallel taxiway to Runway 36R extension would be constructed when needed. The following is a list of identifiable long-term taxiway improvements:

- Taxiway A1 Widening
- Construct South Crossfield Taxiways Q and R System
- Taxiways E, F, J, and K Extensions to the former Gee Bee Property
- Construct Taxiway Connectors to the ultimate extension of Runway 36R
- Construct Taxiway P (East of Runway 17L/35R)

Aprons

Several potential long-term apron improvement projects have been identified. These are demand-driven type projects that have no definitive timeline and/or are tenant-driven. These are projects that have been discussed with GOAA staff and for planning purposes, new apron pavement areas have been identified and reserved for future development. The following are several potential long-term apron projects:

- Alert Area Ramp Expansion
- West Ramp Expansion (North and South)
- FedEx Ramp Expansion (West and South)
- East Midfield Apron Development (west of Heintzelman Boulevard)
- RON Ramp Construction at Airside 4

Other

Several other airfield related items have been identified as follows:

- FAA Terminal Radar Approach Control (TRACON) Demolition and Relocation;
- Precision Runway Monitor (PRM); and
- Airport Surveillance Radar (ASR) Upgrade

11.2.2.3 Surface Transportation Projects

Roadway

The 1- to 15-year CIP has identified a number of proposed on-airport roadway improvements. In support of the identified 1- to 15-year on-airport roadway projects, a number of off-airport roadway projects that are required to enhance the entire surface transportation network around the airport have been identified. It should be noted that the cost estimates, timeline, and funding for these projects has not been identified. These off-airport roadway projects to be completed by others are listed as follows:

- Airport Boulevard Improvements
- Alafaya Trail Extension State Road 15 (Narcoossee Road)
- Boggy Creek Road/South Access Road/State Road 417 (Central Florida GreeneWay) Interchange Construction
- Lake Nona Road Extension;
- State Road 15 (Narcoossee Road) and State Road 528 (Beeline Expressway) Interchange Reconstruction
- State Road 436 (Semoran Boulevard) and State Road 528 (Beeline Expressway) Interchange Reconstruction
- Wetherbee Road Extension (to Heintzelman Boulevard)

Parking

As the South Terminal Complex develops, the need for additional remote public parking and employee parking spaces is projected. On the south side of the airport, new areas have been identified in the future South Terminal Support Area for the relocation of the existing remote public "Red" lot and a new second employee parking lot. They are listed as follows:

- South Red Lot Demolition and Relocation to South Terminal Support Area(s)
- Construct South Terminal Complex Employee Parking Lot

Service Roads

As growth and future development continues, existing service roads will need to be relocated and realigned. The following identifies one project:

- Northwest Terminal Support Area (NWTSA) Service Roads
- Improve South Tradeport Area Service Roads
- Relocate Fourth Runway (17L/35R) Service Road to the East.

Rail

Two rail systems are shown on the plan as future capabilities. Rail right-of-way corridors throughout the airport are reserved for potential rail service. There is no timeline associated with the construction of the High Speed Rail (HSR) or Light Rail Transit (LRT).

- Construct HSR System
- Construct LRT System

11.2.2.4 Other Projects

Aircraft Rescue and Fire Fighting (ARFF) Facilities

As airport growth continues, some ARFF stations may need to be expanded. In order to meet new Federal Aviation Regulations (FAR) and/or International Civil Aviation Organization (ICAO) compliance requirements, some ARFF stations may need to be relocated and new supplemental ARFF stations may be required. These sites may include the following:

- East Airfield ARFF Station Expansion
- New Northwest/Southeast Airfield ARFF Station(s)
- West Airfield ARFF Station Relocation

Aviation Support

The previous Master Plans have shown the capability of expanding the Tradeport's main fuel storage tank farm. This updated plan shows the capability of developing a second fuel farm on the east side of the airport. There is no timeline associated with either the Main fuel farm expansion or East Airfield fuel farm construction. Expansion of the Tradeport fuel farm and development of the East Airfield fuel farm will be accomplished on a demand-driven basis.

- Main Fuel Farm Expansion
- Construct New East Airfield Fuel Farm

Building Demolition

Buildings reaching the end of their useful life have been identified for demolition and removal. The following is a listing of these facilities:

- Bunker Area Buildings (10)
- Rental Car Agency Buildings (3) located west of the Old Terminal Building in the NWTSA
- Old Terminal Buildings (2)
- U.S. Post Office Complex (4 Buildings)
- U.S. Army Reserve (U.S.A.R.) Hangar and Support Buildings in North and South Tradeport

Property Acquisition

When the U.S.A.R. properties become available, the airport may purchase the following parcels:

- U.S.A.R. in North and South Tradeport (North parcel is programmed in 15-year CIP)

11.2.2.5 Summary

The foregoing text and exhibits provide detail for both the 2004-2019 CIP and the Ultimate CIP. Figure 11-2 portrays the Ultimate CIP for this Master Plan Update.

It is important to emphasize that the identified projects are a combination of both demand-driven projects as well as tenant-driven projects. Nevertheless, the implementation of these projects will be based on documented justification and sound financing principles

APPENDICES – VOLUME 3

AIRPORT MASTER PLAN UPDATE
ORLANDO INTERNATIONAL AIRPORT

APPENDIX Q

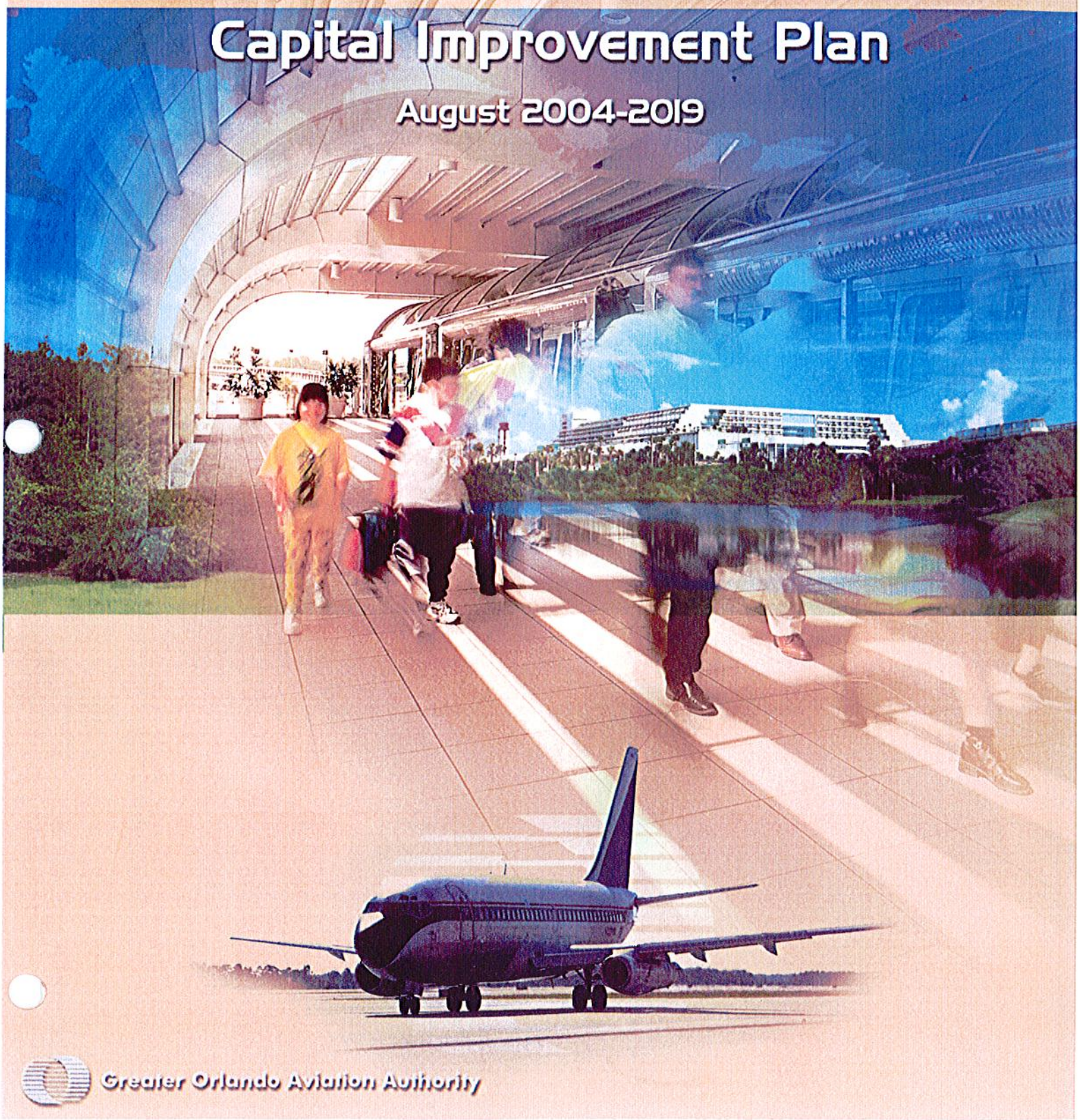
AIRPORT MASTER PLAN UPDATE
ORLANDO INTERNATIONAL AIRPORT

Orlando International Airport

MCO

Capital Improvement Plan

August 2004-2019



Greater Orlando Aviation Authority

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INTRODUCTION

Capital Improvement Plan
Orlando International Airport
Fiscal Year (FY) 2004–2019 and Beyond

A multi-year Capital Improvement Plan (CIP) has been developed for Orlando International Airport (MCO) to accommodate the projected annual passenger demand of 50 million by 2019.

Multiple capital improvement and aviation related development projects are recommended for implementation between FY 2004 and FY 2019. Proposed improvements entail development to enhance airport access, circulation, safety, intermodal capability, security, environmental, and other aviation-related development. The total cost of these projects is estimated at $3.3 billion (escalated). This CIP will use a combination of several funding sources including federal and state grants (AIP and FDOT grants respectively), local funds, and Passenger Facility Charges (PFCs). Individual project funding profiles are provided in Tab 2 "Escalated Cost by Funding Source."

The CIP is organized into five distinct project groups based on type of improvements as shown below. Project description and detailed funding plans are included in Tab 3.

Terminal – These improvements are related to the main landside terminal, airside buildings, components of the future South Terminal Complex, and other passenger service-related facilities. Facility improvements to enhance airport security and to serve New Large Aircraft (NLA) are also identified. The cost of these projects is estimated at $2.4 billion and these improvements are depicted in Tab 3A.

Airfield – These improvements are related to airfield pavement (runway, taxiway, and apron) construction and reconstruction, navigational aid equipment, safety, and wildlife attractants mitigation. The cost of these projects is estimated at $457 million and these improvements are depicted in Tab 3B.

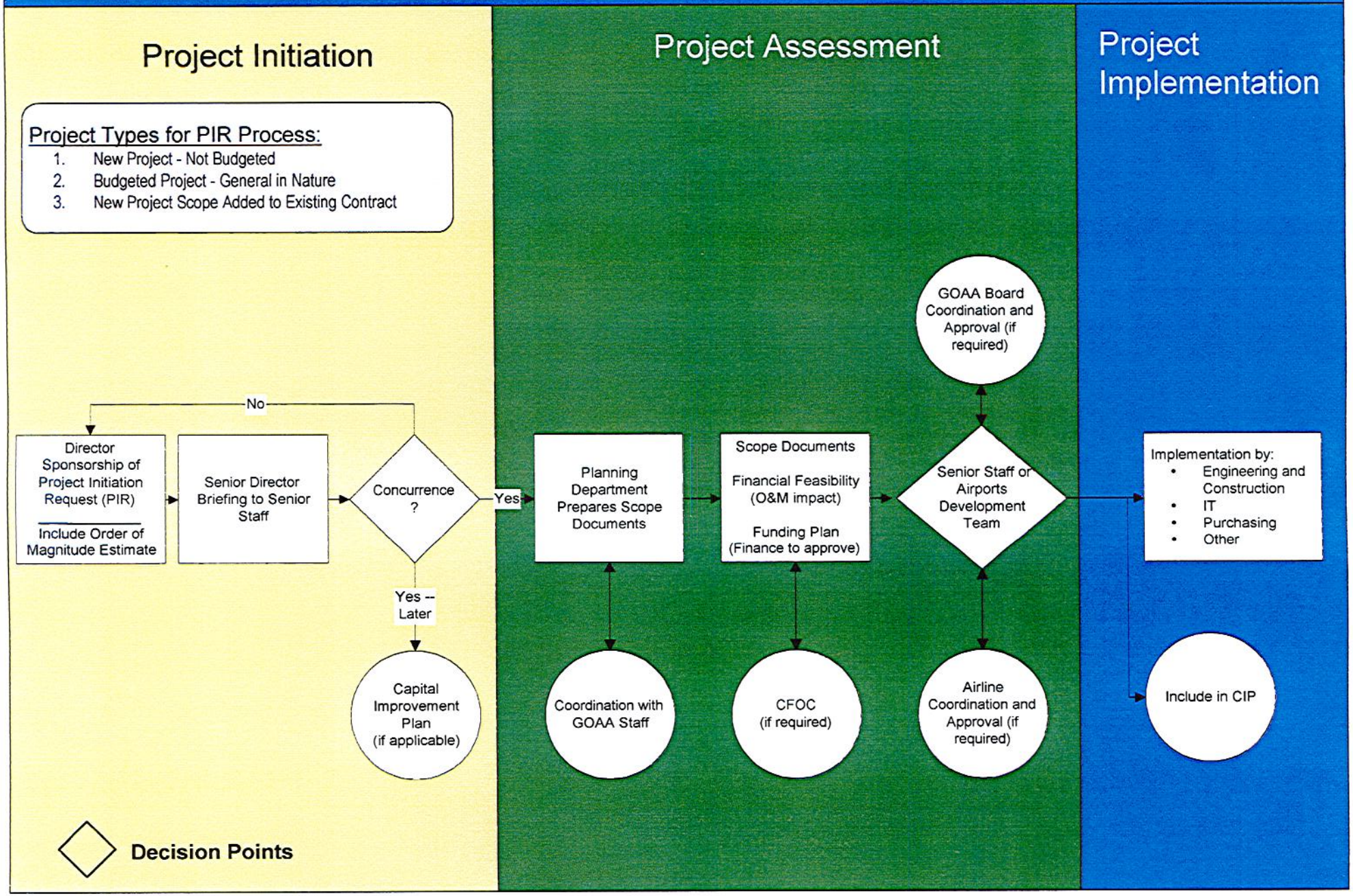
Roadway – These improvements are related to the on-airport access and service roadways, parking facilities, rental car facilities, rail, and signage. The cost of these projects is estimated at $309 million and these improvements are depicted in Tab 3C.

Other – These improvements are related to the aviation-related support facilities, drainage improvements, environmental mitigation, and building demolition. The cost of these projects is estimated at $121 million and these improvements are depicted in Tab 3D.

Beyond 2019 – These improvements are related to long-term airfield and roadway projects. The cost of these projects is estimated at $344 million and these improvements are depicted in Tab 3E.

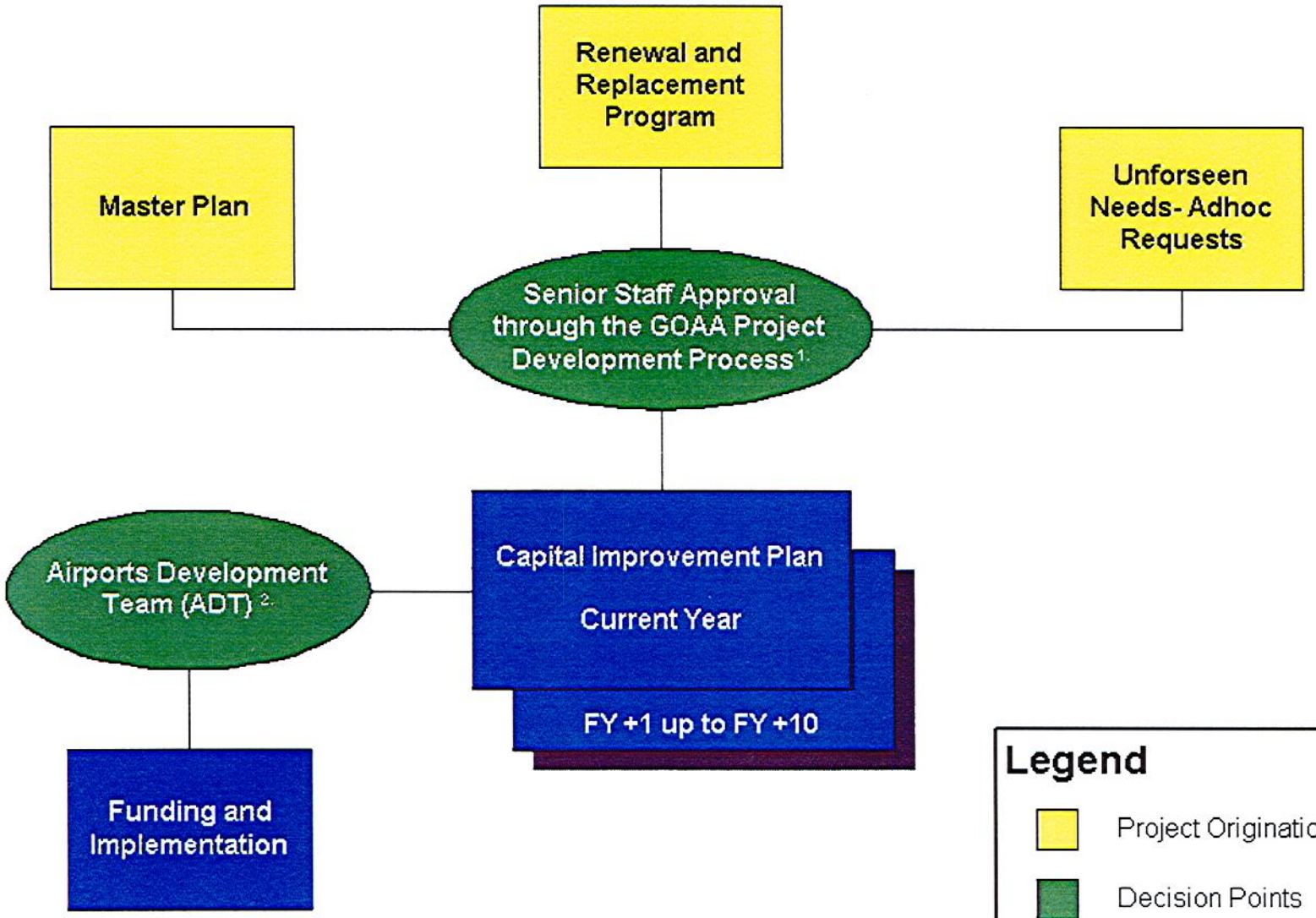
Further, numerous Renewal and Replacement (R&R) projects are recommended between FY 2004 to FY 2014. These projects are to preserve, upgrade, and/or enhance existing airport assets and infrastructure. The estimated costs for these R&R projects are reflected in the appropriate project categories listed above.

GOAA Project Development Process



t:\projects\planning\project management\t-3876 project request flow chart PIR Only_b .vsd 12/1/2003

Capital Improvement Plan Process Flow



1. Senior Staff reviews and prioritizes projects on a scheduled and an adhoc basis.
2. Senior Staff reviews CIP annually and prepares budget for Board and Airline Approval

t:\projects\planning\CIP\t4099 CIP Process 1/21/04

Airport Traffic Activity Projections
Orlando International Airport Capital Improvement Plan (2004-2019)
Annual Enplaned Passengers
Annual Total Passengers
Annual Aircraft Operations
Daily Vehicle Trips

Year	Annual Enplaned Passengers: Bond Forecast[1]	Annual Enplaned Passengers: Master Plan[2]	Total Annual Passengers[3]	Annual Aircraft Operations: Master Plan[4]	Daily Vehicle Trips: Master Plan[5]
2004	14,866,000	15,365,000	30,730,000	346,385	109,231
2005	15,380,000	16,019,000	32,038,000	356,340	113,170
2006	15,864,000	16,649,000	33,298,000	365,250	117,251
2007	16,353,000	17,265,000	34,530,000	373,791	121,479
2008	16,861,000	17,862,000	35,724,000	380,479	125,859
2009	17,376,000	18,480,000	36,960,000	392,440	130,398
2010	17,900,000	19,122,000	38,244,000	404,877	135,100
2011		19,788,000	39,576,000	417,790	138,185
2012		20,479,000	40,958,000	431,200	141,340
2013		21,093,000	42,186,000	442,158	144,567
2014		21,726,000	43,452,000	453,393	147,868
2015		22,378,000	44,756,000	464,915	153,200
2016		23,049,000	46,098,000	476,729	153,237
2017		23,761,000	47,522,000	488,844	159,335
2018		24,474,000	48,948,000	501,266	162,494
2019		25,208,000	50,416,000	514,004	165,716

SOURCES: [1] FY 2004-2010 Passenger Forecast: J.F. Brown Company, Inc. March 2002

[2] Annual Enplaned Passenger Forecast: Orlando International Airport Master Plan Update, URS, Inc., May 2004

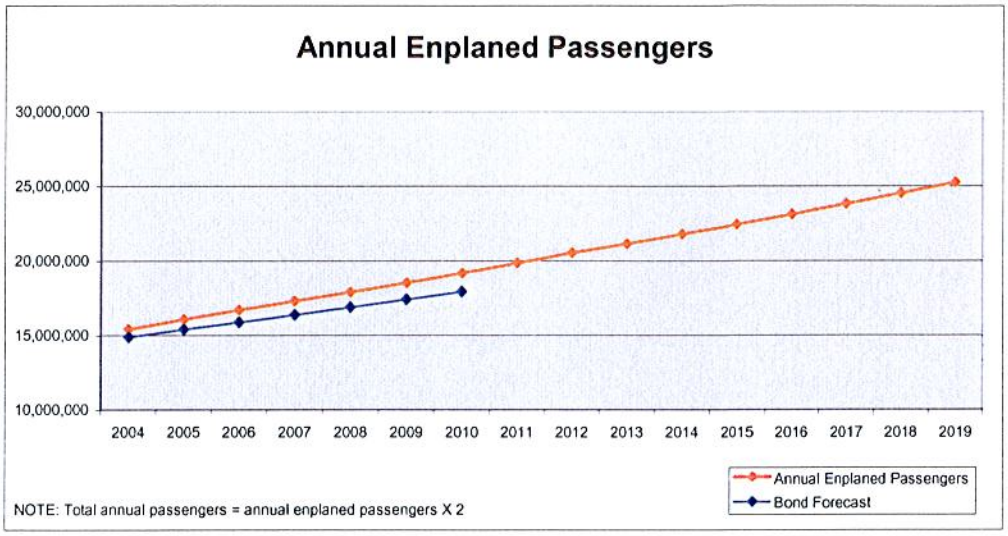
[3] Total Annual Passengers = Annual Enplaned Passengers X 2

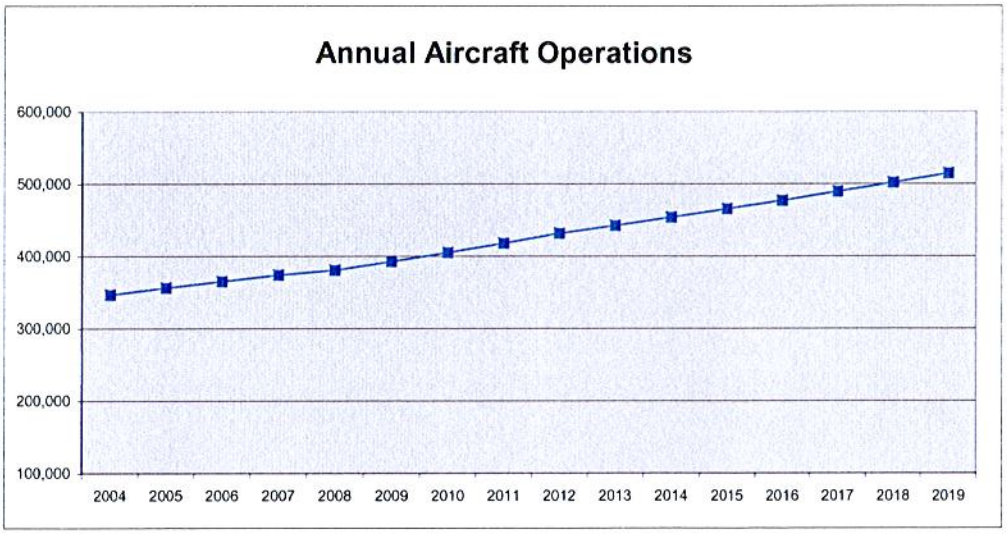
[4] Surface Transportation Plan: Orlando International Airport Master Plan Update, URS Inc., May 2004

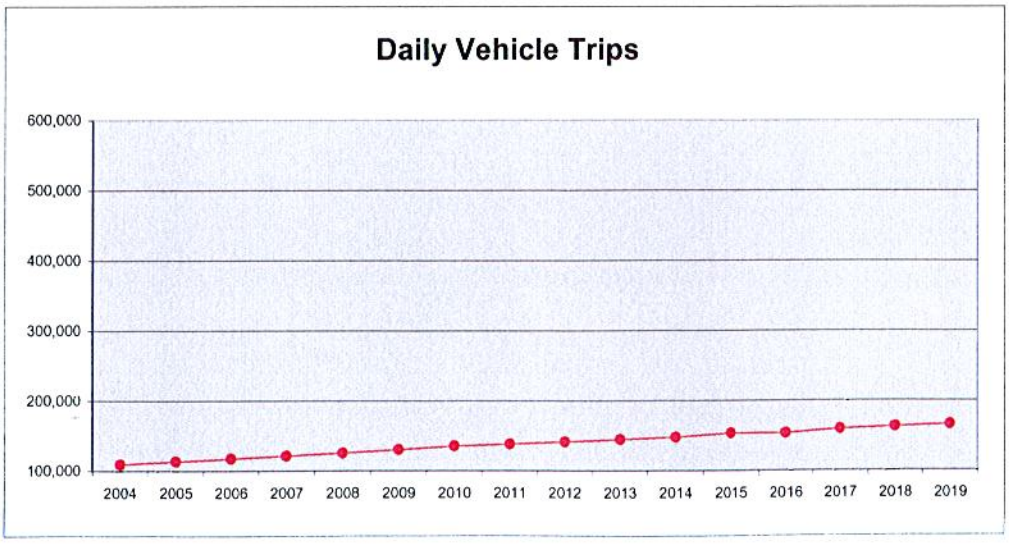
[5] Surface Transportation Plan: Orlando International Airport Master Plan Update, URS Inc., May 2004

NOTE: Forecast numbers have been interpolated where required.

Airport Traffic Activity Projections
Orlando International Airport
Capital Improvement Program (2004-2019)







Greater Orlando Aviation Authority
Capital Improvement Plan (2004-2019)
August 2004

Project Type	UNESCALATED COST	Project Start	Project End	Escalated Project Costs	State & Federal Grants	Approved PFC (PAYG)	Future PFC (PAYG)	Future Revenue Bonds (PFC Backed)	Future Revenue Bonds (GARBS)	Authority Funds (Existing)	Authority Funds (Future)	R&R
TERMINAL PROJECTS												
A) Airsides 1 and 3 Rehabilitation												
1) Airside 1	56,174,000	2004	2008	61,383,000	3,279,000	-	36,620,000	-	-	21,484,000	-	-
2) Airside 3	58,219,000	2004	2008	63,617,000	3,398,000	-	37,953,000	-	-	22,266,000	-	-
Subtotal - Airsides 1 and 3 Rehabilitation	**114,393,000**			**125,000,000**	**6,677,000**	**-**	**74,573,000**	**-**	**-**	**43,750,000**	**-**	**-**
B) Airside 2 Expansion												
1) Expand Wings 7 & 9 (6 new gates)												
a) Expand Wings 7 & 9 (6 new gates) (includes relocation of artwork)	13,039,000	2004	2006	13,850,000	-	-	11,550,000	-	-	2,300,000	-	-
b) Extend Taxiways G1 and H2	4,599,000	2004	2006	4,737,000	-	-	4,737,000	-	-	-	-	-
2) Concessions	750,000	2004	2005	750,000	-	-	-	-	-	750,000	-	-
3) Add New Wing (8 new gates)												
a) Design	2,500,000	2007	2007	2,732,000	-	-	1,775,800	-	956,200	-	-	-
b) Construction	23,290,000	2008	2010	26,999,000	-	-	17,549,000	-	9,450,000	-	-	-
c) Other Building Improvements	4,356,000	2008	2010	4,903,000	-	-	-	-	4,903,000	-	-	-
Subtotal - Airside 2 Expansion	**48,534,000**			**53,971,000**	**-**	**-**	**35,611,800**	**-**	**15,309,200**	**3,050,000**	**-**	**-**
C) Airside 4 Modifications												
NLA A-380 Modifications Airside 4 Terminal Allowance	5,000,000	2005	2005	5,150,000	-	-	5,150,000	-	-	-	-	-
Subtotal - Airside 4 Modifications	**5,000,000**			**5,150,000**	**-**	**-**	**5,150,000**	**-**	**-**	**-**	**-**	**-**
D) Security Projects												
1) EDS Implementation												
a) EDS Phase IIA	40,000,000	2004	2006	40,000,000	35,000,000	-	5,000,000	-	-	-	-	-
b) CEF Authority Offices (required as result of EDS relocation)	5,000,000	2004	2005	5,000,000	-	-	5,000,000	-	-	-	-	-
c) EDS Phase IIB	95,000,000	2005	2008	95,000,000	90,250,000	-	4,750,000	-	-	-	-	-
2) Fuel Farm(s) Enhancements (Allowance)	1,000,000	2005	2005	1,030,000	901,000	-	129,000	-	-	-	-	-
3) Local Area Network Infrastructure: Fiber Optic Cable from Landside Terminal to Remote Guard Posts and Gates, Including Electronics	900,000	2005	2005	927,000	811,000	-	116,000	-	-	-	-	-
4) Access Control System BP-X007	2,900,000	2005	2005	2,987,000	2,614,000	-	373,000	-	-	-	-	-
5) Biometrics System (Allowance)	4,000,000	2007	2007	4,371,000	3,825,000	-	546,000	-	-	-	-	-
6) Public Safety Center	4,000,000	2008	2008	4,502,000	3,939,000	-	563,000	-	-	-	-	-
7) Local Area Network Infrastructure												
a) Replacement of Infrastructure Electronics	115,000	2008	2008	129,000	113,000	-	16,000	-	-	-	-	-
b) Replacement of Infrastructure Electronics	115,000	2013	2013	150,000	131,000	-	19,000	-	-	-	-	-
8) Improvements to AOA Access - VES	5,000,000	2016	2016	7,129,000	6,238,000	-	891,000	-	-	-	-	-
Subtotal - Security Projects	**158,030,000**			**161,225,000**	**143,822,000**	**-**	**17,403,000**	**-**	**-**	**-**	**-**	**-**

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Project Type	UNESCALATED COST	Project Start	Project End	Escalated Project Costs	State & Federal Grants	Approved PFC (PAYG)	Future PFC (PAYG)	Future Revenue Bonds (PFC Backed)	Future Revenue Bonds (GARBS)	Authority Funds (Existing)	Authority Funds (Future)	R&R
E) North Terminal Capacity Projects												
1) Expand East and West Security Checkpoints: Add 4 lanes (2 lanes each on east end & west end) (Allowance)	500,000	2004	2004	500,000	438,000	-	62,000	-	-	-	-	-
2) Implement/Upgrade Common Use Terminal Equipment (CUTE); Begin Implemetation of Common Use Self-Service (CUSS)	3,200,000	2005	2005	3,200,000	-	-	3,200,000	-	-	-	-	-
3) Level 3 Additional Curbside Canopy	1,000,000	2005	2005	1,030,000	-	-	-	-	-	-	1,030,000	-
4) Ventilation Improvements (2nd level baggage make-up/curb) (Allowance)	3,000,000	2005	2005	3,090,000	-	-	-	-	3,090,000	-	-	-
5) Expand East and West Security Checkpoints to meet 40 MAP activity:												
a) West Security Checkpoint	5,000,000	2007	2007	5,464,000	4,781,000	-	683,000	-	-	-	-	-
b) East Security Checkpoint	7,000,000	2007	2007	7,649,000	6,693,000	-	956,000	-	-	-	-	-
c) Curb Enhancements	1,000,000	2007	2007	1,093,000	-	-	-	-	-	-	1,093,000	-
6) Relocate Airlines (Allowance)	3,000,000	2009	2009	3,000,000	-	-	-	-	-	3,000,000	-	-
Subtotal - North Terminal Capacity Projects	**23,700,000**			**25,026,000**	**11,912,000**	**-**	**4,901,000**	**-**	**3,090,000**	**3,000,000**	**2,123,000**	**-**
F) South Terminal												
1) Design and Construct South Terminal Facility												
a) Phase II - Infrastructure	100,000,000	2005	2012	115,927,000	27,327,000	-	48,026,000	-	40,574,000	-	-	-
b) Phase III - 12 Gates	594,000,000	2012	2014	775,035,000	-	-	77,504,000	426,269,000	271,262,000	-	-	-
c) Phase IV - 12 Gates	606,088,000	2016	2018	890,061,000	-	-	89,006,000	489,534,000	311,521,000	-	-	-
Subtotal - South Terminal	**1,300,088,000**			**1,781,023,000**	**27,327,000**	**-**	**214,536,000**	**915,803,000**	**623,357,000**	**-**	**-**	**-**
G) Asset Preservation/R&R Projects												
Asset Preservation Projects	142,937,000	2004	2014	142,937,000	-	-	-	-	-	-	-	142,937,000
Subtotal - Asset Preservation/R&R Projects	**142,937,000**			**142,937,000**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**142,937,000**
H) Hyatt Hotel Improvements												
1) Room Renovations	8,500,000	2011	2014	11,091,000	-	-	-	-	11,091,000	-	-	-
2) Hotel Expansion or New Hotel	50,000,000	2011	2014	65,239,000	-	-	-	-	65,239,000	-	-	-
Subtotal - Hyatt Hotel Improvements	**58,500,000**			**76,330,000**	**-**	**-**	**-**	**-**	**76,330,000**	**-**	**-**	**-**
Subtotal - TERMINAL PROJECTS	**1,851,182,000**			**2,370,662,000**	**189,738,000**	**-**	**352,174,800**	**915,803,000**	**718,086,200**	**49,800,000**	**2,123,000**	**142,937,000**

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Project Type	UNESCALATED COST	Project Start	Project End	Escalated Project Costs	State & Federal Grants	Approved PFC (PAYG)	Future PFC (PAYG)	Future Revenue Bonds (PFC Backed)	Future Revenue Bonds (GARBS)	Authority Funds (Existing)	Authority Funds (Future)	R&R
AIRFIELD PROJECTS												
A) Taxiways/Runways												
1) Runway 18L and 18R RSA Improvements (Phase I): Minor Marking and Lighting Modifications	363,000	2006	2006	374,000	327,000	-	47,000	-	-	-	-	-
2) East Airfield Modifications For Judgmental Oversteering / Cockpit Over Centerline Taxi Operations												
a) Phase I	600,000	2004	2006	618,000	541,000	-	77,000	-	-	-	-	-
b) Phase II	4,000,000	2006	2006	4,244,000	3,714,000	-	530,000	-	-	-	-	-
3) Runway 18L and 18R RSA Improvements (Phase II)												
a) Displace Thresholds	2,200,000	2007	2008	2,334,000	2,042,000	-	292,000	-	-	-	-	-
b) Extend Taxiway B2	4,500,000	2007	2008	4,774,000	4,177,000	-	597,000	-	-	-	-	-
4) Surface Movement Guidance & Control System (SMGCS)	1,800,000	2006	2006	1,910,000	1,671,000	-	239,000	-	-	-	-	-
5) New West Airfield Exit Taxiways												
a) Design	1,965,000	2006	2007	2,085,000	1,824,000		261,000					
b) Construction	13,835,000	2008	2009	14,677,000	12,843,000		1,834,000					
6) NLA A-380 Modifications Airside 4												
a) East Airfield Modifications	15,600,000	2006	2006	16,550,000	16,000,000	-	550,000	-	-	-	-	-
b) West Airfield Modifications	8,330,000	2006	2008	9,000,000	-	-	9,000,000	-	-	-	-	-
7) Taxiway L Extension South of Comair	43,300,000	2007	2010	50,197,000	43,922,000	-	6,275,000	-	-	-	-	-
8) Taxiway Y Extension (West Ramp)	2,000,000	2007	2007	2,185,000	1,912,000	-	273,000	-	-	-	-	-
9) Airside 2 & 4 Connector Taxiway (Relocate service road between airsides)	6,705,000	2010	2010	8,006,000	7,005,000	-	1,001,000	-	-	-	-	-
10) Taxiway C Extension	9,740,000	2014	2015	13,482,000	11,797,000	-	1,685,000	-	-	-	-	-
11) Dual North Crossfield Taxiway: Demolish and Replace West Cargo Buildings and Delta GSE/Cargo Facilities	21,700,000	2016	2019	32,823,000	28,720,000	-	4,103,000	-	-	-	-	-
12) Extend Runway 36R 2,780' (south)	31,600,000	2017	2020	49,232,000	43,078,000	-	6,154,000	-	-	-	-	-
13) Taxiway B Extension	9,740,000	2017	2020	15,175,000	13,278,000	-	1,897,000	-	-	-	-	-
14) Extend Runway 36L 1,500' (south)	12,500,000	2017	2020	19,475,000	17,041,000	-	2,434,000	-	-	-	-	-
15) Taxiway Connectors B11 and B12	15,600,000	2017	2020	24,304,000	21,266,000	-	3,038,000	-	-	-	-	-
16) Taxiway A3 Realignment	2,700,000	2017	2020	4,207,000	3,681,000	-	526,000	-	-	-	-	-
17) Taxiway E Extension (to Taxiway N)	34,500,000	2019	2022	57,023,000	49,895,000	-	7,128,000	-	-	-	-	-
18) Parallel Taxiway M - West Side of Fourth Runway	35,100,000	2019	2022	58,015,000	50,763,000	-	7,252,000	-	-	-	-	-
Subtotal - Taxiways/Runways	**278,378,000**			**390,690,000**	**335,497,000**	**-**	**55,193,000**	**-**	**-**	**-**	**-**	**-**

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Project Type	UNESCALATED COST	Project Start	Project End	Escalated Project Costs	State & Federal Grants	Approved PFC (PAYG)	Future PFC (PAYG)	Future Revenue Bonds (PFC Backed)	Future Revenue Bonds (GARBS)	Authority Funds (Existing)	Authority Funds (Future)	R&R
B) Miscellaneous												
1) Wildlife Attractants/Mitigation												
a) South End Runway 35L RPZ Site Improvements	4,049,000	2004	2004	4,049,000	3,543,000	506,000	-	-	-	-	-	-
b) Remove Remnant Wetlands	7,566,000	2005	2005	7,793,000	6,819,000	974,000	-	-	-	-	-	-
c) Fill Comair Pond	4,324,000	2005	2005	4,454,000	3,897,000	557,000	-	-	-	-	-	-
d) Fill Old Stilling Basin	3,522,000	2005	2005	3,628,000	3,175,000	453,000	-	-	-	-	-	-
e) Fill Third Runway Borrow Pit	4,199,000	2005	2005	4,325,000	3,784,000	541,000	-	-	-	-	-	-
f) Fill in Wetland North of Mid-Crossfield Taxiway "E"	5,537,000	2006	2006	5,874,000	5,140,000	734,000	-	-	-	-	-	-
Subtotal Misc. Airfield Projects	**29,197,000**			**30,123,000**	**26,358,000**	**3,765,000**	**-**	**-**	**-**	**-**	**-**	**-**
C) Asset Preservation / R&R Projects												
Airfield Asset Preservation Projects	35,688,000	2004	2014	35,688,000	-	-	-	-	-	-	-	35,688,000
Subtotal Asset Preservation/R&R Projects	**35,688,000**			**35,688,000**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**35,688,000**
Subtotal - AIRFIELD PROJECTS	**343,263,000**			**456,501,000**	**361,855,000**	**3,765,000**	**55,193,000**	**-**	**-**	**-**	**-**	**35,688,000**

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Project Type	UNESCALATED COST	Project Start	Project End	Escalated Project Costs	State & Federal Grants	Approved PFC (PAYG)	Future PFC (PAYG)	Future Revenue Bonds (PFC Backed)	Future Revenue Bonds (GARBS)	Authority Funds (Existing)	Authority Funds (Future)	R&R
ROADWAY & PARKING PROJECTS												
A) Roadways												
1) Interim Widening of South Access Road	10,100,000	2005	2007	10,403,000	-	-	10,403,000	-	-	-	-	-
2) Cargo Road Extension (Airport Blvd. to Old Terminal, 2 lanes)	6,400,000	2005	2008	6,592,000	-	-	6,592,000	-	-	-	-	-
3) Widen Exit Road (from Cargo Road to SR 528)	1,120,000	2005	2007	1,154,000	577,000	-	577,000	-	-	-	-	-
4) Terminal "A" Exit Weave	2,244,000	2005	2005	2,311,000	-	-	2,311,000	-	-	-	-	-
5) Heintzelman Boulevard Extension to Wetherbee/Boggy Creek	8,326,000	2010	2011	10,240,000	8,960,000	-	1,280,000	-	-	-	-	-
6) East Airfield Secure Road Extension	6,557,000	2010	2010	7,829,000	-	-	7,829,000	-	-	-	-	-
7) Dowden Road Extension (4 lanes)	21,563,000	2010	2011	25,747,000	12,873,500	-	12,873,500	-	-	-	-	-
8) Cut-Through Traffic												
a) North Terminal Braided Roadway	28,900,000	2011	2013	36,610,000	32,034,000	-	4,576,000	-	-	-	-	-
b) South Terminal Braided Roadway	34,600,000	2011	2013	43,830,000	38,351,000	-	5,479,000	-	-	-	-	-
9) Widen Entrance Road (SR 528 to Cargo Road)	2,615,000	2012	2012	3,313,000	1,657,000	-	1,656,000	-	-	-	-	-
10) Widen and Realign Tradeport Drive												
a) Widen Tradeport from Beeline to Bear Road (6 lanes)	1,567,000	2012	2012	1,985,000	993,000	-	992,000	-	-	-	-	-
b) Realign Central Tradeport to West Property Line (Bear Road to Binnacle)	7,245,000	2012	2012	9,178,000	4,589,000	-	4,589,000	-	-	-	-	-
c) Realign Central Tradeport from Binnacle to Boggy Creek	39,900,000	2013	2013	52,060,000	26,030,000	-	26,030,000	-	-	-	-	-
11) Existing Bear Road Widening (Cargo Road to Tradeport Drive (2 lanes to 4 lanes)	6,240,000	2013	2013	8,142,000	-	-	8,142,000	-	-	-	-	-
12) Secure Service Road (West Airfield)	1,900,000	2017	2020	2,960,000	-	-	2,960,000	-	-	-	-	-
Subtotal - Roadways	**179,277,000**			**222,354,000**	**126,064,500**	**-**	**96,289,500**	**-**	**-**	**-**	**-**	**-**

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Project Type	UNESCALATED COST	Project Start	Project End	Escalated Project Costs	State & Federal Grants	Approved PFC (PAYG)	Future PFC (PAYG)	Future Revenue Bonds (PFC Backed)	Future Revenue Bonds (GARBS)	Authority Funds (Existing)	Authority Funds (Future)	R&R
B) Parking												
1) Employee Parking Lot Expansion												
a) Design	366,000	2005	2005	400,000	200,000	-	-	-	-	200,000	-	-
b) Construction	6,406,000	2005	2006	7,000,000	3,500,000	-	-	-	-	3,500,000	-	-
2) Blue Lot Expansion												
a) Design	1,000,000	2005	2005	1,000,000	500,000	-	-	-	-	500,000	-	-
b) Construction	13,889,000	2005	2006	14,300,000	7,150,000	-	-	-	1,581,000	5,569,000	-	-
3) Revenue Control Enhancements / Parking Equipment/E-Pass Installation / Canopy Modifications (Allowance)	8,767,000	2005	2005	9,030,000	-	-	-	-	9,030,000	-	-	-
4) Install additional exit lane/cashier booth breakroom facilities, and toilet at Red Lot	531,900	2005	2005	548,000	-	-	-	-	548,000	-	-	-
5) Parking Garage Signage (Allowance)	2,000,000	2005	2005	2,060,000	-	-	-	-	2,060,000	-	-	-
6) Close Gold Overflow Lot, Provide Replacement Overflow Spaces (1,000 in Red Lot)	1,640,544	2008	2008	1,846,500	923,250	-	-	-	923,250	-	-	-
7) Taxi Bullpen Relocation to Red Lot	4,700,000	2008	2008	5,290,000	-	-	-	-	5,290,000	-	-	-
8) Modify/Expand RAC Ready/Return Areas in Support of RAC Rebid in 2009 (leases expire 2/28/2009) (Allowance)	10,000,000	2008	2008	11,255,000	-	-	-	-	11,255,000	-	-	-
9) Expand Red Lot for Holiday Overflow (2,400 spaces)	8,762,940	2010	2010	10,463,500	5,231,750	-	-	-	5,231,750	-	-	-
Subtotal - Parking	**58,063,384**			**63,193,000**	**17,505,000**	**-**	**-**	**-**	**35,919,000**	**9,769,000**	**-**	**-**
C) Asset Preservation/R&R Projects										-		
Roadway & Parking Asset Preservation Projects	23,950,000	2004	2014	23,950,000	-	-	-	-	-	-	-	23,950,000
Subtotal - Asset Preservation/R&R Projects	**23,950,000**			**23,950,000**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**23,950,000**
										-		
Subtotal - ROADWAY & PARKING PROJECTS	**261,290,384**			**309,497,000**	**143,569,500**	**-**	**96,289,500**	**-**	**35,919,000**	**9,769,000**	**-**	**23,950,000**

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Project Type	UNESCALATED COST	Project Start	Project End	Escalated Project Costs	State & Federal Grants	Approved PFC (PAYG)	Future PFC (PAYG)	Future Revenue Bonds (PFC Backed)	Future Revenue Bonds (GARBS)	Authority Funds (Existing)	Authority Funds (Future)	R&R
OTHER PROJECTS												
A) Other Projects												
1) Environmental Projects	20,615,000	2004	2014	23,898,000	-	-	-	-	-	-	23,898,000	-
2) Purchase Army Property - Tradeport	6,500,000	2005	2005	6,695,000	-	-	-	-	-	-	6,695,000	-
3) Perishables Center (allowance)	1,000,000	2005	2005	1,030,000	-	-	-	-	-	-	1,030,000	-
4) Art Program (allowance)	1,000,000	2005	2011	1,000,000	-	-	-	-	-	-	1,000,000	-
5) Demolish Old Navy Commissary Warehouse	700,000	2008	2008	788,000	-	-	-	-	-	-	788,000	-
6) Demolish Two-Story Building Located on FAA Parcel #5 at Tradeport	200,000	2008	2008	225,000	-	-	-	-	-	-	225,000	-
7) Post Office Demolition	1,200,000	2008	2008	1,351,000	-	-	-	-	-	-	1,351,000	-
8) Master Plan Update	4,000,000	2008	2013	4,919,000	4,304,000	-	615,000	-	-	-	-	-
9) South Tradeport Drainage Improvements	6,300,000	2008	2008	7,091,000	-	-	-	-	-	-	7,091,000	-
10) Demolish Old Terminal (Buildings 607 & 608)	1,218,000	2008	2008	1,371,000	-	-	-	-	-	-	1,371,000	-
11) Land Development/Mitigation and Site Prep (Allowance)	30,000,000	2009	2012	36,896,000	-	-	-	-	-	-	36,896,000	-
12) Authority Warehouse Facility (30,000 sf)	5,000,000	2010	2010	5,970,000	-	-	-	-	5,970,000	-	-	-
13) GOAA Office Building at Terminal	10,000,000	2012	2012	12,668,000	-	-	-	-	12,668,000	-	-	-
Subtotal - Other Projects	**87,733,000**			**103,902,000**	**4,304,000**	**-**	**615,000**	**-**	**18,638,000**	**-**	**80,345,000**	**-**
B) Asset Preservation/R&R Projects												
Asset Preservation/R&R Projects	17,424,000	2004	2,014	17,425,000	-	-	-	-	-	-	-	17,425,000
Subtotal - Asset Preservation/R&R Projects	**17,424,000**			**17,425,000**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**17,425,000**
Subtotal - OTHER PROJECTS	**105,157,000**			**121,327,000**	**4,304,000**	**-**	**615,000**	**-**	**18,638,000**	**-**	**80,345,000**	**17,425,000**
TOTAL PROJECT COST	**2,560,892,384**			**3,257,987,000**	**699,466,500**	**3,765,000**	**504,272,300**	**915,803,000**	**772,643,200**	**59,569,000**	**82,468,000**	**220,000,000**

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Project Type	UNESCALATED COST	Project Start	Project End	Escalated Project Costs	State & Federal Grants	Approved PFC (PAYG)	Future PFC (PAYG)	Future Revenue Bonds (PFC Backed)	Future Revenue Bonds (GARBS)	Authority Funds (Existing)	Authority Funds (Future)	R&R
PROJECTS BEYOND MODEL CIP:												
Airfield Projects												
22) Dual North Crossfield Taxiway												
a) Taxiway and Bridges	50,300,000	2020	2023	85,632,000	74,928,000	-	10,704,000	-	-	-	-	-
b) 1,500 ft Extension to Runway 17R/35L	15,500,000	2020	2023	26,388,000	23,090,000	-	3,298,000	-	-	-	-	-
c) Relocate NAVAIDS	719,000	2020	2023	1,224,000	1,071,000	-	153,000	-	-	-	-	-
d) Taxiways H Extension and Connector Taxiways	12,700,000	2020	2023	21,621,000	18,918,000	-	2,703,000	-	-	-	-	-
e) Extend Taxiway K to Runway 17R/35L	27,600,000	2020	2023	46,987,000	41,114,000	-	5,873,000	-	-	-	-	-
23) Parallel Taxiway - East Side of Fourth Runway (Airfield Access to GeeBee Area)	62,800,000	2020	2023	106,913,000	93,549,000	-	13,364,000	-	-	-	-	-
24) Taxiway Z Extension	21,300,000	2021	2024	37,350,000	32,681,000	-	4,669,000	-	-	-	-	-
B) Miscellaneous												
1) Wildlife Attractants/Mitigation												
g) Regrade Side Slopes of West Airsides 1 & 3 Ponds	11,120,000	2020	2021	18,380,000	16,083,000	2,297,000	-	-	-	-	-	-
Subtotal - Airfield Projects Beyond Modeling Horizon	**202,039,000**			**344,495,000**	**301,434,000**	**2,297,000**	**40,764,000**	**-**	**-**	**-**	**-**	**-**
TOTAL PROJECT COST BEYOND MODELING HORIZON	**202,039,000**			**344,495,000**	**301,434,000**	**2,297,000**	**40,764,000**	**-**	**-**	**-**	**-**	**-**

TERMINAL PROJECTS

A) Airsides 1 and 3 Rehabilitation

1) Airside 1	**$ 61,383,000**
2) Airside 3	**$ 63,617,000**
Total - Airsides 1 and 3 Rehabilitation	**$ 125,000,000**

Description:

This is a capacity project that will rehabilitate two (2) airside terminal building(s). This project will provide the rehabilitation of Airsides 1 and 3, including, but not limited to: providing additional electrical power and air-conditioning capacity; rehabilitation of hold rooms of all airside wings; expansion of hub areas; Automated Guideway Transit (AGT) station rehabilitation; and mechanical, electrical, security, and communication systems rehabilitation.

Demand and Benefits:

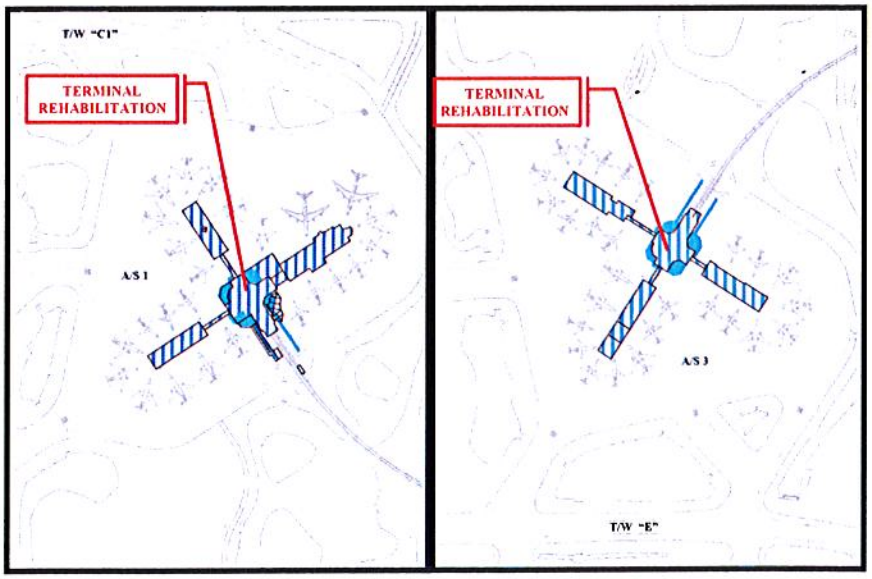
Airsides 1 and 3, located on the west side of the North Terminal Complex at MCO, are over 25 years old and reaching the end of their useful life. These airsides have received no major renovations since their original construction date. This rehabilitation project will provide accommodation for increased passenger circulation, concession space, public seating, and renovation/upgrades to improve efficiency to existing electrical power and air-conditioning systems. These renovated and expanded buildings will provide a comparable level of service and have a service life similar to a modern building at a lower cost rather than constructing new airsides. These modified buildings will also provide an equivalent airport experience to the traveling public as currently found on Airsides 2 and 4.

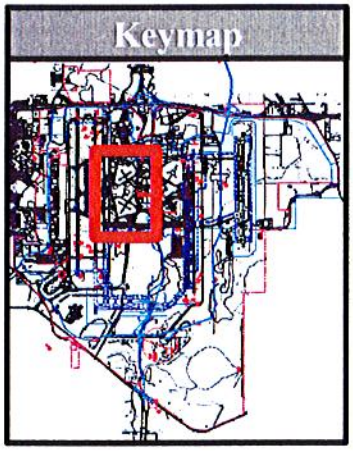
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 61,383,000	3,279,000	36,620,000	-	-	21,484,000	-
$ 63,617,000	3,398,000	37,953,000	-	-	22,266,000	-

Schedule:

Start: 2004
Finish: 2008





TERMINAL PROJECTS

B) Airside 2 Expansion

1) Expand Wings 7 & 9 (6 new gates)	
a) Expand Wings 7 & 9 (6 new gates) (includes relocation of artwork)	$ 13,850,000
b) Extend Taxiways G1 and H2	$ 4,737,000
2) Concessions	$ 750,000
3) Add New Wing (8 new gates)	
a) Design	$ 2,732,000
b) Construction	$ 26,999,000
c) Other Building Improvements	$ 4,903,000
Total - Airside 2 Expansion	**$ 53,971,000**

Description:

This is a capacity project that will modify an existing airside terminal building. This project will include the expansion of existing concourses (Wings 7 and 9) and the addition of the third concourse (Wing 8) at Airside 2. This project will increase the total number of gates from 16 to up to 30. The project also includes the extension of Taxiways G1 and H2, including clearing, site grading, drainage, pavement, marking, taxiway edge and center lighting, and taxiway marking.

Demand and Benefits:

Airside 2, the most recently constructed airside at MCO, was opened in 2000. It was constructed with expansion capability on a demand-driven basis. Two partial concourses were constructed in the initial construction phase and expansion room is available in both. The center concourse was not constructed. Since the expansion of Airside 2 is critical to enable the airport to accommodate 40 million annual passengers, there is an immediate need to modify Airside 2 by expanding the existing two concourses and constructing the third concourse at a future date. Since Taxiways G1 and H2 are in close proximity to Airside 2, the increased movement of aircraft associated with the expansion of Airside 2 requires the extension of these taxiway connectors to improve access between the airline gate areas and the east airfield.

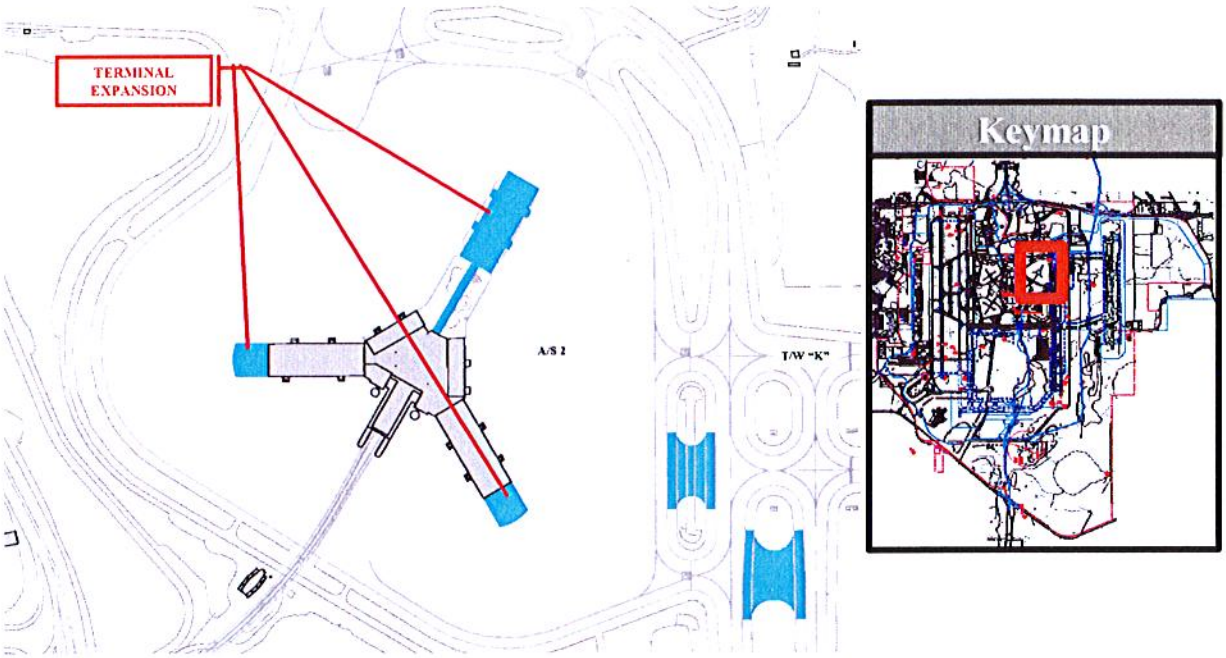
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 13,850,000	-	11,550,000	-	-	2,300,000	-
$ 4,737,000	-	4,737,000	-	-	-	-
$ 750,000	-	-	-	-	750,000	-
$ 2,732,000	-	1,775,800	-	956,200	-	-
$ 26,999,000	-	17,549,000	-	9,450,000	-	-
$ 4,903,000	-	-	-	4,903,000	-	-

Schedule:

Start: 2004
Finish: 2010

Airside 2 Expansion



TERMINAL PROJECTS

C) Airside 4 Modifications
New Large Aircraft (NLA) A380 Modifications Airside 4 Terminal (Allowance) ..... $ 5,150,000

Description:

This is a capacity project that will modify an existing airside terminal building. This project includes terminal enhancements to accommodate the A380 including holdroom modifications, Passenger Boarding Bridge (PBB) modifications, and other passenger facility-related improvements as required.

Demand and Benefits:

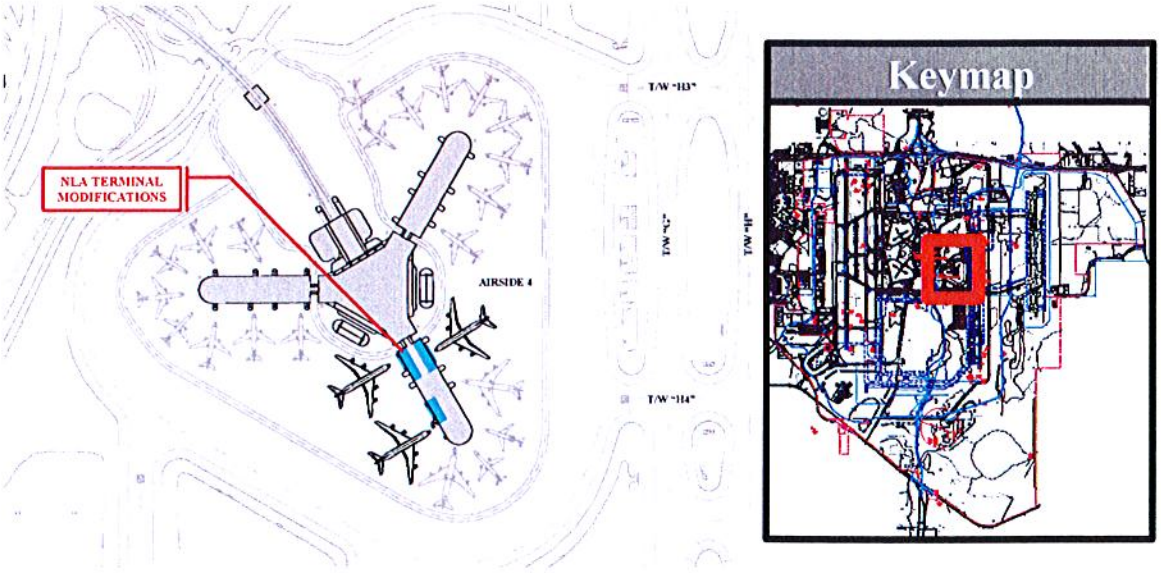
Airbus Industrie is manufacturing a new aircraft, the A380, which will become the first Federal Aviation Administration (FAA) Airplane Design Group (ADG) VI commercial passenger aircraft to operate in domestic and international markets. With a wingspan of 261 feet, the A380 is programmed to enter service as early as 2006. MCO has existing facilities with capability to accommodate this new large aircraft, with some terminal and airfield facility modifications. In order to ensure MCO remains both a viable and preferred destination for these large aircraft, these modifications must be completed for the arrival of the A380 into the markets served.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 5,150,000	-	5,150,000	-	-	-	-

Schedule:

Start: 2005
Finish: 2005



TERMINAL PROJECTS

E) North Terminal Capacity Projects

2) Implement/Upgrade Common Use Terminal Equipment (CUTE); Begin Implementation of Common Use Self-Service (CUSS)	$ 3,200,000
3) Level 3 Additional Curbside Canopy	$ 1,030,000
4) Ventilation Improvements (2nd level baggage make-up/curb) (Allowance)	$ 3,090,000
5) Expand East and West Security Checkpoints to meet 40 MAP activity:	
a) West Security Checkpoint	$ 5,464,000
b) East Security Checkpoint	$ 7,649,000
c) Curb Enhancements	$ 1,093,000
6) Relocate Airlines (Allowance)	$ 3,000,000
Total North Terminal Capacity Projects (Items 2-6)	$24,526,000

North Terminal Capacity Projects
2) Implement/Upgrade Common Use Terminal Equipment (CUTE); Begin Implementation of Common Use Self-Service (CUSS)

Description:
The implementation of CUTE has been partially completed. This project will:

1) implement CUTE at 12 former USAirways gates and airside counters. The project will include airside check-in positions, gate door positions, airside networking wiring costs, SITA gateways and counter modifications;

2) begin to upgrade the existing CUTE equipment to Microsoft XP from NT; and

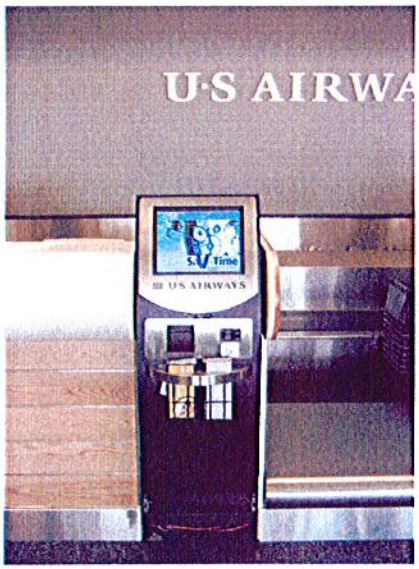
3) provide the initial phase to install 365 CUSS kiosks in the landside terminal. These kiosks will be mainly located in the check-in counters, with some stand-alone units. This project will include a core computer system, kiosks, passport readers, landside networking wiring costs and counter modifications.

Demand and Benefits:
The implementation of CUTE is necessary as MCO transitions from airline proprietary gates and counters to preferential use. The implementation of CUSS is necessary to accommodate changing market conditions. As passengers require less interaction with airline personnel for check-in, this enhancement is critical to MCO.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 3,200,000	-	3,200,000	-	-	-	-

Schedule:
Start: 2005
Finish: 2005



North Terminal Capacity Projects
3) Level 3 Additional Curbside Canopy

Description:
This project includes modification to a combination of the following areas/joints of the existing Level 3 curbside canopy: beam cap; side wall; bridge cap; canopy back panel; and, canopy panel joint.

Demand and Benefits:
There is a considerable amount of wind blown rain that reaches the users of the third (3rd) level curb. The existing design was not planned as a wind and waterproof cover for the curb. This project provides for adapting the existing roof, skylight and canopy systems to reduce the amount of wind blown rain.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
1,030,000	-	-	-	-	1,030,000	-

Schedule:
Start: 2005
Finish: 2005

North Terminal Capacity Projects
4) Ventilation Improvements

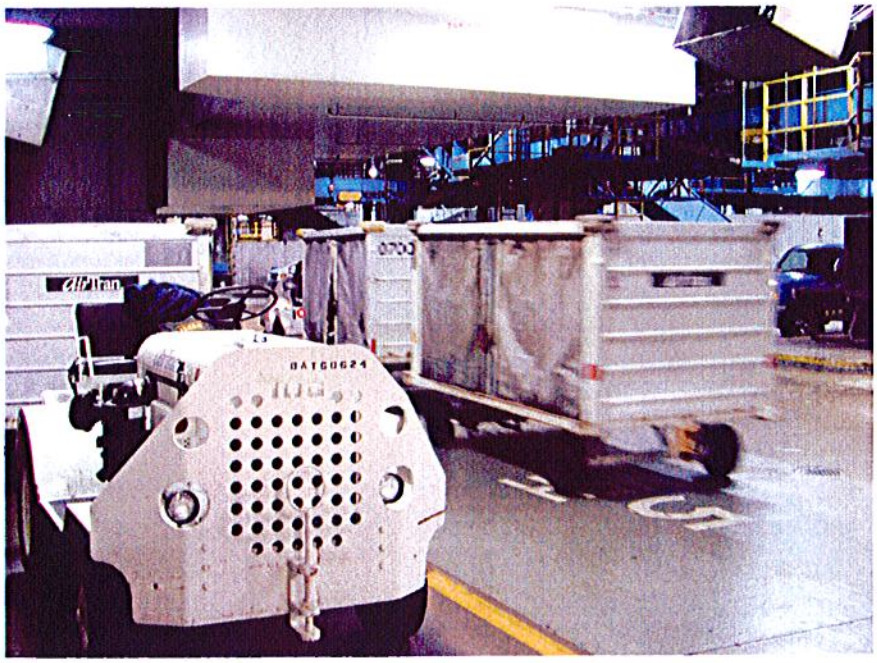
Description:
This safety project provides ventilation improvements in the second (2nd) level baggage make-up and curb. It includes infrastructure required to convert tugs from gasoline power to electric/cleaner power. It also includes study and implementation of ventilation improvements in Level 2 baggage claim area, including Hyatt Hotel's vent and loading dock. This project also provides additional air movement in the curb area of Level 2.

Demand and Benefits:
This is a mandated safety project.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$3,090,000	-	-	-	3,090,000	-	-

Schedule:
Start: 2005
Finish: 2005



North Terminal Capacity Projects
6) Relocate Airlines (Allowance)

Description:
These funds are to relocate airlines when major construction projects are approved.

Demand and Benefits:
This project would enable the airlines to continue normal operations during major construction projects.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 3,000,000	-	-	-	-	3,000,000	-

Schedule:
Start: 2009
Finish: 2009

TERMINAL PROJECTS

F) South Terminal

a) Phase II – Infrastructure	$ 115,927,000
b) Phase III – 12 Gates	$ 775,035,000
c) Phase IV – 12 Gates	$ 890,061,000
Total - South Terminal	$1,781,023,000

Description:

This is a capacity project that will add a new passenger terminal complex at MCO. This facility will be constructed in phases to accommodate increasing demand. The project will include design and construction of a new terminal complex located to the south of the existing terminal complex, providing an additional 120 gates at build-out.

- The project phasing will initially provide a 12-gate terminal and the Intermodal Transit System (ITS) that will serve as the connection between the North and the new South Terminal Complexes.
- Subsequent phasing, to meet actual passenger demand, will provide an additional 12 gates and add 4 additional cars to the ITS, also including terminal, sitework/infrastructure, airfield, public/secure/service roads, related improvements and structural parking.

Demand and Benefits:

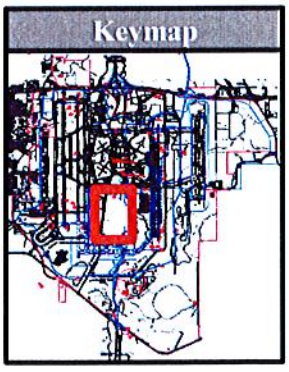
Projected growth of passengers at MCO will surpass 40 million annual passengers (MAP) in 2012, reaching 47 MAP in 2017. The 2003 MCO North Terminal Capacity Study identified the enhanced capacity of the North Terminal to be between 37 to 46 MAP, with certain facility improvements. Therefore, it is projected that 12 to 24 of the 120 gates at the South Terminal will be required to meet the demand by 2017. Project phasing will be determined by actual passenger demand, with the possibility of these initial phases being built simultaneously.

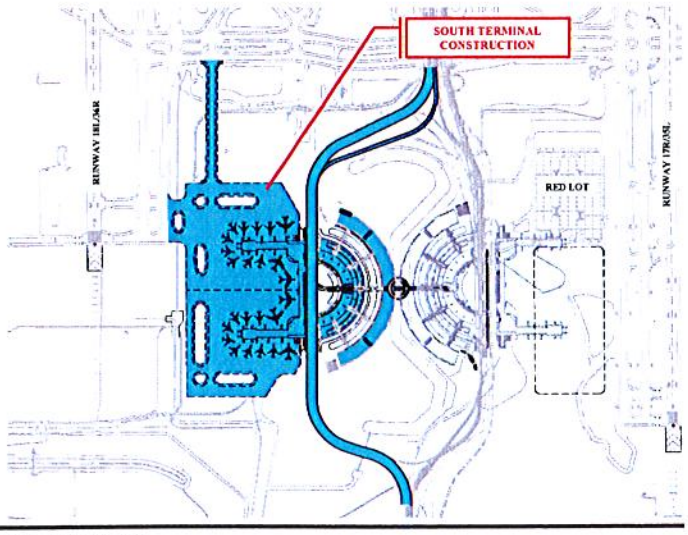
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 115,927,000	27,327,000	48,026,000	-	40,574,000	-	-
$ 775,035,000	-	77,504,000	426,269,000	271,262,000	-	-
$ 890,061,000	-	89,006,000	489,534,000	311,521,000	-	-

Schedule:

Start: 2008
Finish: 2016





TERMINAL PROJECTS

G) Asset Preservation/R & R Projects $142,937,000

Description:

In October 2002, the Greater Orlando Aviation Authority embarked upon a goal to produce and maintain an Asset Preservation Renewal & Replacement Plan for MCO. A breakdown of these projects is available in a separate document.

Demand and Benefits:

This program will identify the asset, quantify the prevention effort, and schedule the proposed capital outlays within the respective area by fiscal year.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$142,937,000	-	-	-	-	-	142,937,000

Schedule:

Start: 2004
Finish: 2014

TERMINAL PROJECTS

H) Hyatt Hotel Improvements

1) Room Renovations	**$11,091,000**
2) Hotel Expansion or New Hotel	**$65,239,000**
Total - Hyatt Hotel Improvements	**$76,330,000**

1) Room Renovations

Description:
This project includes complete renovation of hotel facility guest rooms and suites to include soft goods, case goods, finishes, including ceilings, paint, wall coverings, tile, countertops and carpeting, and bathroom modifications to comply with Americans with Disabilities Act and Florida Access Code requirements.

Demand and Benefits:
This project will allow the hotel to provide a level of service to maintain its four star rating.

2) Hotel Expansion or New Hotel

Description:
This project will expand the Hyatt Hotel by 300 rooms and expand associated banquet facilities. This expansion will be built on top of the new rail station.

Demand and Benefits:
This project will support hotel operations and continue to enhance service to the airport customers.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$11,091,000	-	-	-	11,091,000	-	-
$65,239,000	-	-	-	65,239,000	-	-

Schedule:
Start: 2011
Finish: 2014

AIRFIELD PROJECTS

A) Taxiways/Runways

1) Runways 18L and 18R Runway Safety Area (RSA) Improvements (Phase I): Minor Marking and Lighting Modifications ..... $ 374,000

Description:

This project will establish a 1,000-foot extended RSA off Runways 18L and 18R through the application of declared distances and some aviation equipment modifications. Declared distances for Landing Distance Available (LDA) and Accelerate Stop Distance Available (ASDA) for Runways 36L and 36R will be reduced by approximately 400 feet. Airfield-related construction improvements will include the installation and modification of runway lighting equipment, runway distance remaining signage, pavement markings, electrical system upgrades, and miscellaneous aviation facility related improvements. This project is scheduled to be implemented in FY 2004.

Demand and Benefits:

In 2002, the Authority initiated a planning analysis to identify and evaluate RSA improvement alternatives for Runway 18L and 18R. This report titled "OIA West Airfield (Runways 18L and 18R) Runway Safety Area Study" was completed and approved in March 2003.

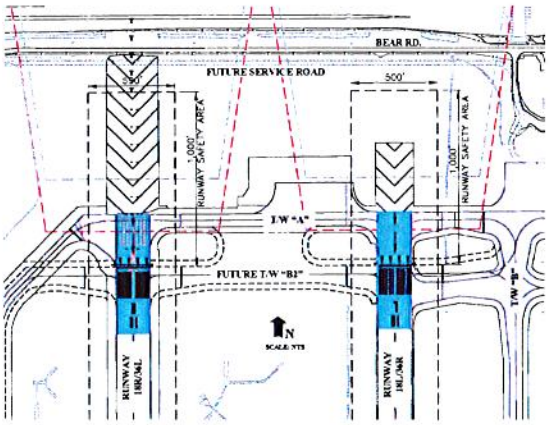
The RSA lengths beyond the runway end (extended RSA) for Runways 18L and 18R require modifications to satisfy FAA airport design standards. Displacement of Runways 18L and 18R thresholds will satisfy FAA design criteria. This airfield safety related project will enhance those aircraft safety for aircraft operating from Runways 36L and 36R.

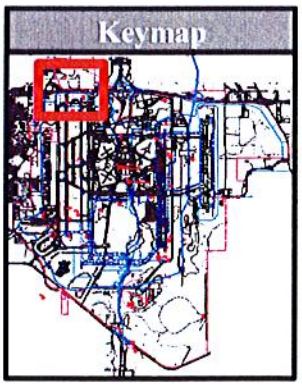
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 374,000	327,000	47,000	-	-	-	-

Schedule:

Start: 2006
Finish: 2006





AIRFIELD PROJECTS

A) Taxiways/Runways

2) East Airfield Modifications For Judgmental Oversteering / Cockpit Over Centerline Taxi Operations

a) Phase I	**$ 618,000**
b) Phase II	**$4,244,000**
Total	**$4,844,000**

This project provides improvements to the intersections of Runway 17R/35L and associated Taxiways E, F, G and H to support cockpit over centerline steering by large commercial aircraft (Group IV and above). Phase I will remove taxiway centerline lighting and pavement markings along the taxiway radii at these intersections to permit judgmental oversteering operations only. Phase II will include widening of taxiway fillets/shoulders, pavement remarking, and taxiway edge lighting to support cockpit over centerline and low visibility aircraft taxi operations.

Demand and Benefits:

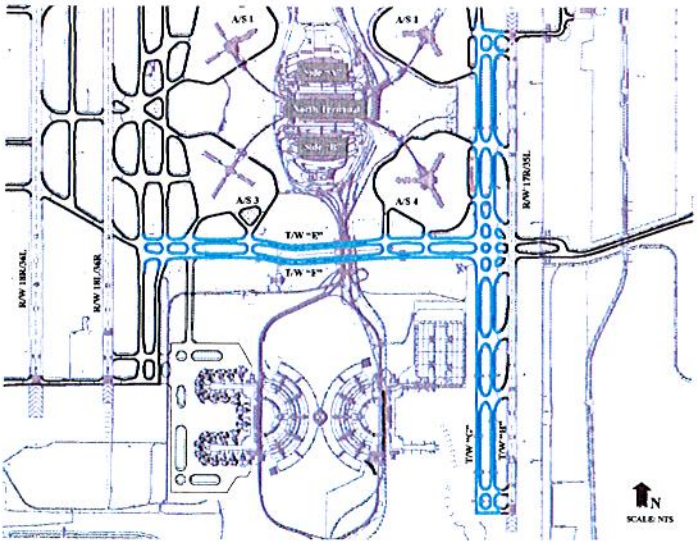
These airfield pavement facility improvements will improve the safety and capacity of the airfield by providing for judgmental oversteering operations, cockpit over centerline and low visibility aircraft taxi operations at the intersections of Runway 17R/35L and associated Taxiways E, F, G and H. .

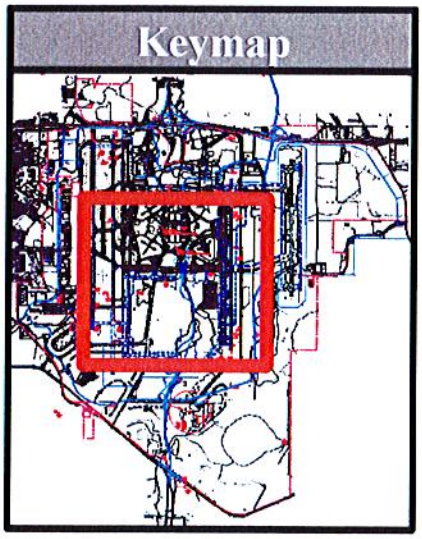
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 618,000	541,000	77,000	-	-	-	-
$ 4,244,000	3,714,000	530,000	-	-	-	-

2a Schedule:
Start: 2004
Finish: 2006

2b Schedule:
Start: 2006
Finish: 2006





AIRFIELD PROJECTS

A) Taxiways/Runways

3) Runways 18L and 18R Runway Safety Area (RSA) Improvements (Phase II)

a) Displace Thresholds.....$ 2,334,000

b) Extend Taxiway B2 .....$ 4,774,000

Total - Runways 18L and 18R RSA Improvements (Phase II).....$ 7,108,000

Description:

Programmed for FY 2005, this project will displace both Runways 18L and 18R thresholds approximately 400 feet to the south. The project will include the relocation of FAA NAVAIDS equipment including Runway 18R glide slope antenna, relocation of the Medium Intensity Approach Lighting System with Runway Alignment Indicator Lights (MALSR) stations, new touchdown zone lights on Runway 18L, and relocation of existing distance remaining signs. Taxiway B2 will also be extended to the west to connect with Taxiway A in this phase.

Demand and Benefits:

In 2002, the Authority initiated a planning analysis to identify and evaluate RSA improvement alternatives for Runway 18L and 18R. This report titled "OIA West Airfield (Runways 18L and 18R) Runway Safety Area Study" was completed and approved in March 2003.

The RSA lengths beyond the runway end (extended RSA) for Runways 18L and 18R require modifications to satisfy Federal Aviation Administration (FAA) airport design standards. Displacement of Runways 18L and 18R thresholds will satisfy FAA design criteria. This airfield safety related project will enhance those aircraft safety for aircraft operating from Runways 36L and 36R.

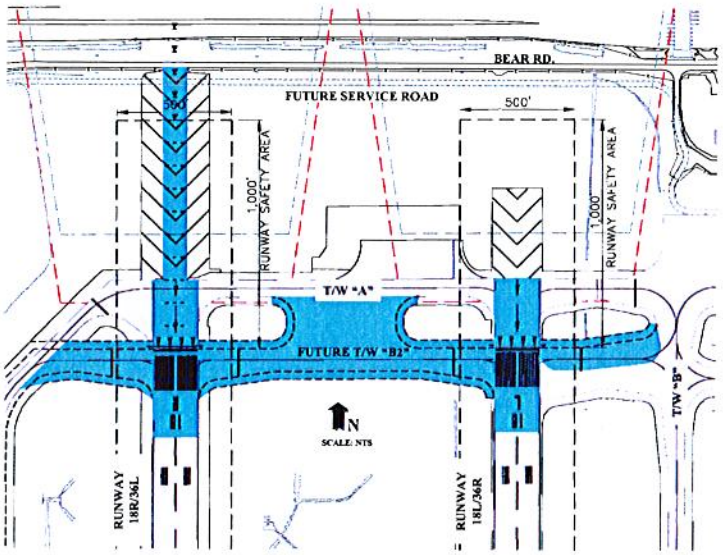
Funding:

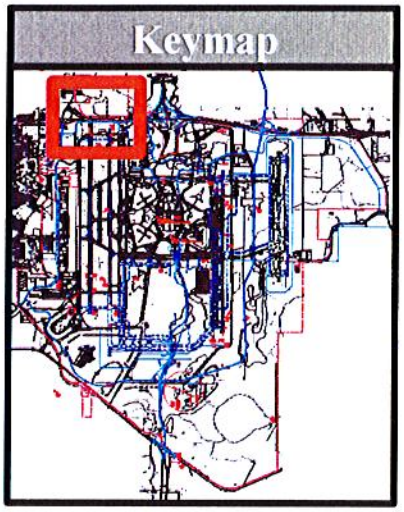
Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 2,334,000	2,042,000	292,000	-	-	-	-
$ 4,774,050	4,177,000	597,000	-	-	-	-

3a Schedule
Start: 2007
Finish: 2008

3b Schedule:
Start: 2007
Finish: 2008

Taxiways/Runways
3) Runways 18L and 18R Runway Safety Area (RSA) (Phase II)





AIRFIELD PROJECTS

A) Taxiways/Runways

4) Surface Movement Guidance & Control System (SMGCS)..... $1,910,000

Description:

A SMGCS plan is being developed for MCO and should be submitted to the FAA in 2004. This plan was developed in accordance with FAA Advisory Circular 170-57A and the MCO SMGCS working group. This FAA document provides guidelines for the preparation of a SMGCS plan. With FAA approval of this plan and airfield pavement modifications, airport staff, airlines and other airport tenants at MCO will then be subject to SMGCS training in order to operate under low visibility weather conditions.

Demand and Benefits:

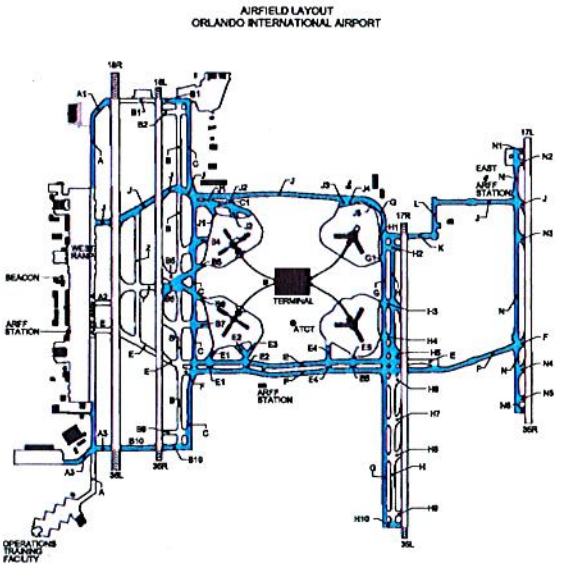
To support passenger and air cargo airline operations at MCO, airfield pavement markings along SMGCS taxi routes need to be modified. The FAA approved plan will permit aircraft to taxi, land, and depart during periods of low visibility when conditions are below 1,200 feet Runway Visual Range (1200 RVR) but not less than 600 RVR. This SMGCS project will enhance airfield safety and minimizes aircraft delay. The SMGCS plan for MCO was developed to support both north and south flow operations. The implementation of SMGCS at MCO will also support the FAA's upgrading of Instrument Landing System Category II (ILS CAT II) equipment to ILS Category III on Runway 17L/35R. The FAA will then be able to develop new instrument approach procedures for these runways.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 1,910,000	1,671,000	239,000	-	-	-	-

Schedule:

Start: 2006
Finish: 2006



SCALE: NTS

AIRFIELD PROJECTS

A) Taxiways/Runways

5) New West Airfield Exit Taxiways

a) Design	**$ 2,085,000**
b) Construction	**$ 14,677,000**
Total – New West Airfield Exit Taxiways	**$ 16,762,000**

Description:

Three high-speed exit taxiway segments will be constructed on the west airfield to reduce aircraft on runway occupancy times. Portions of Taxiways J and E west of Runway 18R/36L are also to be upgraded to minimize runway occupancy time. Modification of these two taxiways will enhance aircraft taxiing operations from this runway the west ramp.

Demand and Benefits:

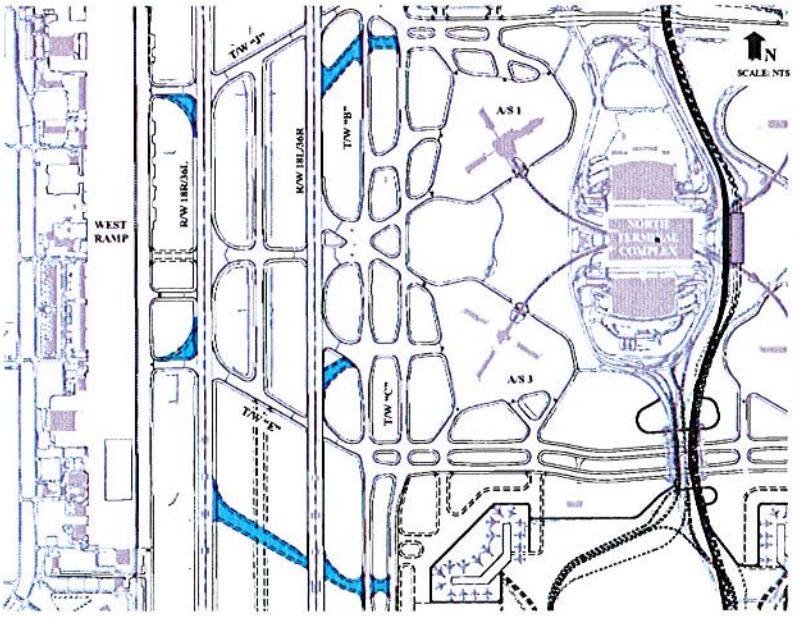
High-speed exit taxiways enhance airfield capacity and reduce delay by minimizing aircraft occupancy time on the west airfield runways. If an aircraft remains on a runway, the capacity of that runway is reduced and delays will result for arriving and departing aircraft. When exit taxiways are properly positioned, landing aircraft are able to quickly exit the runway. Proposed taxiways will be located near the intersections of Runway 18R/36L and Taxiway J; Runway 18R/36L and Taxiway E; and between Runway 18R/36L and Taxiway C.

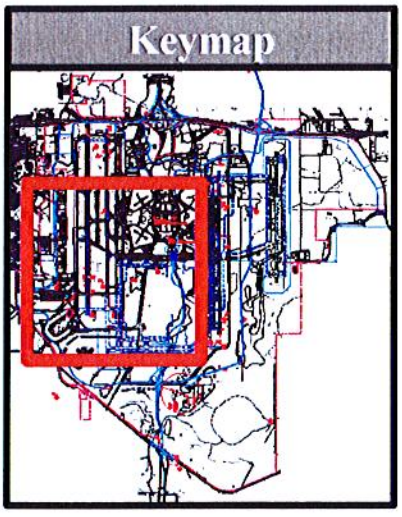
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 2,085,000	1,824,000	261,000	-	-	-	-
$ 14,677,000	12,843,000	1,834,000	-	-	-	-

5a Schedule
Start: 2006
Finish: 2007

5b Schedule:
Start: 2008
Finish: 2009





AIRFIELD PROJECTS

A) Taxiways/Runways

6) NLA A-380 Modifications, Airside 4

a) East Airfield Modifications	**$ 16,550,000**
b) West Airfield Modifications	**$ 9,000,000**
Total NLA A-380 Modifications, Airside 4	**$ 25,550,000**

Description:

This is an airfield capacity enhancement project. This project includes the re-definition of the aircraft lead-in and parking positions to provide for ADG VI aircraft access to the Airside 4 Terminal Building and Passenger Boarding Bridge (PBB) equipment, and modifications to the layout of fuel hydrants to meet the fueling geometry of the new A380 aircraft. It also includes airfield enhancements to accommodate the A380 including: Widen Runway 17R/35L, including widening of full-strength pavement, runway shoulders and blast pads; associated taxiway widening, taxiway radii enhancements, extension of multiple pipe crossings to meet the larger taxiway safety area width requirements, and, installation of new centerline lighting.

Demand and Benefits:

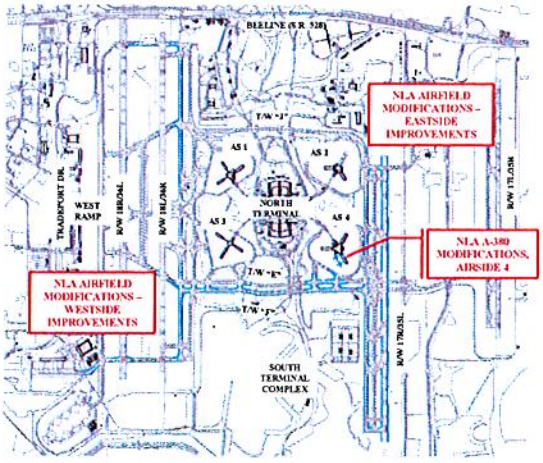
Airbus Industrie is manufacturing a new aircraft, the A380, which will become the first FAA ADG VI passenger aircraft to operate in domestic and international markets. The A380, with a wingspan of 261 feet, is programmed to enter service as early as 2006. MCO has existing facilities with capability to accommodate this new large aircraft, with some terminal and airfield facility modifications. In order to ensure MCO remains both a viable and preferred destination for these large aircraft, these modifications must be completed for the arrival of the A380 into the markets served.

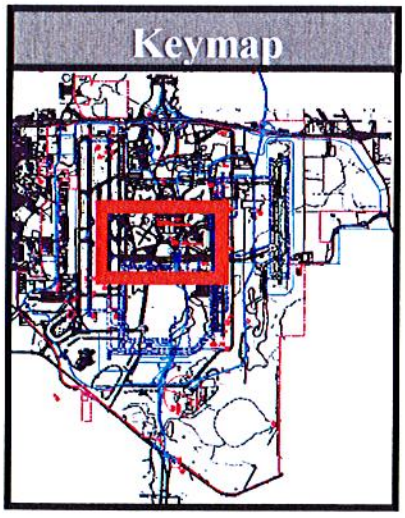
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 16,550,000	16,000,000	550,000	-	-	-	-
$ 9,000,000		9,000,000	-	-	-	-

6a Schedule:
Start: 2006
Finish: 2006

6b Schedule:
Start: 2006
Finish: 2008





AIRFIELD PROJECTS

A) Taxiways/Runways

7) Taxiway L Extension South of Comair $50,197,000

Description:

Taxiway L is proposed to be extended from Taxiway K (west of the Comair Delta Connection aircraft maintenance hangar) approximately 8,500 feet to the south. This taxiway extension will be located west of the bypass canal and will link with Taxiway G approximately 1,300 feet to the west as a taxiway connector. This alignment alternative maximizes the use of undeveloped land adjacent to the airfield. This airfield improvement project also includes the construction of four (4) taxiway connectors between Taxiway L to Runway 17R/35L. A future apron taxilane is also shown on the east side of the bypass canal. This project will require a box culvert to support access between the midfield area and Runway 17R/35L.

Demand and Benefits:

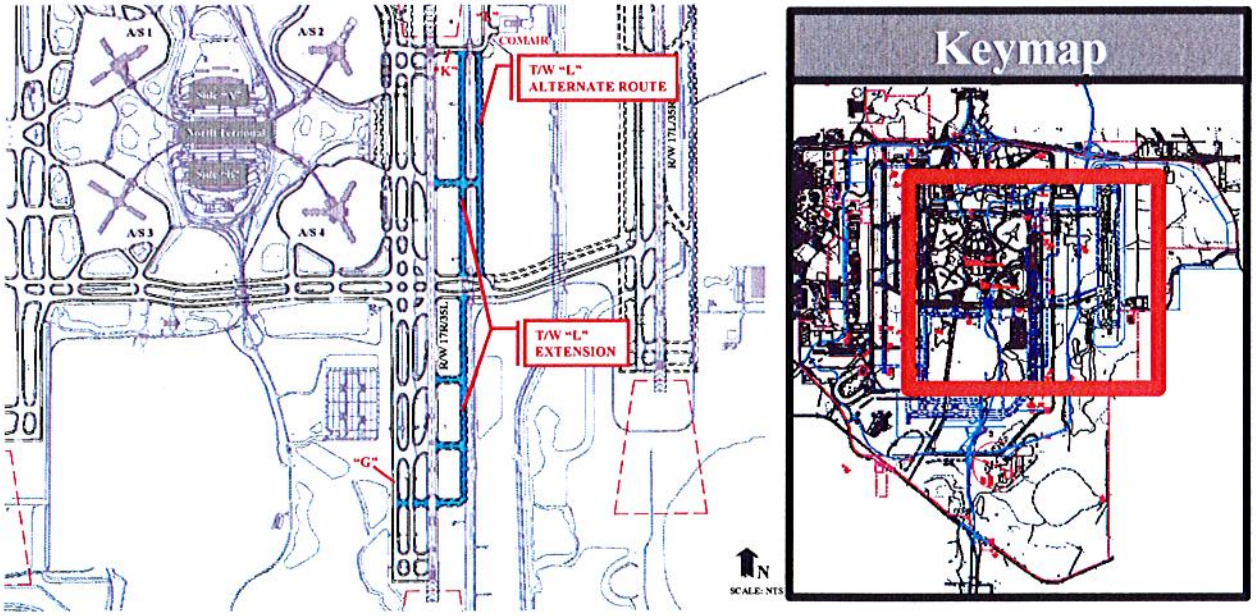
This taxiway extension is demand driven and will support new aviation-related development in the Midfield/Heintzelman Blvd. area that requires direct access to the airfield. This taxiway improvement will accommodate FAA Airplane Design Group VI commercial aircraft. The availability of a partial parallel taxiway on the east side of Runway 17R/35L enhances airfield capacity.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 50,197,000	43,922,000	6,275,000	-	-	-	-

Schedule:

Start: 2007
Finish: 2010



AIRFIELD PROJECTS

A) Taxiways/Runways

8) Taxiway Y Extension (West Ramp)..... $2,185,000

Description:

Taxiway Y is to be extended to the west from Runway 18R/36L to the West Ramp to enhance aircraft taxi operations on the west airfield.

Demand and Benefits:

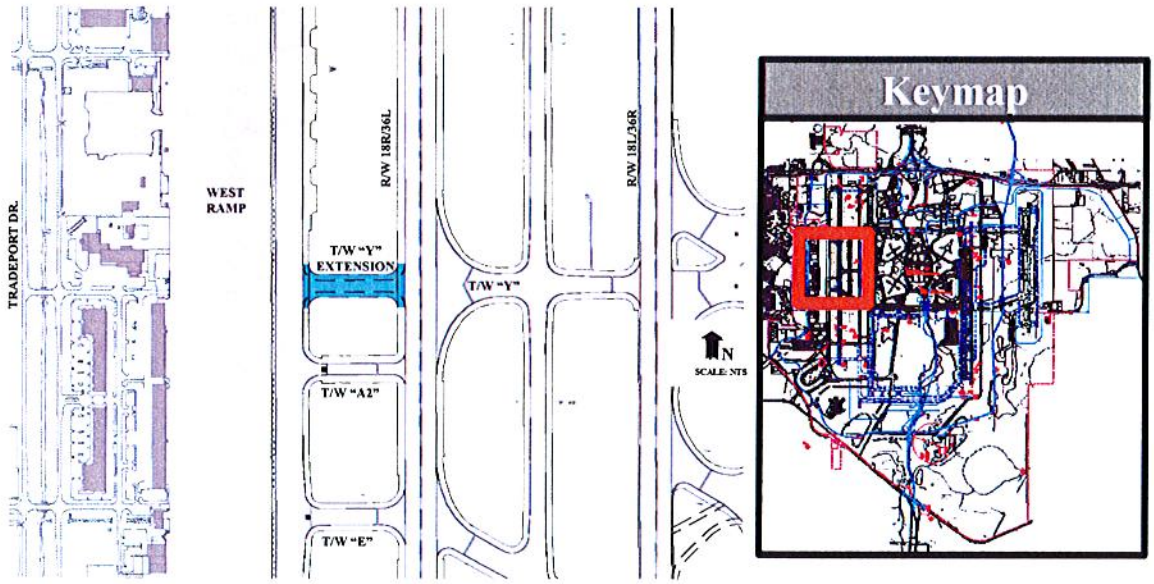
In support of continued aviation-related development in the Tradeport area, this taxiway extension will improve access between the west airfield and aviation support facilities located along the West Ramp. Runway occupancy time on Runway 18R/36L will be minimized.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 2,185,000	1,912,000	273,000	-	-	-	-

Schedule:

Start: 2007
Finish: 2007



AIRFIELD PROJECTS

A) Taxiways/Runways

9) Airside 2 & 4 Connector Taxiway (Relocate service road between airsides) $8,006,000

Description:

This project recommends the construction of a Taxiway I taxiway connector linking the Airside 2 and 4 aprons. A service road and airline ground support equipment (GSE) facilities adjacent to Airsides 2 and 4 will require removal and relocation.

Demand and Benefits:

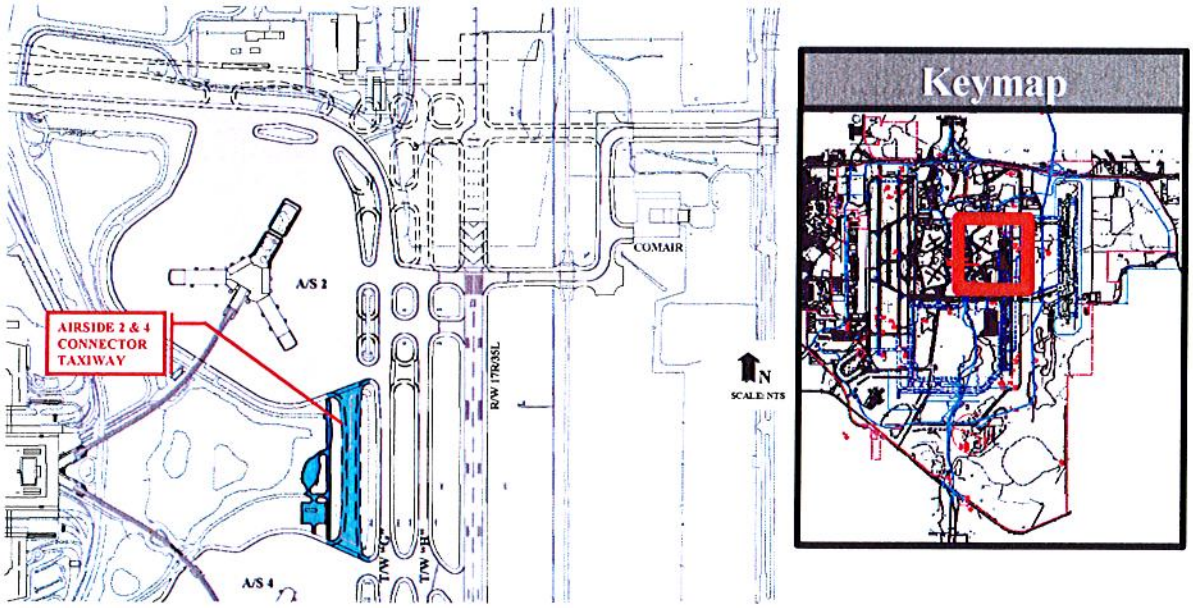
The construction of this connector taxiway between the two airline aircraft movement areas will enhance airline taxiing operations, promote more efficient utilization of aircraft gates, and increase airfield capacity.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 8,006,000	7,005,000	1,001,000	-	-	-	-

Schedule:

Start: 2010
Finish: 2010



AIRFIELD PROJECTS

A) Taxiways/Runways

10) Taxiway C Extension $13,482,000

Description:

The extension to Taxiway C will be completed in conjunction with the future Runway 36R extension project. From Taxiway C10, Taxiway C will be extended approximately 2,780 feet to the south.

Demand and Benefits:

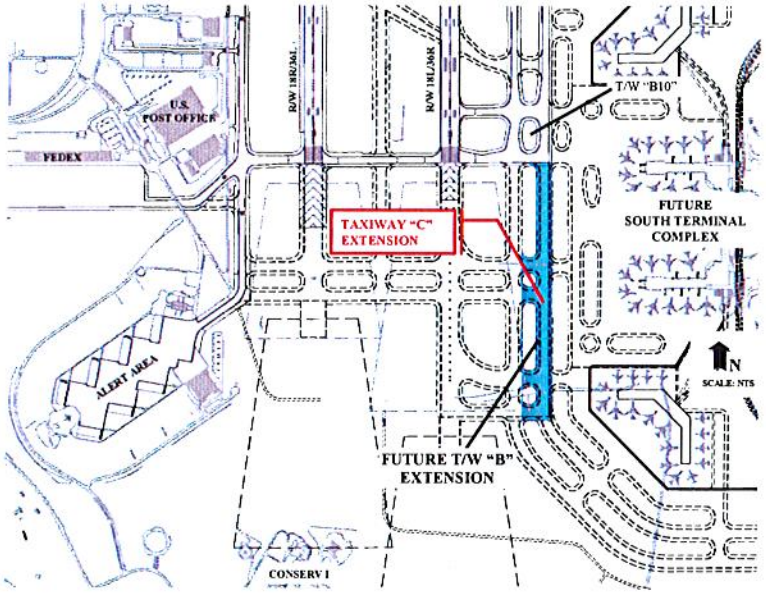
This taxiway improvement will increase airfield capacity by providing direct access between the west airfield and the future South Terminal Complex. Along with full length parallel Taxiway B, Taxiway C will support two-way aircraft taxiing operations and will reduce aircraft delay.

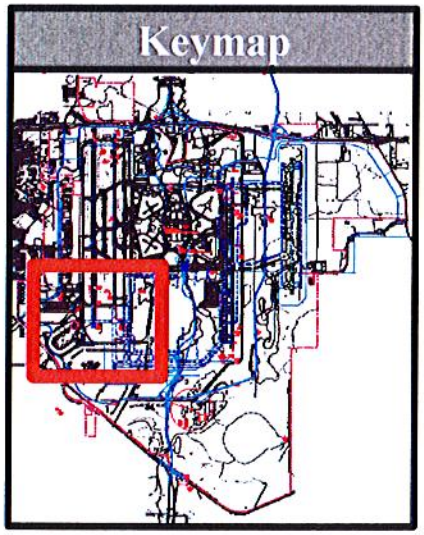
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 13,482,000	11,797,000	1,685,000	-	-	-	-

Schedule:

Start: 2014
Finish: 2015





AIRFIELD PROJECTS

A) Taxiways/Runways

11) Dual North Crossfield Taxiway

Demolish and/or Relocate West Cargo Buildings and Delta Ground Support Equipment/Cargo Facilities ..... $ 32,823,000

Description:

This project encompasses aviation-related building removal and relocation activity. Several airline support and air cargo buildings located north of this new taxiway will need to be removed or relocated.

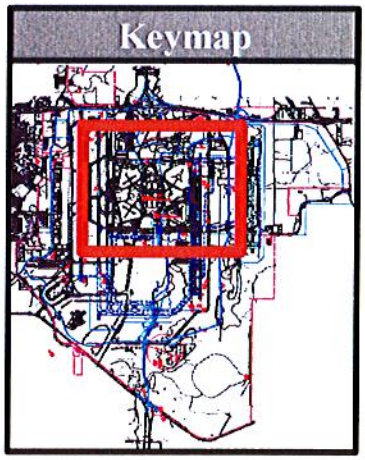
Demand and Benefits:

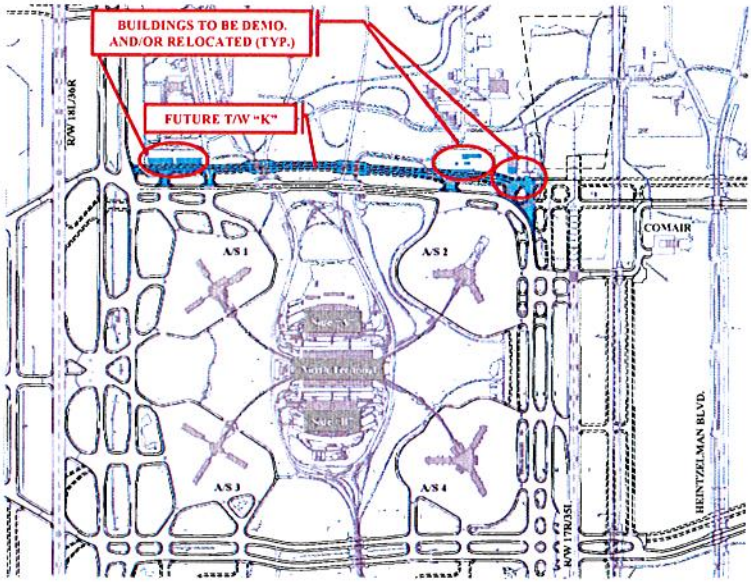
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 32,823,000	28,720,000	4,103,000	-	-	-	-

Schedule:

Start: 2016
Finish: 2019





AIRFIELD PROJECTS

A) Taxiways/Runways

12) Extend Runway 36R 2,780' (south)..... $49,232,000

Description:

The 2,780-foot extension of Runway 36R to the south is programmed as a long-term airfield improvement project. The total runway length increases from 12,005 feet to 14,785 feet to support long haul aircraft operations. This project includes runway pavement, lighting and marking improvements. FAA NAVAIDS and visual equipment approach and a portion of the secure service road will require relocation.

Demand and Benefits:

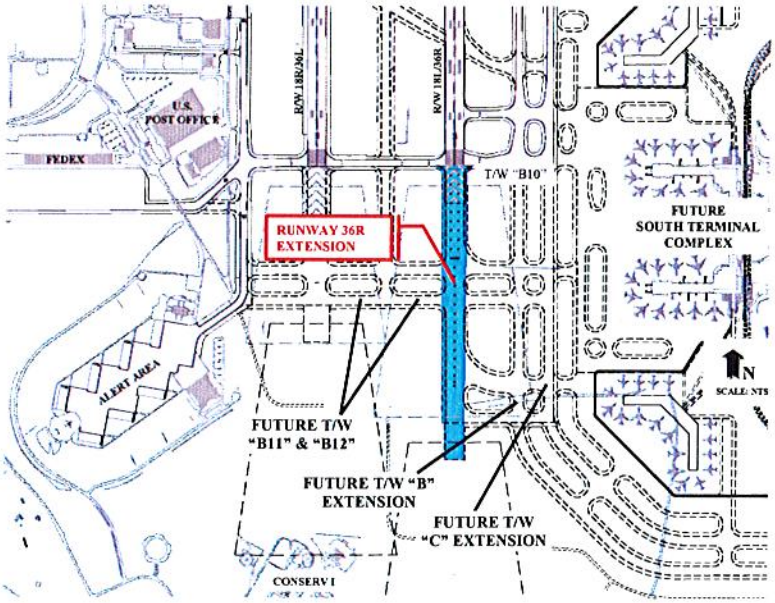
This runway extension relocates the Runway 36R threshold south of the future South Terminal Complex. This airfield project is necessary to avoid potential TERPS conflicts associated with the construction of parallel Taxiways B and C near the South Terminal Complex. This runway extension project will increase airfield capacity and enhance safety.

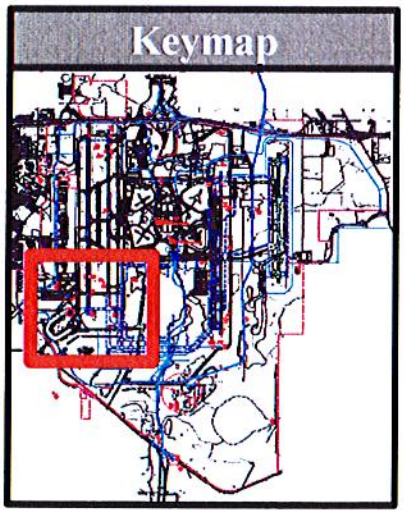
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 49,232,000	43,078,000	6,154,000	-	-	-	-

Schedule:

Start: 2017
Finish: 2020





AIRFIELD PROJECTS

A) Taxiways/Runways

13) Taxiway B Extension $15,175,000

Description:

The extension to Taxiway B will be completed in conjunction with the future Runway 36R extension project. From Taxiway B10, Taxiway B will be extended approximately 2,780 feet to the south. Several taxiway connectors between runway 36R and Taxiway B will also be constructed.

Demand and Benefits:

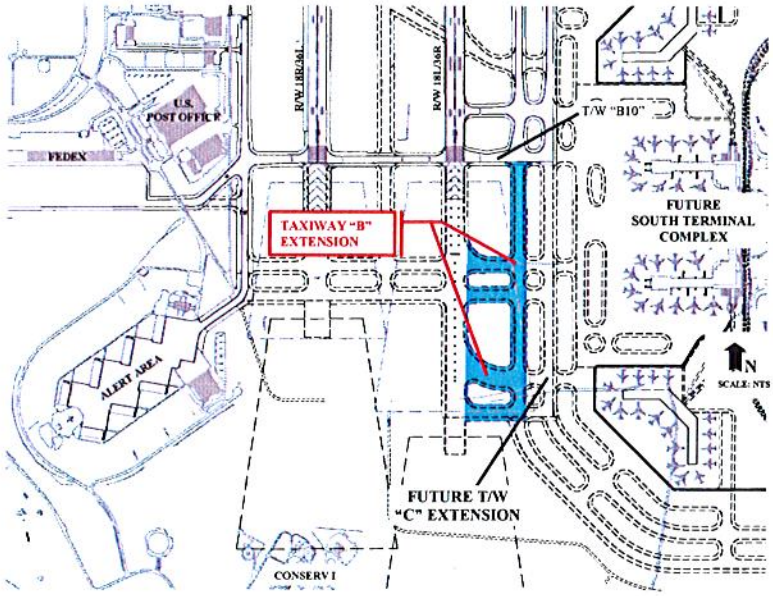
This taxiway improvement will increase airfield capacity by providing direct access between the west airfield and the future South Terminal Complex. Along with full length parallel Taxiway C, Taxiway B will support two-way aircraft taxiing operations and will reduce aircraft delay.

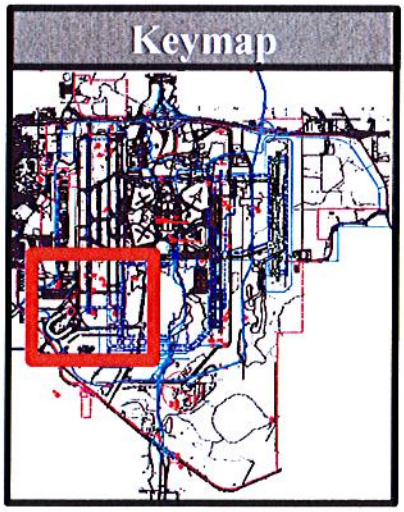
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$15,175,000	13,278,000	1,897,000	-	-	-	-

Schedule:

Start: 2017
Finish: 2020





AIRFIELD PROJECTS

A) Taxiways/Runways

14) Extend Runway 36L 1,500' (south) $19,475,000

Description:

The 1,500 foot extension of Runway 36L to the south is programmed as a long-term airfield improvement project. This runway would support long haul aircraft operations. The total runway length increases from 12,004 feet to 13,504 feet. This project includes runway pavement, lighting, and marking improvements. FAA NAVIDS equipment, including the ILS localizer antenna, near Runway 36L will require relocation.

Demand and Benefits:

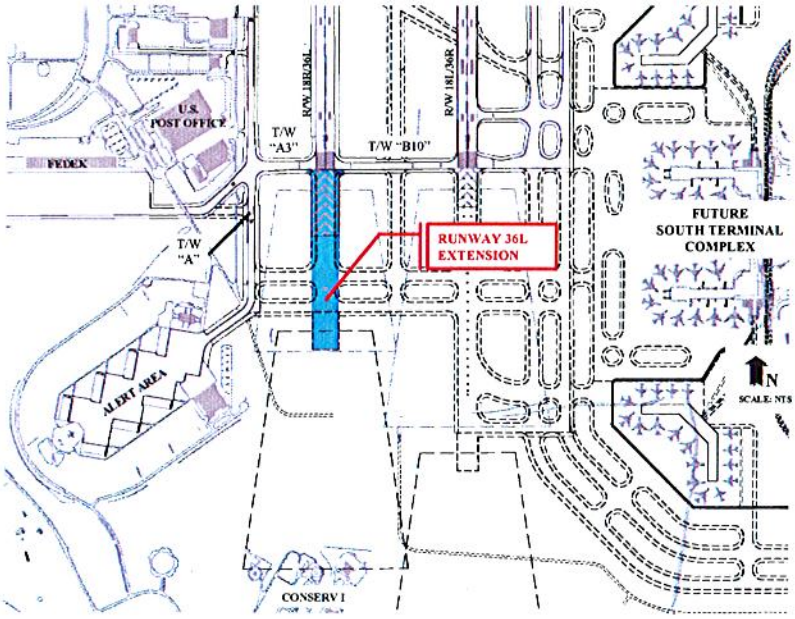
This runway extension to the south and is necessary to avoid potential TERPS conflicts associated with the portion of Taxiway A south of Taxiway A3.

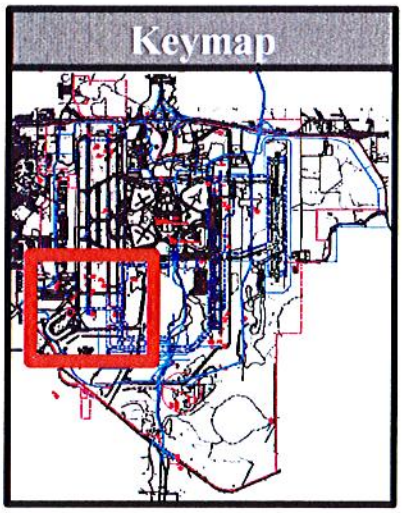
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 19,475,000	17,041,000	2,434,000	-	-	-	-

Schedule:

Start: 2017
Finish: 2020





AIRFIELD PROJECTS

A) Taxiways/Runways

15) Taxiway Connectors B11 and B12..... $24,304,000

Description:

New Taxiway Connectors B11 and B12 will be constructed in conjunction with the Runway 36RLextension project. This taxiway improvement will improve airfield access between the West Ramp, Alert Area ramp, FedEx ramp, and the future South Terminal Complex.

Demand and Benefits:

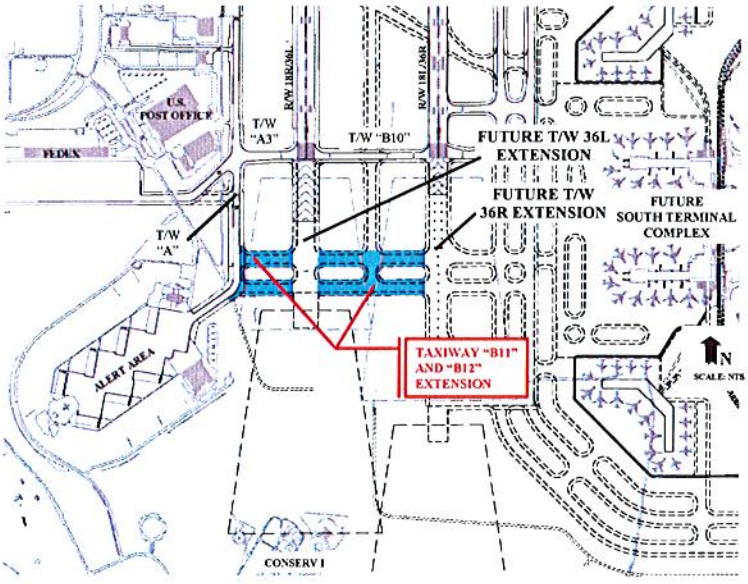
This airfield capacity-related improvement project enhances access between west airfield and existing aviation-related development areas. Airfield safety is also enhanced with the availability of additional runway exit taxiways and aircraft departure queues at or near the Runway 36L and 36R thresholds.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 24,304,000	21,266,000	3,038,000	-	-	-	-

Schedule:

Start: 2017
Finish: 2020



AIRFIELD PROJECTS

A) Taxiways/Runways

16) Taxiway A3 Realignment..... $4,207,000

Description:

A portion of Taxiway A3 will be realigned and constructed in conjunction with the Runway 36L extension project. This project includes airfield pavement construction and removal, and drainage facility related improvements. The portion of Taxiway A3 and adjacent land area located between Taxilane A and the FedEx apron will be reserved for aviation-related development.

Demand and Benefits:

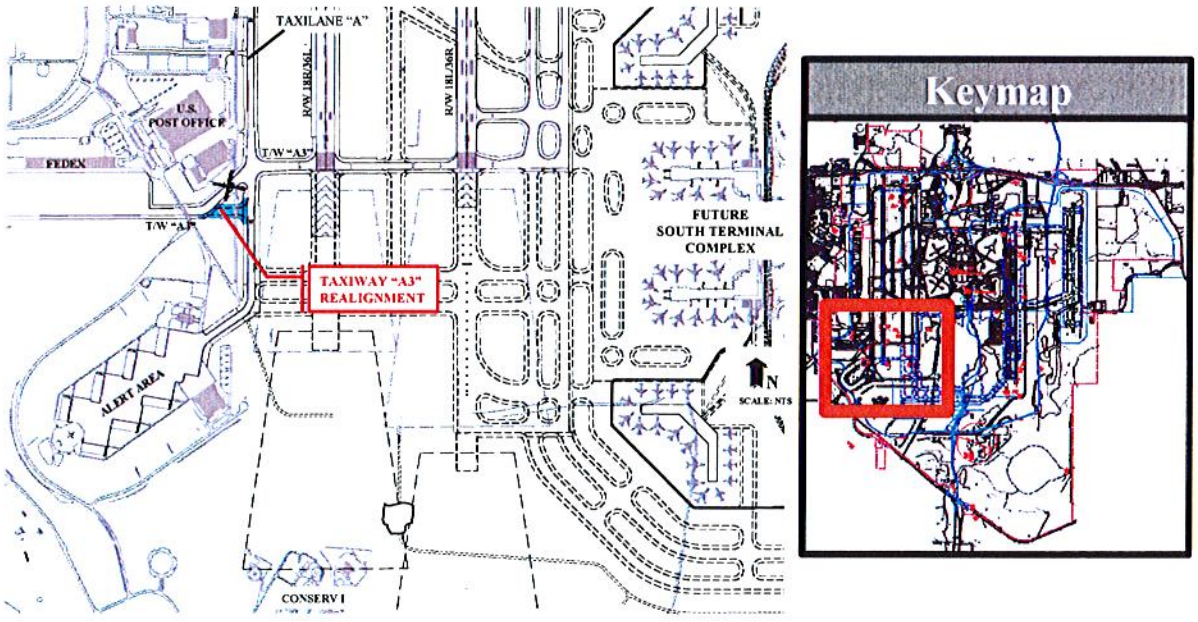
This taxiway improvement project will improve airfield access between the FedEx ramp and the west airfield.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 4,207,000	3,681,000	526,000	-	-	-	-

Schedule:

Start: 2017
Finish: 2020



AIRFIELD PROJECTS

A) Taxiways/Runways

17) Taxiway E Extension (to Taxiway N) $57,023,000

Description:

The extension of Taxiway E to the east will be demand driven. A new taxiway bridge will be needed to cross over both Heintzelman Boulevard and a drainage canal. This taxiway extension will be constructed from the portion of Taxiway E located east of the bypass canal to Taxiway N.

Demand and Benefits:

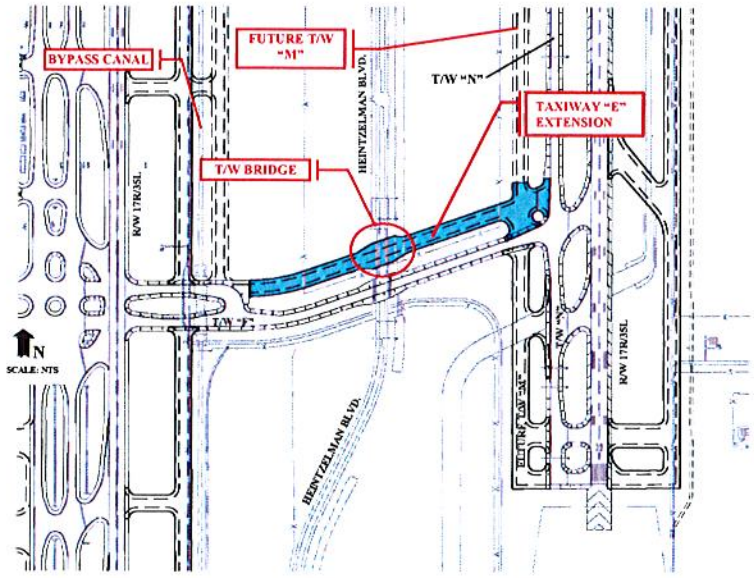
This taxiway extension will improve aircraft operations on the east airfield and will increase airfield capacity and reduce delay. In addition, improved taxiway E along with Taxiway F, will support two-way aircraft taxiing operations on the Mid-Crossfield taxiway system.

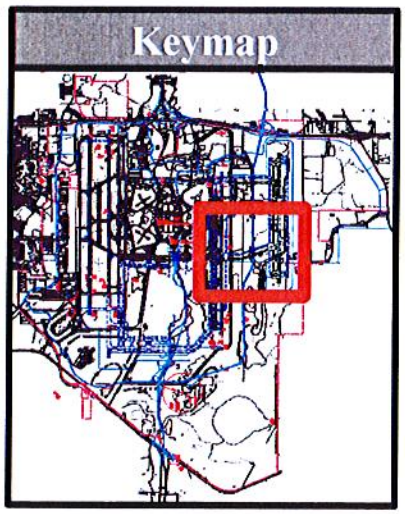
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$57,023,000	49,895,000	7,128,000	-	-	-	-

Schedule:

Start: 2019
Finish: 2022





AIRFIELD PROJECTS

A) Taxiways/Runways

18) Parallel Taxiway M - West Side of Fourth Runway..... $58,015,000

Description:

Taxiway M is to be extended approximately 8,600 feet to the south to Taxiway N6. This taxiway along with Taxiway N, will provide a dual parallel taxiway system on the west side of Runway 17L/35R.

Demand and Benefits:

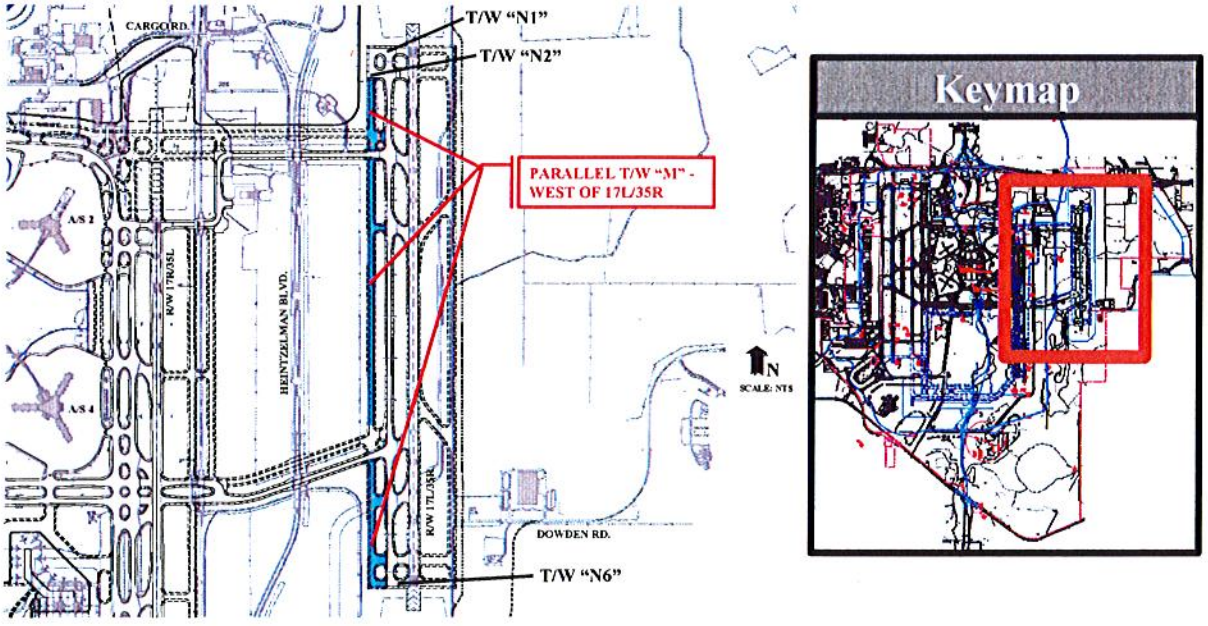
As utilization of Runway 17L/35R increases, the demand for efficient aircraft taxi operations on the East Airfield will require airfield capacity related improvements. This new parallel taxiway will provide a more efficient and flexible taxiway ground movement for aircraft landing and taking off on Runway 17L/35R. This taxiway along with Taxiway N will support two-way aircraft taxi routes.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 58,015,000	50,763,000	7,252,000	-	-	-	-

Schedule:

Start: 2019
Finish: 2022



AIRFIELD PROJECTS

B) Miscellaneous

1) Wildlife Attractants/Mitigation

a) South End Runway 35L Runway Protection Zone (RPZ) Site Improvements	**$ 4,049,000**
b) Remove Remnant Wetlands	**$ 7,793,000**
c) Fill Comair Pond	**$ 4,454,000**
d) Fill Old Stilling Basin	**$ 3,628,000**
e) Fill Third Runway Borrow Pit	**$ 4,325,000**
f) Fill in Wetland North of Mid-Crossfield Taxiway E	**$ 5,874,000**
Total - Wildlife Attractants/Mitigation	**$30,123,000**

Description:

This is a safety-related project consisting of modifications/improvements to lands adjacent to the airfield. The Elimination of Wildlife Attractants Mitigation Program developed in 2001 between the FAA and the Authority, provides for the filling in of drainage ponds and the removal of wetlands to deter wildlife activity. These projects, in combination with continuing wildlife control procedures, have been carefully structured, located and integrated into the overall airport development and operations.

a) Remove pond area in the South end of Runway 35L RPZ site improvements located on the southern end of Runway 17R/35L, north of Heintzelman Boulevard. This project includes design, clearing, filling, grading, drainage and mitigation for approximately 30 acres;
b) Remove remnant wetlands located on the east and west sides of Heintzelman Boulevard, near the southern end of Runways 17L/35R and 17R/35L. This project includes dewatering, clearing, degrubbing, demucking, backfilling with on-site material, grading, drainage and sodding of approximately 51 acres;
c) Fill Comair Pond, located between Runways 17L/35R and 17R/35L, at the northern end of Heintzelman Boulevard;
d) Fill Old Stilling Basin, located on the east side of Heintzelman Boulevard, southwest of Runway 17L/35R;
e) Fill Runway 17R/35L Borrow Pit, located on the west side of Heintzelman Boulevard, east of Runway 17R/35L;
f) Fill in wetland north of Mid-Crossfield Taxiway E, centrally located north of the Mid-Crossfield Taxiway. This project includes dewatering, clearing, grubbing, demucking, geotextile, backfill, compacting and sodding of approximately 16.6 acres.

Demand and Benefits:

The program for reduction of wildlife habitat at MCO was formulated to meet the requirements set forth in the FAA's Advisory Circular 150/5200-33 (Hazardous Wildlife Attractants On or Near Airports). With approximately 13,300 acres of developed and undeveloped property and four (4) active runways, this program supports the airport's highest priority to provide maximum safety for aircraft and passengers through management of wildlife and wildlife habitat.

Funding:

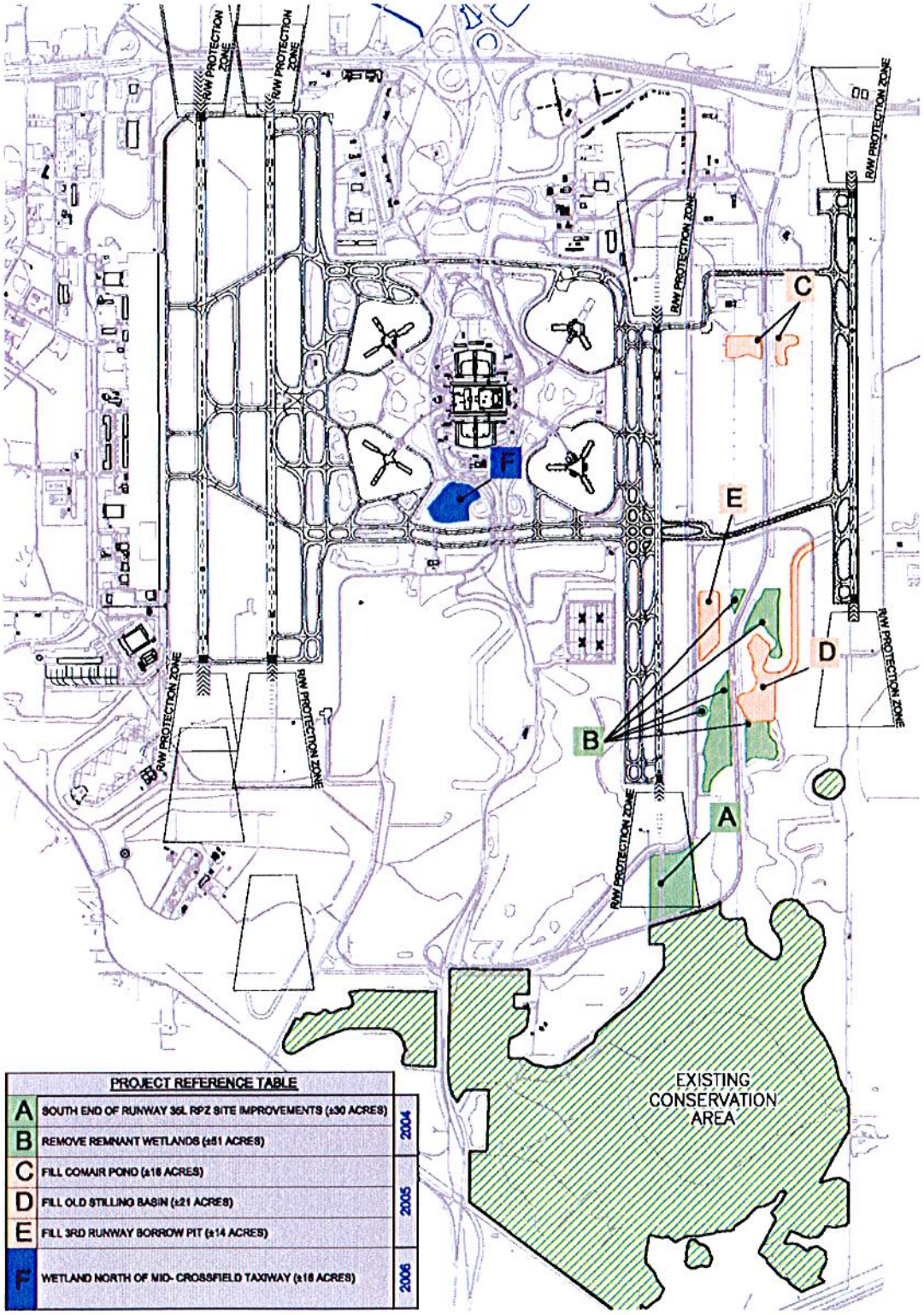
Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 4,049,000	3,543,000	506,000	-	-	-	-
$ 7,793,000	6,819,000	974,000	-	-	-	-
$ 4,454,000	3,897,000	557,000	-	-	-	-
$ 3,628,000	3,175,000	453,000	-	-	-	-
$ 4,325,000	3,784,000	541,000	-	-	-	-
$ 5,874,000	5,140,000	734,000	-	-	-	-

Schedule:

Start: 2004
Finish: 2006

Photograph of R/W 35L Runway Protection Zone

Elimination of Wildlife Attraction Program-FY 2004-2006 Project Location Map



AIRFIELD PROJECTS

C) Asset Preservation/R&R Projects $35,688,000

Description:

In October 2002, the Greater Orlando Aviation Authority embarked upon a goal to produce and maintain an Asset Preservation Renewal & Replacement Plan for MCO. A breakdown of these projects is available in a separate document.

Airfield pavement facilities (runways, taxiways, and ramp apron) require regular and/or periodic preventative maintenance, rehabilitation, or construction to provide a satisfactory service life.

Demand and Benefits:

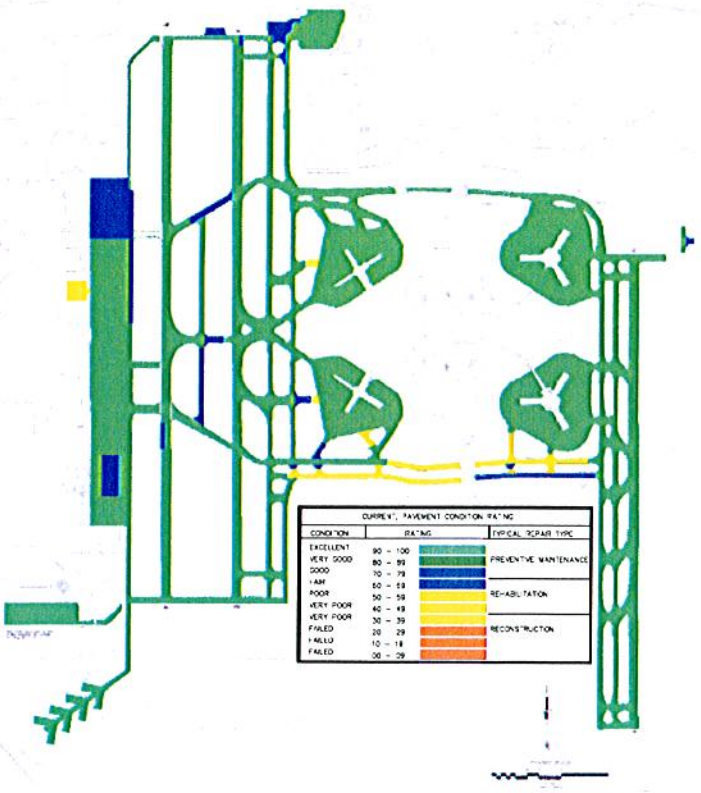
This program will identify the asset, quantify the prevention effort, and schedule the proposed capital outlays within the respective area by fiscal year.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 35,688,000	-	-	-	-	-	35,688,000

Schedule:

Start: 2004
Finish: 2014



ROADWAY & PARKING PROJECTS

A) Roadways

1) Interim Widening of South Access Road $10,403,000

Description:

This project will widen the existing two-lane undivided roadway to a four-lane divided roadway from Heintzelman Boulevard to Airport Boulevard north of the mid-crossfield taxiways (E and F), a distance of approximately 1.8 miles. The widening is anticipated to occur along the existing alignment. Considerations for the South Terminal Complex will be made to ensure compatibility between South Access Road and the South Terminal Complex.

Demand and Benefits:

Analysis completed for the 2003 North Terminal Capacity Study, the 2004 MCO Master Plan Update and year 2003 traffic counts indicate this roadway is beginning to experience unsatisfactory operating conditions during peak periods. These unsatisfactory conditions will continue to worsen as activity at the airport increases.

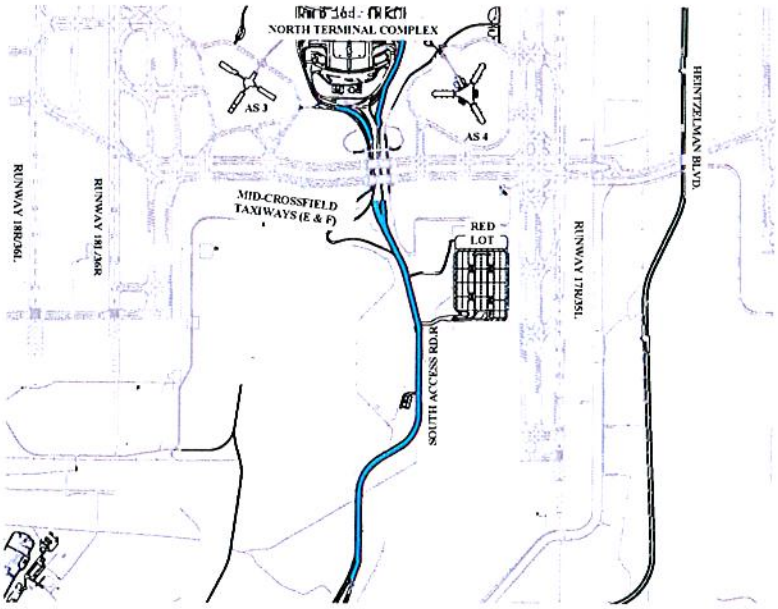
This project will improve operating conditions during peak demand periods. The improved roadway is designed to support projected traffic volumes through a passenger demand level of 45 million annual passengers at the North Terminal. This project will support access to MCO from the south until the construction of the South Terminal loop roadway system.

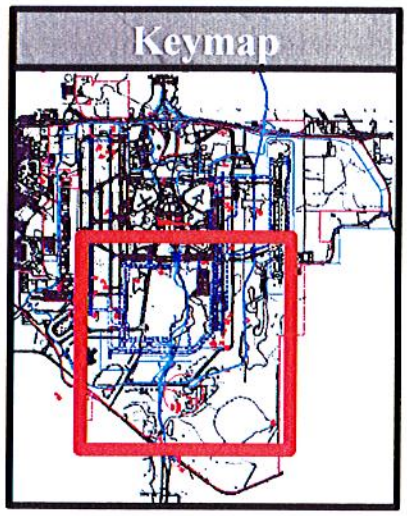
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 10,403,000	-	10,403,000	-	-	-	-

Schedule:

Start: 2005
Finish: 2007





ROADWAY & PARKING PROJECTS

A) Roadways

2) Cargo Road Extension
(Airport Boulevard to Old Terminal, 2 lanes) $6,592,000

Description:

Cargo Road will be extended from its current terminus west of Airport Boulevard to just east of the Old Terminal building at Bear Road. Construction will include a two-lane roadway with sufficient room to expand the road to a four-lane divided roadway as traffic demand warrants. The alignment has been designed to allow maximum development of the land between the existing Blue Lot and Airport Boulevard.

Demand and Benefits:

The demand for this project is driven by two issues: 1) The Northwest Terminal Support Area (NWTSA) is targeted for redevelopment as outlined in the Land Use section of the 2004 MCO Master Plan, and, 2) The MCO Master Plan indicates that the current configuration of Cargo Road will reach its operational capacity by the year 2015.

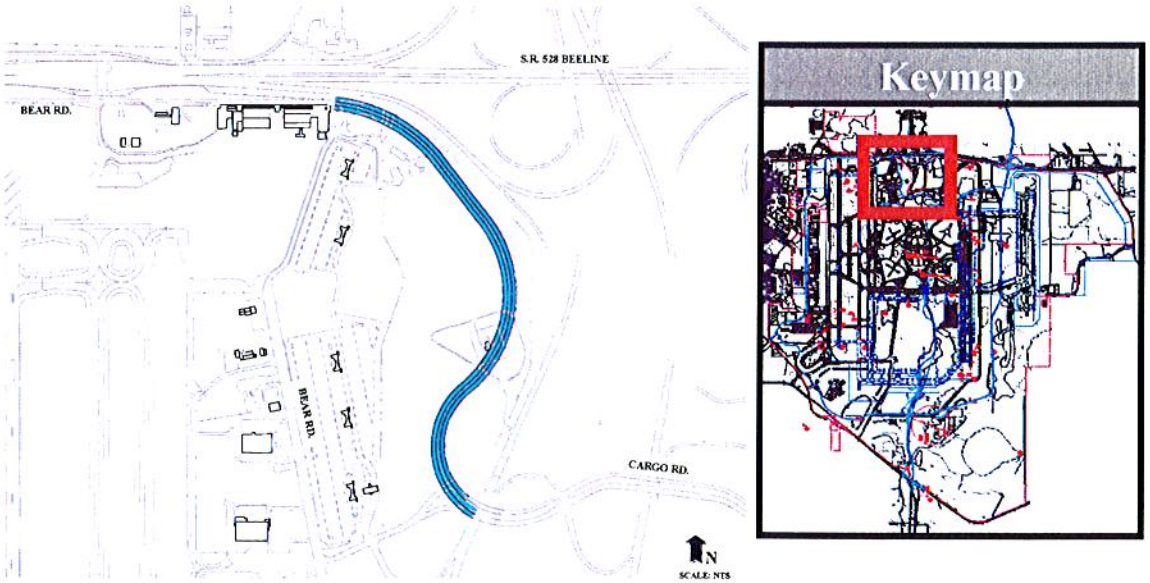
The extension of Cargo Road will support future land use and development in the NWTSA. The extension can be expanded to four (4) lanes to support access to MCO from the northwest. Additional consideration should be given to the ultimate configuration of the proposed Blue Lot expansion as well as the bypass canal which flows through the Cargo Road extension area.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 6,592,000	-	6,592,000	-	-	-	-

Schedule:

Start: 2005
Finish: 2008



ROADWAY & PARKING PROJECTS

A) Roadways

3) Widen Exit Road (from Cargo Road to State Road [SR] 528) $1,154,000

Description:

This project will widen the existing roadway from Cargo Road to SR 528. Specifically, one lane will be added to the west side of the existing lanes from the on-ramp at Cargo Road north across SR 528 to SR 436, an estimated distance of 4,200 feet of which approximately 600 feet is located on airport property. The project includes new overhead signing and widening of the existing bridge over the canal, as well as modifications to the bridge over SR 528. Specific attention must be given to the weave movement from Cargo Road to eastbound SR 528.

NOTE: Additional (escalated) cost to complete this project in the amount of $1,808,000 to be funded by others.

Demand and Benefits:

The existing roadway is projected to reach capacity by 2006 based on an analysis of weaving operations as detailed in the MCO Master Plan. This project will improve traffic operations during peak periods and support projected traffic volumes through the year 2020.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 1,154,000	577,000	577,000	-	-	-	-

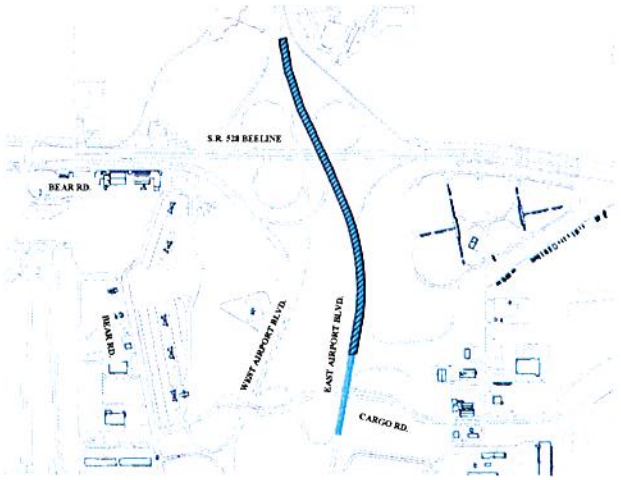
Schedule:

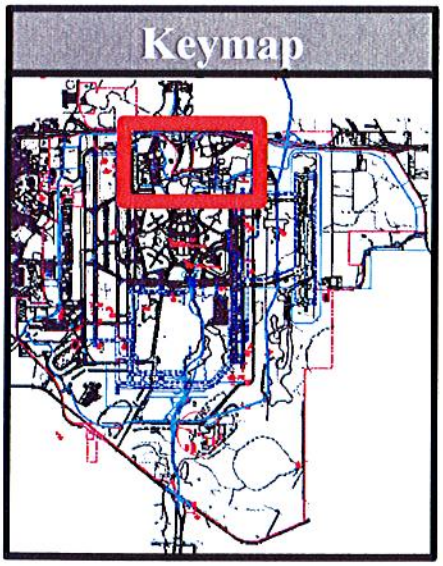
Start: 2005
Finish: 2007

LEGEND

Portion of project to be completed by others

Portion of project located on GOAA property





ROADWAY & PARKING PROJECTS

A) Roadways

4) Terminal "A" Exit Weave $2,311,000

Description:

Currently, one lane each from the departures exit, the arrivals exit, the Rental Car (RAC) exit and the "A" side parking garage exit, all merge to form a four-lane weaving section between the terminal exit and the return ramp to Terminal "A" and southbound Airport Boulevard. The left hand lane, which originates at the parking garage entrance, ends at the return ramp and three (3) lanes continue north to Airport Boulevard. This project will modify the RAC exit to connect with the merge area downstream of the parking exit plaza and provide two (2) lanes for the parking garage exit downstream of the exit plaza. The existing return ramp at the north end of the weaving section will be widened to two (2) lanes from the exit gore to the ramp split to Terminal "A" and southbound Airport Boulevard. The project includes new overhead signing along the Terminal "A" Exit Weave.

Demand and Benefits:

Operational deficiencies have been observed during peak arrival periods following flight delays caused by inclement weather. These deficiencies result in significant queues at the parking plaza that extend back into the garage.

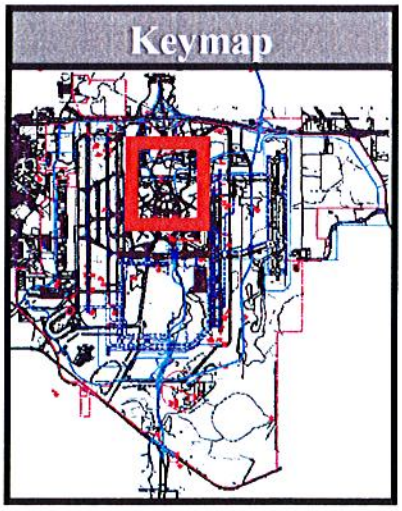
This improvement will provide an additional lane for traffic exiting the parking garage and modify the exit weave to create a more balanced operation. The resulting increase in exiting capacity for the garage will reduce the delays for vehicles exiting the parking garage during these peak periods.

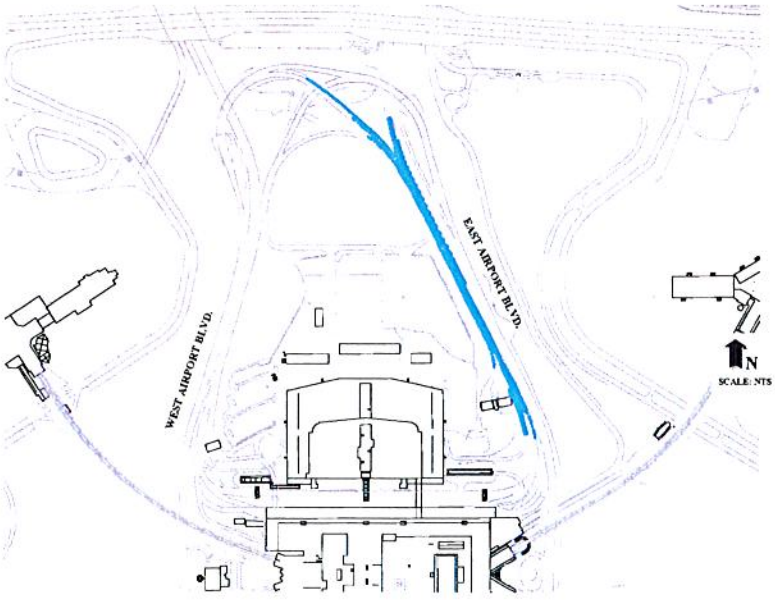
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 2,311,000	-	2,311,000	-	-	-	-

Schedule:

Start: 2005
Finish: 2005





ROADWAY & PARKING PROJECTS

A) Roadways

5) Heintzelman Boulevard Extension to Wetherbee/Boggy Creek $10,240,000

Description:

This project consists of extending the existing four-lane divided roadway from its current terminus, at South Access Road, west to intersect with Boggy Creek Road at Wetherbee Road. Construction includes a four-lane divided urban roadway with a length of approximately 1.2 miles.

Demand and Benefits:

This project will support the development of the South Terminal Complex and will provide improved east/west access for aviation-related development. This roadway improvement will provide direct access from the west to the south side of the airport. It will support projected traffic through the year 2025.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 10,240,000	8,960,000	1,280,000	-	-	-	-

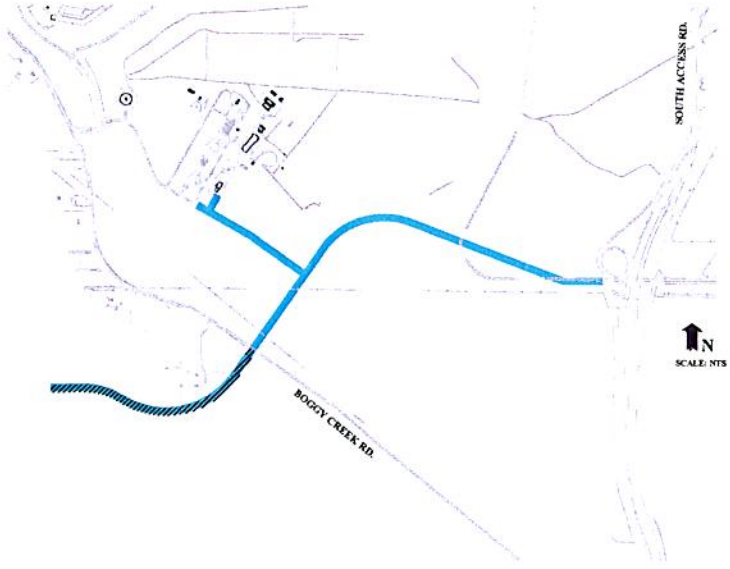
Schedule:

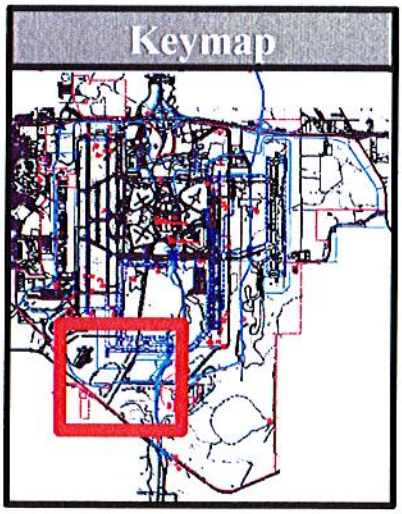
Start: 2010
Finish: 2011

LEGEND

Portion of project to be completed by others

Portion of project located on GOAA property





ROADWAY & PARKING PROJECTS

A) Roadways

7) Dowden Road Extension (4 lanes) $25,747,000

Description:

The project consists of extending the existing roadway from its current terminus at the former Harcourt Brace Jovanovich (HBJ) building #1400 to intersect with Heintzelman Boulevard south of Runway 17L/35R. Construction includes a four-lane divided urban roadway with a length of approximately 1.9 miles.

Demand and Benefits:

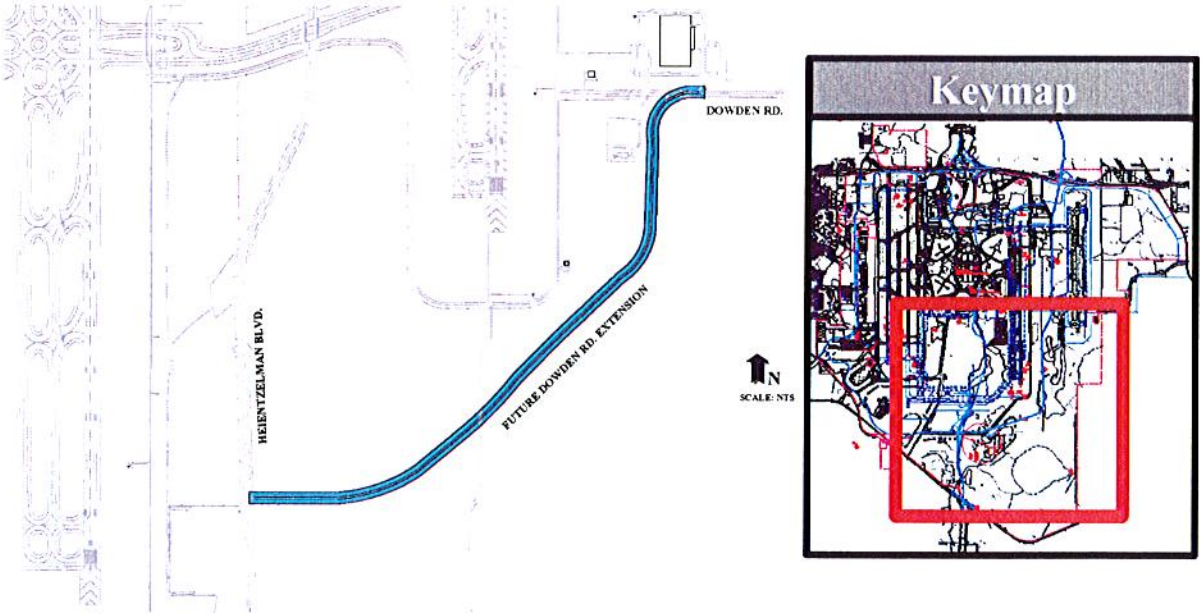
Demand for this project is driven by the development of the South Terminal Complex and Heintzelman Boulevard corridor. It will support projected traffic through the year 2025. This roadway improvement will provide additional east-west access from Narcoossee Road (State Road 15) to Heintzelman Boulevard. It should be noted that the existing Dowden Road will connect with the planned Alafaya Trail extension of Narcoossee Road. The Alafaya Trail extension will provide additional airport access to the eastern Orlando market.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$25,747,000	12,873,500	12,873,500	-	-	-	-

Schedule:

Start: 2010
Finish: 2011



ROADWAY & PARKING PROJECTS

A) Roadways

8) Cut-Through Traffic

a) North Terminal Braided Roadway ..... $ 36,610,000

b) South Terminal Braided Roadway ..... $ 43,830,000

Total Cut-Through Traffic ..... $ 80,440,000

Demand and Benefits:

Cut-through traffic is projected to comprise 34,000 daily trips on airport roadways by 2025. The braided roadway concept will allow the North and South Terminal Complex Loop Roadway system to operate at an acceptable level of service through the year 2025. The analysis, completed as part of the MCO Master Plan, indicates that by the year 2025 approximately 34,000 daily trips will be eliminated from MCO roadways as a result of the braided roadway concept. Without this improvement, the Authority would need to add four (4) additional lanes to the Loop Roadway system, which would require substantial modifications to the taxiway bridges, Cargo Road bridge and Automated Guideway Transit structures.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 36,610,000	32,034,000	4,576,000	-	-	-	-
$ 43,830,000	38,351,000	5,479,000	-	-	-	-

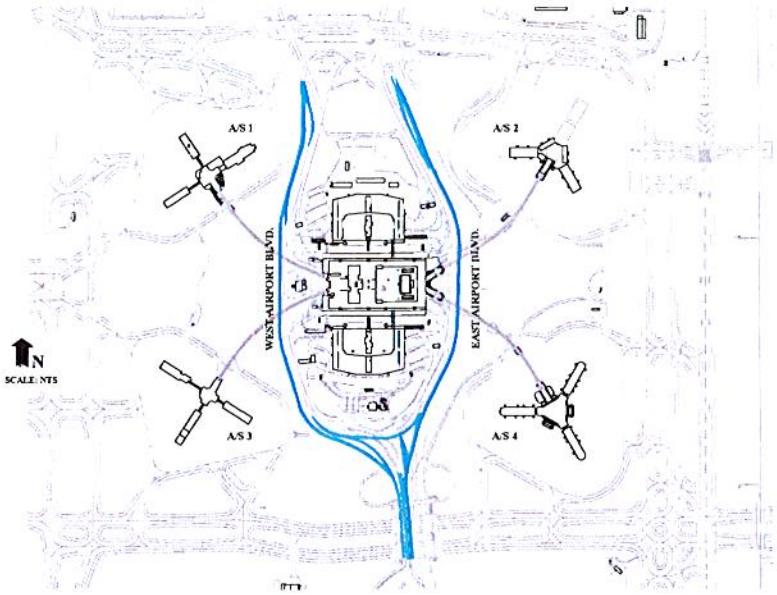
Schedule:

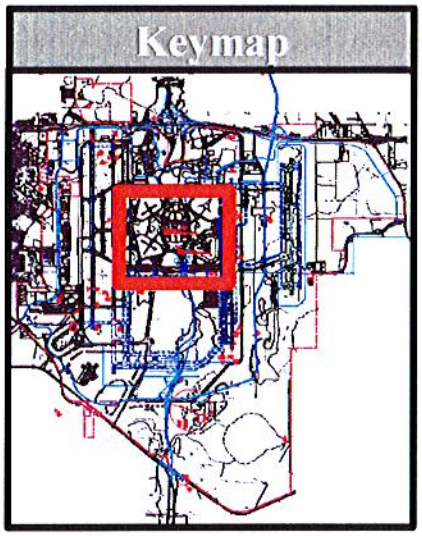
Start: 2011
Finish: 2013

A) Roadways

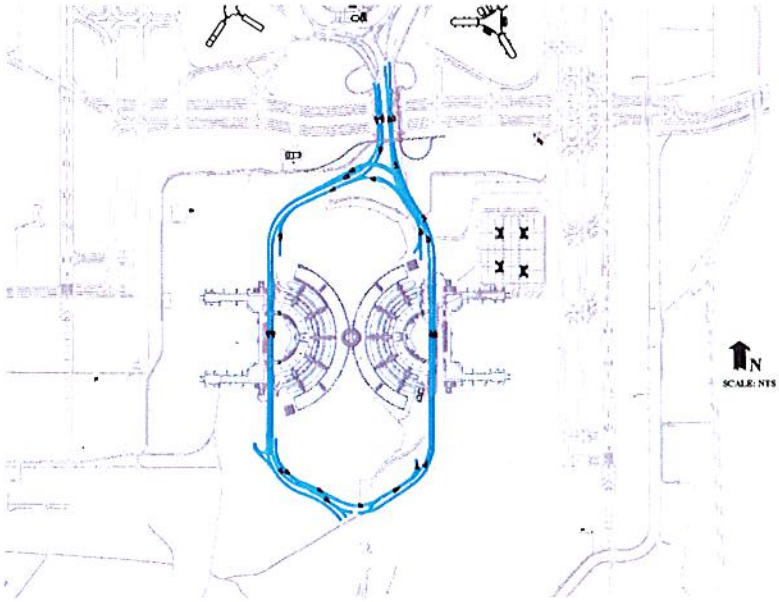
8) Cut-Through Traffic

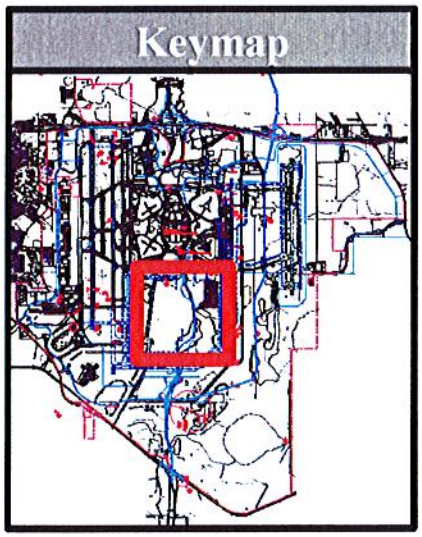
a) North Terminal Braided Roadway





b) South Terminal Braided Roadway





ROADWAY & PARKING PROJECTS

A) Roadways

9) Widen Entrance Road (State Road [SR] 528 to Cargo Road) $3,313,000

Description:

This project will widen the existing entrance roadway from SR 528 to Cargo Road. Specifically, one lane will be added to the right side of the existing lanes from north of the on-ramp from eastbound SR 528 to the off-ramp to Cargo Road, an estimated distance of 3,200 feet of which approximately 600 feet is located on airport property. The project includes new overhead signing, widening of the existing bridge over the canal and reconstruction of approximately 2,100 feet of the existing on-ramp from eastbound SR 528.

NOTE: Additional (escalated) cost to complete this project in the amount of $1,604,000 to be funded by others.

Demand and Benefits:

The existing roadway is projected to reach capacity by 2014 based on an analysis of weaving operations as detailed in the MCO Master Plan. This project will improve traffic operations during peak periods and support projected traffic volumes through the year 2025.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 3,313,000	1,657,000	1,656,000	-	-	-	-

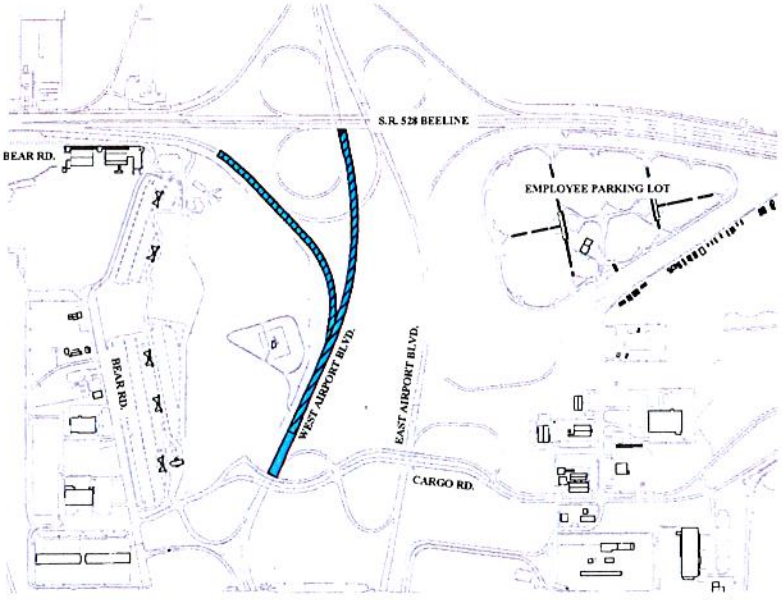
Schedule:

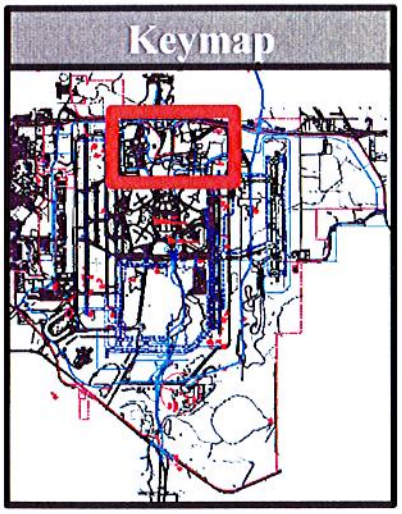
Start: 2012
Finish: 2012

LEGEND

Portion of project to be completed by others

Portion of project located on GOAA property





ROADWAY & PARKING PROJECTS

A) Roadways

10) Widen and Realign Tradeport Drive

a) Widen Tradeport from Bee Line to Bear Road (6 lanes) $1,985,000

Description:

This project will widen the existing four-lane divided roadway to six (6) lanes (three [3] lanes per direction) from Bear Road to State Road (SR) 528. Construction will include intersection and signalization improvements at Jetport Drive/Eastbound SR 528 On-Ramp and at Bear Road.

Demand and Benefits:

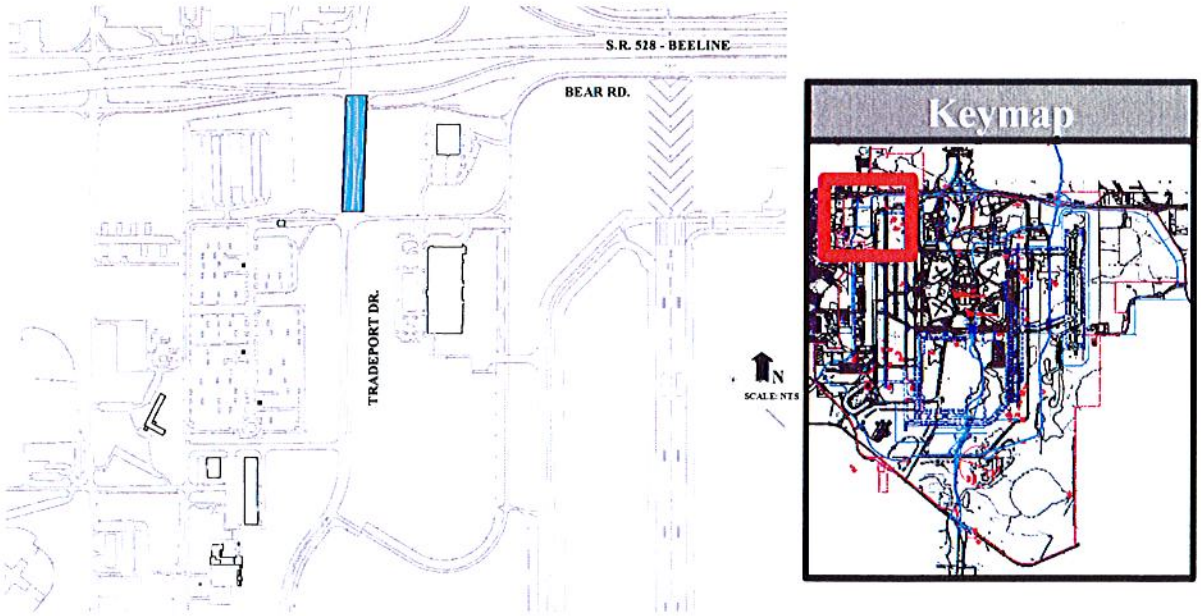
This improvement is necessary to meet the projected traffic demand in 2012, and will support projected traffic demand through the year 2025, while also meeting the criteria set forth in the Orlando International Airport Amended and Restated Development Order. This project has also been designated as a Strategic Intermodal System Connector by the State of Florida. Tradeport Drive serves as a primary access road for cargo and other aviation support functions on the west side of the airport.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 1,985,000	993,000	992,000	-	-	-	-

Schedule:

Start: 2012
Finish: 2012



ROADWAY & PARKING PROJECTS

A) Roadways

10) Widen and Realign Tradeport Drive

b) Widen Central Tradeport to Six (6) Lanes (Bear Road to Binnacle Way) $9,178,000

Description:

In conjunction with the Bee Line Expressway to Bear Road widening project, Tradeport Drive will be widened to six (6) lanes between Bear Road and Binnacle Way.

Demand and Benefits:

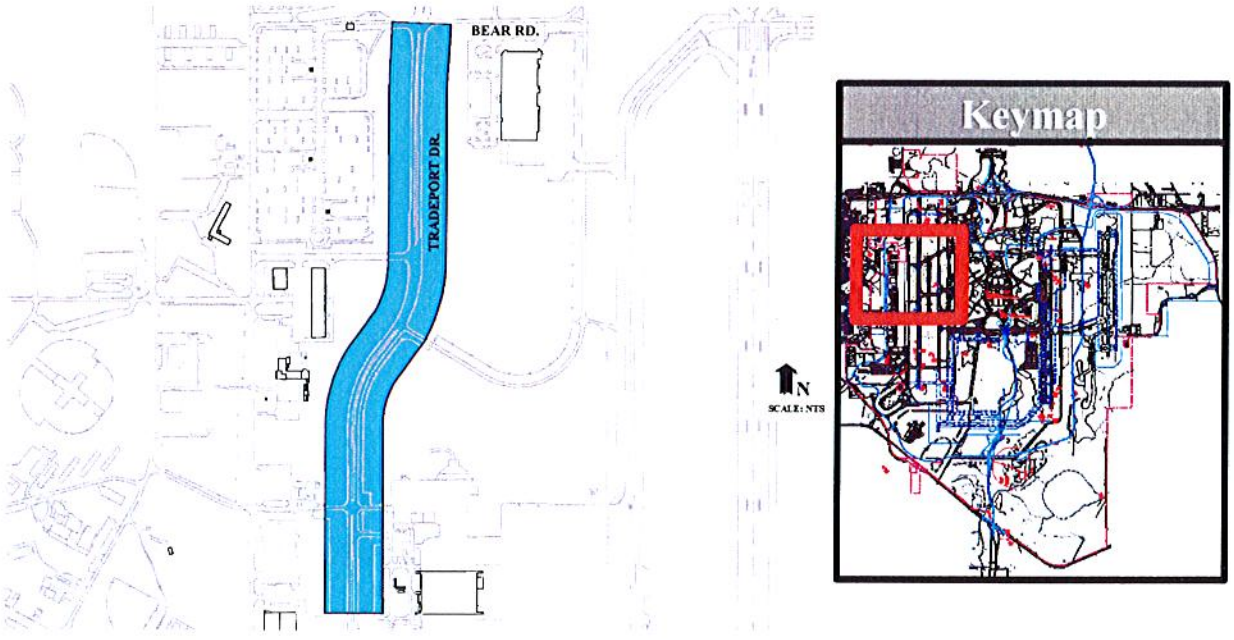
This project will support projected traffic demand through the year 2025 while also accommodating the movement of cargo and other aviation support functions. This facility has been designated as a Strategic Intermodal Connector and is also identified for future widening in the Orlando International Airport Amended and Restated Development Order.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 9,178,000	4,589,000	4,589,000	-	-	-	-

Schedule:

Start: 2012
Finish: 2012



ROADWAY & PARKING PROJECTS

A) Roadways

10) Widen and Realign Tradeport Drive

c) Realign and Widen to Six (6) Lanes Central Tradeport from Binnacle Way to Boggy Creek Road $52,060,000

Description:

In conjunction to the widening from State Road 528 to Binnacle Way, Tradeport Drive will be widened and realigned from Binnacle Way to Boggy Creek Road. The realignment will shift the existing Tradeport Drive approximately 1,000 feet west to the airport's property line. The canal which now flows down the middle of Tradeport Drive will be enclosed.

Demand and Benefits:

This project will support projected traffic demand through the year 2025 while also accommodating the movement of cargo and other aviation support functions. This facility has been designated as a Strategic Intermodal Connector and is also identified for future widening in the Orlando International Airport Amended and Restated Development Order.

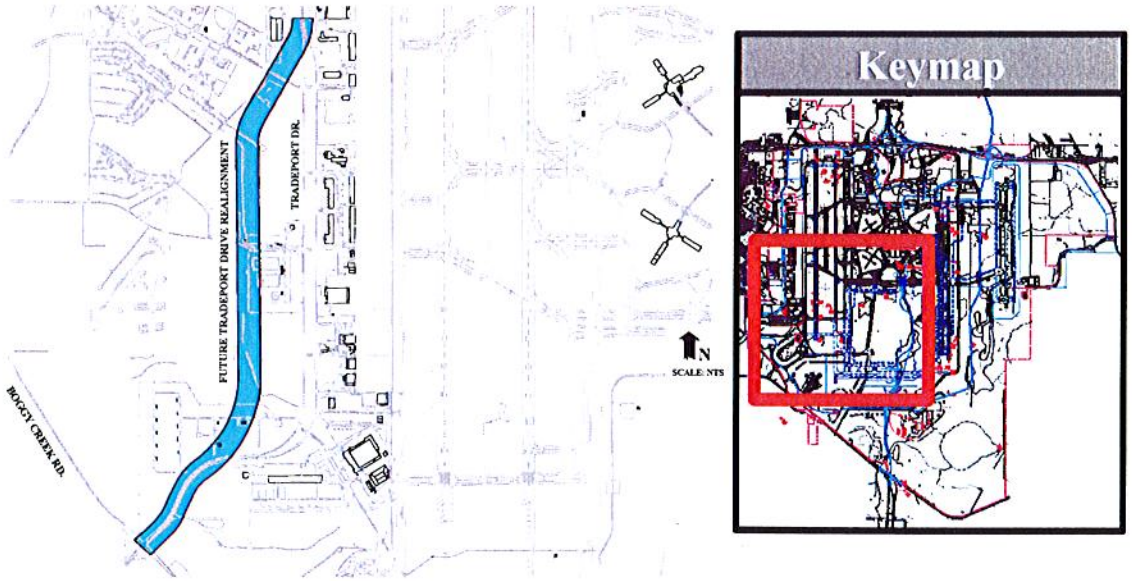
This project will also allow for the aviation-related property located along the west ramp to be better utilized, through redevelopment, by creating deeper parcels. It is envisioned that future development in the Tradeport Drive area will be similar to the recently completed FedEx facility.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 52,060,000	26,030,000	26,030,000	-	-	-	-

Schedule:

Start: 2013
Finish: 2013



ROADWAY & PARKING PROJECTS

A) Roadways

11) Existing Bear Road Widening (Cargo Road to Tradeport Drive, 2 lanes to 4 lanes)..... $8,142,000

Description:

This project will widen Bear Road from existing Cargo Road in the Northwest Terminal Support Area west to Tradeport Drive, including a realignment of Bear Road near the existing Flight Safety facility.

Demand and Benefits:

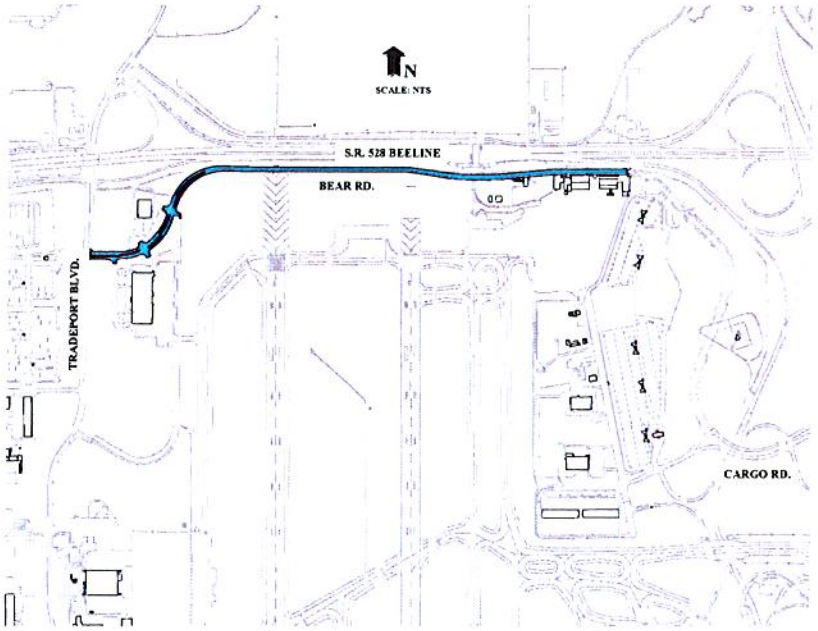
This improvement is necessary to meet projected future demand and to facilitate a better flow of traffic along the northern perimeter of the airport to support aviation-related development. Specific attention should be given to the planned improvements to Runways 17/35 and 18/36 as well as the future widening of the Bee Line Expressway (State Road 528).

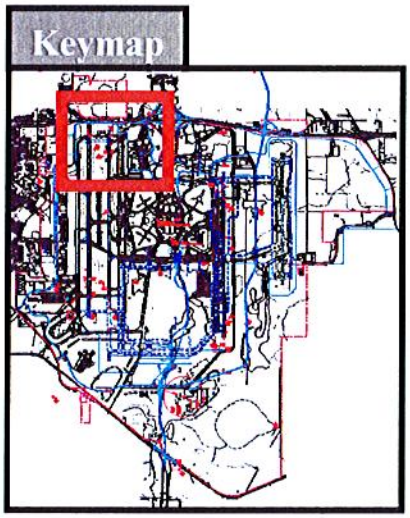
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 8,142,000	-	8,142,000	-	-	-	-

Schedule:

Start: 2013
Finish: 2013





ROADWAY & PARKING PROJECTS

B) Parking

1) Employee Parking Lot Expansion

a) Design	**$ 400,000**
b) Construction	**$ 7,000,000**
Total – Employee Parking Lot Expansion	**$ 7,400,000**

Description:

The existing employee lot will be expanded to the southwest to provide 1,800 additional striped spaces. The expansion will preserve a buffer area between Airport Boulevard and the parking lot.

Demand and Benefits:

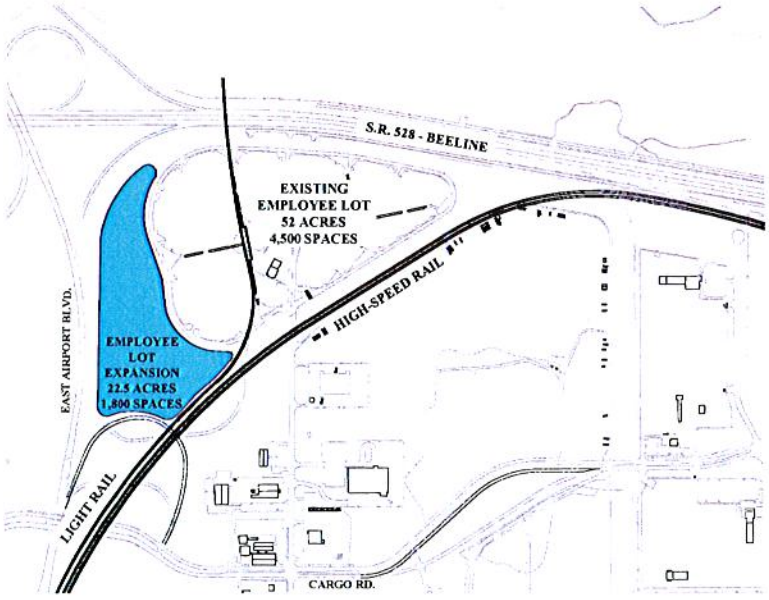
The existing employee parking lot is currently operating at near capacity. As the airport grows, demand for additional employee parking will increase. The Master Plan analysis indicates that the employee lot will need to be expanded by 1,800 spaces to accommodate the North Terminal build-out.

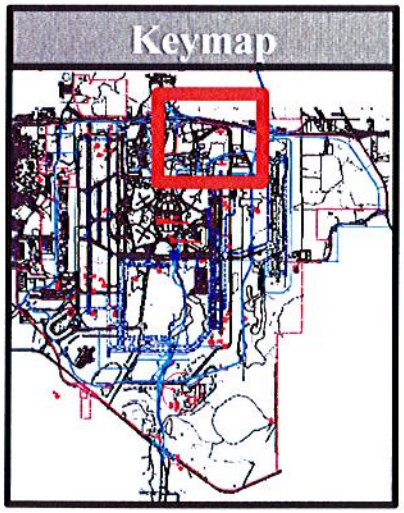
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 400,000	200,000	-	-	-	200,000	-
$ 7,000,000	3,500,000	-	-	-	3,500,000	

Design Schedule:
Start: 2005
Finish: 2005

Construction Schedule:
Start: 2005
Finish: 2006





ROADWAY & PARKING PROJECTS

B) Parking

2) Blue Lot Expansion

a) Design	**$ 1,000,000**
b) Construction	**$ 14,300,000**
Total – Blue Lot Expansion	**$ 15,300,000**

Description:

The Blue Lot at Cargo Road will be expanded on the west side of the Cargo Road extension. The expansion will encompass 34 acres and provide 2,700 additional parking spaces (including 300 overflow) for a total of 6,073 parking spaces.

Demand and Benefits:

This project is needed to replace capacity that will be lost when the Gold Lot is closed. Ultimately, if the Gold Lot remains open, this improvement will be needed by 32 million annual passengers (MAP). This project will allow the Gold Lot to be closed and the land to be converted to other uses. It will also consolidate satellite parking operations currently split between the Blue Lot and the Gold Lot into one facility. If the Gold Lot remains open, this project will increase overall public parking capacity sufficient to support a passenger demand of 36 MAP.

Funding:

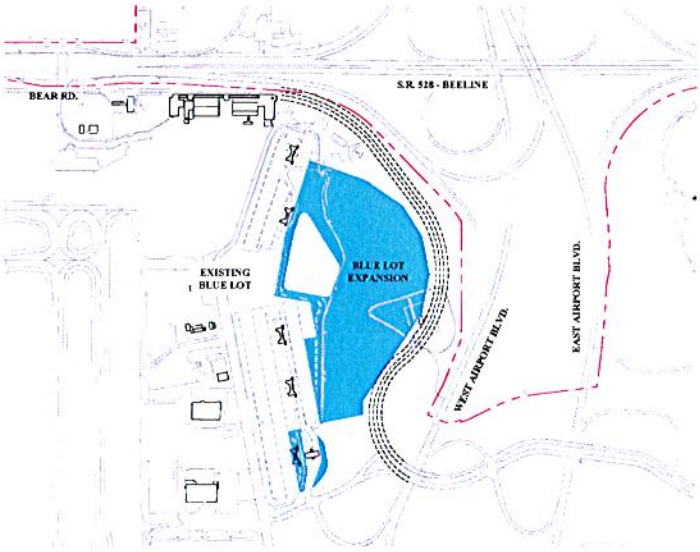
Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 1,000,000	500,000	-	-	-	500,000	-
$ 14,300,000	7,150,000	-	-	1,581,000	5,569,000	-

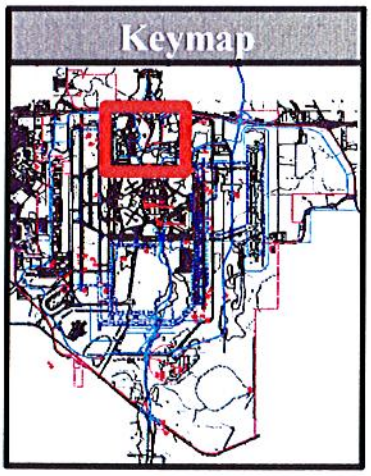
2a Schedule:

Start: 2005
Finish: 2005

2b Schedule:

Start: 2005
Finish: 2006





ROADWAY & PARKING PROJECTS

B) Parking

3) Revenue Control Enhancements / Parking Equipment/E-PASS Installation/Canopy Modifications (Allowance) $9,030,000

Description:

This project includes the replacement of the Durasys revenue control software, hardware, and equipment used in the commercial lanes. This system dates back to the 1980s and needs to be upgraded. Also included is the equipment necessary for the installation of E-PASS at the terminal and satellite parking facilities.

Demand and Benefits:

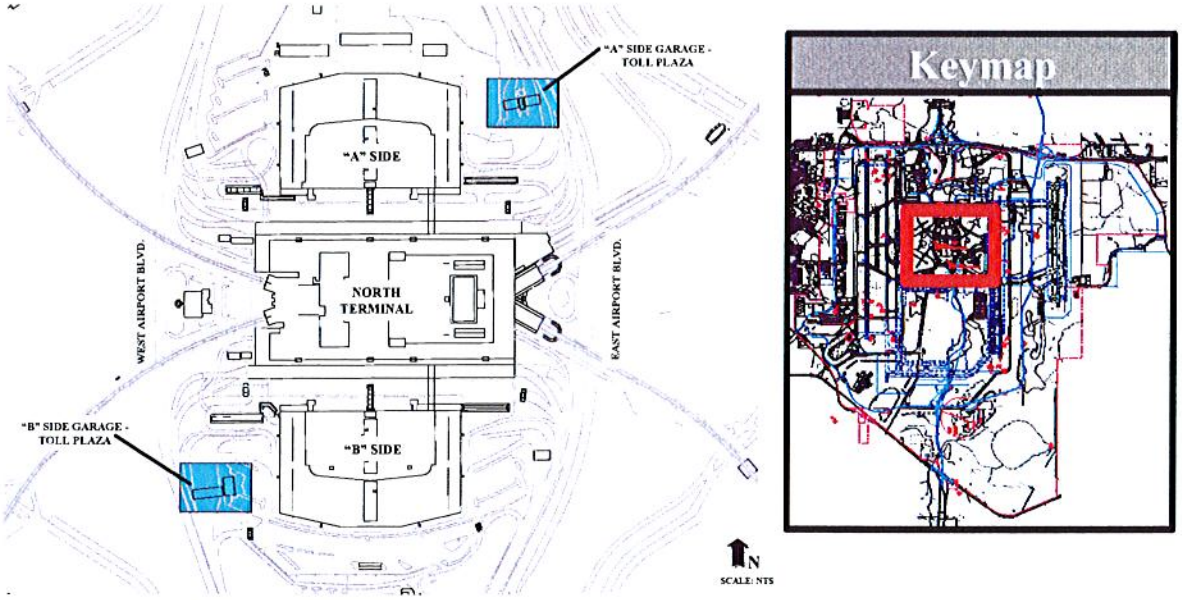
This project is needed to maintain current technology in the commercial lane and to support future E-PASS applications.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 9,030,000	-	-	-	9,030,000	-	-

Schedule:

Start: 2005
Finish: 2005



ROADWAY & PARKING PROJECTS

B) Parking

4) Install additional exit lane/cashier booth, break room facilities, and toilet at Red Lot $548,000

Description:

This project will upgrade the current revenue control facilities at the Red Lot to include an additional exit lane and restroom/break room facilities.

Demand and Benefits:

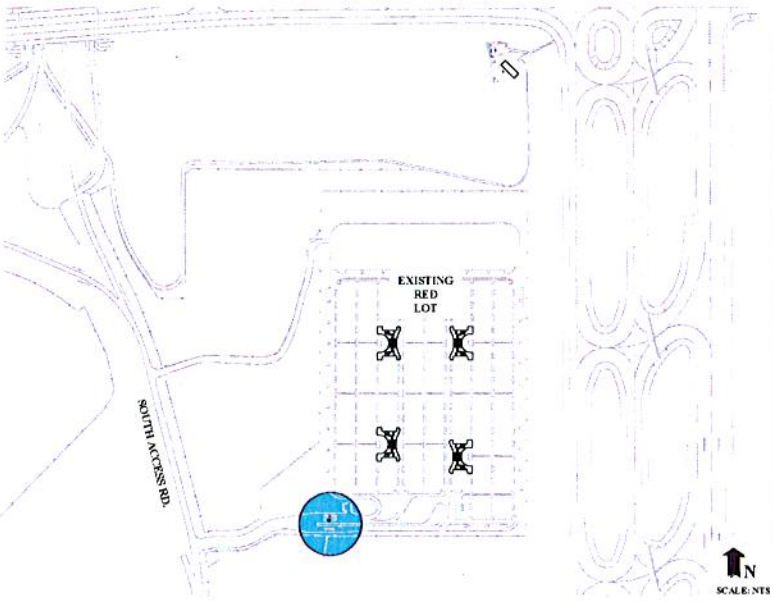
This will allow for continuous operations of the Red Lot as well as add additional capacity at the exit lane.

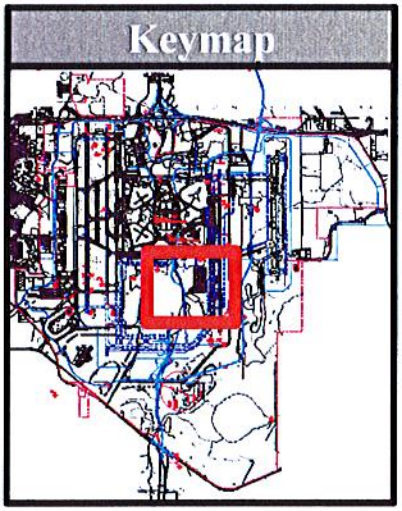
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 548,000	-	-	-	548,000	-	-

Schedule:

Start: 2005
Finish: 2005





ROADWAY & PARKING PROJECTS

B) Parking

5) Parking Garage Signage (allowance) $2,060,000

Description:

Replacement of the existing parking garage signage.

Demand and Benefits:

The existing signage in both "A" and "B" side garages and the terminal top garage is nearing its useful life. Exposure to the outside elements has caused many signs to fade and become difficult to read. Passenger comments have also indicated that the existing garage signage is confusing. This project will renew the existing signage and will be analyzed to improve the wayfinding message to better serve passengers.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 2,060,000	-	-	-	2,060,000	-	-

Schedule:

Start: 2005
Finish: 2005

ROADWAY & PARKING PROJECTS

B) Parking

6) Close Gold Overflow Lot, Provide Replacement Overflow Spaces (1,000 in Red Lot)..... $1,846,500

Description:

The MCO Master Plan recommends that the existing Gold Lot on Tradeport Drive be transitioned to an aviation support-related land use. The conversion of this lot will require that the existing surface provided by the Gold Parking Lot be replaced. One option is the existing Red Lot on South Access Road can be expanded to the south to provide additional parking capacity. The proposed expansion will encompass approximately14 acres and provide 1,000 additional overflow parking spaces for a total of 4,713 parking spaces. This project will also allow for the satellite parking bus operation to be streamlined during peak periods.

Demand and Benefits:

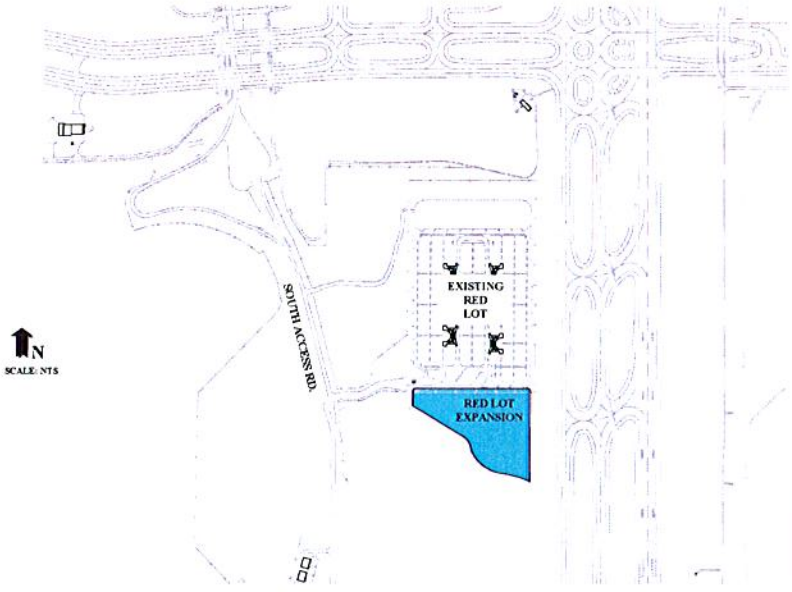
This project is needed to replace capacity that will be lost when the Gold Overflow Lot is closed. Ultimately, if the Gold Overflow Lot remains open, this improvement will be needed by 36 million annual passengers. This project will allow the Gold Overflow Lot to be closed and the land converted to other uses.

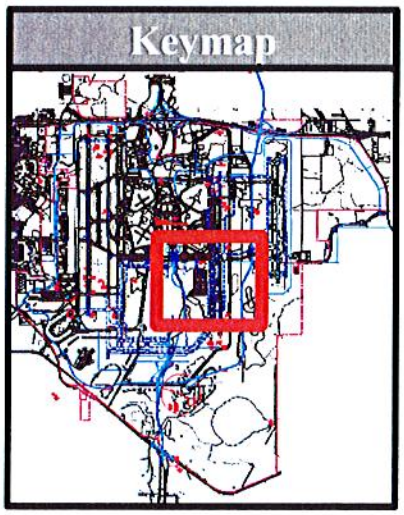
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 1,846,500	923,250	-	-	923,250	-	-

Schedule:

Start: 2008
Finish: 2008





ROADWAY & PARKING PROJECTS

B) Parking

7) Taxi Bullpen Relocation to Red Lot..... $5,290,000

Description:

The existing taxi bullpen facility is located south of the "B" side parking garage. The relocated taxi staging area will utilize western portions of the existing Red Parking Lot. Ingress and egress from the taxi staging area to South Access Road will be provided via the existing Red Lot access roadway. To support this relocated taxi operation, the following facilities are required: access roadway; turn lane roadway improvements; driver's rest and toilet area; driver's shelter building; starter's office building; landscaping; signage; fencing; drainage facility modifications; parking space for mobile food concessionaires and the installation of conduit to support a future Automated Vehicle Identification system. This project will also provide for new taxi queue areas adjacent to the 'A' and 'B' sides of the Landside Terminal building.

Demand and Benefits:

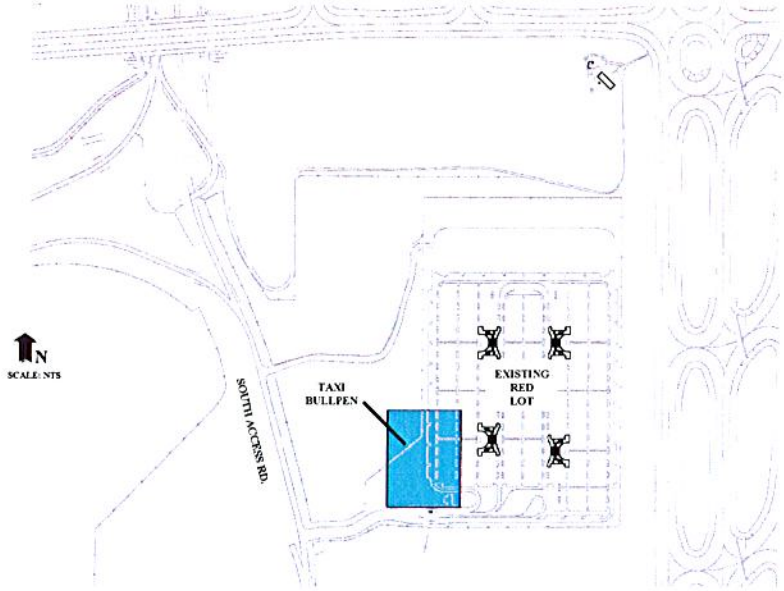
The present location of the taxi staging area, adjacent to the Terminal "B" parking garage, requires taxis to weave across passenger traffic entering or exiting Terminal "B". This condition negatively impacts the traffic operations along these short weaving sections, thereby, reducing the overall capacity of the North Terminal Complex Loop Roadway System. This project will enhance terminal roadway capacity and provide additional parking space for commercial motor bus vehicles.

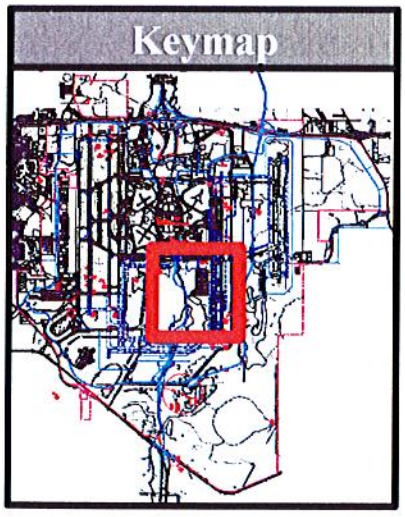
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 5,290,000	-	-	-	5,290,000	-	-

Schedule:

Start: 2008
Finish: 2008





ROADWAY & PARKING PROJECTS

B) Parking

8) Modify/Expand Rental Car (RAC) Ready/Return Areas in Support of RAC Rebid in 2009 (leases expire 2/28/2009) (Allowance) $11,255,000

Description:

The existing lease with on-site RAC providers will expire in the first quarter of 2009. In preparation of the lease negotiations, options to modify and/or expand the current RAC ready/return areas are being reviewed.

Demand and Benefits:

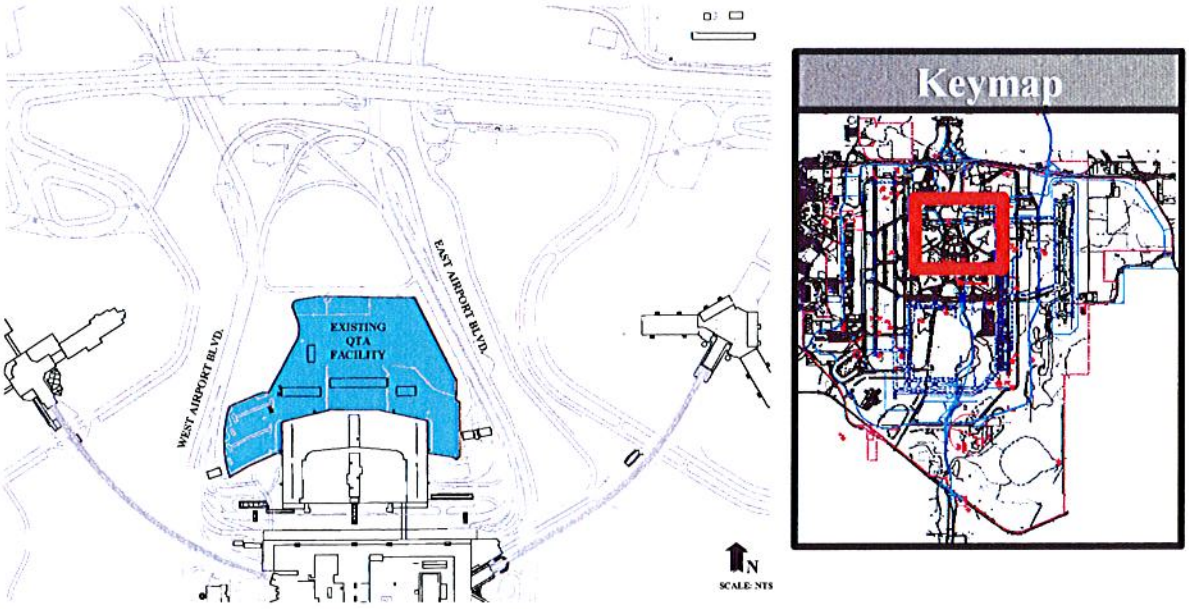
This allowance is intended to provide flexibility for the Authority as the RAC leases are negotiated.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 11,255,000	-	-	-	11,255,088	-	-

Schedule:

Start: 2008
Finish: 2008



ROADWAY & PARKING PROJECTS

B) Parking

9) Expand Red Lot for Holiday Overflow (2,400 spaces)..... $10,463,500

Description:

The existing Red Lot on South Access Road will be expanded to the south to provide additional parking capacity. The proposed expansion will encompass approximately 30 acres and provide 2,400 additional Holiday Overflow striped parking spaces for a total of 6,653 spaces.

Demand and Benefits:

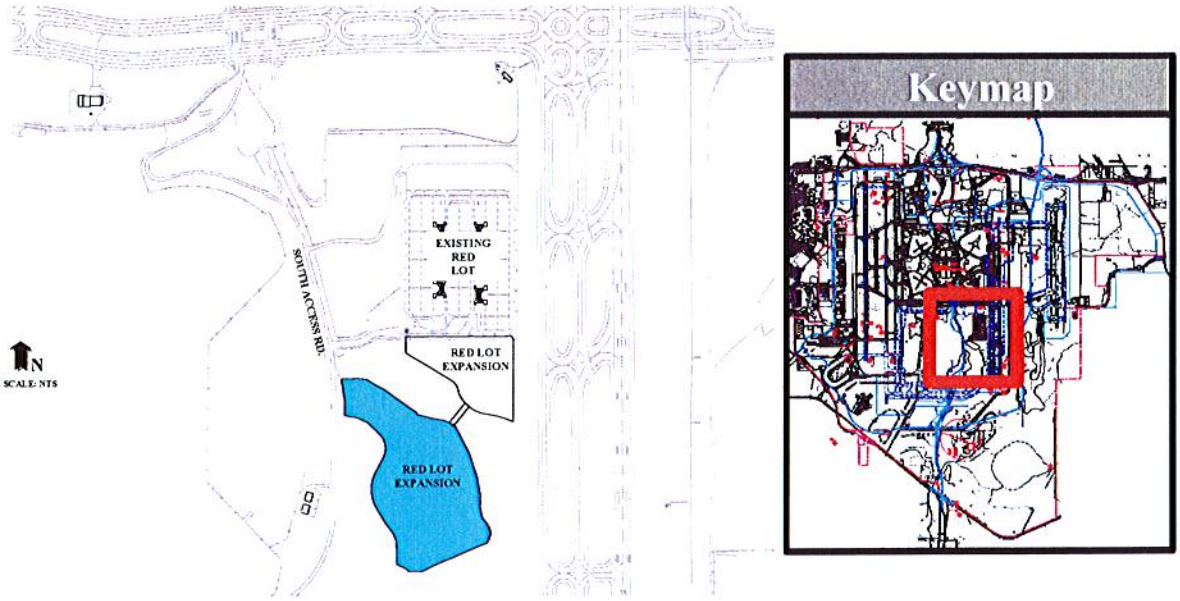
This project will be needed by 31 million annual passengers (MAP) if the Gold Lot is closed. If the Gold Lot remains open, this project will be needed by 36 MAP. This project, combined with parking projects B1 through B3 and project B5, will support parking demand through 39 MAP. The Red Lot can remain in operation until construction of Phase II of the South Terminal Complex.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 10,463,500	5,231,750	-	-	5,231,750	-	-

Schedule:

Start: 2010
Finish: 2010



ROADWAY & PARKING PROJECTS

C) Asset Preservation/R&R Projects $23,950,000

Description:

In October 2002, the Greater Orlando Aviation Authority embarked upon a goal to produce and maintain an Asset Preservation Renewal & Replacement Plan for MCO. A breakdown of these projects is available in a separate document.

Demand and Benefits:

This program will identify the asset, quantify the prevention effort, and schedule the proposed capital outlays within the respective area by fiscal year.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 23,950,000	-	-	-	-	-	23,950,000

Schedule:

Start: 2004
Finish: 2014

OTHER PROJECTS

A) Other Projects

1) Environmental Projects..... $23,898,000

Description:

The Greater Orlando Aviation Authority continues to implement a comprehensive Environmental Program to address various issues such as environmental assessment, mitigation, monitoring, restoration and remediation.

Demand and Benefits:

In maintaining compliance with federal, state, and local environmental rules and regulations, the environmental program at Orlando International Airport allows for property development while protecting and conserving the beneficial functions of environmentally sensitive lands.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 23,898,000	-	-	-	-	23,898,000	-

Schedule:

Start: 2004
Finish: 2014

OTHER PROJECTS

A) Other Projects

3) Perishables Center (Allowance) $1,030,000

Description:

This project will provide modifications and rehabilitation to the Perishables Center.

Demand and Benefits:

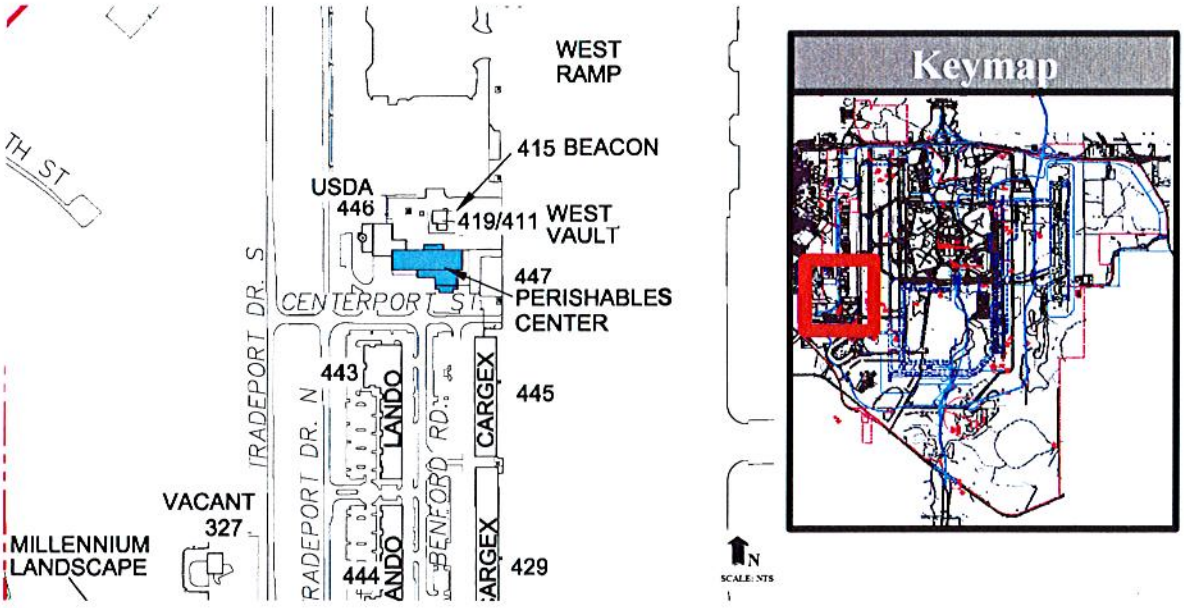
The contract with the current Perishables Center tenant expired in March 2004. The building is approximately 20 years old, underutilized, and in need of renovation. These modifications and rehabilitation are required to redevelop this facility and to maintain the marketability of this commercial site.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 1,030,000	-	-	-	1,030,000	-	-

Schedule:

Start: 2005
Finish: 2005



OTHER PROJECTS

A) Other Projects

4) Art Program (Allowance)..... $1,000,000

Description:

Purchase of art work in various forms for display throughout the landside and airside terminals.

Demand and Benefits:

This program maintains the airport's public art collection while continuing to please the Central Florida Community and its many visitors. It helps showcase the airport to the traveling public, enhancing the "Orlando Experience" and the overall appearance of the terminal buildings.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 1,000,000	-	-	-	-	1,000,000	-

Schedule:

Start: 2005
Finish: 2011

OTHER PROJECTS

A) Other Projects

5) Demolish Old Navy Commissary Warehouse..... $788,000

Description:

This project is to demolish a 79,800 square foot building, the old United States Navy Commissary Warehouse. The project will include building and parking lot demolition, electrical demolition, disposal of debris and site restoration.

Demand and Benefits:

The old United States Navy Commissary Warehouse was built in 1952 and has served its useful service life. The area is programmed for future redevelopment. A building survey completed in 1996 lists the following results concerning some of the building conditions:

- Structural Status - major repair of roof decking required; poor condition;
- Heating, Ventilating, and Air Conditioning System - total replacement required;
- Plumbing System - one restroom exists, additional restroom must be added to meet Americans With Disabilities Act standards;
- Parking - limited, need paved access;
- Pavement - poor condition;
- Comments - large gaping holes in roof, second floor collapsing, integrity of steel in roof questionable.

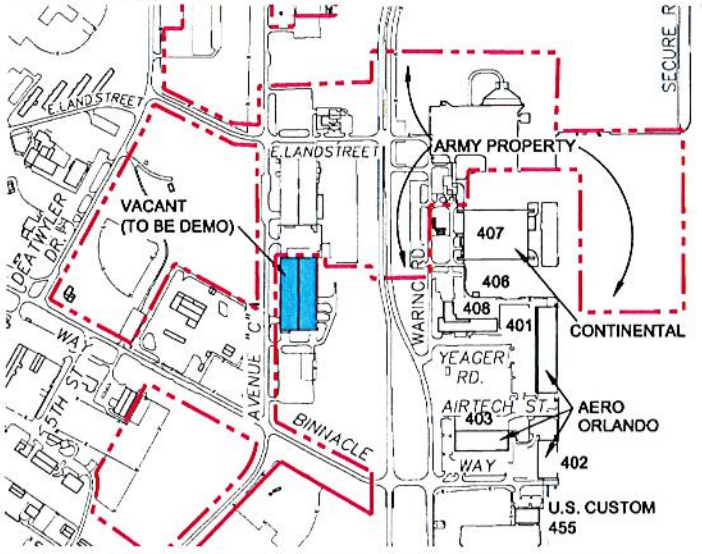
The recommendation of this building survey is to demolish the building and create a suitable space for new development. Future modern facilities will enhance the Tradeport use market.

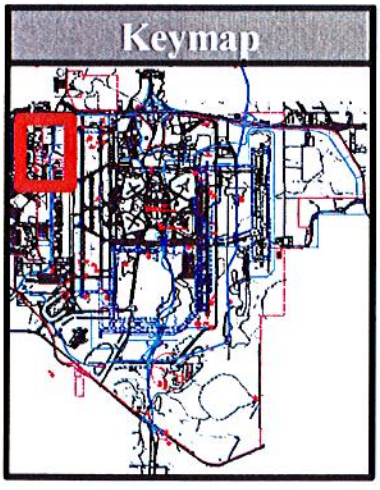
Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 788,000	-	-	-	-	788,000	-

Schedule:

Start: 2008
Finish: 2008





OTHER PROJECTS

A) Other Projects

6) Demolish Two-Story Building Located on Federal Aviation Administration (FAA) Parcel #5 at Tradeport..... $225,000

Description:

This project is to demolish a 23,484 square foot building located on the former FAA Parcel #5. The project will include building demolition, electrical demolition and site restoration.

Demand and Benefits:

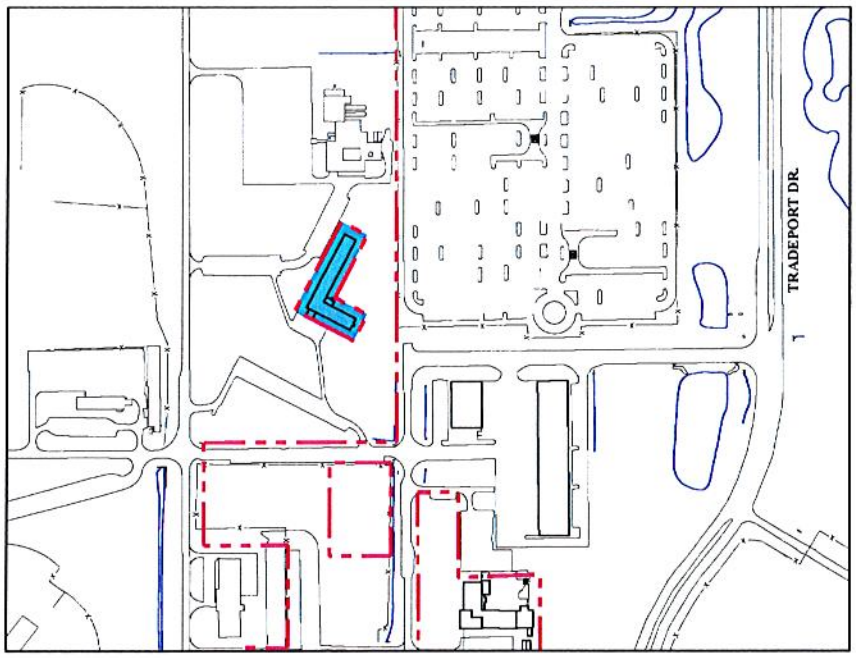
The demolition of the two story building located on the former FAA Parcel #5 at Tradeport has been identified by the Commercial Properties Department as a high priority demolition project. This building has reached its useful life. This demolition will create a suitable space for new development. Future modern facilities will enhance the Tradeport use market.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 225,000	-	-	-	-	225,000	-

Schedule:

Start: 2008
Finish: 2008



OTHER PROJECTS

A) Other Projects

7) Post Office Demolition (lease expires 3/27/07) $1,351,000

Description:

This project includes the demolition of buildings #475, #476, #477 and #478 (approximately 140,000 square feet) including parking lots, electrical demolition, disposal of debris and site restoration. This land development project would allow expansion of the FedEx ramp to the east.

Demand and Benefits:

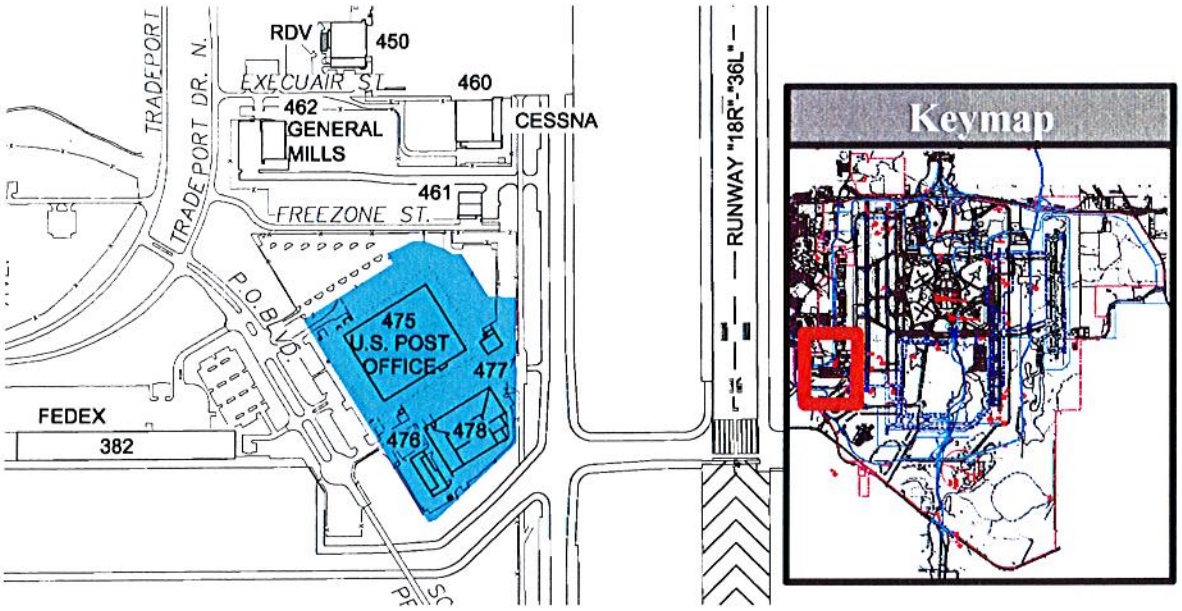
The expiration date of the leasehold agreement with the United States Post Office is March 2007. The relocation of the facility is planned to coincide with the lease expiration date. This demolition project is scheduled to take place to make the current Post Office site available for other aviation-related revenue generating uses. This is prime property adjacent to the airfield that can be developed for major revenue-producing, aviation-related use.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 1,351,000	-	-	-	-	1,351,000	-

Schedule:

Start: 2008
Finish: 2008



OTHER PROJECTS

A) Other Projects

8) Master Plan Update $4,919,000

Description:

An airport master plan is a concept of the ultimate development of an airport. It includes forecast of demand, development of alternative solutions to reasonably satisfy forecasted demand, determination of the cost effectiveness of alternative solutions, financial feasibility and environmental impact of alternative solutions. The most recent airport master plan update for Orlando International Airport was completed in 2004.

Demand and Benefits:

The overall objectives of the airport master plan is to provide guidelines for future development which will satisfy aviation demand and will be compatible with the environment, community development and other modes of transportation. During this comprehensive planning effort, the airport's primary planning tool, the Airport Layout Plan, is updated.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 4,919,000	4,304,000	615,000	-	-	-	-

Schedule:

Start: 2008
Finish: 2013

OTHER PROJECTS

A) Other Projects

9) South Tradeport Drainage Improvements $7,091,000

Description:

To accommodate additional development in Central and South Tradeport areas, long-term drainage improvements are required and include the following project components:

1. Construction of two new ponds
   - Pond 1, north of former bunker area, 7.4 acres, 3,400' northwest of Runway 36L;
   - Pond 2, south of former bunker area, 8.6 acres, 4,700' west of Runway 36L;
2. Partial enlargement of Lake Gillooly
   - Pond 3, south of Lake Gillooly, 5.8 acres, 4,200' southwest of Runway 36L; and
3. Relocation and replacement of water control structure

These ponds will be constructed as wet ponds, with 4:1 and 2:1 side slopes.

Demand and Benefits:

The South Tradeport area includes approximately 440 acres where aviation-related (cargo/hangar) and mixed (commercial/industrial) land uses are planned for the future. The primary drainage facility is Lake Gillooly. Lake Gillooly is located approximately 2,600' southwest of Runway 36L. It provides stormwater treatment per Southwest Florida Water Management District permit and will reach capacity with future land development. Additional drainage facilities are needed to increase stormwater treatment capacity and to support this continuing land development. This project will provide additional drainage capacity in support of land development.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 7,091,000	-	-	-	-	7,091,000	-

Schedule:

Start: 2008
Finish 2008

N

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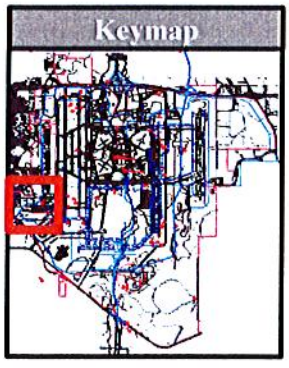
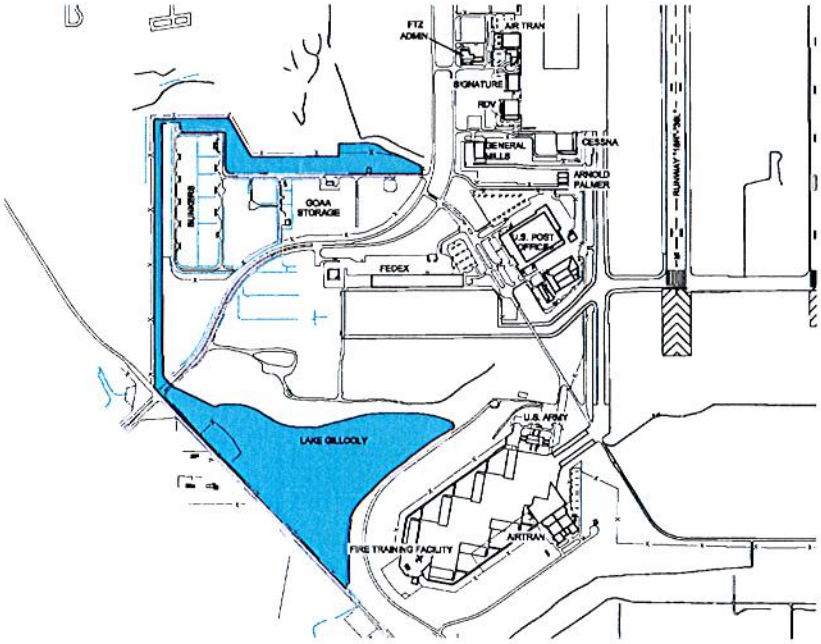




OTHER PROJECTS

A) Other Projects

10) Demolish Old Terminal (Buildings 607 & 608) $1,371,000

Description:

This project is to demolish the old terminal building along Bear Road, known as buildings #607 and #608. The project will include building demolition, termination of all utilities at the perimeter of the site, and creation of a suitable space for more appropriate use of the site for new construction.

Demand and Benefits:

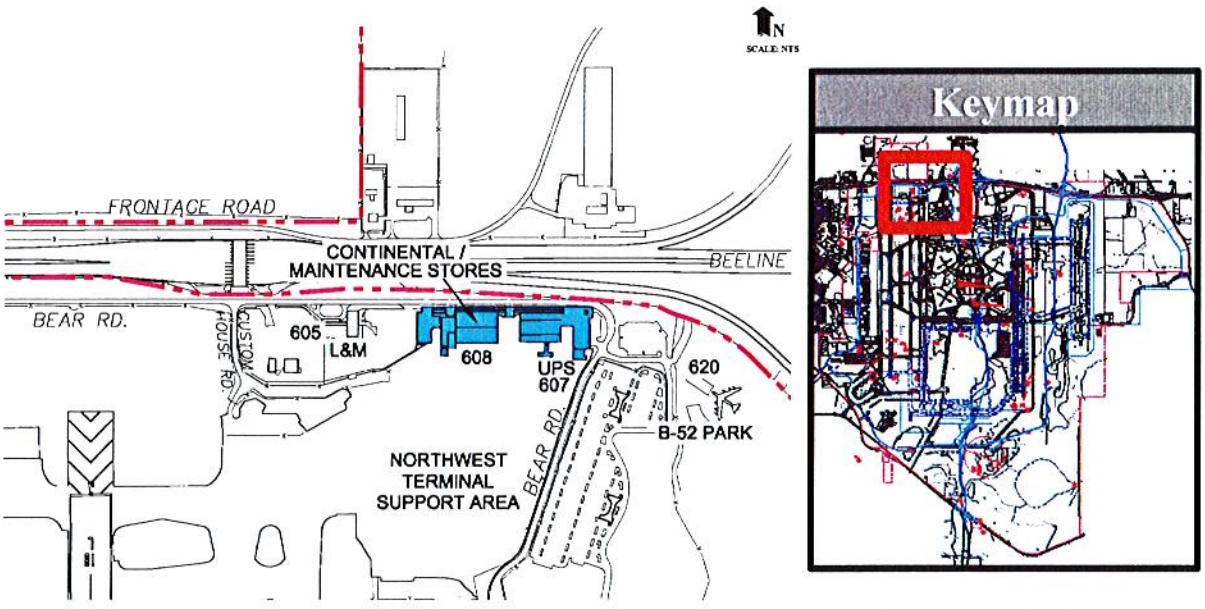
The old terminal, comprised of buildings #607 and #608, has been evaluated for consideration of either renovation or demolition. These buildings have been modified several times for a variety of uses and have served their useful service life. Per the building evaluation and assessment completed in November 2002, renovation of the existing buildings in order to bring them to a useful condition would cost approximately $10 million. With the total square footage of the two buildings being 91,460 square feet, the estimated cost of a comparable new facility with the same total area and functionality including demolition costs would be under $9 million. Based on this overall cost assessment of these two alternatives and the overall usefulness of the existing building layout, the preferred alternative is to demolish the two buildings and create a suitable space for more appropriate use of the site for new construction. Future modern facilities will enhance the Northwest Terminal Support Area. Building demolition projects are demand driven.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 1,371,000	-	-	-	-	1,371,000	-

Schedule:

Start: 2008
Finish: 2008



OTHER PROJECTS

A) Other Projects

11) Land Development/Mitigation and Site Prep (Allowance) .....$ 36,896,000

Description:

This project provides for land development, mitigation and site preparation, including installation of utilities, earthwork, drainage modifications and paving, as required for the following properties:

- GeeBee Property
- Poitras Property
- Heintzelman/Midfield Development

Demand and Benefits:

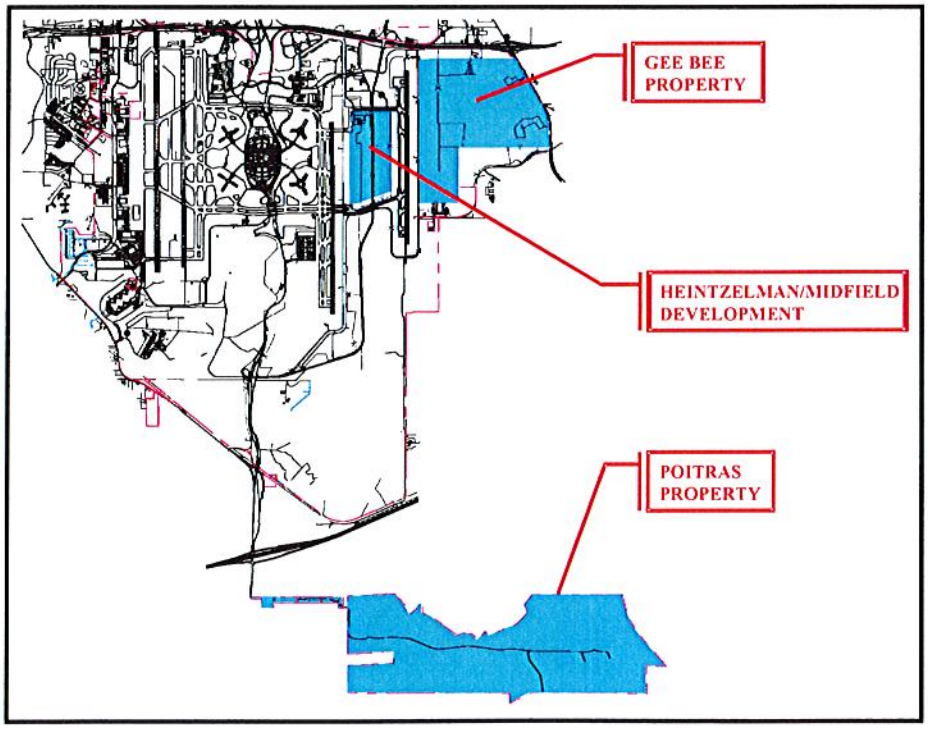
The various elements of this project are required in order to develop the listed properties into marketable commercial sites.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 36,896,000	-	-	-	-	36,896,000	-

Schedule:

Start: 2009
Finish: 2012



OTHER PROJECTS

B) Asset Preservation/R&R Projects $17,425,000

Description:

In October 2002, the Greater Orlando Aviation Authority embarked upon a goal to produce and maintain an Asset Preservation Renewal & Replacement Plan for MCO. A breakdown of these projects is available in a separate document.

Demand and Benefits:

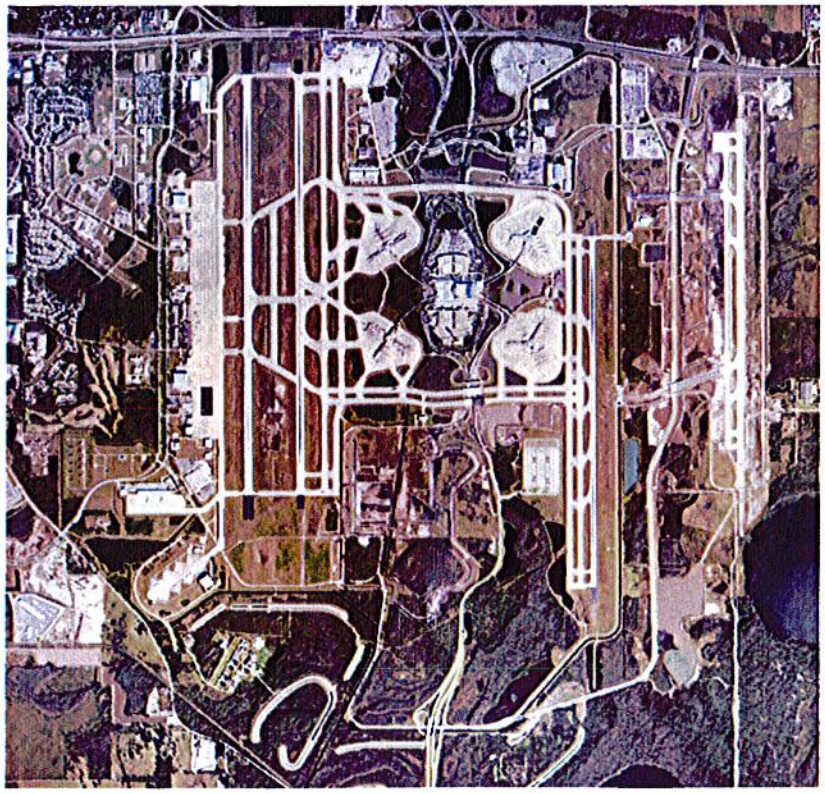
This program will identify the asset, quantify the prevention effort, and schedule the proposed capital outlays within the respective area by fiscal year.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 17,425,000	-	-	-	-	-	17,425,000

Schedule:

Start: 2004
Finish: 2014



PROJECTS BEYOND 2019

A) Taxiways/Runways

22) Dual North Crossfield Taxiway

a) Taxiway and Bridges	$ 85,632,000
b) 1,500 ft Extension to Runway 17R/35L	$ 26,388,000
c) Relocate Navigational Aids (NAVAIDS)	$ 1,224,000
d) Taxiways H Extension and Connector Taxiways	$ 21,621,000
e) Extend Taxiway K from Runway 17R/35L	$ 46,987,000
Total - Dual North Crossfield Taxiway	**$ 181,852,000**

Description:

This project encompasses several airfield pavement and navigational aid equipment improvements, and aviation-related building removal and relocation activity. The second or dual north crossfield taxiway (K) will be constructed in conjunction with the future Runway 17R extension project. This runway will be extended 1,500 feet to the north to provide a total length of 11,500 feet. Associated NAVAIDS including the Instrument Landing System and Approach Lighting System with Sequenced Flashers (ALSF-II) equipment need to be relocated. Extensions of Taxiways H and J will also be completed. Several airline support and air cargo buildings located north of this new taxiway will need to be removed or relocated.

Demand and Benefits:

Results from the airfield SIMMOD simulation analyses conducted during the MCO Airport Master Plan Update indicated that a second north crossfield taxiway would provide significant aircraft delay reduction benefits and assist in the separation of aircraft operations by the FAA Air Traffic Control Tower personnel. The extension of Taxiway J to the east between existing Runways 17R and 17L will provide the capability to operate a mixture of departures and arrivals on the east airfield.

Implementation of the dual north crossfield taxiway will conflict with the existing TERPS airspace surfaces for Runway 17R. The extension of this runway to the north removes this TERPS conflict.

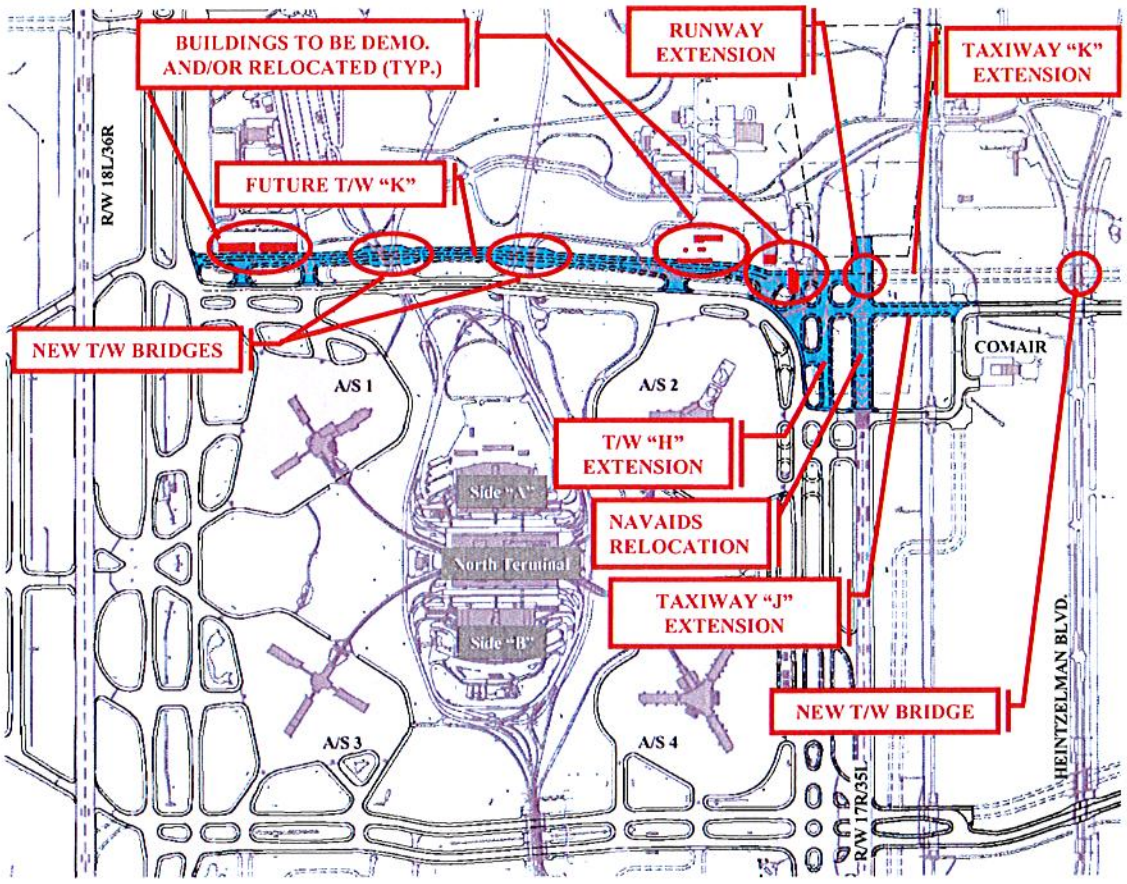
Funding:

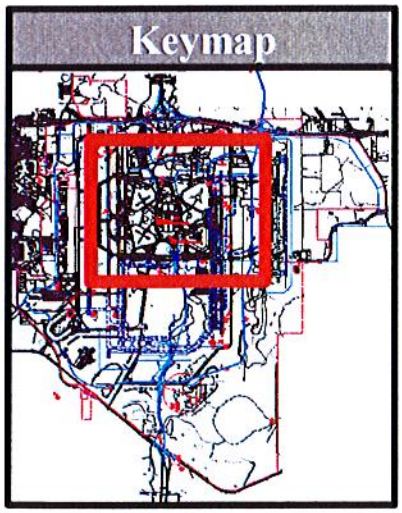
Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 85,632,000	74,928,000	10,704,000	-	-	-	-
$ 26,388,000	23,090,000	3,298,000	-	-	-	-
$ 1,224,000	1,071,000	153,000	-	-	-	-
$ 21,621,000	18,918,000	2,703,000	-	-	-	-
$ 46,987,000	41,114,000	5,873,000	-	-	-	-

Schedule:

Start: 2020
Finish: 2023

A) Taxiways/Runways
22) Dual North Crossfield Taxiway





PROJECTS BEYOND 2019

A) Taxiways/Runways

23) Parallel Taxiway - East Side of Fourth Runway (Airfield Access to GeeBee Area) $106,913,000

Description:

Full length Taxiway P will be located approximately 640 feet east of Runway 17L/35R. The construction of this taxiway is demand driven to support future Airplane Design Group VI operations on the East Airfield. Six (6) high speed exit taxiways and taxiway connectors will also be constructed in this project. A portion of the existing secure service road will require removal and relocation.

Demand and Benefits:

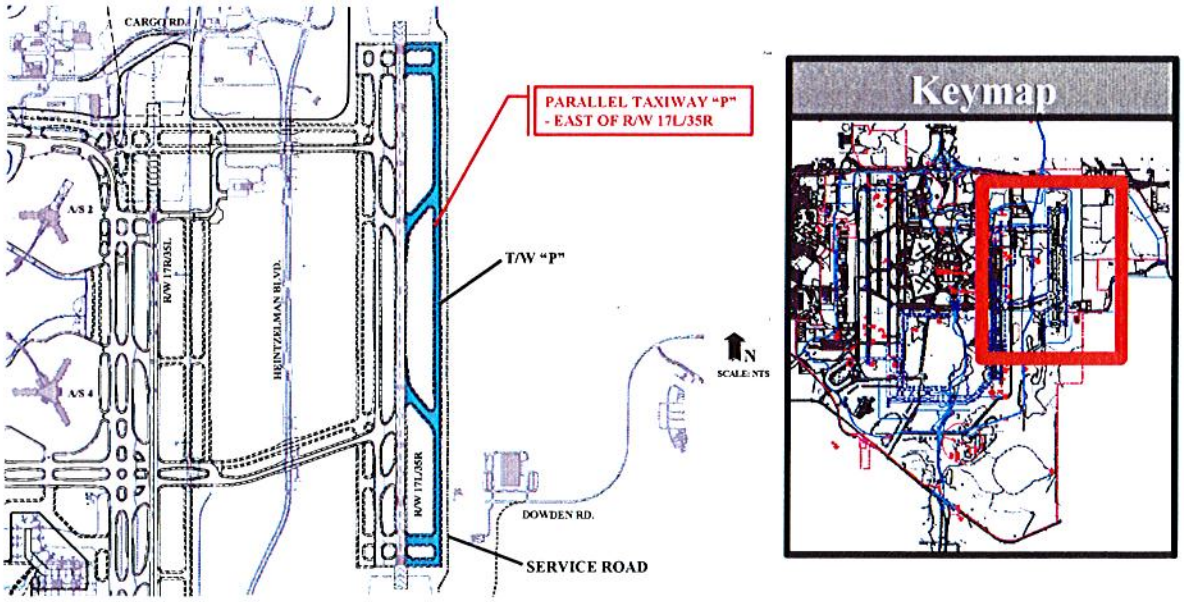
As the East Tradeport Development Area develops, a parallel taxiway east of Runway 17L/35R will be needed to provide access between the future East Tradeport Development Area (former GeeBee property) and the east airfield.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$106,913,000	93,549,000	13,364,000	-	-	-	-

Schedule:

Start: 2020
Finish: 2023



PROJECTS BEYOND 2019

A) Taxiways/Runways

24) Taxiway Z Extension $37,350,000

Description:

The extension of Taxiway Z from Taxiway E south to future Taxiway B12 will be completed in conjunction with the southern extension of Runway 36L. Taxiway Z is a partial parallel taxiway located between Runways 18L/36R and 18R/36L.

Demand and Benefits:

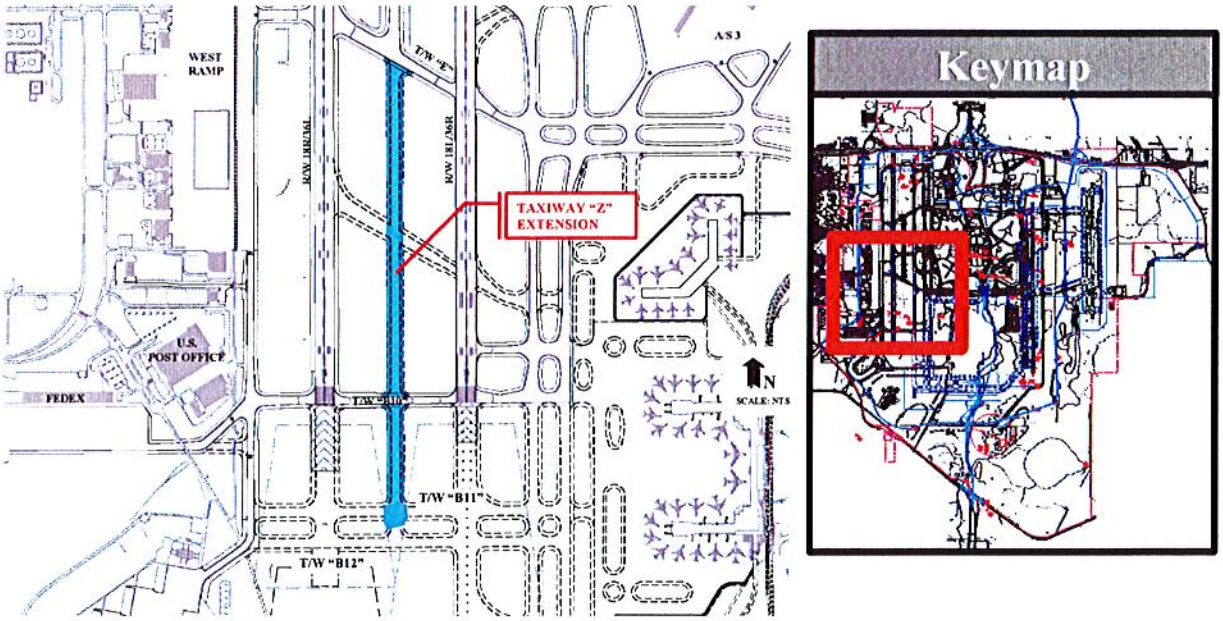
This taxiway extension will provide a more efficient ground taxi flow for landing and takeoff aircraft operating on either Runway 18L/36R and 18R/36L. This taxiway capacity-related improvement project will reduce aircraft runway occupancy time and minimizes delay. This taxiway extension provides a staging area for aircraft operating in the west airfield.

Funding:

Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$37,350,000	32,681,000	4,669,000	-	-	-	-

Schedule:

Start: 2021
Finish: 2024



PROJECTS BEYOND 2019

B) Miscellaneous

1) Wildlife Attractants/Mitigation

g) Regrade Side Slopes of West Airsides 1 & 3 Ponds..... $18,380,000

Description:

This is a safety-related project consisting of modifications/improvements to lands adjacent to the airfield. The Elimination of Wildlife Attractants Mitigation Program developed in 2001 between the FAA and the Authority, provides for the filling in of drainage ponds and the removal of wetlands to deter wildlife activity. These projects, in combination with continuing wildlife control procedures, have been carefully structured, located and integrated into the overall airport development and operations.

g) Regrade side slopes of West Airsides 1 and 3 ponds, located at the northern end of the north terminal complex.

Demand and Benefits:

The program for reduction of wildlife habitat at MCO was formulated to meet the requirements set forth in the FAA's Advisory Circular 150/5200-33 (Hazardous Wildlife Attractants On or Near Airports). With approximately 13,300 acres of developed and undeveloped property and four (4) active runways, this program supports the airport's highest priority to provide maximum safety for aircraft and passengers through management of wildlife and wildlife habitat.

Funding:

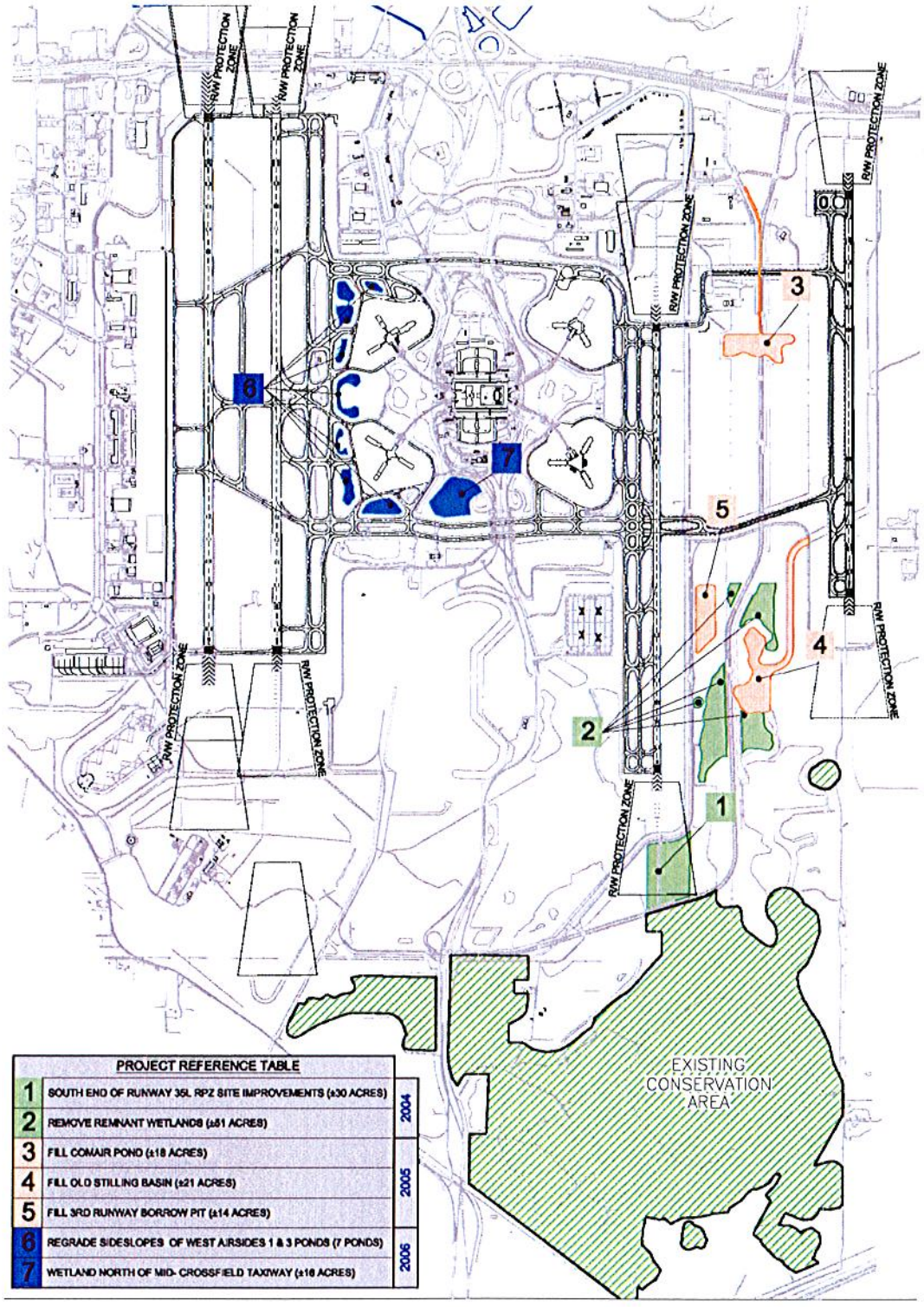
Escalated Total Project Cost	State/Federal Grants	PFC (PAYG)	PFC (Bonds)	GARBS	Other/Authority Funds	R & R
$ 18,380,000	16,083,000	2,297,000	-	-	-	-

Schedule:

Start: 2020
Finish: 2021

B) Miscellaneous

1) Wildlife Attractants/Mitigation



Elimination of Wildlife Attraction Program - FY 2020-2021
Project Location Map

APPENDIX R

AIRPORT MASTER PLAN UPDATE
ORLANDO INTERNATIONAL AIRPORT

GREATER ORLANDO
AVIATION AUTHORITY

Asset Renewal and Replacement

Recommendations for Facilities Renewal and Replacement at the Orlando International Airport.

Introduction

Asset Renewal and Replacement as a Business Priority

It is estimated that approximately 70% of a facility's overall life-span costs are for operation and maintenance (footnote source). While significant new facilities have recently come on-line at Orlando International Airport, there are a number of key facilities approaching 20 years of age. Authority leadership recognizes this fact and established renewal and replacement of existing and proposed facilities as a priority. [1]

Foundation for a Renewal and Replacement Program

The following details out the foundation on which a solid set of best business practices are developed for a robust asset renewal and replacement program:

1) **Safety** – The Authority more effectively manages risk by identifying/codifying maintenance schedules for those items where failure could result in loss of life or serious injury.

2) **Financial Asset Management** – Prudent fiscal management requires an understanding of the initial, on-going, and replacement cost of assets. The on-going obligation to maintain assets is increasing as new assets are added and existing ones age.

3) **Master Planning** - Long-range capital investment and operational capacity strategies are highly dependent on having a solid base-line for current facility conditions and lifecycles.

4) **Capacity and Reliability** – Existing assets need to operational and functional in order to avoid and reduce delays in the overall airways network system

5) **Appearance** – "The Orlando Experience" is a key economic benefit for the airport as well as the overall regional economy. On-going maintenance of aesthetic features needs to be evaluated and programmed for OIA facilities.

Key Questions

A number of key questions sparked the interest in asset renewal and replacement. These questions arose from the OIA 2020 Master plan effort and general recognition that the Orlando International Airport is aging. Some of the questions include:

- Are GOAA's assets being optimized to continue our position as a world-class safe and efficient airport?
- Is the current rate of maintenance sufficient for long-term viability?
- Are facilities being upgraded even though they may also be planned/scheduled for demolition?
- Are there outstanding repair/replacement liabilities that are not being planned and programmed?
- Are facility repairs and replacements being adequately prioritized?

Key Findings

Overall GOAA's assets are in good condition. The project has evolved into an on-going program which is now incorporated directly into the Authority business process for short-term and long term planning and budgeting. Some key items worth noting are:

- The need to identify specific ownership of a given asset or system such as the airfield or building roofs became apparent during the condition assessment process. Ownership/stewardship has been established.
- Not all systems are on a replacement schedule, but rather consciously put on a "run-to-failure" basis.
- System and sub-system component hierarchies have been established and provide effective roll-up capability for summarizing costs.
- The airports' planning and budgeting exercises such as the Capital Improvement Plan, Airports Development Team, OIA Master Plan include an asset renewal and replacement component.

[1] This renewal and replacement planning effort was conducted with in-house resources. The GOAA Planning Department served as lead with contributions from other GOAA Departments.

Methodology

Early on in the Asset Renewal and Replacement effort, it was determined that a solid baseline is critical in order to plan for future capacity and operations. The baseline inventory and condition assessment was done in such a manner that it can be readily updated to allow for dynamic planning and budgeting. For the GOAA asset renewal and replacement program, the baseline effort was launched with the following primary goal and objectives:

Goal:

To establish an ongoing process that will identify and account for the "operational use" of GOAA's assets in order to support the Renewal & Replacement, Capital Improvement, Maintenance and Master Planning Programs:

- This process will support short, medium and long term budget planning as well as support various GOAA personnel in its use.
- This process will be accurate and easy to use.

Objectives:

1) **To assemble GOAA's asset listing 1 (one) time and continue to maintain it from that point.**
   a) Identify asset classifications and categories that will be included (i.e. Area of Operation, Project #, Fixed vs. Non-fixed etc.).
   b) Identify the owners of the assets (i.e. HVAC, Electronics, Information Technology etc.).
   c) Identify and interrupt the asset acquisition and update processes to gather the information that will keep the database current (i.e. Accounts Payable, BP Construction meetings etc.). This is a "read only" interrupt.
   d) Acquire copies of existing assets from their owners and other sources where available (i.e. Accounting, AMMS, Y2K, Internal Audit etc.).
   e) Determine if the input efforts are representative of the desired population. Augment the data gathering where deemed necessary.

2) **To acquire and link the asset specific information that will support the Authority's Renewal & Replacement, Capital Improvement, Maintenance and Master Planning programs.**
   a) Obtain from asset owner (or manufacturer's representative), the specific data to each object (i.e. make, model, etc.)
   b) Obtain from manufacturer the information that supports the object's life cycle (i.e. PM schedules, Units of production, Warranty periods, Replacement labor and material costs etc.).
   c) Establish an asset priority that supports its entitlement of GOAA resources (i.e. risk of failure, amount of loss due to failure etc.)
   d) Obtain from manufacturer and GOAA (where applicable) the necessary lead time for repairs, replacements, and completely new installs.
   e) Indicate asset eligibility for 3rd party funding along with the funding lead time.

3) **To develop the ability of modifying an asset's lifeline while measuring the current and future budget impact.**
   a) Separately identify the time, usage and cost elements for each asset (no batches of similar items).
   b) Apply a separate time, usage, and cost element to the asset's sub-components where material in nature, and where they differ from parent asset.
   c) Establish all asset lifelines as a relative extension of the units of production (i.e. Extend the R&R date by updating the usage information vs. overwriting the due date fields).

4) **To furnish GOAA users with the various reports needed in an accurate and timely manner.**
   a) Identify the users and the various types of reports they prefer (i.e. summarized vs. detailed, hard copy vs. magnetic media etc.).
   b) Identify the reporting periods and report frequencies (i.e. monthly, quarterly, change in status, etc)
   c) Identify the data elements or each report.

The Process Included:

- The identification of material assets and their various classifications and sub-components.
- The identification of the asset's life cycle, maintenance replacement assets, repair and replacement costs and schedules, and GOAA area identification addressing.
- The ability to modify, retire or extend the object's life and show the cost/benefit of that decision in the current and future periods.
- The establishment of an interdepartmental information flow that will insure that all additions, improvements and retirements are kept up-to-date.
- Report processing for the various users to support maintenance scheduling, replacement scheduling, new development, repair and replacement costing, GOAA area identification addressing and other supporting designs and drawings.

Specifically Excluded from Process:

- Fixed asset financial accounting for taxes, depreciation, depletion and amortization.
- Reconciliation and safeguarding of assets, including asset tracking.
- Federal, state, and other funding applications and requests.

Overview

In October 2002, the Greater Orlando Aviation Authority (GOAA) embarked upon a goal to produce and maintain an Asset Preservation Renewal & Replacement Plan for Orlando International Airport.

This program would identify the asset, quantify the prevention effort, and schedule the proposed capital outlays within the respective area by fiscal year.

The following document contains a "write-up" supporting the R & R section of the Capital Improvement Plan (CIP). Information contained within this program will be updated on an annual basis, reflecting the most current changes to the schedules prior to the beginning of the Airport Development Team (ADT) process.

The CIP Renewal & Replacement for OIA is broken down into four (4) main areas:

- Terminal Projects
- Airfield Projects
- Roadway & Parking Projects
- Other R & R Projects

Within the above mentioned areas the following assets are addressed:

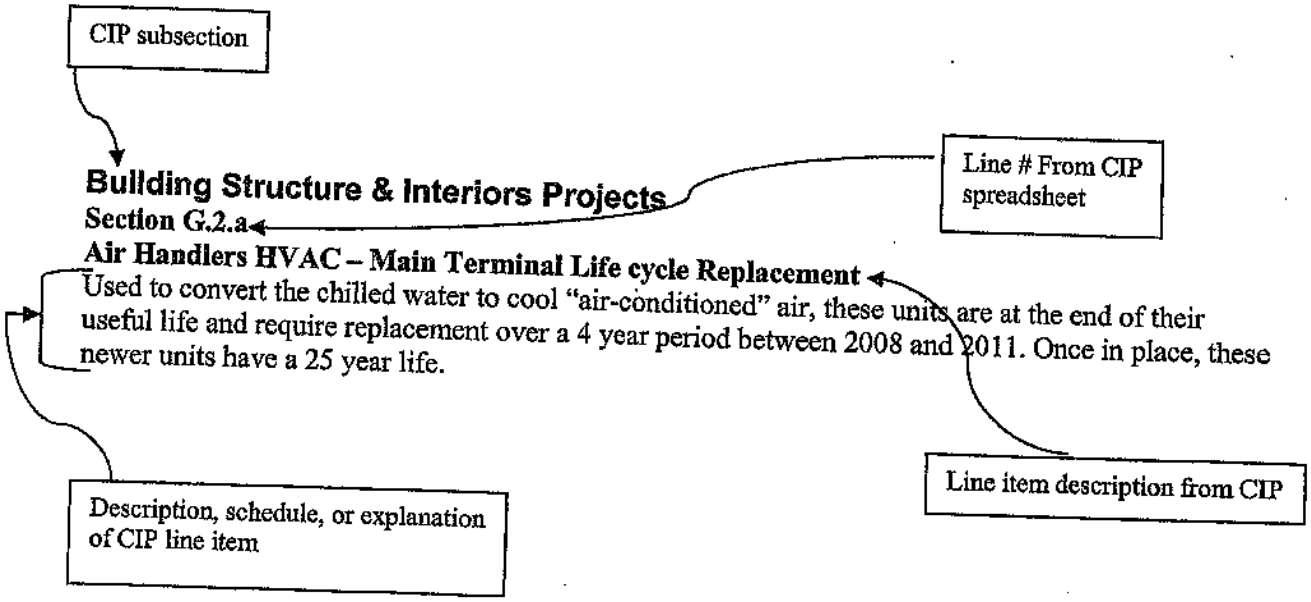
- Access Control System
- CCTV System
- Radio Communications
- Paging System
- Fire Alarm System
- GOAA Servers & Workstations
- GOAA Network & Software
- Telecommunications
- CUTE System
- MUFIDS
- Baggage Systems
- Lightning Detection
- Elevators
- Escalators
- Automatic People Movers
- Parking System
- Noise Monitoring System
- Emergency Response Systems
- Irrigation Systems
- Jet Bridges, Ground Power & PC Air
- Automatic Door System Plan
- Design Equipment Plan
- Signage
- Roads
- Airfield
- Building Structures
- Maintenance Equipment
- Motor Pool Fleet & ARFF Equipment
- Perimeter Fencing & Gates
- Parking Facilities

The following pages contain:

- A diagram explaining how to read the sections
- A write-up for each line item in the CIP with a reference to the exact line number
- A supporting replacement schedule where applicable

This schedule assumes a 1.5% increase in cost per year starting in 2005.

How To Read The Section



Asset Preservation R & R

Baggage System

Section: G.1.a.i

Common Use

The planned replacement of the technology driven components such as servers, workstations, printers and software of the Baggage System carry a 7 year life that is scheduled for turnover beginning in 2005 and 2008. However, the mechanical components such as PLC's, Conveyor Belts and Claim Device share a life expectancy of 10 to 15 years and are scheduled for 2006, 2013 and 2015.

Baggage System

Section G.1.a.ii

Conversion From Exclusive Use to Common Use

The anticipated renewal date for the remaining exclusive use Claim Devices and Conveyors is currently scheduled for 2008. Once in place they too will carry a 10 to 15 year life for mechanical components and 7 years for technology based components.

Unit Count	6	12	4	22	7	28	1	12	
Life In Years	7	7	7	10	15	15	7	15	
Common Use Baggage System	Servers	Workstations	Printers	PLCs	Conveyor Belts	Baggage Claim	Software	Carousels	
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 9
2005	4	6	2	-	-	-	1	-	-
2006	-	-	-	-	-	5	-	-	-
2007	-	-	-	-	-	-	-	-	-
2008	2	6	2	11	-	14	-	-	-
2009	-	-	-	-	-	-	-	-	-
2010	-	-	-	-	-	-	-	-	-
2011	-	-	-	11	-	-	-	-	-
2012	4	6	2	-	-	-	1	-	-
2013	-	-	-	-	-	3	-	-	-
2014	-	-	-	-	-	-	-	-	-
2015	2	6	2	-	-	6	-	-	-
2016	-	-	-	-	-	-	-	-	-
2017	-	-	-	-	-	-	-	-	-
2018	-	-	-	11	-	-	-	-	-
2019	4	6	2	-	-	-	1	-	-
2020	-	-	-	-	-	-	-	-	-
2021	-	-	-	11	-	5	-	-	-
2022	2	6	2	-	-	-	-	-	-
2023	-	-	-	-	-	14	-	-	-
2024	-	-	-	-	-	-	-	-	-

Baggage System

Section G.1.b

Baggage Makeup Systems

Replacement of the Baggage Makeup Systems will follow a similar timeline as the above mentioned conversion of exclusive use equipment. Currently it is scheduled in 2008 to coincide with the expiration of the current airline use agreements. Once in place these components will churn every 15 to 20 years.

Building Structure & Interior Projects

Section G.2.a

Air Handlers HVAC – Main Terminal Life Cycle Replacement

Used to convert the chilled water to cool "air-conditioned" air, these units are at the end of their useful life and require replacement over a 4 year period between 2008 and 2011. Once in place these newer units have a 25 year life.

Building Structure & Interior Projects

Section G.2.b.i

Airside 4 APM Station & Hub Ceiling Tile Replacement/Renovation – APM Station

The ceiling tile in the Airside 4 people mover station is scheduled for replacement in 2005.

Building Structure & Interior Projects

Section G.2.b.ii

Airside 4 APM Station & Hub Ceiling Tile Replacement/Renovation – Hub

The ceiling tile in the passenger hub of Airside 4 is scheduled for replacement in 2008.

Building Structure & Interior Projects

Section G.2.c

Airside 4 Rehabilitation

$68.6 million is bookmarked for a complete rehab of Airside 4. This is currently scheduled for 2013.

Building Structure & Interior Projects

Section G.2.d

Automatic Door System

Scheduled replacement for the North Terminal's Automatic Doors is 2010, 2011, 2012 and 2014. These doors carry an 11 year life and total 201 in number.

Building Structure & Interior Projects

Section G.2.e.i

Canopy Replacement & Structural Steel Preparation – Canopy Replacement

The Airside 1 canopy that covers the bus and baggage areas of FIS is scheduled for replacement in 2005.

Building Structure & Interior Projects

Section G.2.e.ii

Canopy Replacement & Structural Steel Preparation – Steel Prep Garages & Toll Booth

This is a 2008 replacement of the canopy covering the garage cashier lanes at the toll booths and resurfacing of the structural steel.

Building Structure & Interior Projects

Section G.2.f
Carpet & Tile Replacement
Programmed replacements of carpet and tile in all buildings at OIA represent this line item.

Building Structure & Interior Projects

Section G.2.h.i
Curb Areas (Levels 1, 2, and 3) Renovation – Wheelchair, Cart and High Lift Storage (level 3)
Scheduled for 2013 are the areas that currently support service lifts and passenger cart and wheelchair storage facilities.

Building Structure & Interior Projects

Section G.2.h.ii
Curb Areas (Levels 1, 2, and 3) Renovation – Concrete Structure Refurbishment
Terminal surface rehabilitation for levels 1, 2 and 3 of the passenger terminal curb concrete areas is represented here.

Building Structure & Interior Projects

Section G.2.h.iii
Curb Areas (Levels 1, 2, and 3) Renovation – New Airline Stanchions (ticket lobby)
This replacement will support the Authority's effort to standardize the ticket lobby stanchions throughout the terminal.

Building Structure & Interior Projects

Section G.2.h.iv
Curb Areas (Levels 1, 2, and 3) Renovation – Curb Column Surface Restoration
Terminal surface rehabilitation for levels 1, 2 and 3 of the passenger terminal curb columns is represented here.

Building Structure & Interior Projects

Section G.2.h.v
Curb Areas (Levels 1, 2, and 3) Renovation – Level 3 Curb Resurfacing
Terminal surface rehabilitation for levels 1, 2 and 3 of the passenger terminal curb resurfacing is represented here.

Building Structure & Interior Projects

Section G.2.i
Ramp Door Replacement
All 1st level doors for all airsides are scheduled for replacement in years 2005, 2006 and 2007.

Building Structure & Interior Projects

Section G.2.j
Electrical System Replacement – (Lamps, fixtures, cables etc.)
This is a programmed replacement of electrical fixtures for the passenger terminal and airsides.

Building Structure & Interior Projects

Section G.2.k

Emergency Power Upgrade

This is to assess and update the emergency power supply that supports the life safety systems

Building Structure & Interior Projects

Section G.2.l

Escalator Fire Shutter Door Replacement

Replacement of emergency escalator fire doors with new technology driven doors is scheduled for 2005.

Building Structure & Interior Projects

Section G.2.m

Escalator Wells – Replace Curved Plexiglas

There are 32 level 2 & 3 locations where the curved Plexiglas is scheduled for replacement in 2006.

Building Structure & Interior Projects

Section G.2.n.i

Furniture – Kinetic (Airside Hold-room Seating Backfill)

This furniture project will coincide with the expiration of the current airline lease.

Building Structure & Interior Projects

Section G.2.n.ii

Furniture – Refurbish Existing Kinetic Seat Inventory

This furniture replacement project will coincide with the expiration of the current airline lease.

Building Structure & Interior Projects

Section G.2.n.iii

Furniture – Wicker Chair Replacement

This furniture replacement project will coincide with the expiration of the current airline lease.

Building Structure & Interior Projects

Section G.2.o

Jet Bridges, Ground Power & PC Air

Replacement of the current Jet Bridges will include units that contain PC Air and ground power. These units are scheduled across various points in time based upon their remaining estimated life. Airside 4 jet bridge replacements will be accompanied with infrastructure modifications to accommodate the new ground power/PC Air based units.

Unit Count	25	16	25	24	24				
Life In Years	20	20	20	20	20				
Jet Bridge, Ground Power & PC Air System	Jet Bridge, Ground Power & PC Air - Airside 1	Jet Bridge, Ground Power & PC Air - Airside 2	Jet Bridge, Ground Power & PC Air - Airside 3	Jet Bridge, Ground Power & PC Air - Airside 4	A/S 4 Jet Bridge Infrastructure				
Fiscal	Section	Section	Section	Section	Section	Section	Section	Section	Section
Year	1	2	3	4	5	6	7	8	9
2005	8	-	-	-	-	-	-	-	-
2006	-	-	-	-	-	-	-	-	-
2007	-	-	-	-	-	-	-	-	-
2008	17	-	25	-	-	-	-	-	-
2009	-	-	-	-	-	-	-	-	-
2010	-	-	-	24	24	-	-	-	-
2011	-	-	-	-	-	-	-	-	-
2012	-	-	-	-	-	-	-	-	-
2013	-	-	-	-	-	-	-	-	-
2014	-	-	-	-	-	-	-	-	-
2015	-	-	-	-	-	-	-	-	-
2016	-	-	-	-	-	-	-	-	-
2017	-	-	-	-	-	-	-	-	-
2018	-	-	-	-	-	-	-	-	-
2019	-	-	-	-	-	-	-	-	-
2020	-	16	-	-	-	-	-	-	-
2021	-	-	-	-	-	-	-	-	-
2022	-	-	-	-	-	-	-	-	-
2023	-	-	-	-	-	-	-	-	-
2024	-	-	-	-	-	-	-	-	-

Building Structure & Interior Projects

Section G.2.q

Public Restrooms

This is a programmed 20 year replacement of the Airside & Terminal restrooms.

Emergency Response Projects

Section G.3.a

Emergency Response Systems

This schedule addresses the 63 defibrillator units placed throughout the airport with a 7 year life expectancy. Beginning in 2005 and continuing each year, these units will be replaced.

Unit Count	63
Life In Years	7

Emergency Response System	Defibrillators								
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 9
2005	6	-	-	-	-	-	-	-	-
2006	7	-	-	-	-	-	-	-	-
2007	8	-	-	-	-	-	-	-	-
2008	9	-	-	-	-	-	-	-	-
2009	10	-	-	-	-	-	-	-	-
2010	11	-	-	-	-	-	-	-	-
2011	12	-	-	-	-	-	-	-	-
2012	6	-	-	-	-	-	-	-	-
2013	7	-	-	-	-	-	-	-	-
2014	8	-	-	-	-	-	-	-	-
2015	9	-	-	-	-	-	-	-	-
2016	10	-	-	-	-	-	-	-	-
2017	11	-	-	-	-	-	-	-	-
2018	12	-	-	-	-	-	-	-	-
2019	6	-	-	-	-	-	-	-	-
2020	7	-	-	-	-	-	-	-	-
2021	8	-	-	-	-	-	-	-	-
2022	9	-	-	-	-	-	-	-	-
2023	10	-	-	-	-	-	-	-	-
2024	11	-	-	-	-	-	-	-	-
Total									

Emergency Response Projects

Section G.3.b

Fire Pumps (East & West Landside)

20 year scheduled replacement of fire pumps that augment water pressure.

Information Technology

Section G.4.a

Access Control System

This schedule includes the replacement of the new system which has a roll out date of 2005. The replacement includes regular upgrades of software every 3 years and accompanying hardware every 7 years. Electronic components are also regularly scheduled for the purpose of planning capital disbursements; however, they will be replaced at the point of failure.

Unit count	135	740	100	15	1	2	5	4	360	2
Life In Years	10	10	20	7	3	7	5	7	10	7
Access Control System	Controller Panels	Prox Card Readers	Electrical Enclosures	Workstations	Head End Software	Reports Printers	Proxi Card Printers	ID Photo Cameras	Electronic Door Locks	Head End Servers
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 9	Section 10
2005	-	-	-	-	-	-	-	-	10	
2006	-	-	-	-	-	-	-	-	10	
2007	3	10	-	-	-	-	-	-	10	
2008	8	50	-	-	1	2	5	-	25	
2009	8	50	-	-	-	-	-	-	25	
2010	8	50	-	-	-	-	-	-	25	
2011	8	50	-	15	1	-	-	4	25	2
2012	8	50	-	-	-	-	-	-	25	
2013	8	50	-	-	-	-	5	-	25	
2014	8	50	-	-	1	-	-	-	25	
2015	8	50	20	-	-	2	-	-	25	
2016	8	50	-	-	-	-	-	-	25	
2017	3	10	-	-	1	-	-	-	10	
2018	8	50	-	15	-	-	5	4	25	2
2019	8	50	-	-	-	-	-	-	25	
2020	8	50	-	-	1	-	-	-	25	
2021	8	50	-	-	-	-	-	-	25	
2022	8	50	-	-	-	2	-	-	25	
2023	8	50	-	-	1	-	5	-	25	
2024	8	50	-	-	-	-	-	-	25	

Information Technology

Section G.4.b

CCTV System

Camera replacement will carry a year to year allotment for failed units. Date driven replacements such as the head end and digital recorders will carry a 7 year cycle pending no security compliance changes alter the plan.

Unit Count	296	1	7	4	22
Life In Years	7	7	7	7	7

CCTV System Fiscal Year	Cameras Section 1	Head End Section 2	CCTV Workstation Section 3	TV Monitor Section 4	Digital Recorder Section 5	Section 6	Section 7	Section 8	Section 9
2005	15	-	-	-	-	-	-	-	-
2006	20	-	-	-	-	-	-	-	-
2007	25	-	-	-	-	-	-	-	-
2008	30	-	-	-	-	-	-	-	-
2009	30	-	-	-	-	-	-	-	-
2010	30	-	-	-	-	-	-	-	-
2011	30	1	7	4	22	-	-	-	-
2012	30	-	-	-	-	-	-	-	-
2013	30	-	-	-	-	-	-	-	-
2014	30	-	-	-	-	-	-	-	-
2015	30	-	-	-	-	-	-	-	-
2016	30	-	-	-	-	-	-	-	-
2017	30	-	-	-	-	-	-	-	-
2018	30	1	7	4	22	-	-	-	-
2019	30	-	-	-	-	-	-	-	-
2020	30	-	-	-	-	-	-	-	-
2021	30	-	-	-	-	-	-	-	-
2022	30	-	-	-	-	-	-	-	-
2023	30	-	-	-	-	-	-	-	-
2024	30	-	-	-	-	-	-	-	-

Information Technology

Section G.4.c

CUTE (Common Use Terminal Equipment)

CUTE technology carries a 7 year life cycle with a complete upgrade in 2007 and again in 2014. The 2007 upgrade will accommodate the new preferred/common use airline agreements. Infrastructure modifications are necessary in the 2007 upgrade and are included in this schedule.

Unit Count	1	471	471	471	30	1	2	170	471	33	130	200	50
Life In Years	7	7	7	7	7	20	7	7	7	7	7	7	7
CUTE System	CoreCUSS (Hard End)	Workstations	Boarding Pass Printers	Bag Tag Printers	Report Printers	CUTE Expansion - CUSS Infrastructure	Routers	Passport Reader Keyboards	Client Software SITA	BGR's Boarding Gate Readers	Client Software SEATS	CUSS Kiosks	Kiosk Passport
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 9	Section 10	Section 11	Section 12	Section 13
2005	-	-	-	-	-	-	-	-	-	-	-	-	-
2006	-	-	-	-	-	-	-	-	-	-	-	-	-
2007	1	471	471	471	30	1	2	170	471	33	33	200	50
2008	-	-	-	-	-	-	-	-	-	-	-	-	-
2009	-	-	-	-	-	-	-	-	-	-	-	-	-
2010	-	-	-	-	-	-	-	-	-	-	-	-	-
2011	-	-	-	-	-	-	-	-	-	-	-	-	-
2012	-	-	-	-	-	-	-	-	-	-	-	-	-
2013	-	-	-	-	-	-	-	-	-	-	-	-	-
2014	1	471	471	471	30	-	2	170	471	33	33	200	50
2015	-	-	-	-	-	-	-	-	-	-	-	-	-
2016	-	-	-	-	-	-	-	-	-	-	-	-	-
2017	-	-	-	-	-	-	-	-	-	-	-	-	-
2018	-	-	-	-	-	-	-	-	-	-	-	-	-
2019	-	-	-	-	-	-	-	-	-	-	-	-	-
2020	-	-	-	-	-	-	-	-	-	-	-	-	-
2021	1	471	471	471	30	-	2	170	471	33	33	200	50
2022	-	-	-	-	-	-	-	-	-	-	-	-	-
2023	-	-	-	-	-	-	-	-	-	-	-	-	-
2024	-	-	-	-	-	-	-	-	-	-	-	-	-

Information Technology

Section G.4.d

Fire Alarm System

Two main replacements drive the Fire Alarm System replacement plan. The annual panel replacements due to anticipated failures and a Hyatt Hotel head end upgrade in 2009.

Unit Count	1	43	1	1
Life In Years	10	15	10	15

Fire Alarm System	EST3 Head End	Processor Panels	Fireworks Workstation	Hyatt Upgrade to EST3 from FCC
Fiscal Year	Section 1	Section 2	Section 3	Section 4
2005	-	3	1	-
2006	-	3	-	-
2007	-	3	-	-
2008	-	3	-	-
2009	-	3	-	1
2010	-	3	-	-
2011	1	3	-	-
2012	-	3	-	-
2013	-	3	-	-
2014	-	3	-	-
2015	-	3	-	-
2016	-	3	-	-
2017	-	3	-	-
2018	-	3	-	-
2019	-	3	1	-
2020	-	3	-	-
2021	1	3	-	-
2022	-	3	-	-
2023	-	3	-	-
2024	-	3	-	1

Fire Alarm System	Section 5	Section 6	Section 7	Section 8	Section 9
2005	-	-	-	-	-
2006	-	-	-	-	-
2007	-	-	-	-	-
2008	-	-	-	-	-
2009	-	-	-	-	-
2010	-	-	-	-	-
2011	-	-	-	-	-
2012	-	-	-	-	-
2013	-	-	-	-	-
2014	-	-	-	-	-
2015	-	-	-	-	-
2016	-	-	-	-	-
2017	-	-	-	-	-
2018	-	-	-	-	-
2019	-	-	-	-	-
2020	-	-	-	-	-
2021	-	-	-	-	-
2022	-	-	-	-	-
2023	-	-	-	-	-
2024	-	-	-	-	-

Information Technology

Section G.4.e

Graphic & Design Equipment

These are the technology based systems that produce the signs, plan drawings, tenant exhibits, wall size photos etc. for the Authority. Their replacement rides a 5 and 7 year time line depending upon the particular components. Servers for this application are included in the IT Hardware Plan.

Unit Count	5	6	5	2	1	3	1	1	1	3
Life In Years	5	5	5	7	7	10	7	10	3	5
Design Equipment System	Workstations	Workstations (High End)	Printers	Plotters	Copiers - Wide Feed System -QCE	Cutters	Large Format Plotters	Engraver	Software	Servers
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 9	Section 10
2005	-	-	-	-	-	-	-	-	-	N/A
2006	5	6	5	2	1	3	1	1	1	N/A
2007	-	-	-	-	-	-	-	-	-	N/A
2008	-	-	-	-	-	-	-	-	-	N/A
2009	-	-	-	-	-	-	-	-	-	N/A
2010	-	-	-	-	-	-	-	-	-	N/A
2011	5	6	5	2	-	-	-	-	1	N/A
2012	-	-	-	-	-	-	-	-	-	N/A
2013	-	-	-	-	1	3	1	1	-	N/A
2014	-	-	-	-	-	-	-	-	-	N/A
2015	-	-	-	-	-	-	-	-	-	N/A
2016	5	6	5	2	-	-	-	-	1	N/A
2017	-	-	-	-	-	-	-	-	-	N/A
2018	-	-	-	-	-	-	-	-	-	N/A
2019	-	-	-	-	-	-	-	-	-	N/A
2020	-	-	-	-	1	3	1	1	-	N/A
2021	5	6	5	2	-	-	-	-	1	N/A
2022	-	-	-	-	-	-	-	-	-	N/A
2023	-	-	-	-	-	-	-	-	-	N/A
2024	-	-	-	-	-	-	-	-	-	N/A

Information Technology

Section G.4.f

GOAA - Network

This schedule represents the GOAA network equipment necessary to operate the various applications. Located in the GOAA IT processing room in the North Terminal, second level and networked throughout the airport.

Unit Count	6	6	95	8	140	200	6
Life In Years	10	6	5	3	3	3	4
IT Network & Network Infrastructure System	Optical Transport - Complete Set	Core Switches	Edge Switches	Network Security Devices	Power & Environmental Monitors	Wireless Access Points	Optical Transport Cards (1 time)
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 10	Section 11
2005	-	-	-	-	32	-	
2006	-	-	20	-	46	-	
2007	-	-	20	-	47	200	-
2008	-	-	15	8	47	-	6
2009	-	6	20	-	46	-	-
2010	-	-	20	-	47	200	-
2011	-	-	20	8	47	-	-
2012	-	-	20	-	46	-	-
2013	6	-	15	-	47	200	-
2014	-	-	20	8	47	-	-
2015	-	6	20	-	46	-	-
2016	-	-	20	-	47	200	-
2017	-	-	20	8	47	-	-
2018	-	-	15	-	46	-	-
2019	-	-	20	-	47	200	-
2020	-	-	20	8	47	-	-
2021	-	6	20	-	46	-	-
2022	-	-	20	-	47	200	-
2023	6	-	15	8	47	-	-
2024	-	-	20	-	46	-	-

Information Technology

Section G.4.g

GOAA Servers & Workstations

Hardware such as servers, workstations, printers and tape libraries will support the above section replacement line for network and software. It too will support the GOAA administrative effort and that of the tenants, airlines and concessions that require integrated processing. Located in the GOAA IT processing room in the North Terminal, second level and networked throughout the airport.

Unit Count	5	3	34	475	200	1	1	2	1
Life In Years	5	5	6	4	4	5	7	10	5
IT Non Network - Hardware Only System	Financial System Servers	E-Mail Servers	Office Product Servers	Workstations	Printers	Large Tape Library	Small Tape Library	Liebert System	Integration Hardware
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 9
2005	-	-	-	120	50	-	-	1	-
2006	-	2	10	115	50	-	-	-	-
2007	5	-	6	120	50	-	1	-	1
2008	-	1	12	120	50	1	-	-	-
2009	-	-	10	120	50	-	-	-	-
2010	-	-	-	120	50	-	-	-	-
2011	-	2	10	115	50	-	-	-	-
2012	5	-	6	120	50	-	-	1	1
2013	-	1	12	120	50	1	-	-	-
2014	-	-	10	120	50	-	1	-	-
2015	-	-	-	115	50	-	-	1	-
2016	-	2	10	120	50	-	-	-	-
2017	5	-	6	120	50	-	-	-	1
2018	-	1	12	120	50	1	-	-	-
2019	-	-	10	115	50	-	-	-	-
2020	-	-	-	120	50	-	-	-	-
2021	-	2	10	120	50	-	1	-	-
2022	5	-	6	120	50	-	-	1	1
2023	-	1	12	115	50	1	-	-	-
2024	-	-	10	120	50	-	-	-	-

Information Technology

Section G.4.h

Irrigation Systems

There are over 3,000 watering zones being serviced by over 30,000 sprinklers within a multi mile network of pipes and pumps that are controlled by a head end computer system. Replacement schedules are driven by anticipated points of failure for mechanical driven components and technology driven elements are scheduled around planned upgrades.

Unit Count	1	14	150	2	2	5	30	30	1	3,140	30,000
Life In Years	7	5	10	5	20	15	10	3	7	10	5
Irrigation System	Head end Workstation	Cluster Control Units	Controllers	Whether Station	Primary Pumps	Backup Pumps	Master Valves	Hydraulic - 2 landings	Software	Valves (Included in Maint. Contract	Sprinkler Heads (Included in Maint. Contract
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 9	Section 10	Section 11
2005	1	3	15	-	1	1	3	10	-	-	-
2006	-	3	15	-	-	-	3	10	1	-	-
2007	-	3	15	1	1	1	3	10	-	-	-
2008	-	3	15	-	-	-	3	10	-	-	-
2009	-	2	15	1	-	1	3	10	-	-	-
2010	-	3	15	-	-	-	3	10	-	-	-
2011	-	3	15	-	-	1	3	10	-	-	-
2012	1	3	15	1	-	-	3	10	-	-	-
2013	-	3	15	-	-	1	3	10	1	-	-
2014	-	2	15	1	-	-	3	10	-	-	-
2015	-	3	15	-	-	-	3	10	-	-	-
2016	-	3	15	-	-	-	3	10	-	-	-
2017	-	3	15	1	-	-	3	10	-	-	-
2018	-	3	15	-	-	-	3	10	-	-	-
2019	1	2	15	1	-	-	3	10	-	-	-
2020	-	3	15	-	-	1	3	10	1	-	-
2021	-	3	15	-	-	-	3	10	-	-	-
2022	-	3	15	1	-	-	3	10	-	-	-
2023	-	3	15	-	-	-	3	10	-	-	-
2024	-	2	15	1	-	-	3	10	-	-	-

Information Technology

Section G.4.i

Lightning Detection

GOAA provides a service that predicts, detects, locates and measures lightning strikes within a 12 mile radius of the center point of the airport. It is a subscription service that uses proprietary software and runs on GOAA owned hardware. The replacement schedule supports both hardware and software replacements. Located in the GOAA IT processing room in the North Terminal, second level and networked throughout the airport.

Unit Count	20	1	2	2	6
Life In Years	15	15	15	10	3
Lightning Detection System	RAD'S with Connections	Head End	Signal Distribution Equipment	Field Mills	Modems

Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 9
2005	-	-	-	-	-	-	-	-	-
2006	1	1	2	1	6	-	-	-	-
2007	1	-	-	-	-	-	-	-	-
2008	1	-	-	-	-	-	-	-	-
2009	1	-	-	-	6	-	-	-	-
2010	2	-	-	-	-	-	-	-	-
2011	2	-	-	-	-	-	-	-	-
2012	2	-	-	1	6	-	-	-	-
2013	2	-	-	-	-	-	-	-	-
2014	2	-	-	-	-	-	-	-	-
2015	2	-	-	-	6	-	-	-	-
2016	2	-	-	1	-	-	-	-	-
2017	2	-	-	-	-	-	-	-	-
2018	-	-	-	-	6	-	-	-	-
2019	-	-	-	-	-	-	-	-	-
2020	1	1	2	-	-	-	-	-	-
2021	1	-	-	-	6	-	-	-	-
2022	1	-	-	1	-	-	-	-	-
2023	1	-	-	-	-	-	-	-	-
2024	2	-	-	-	6	-	-	-	-

Information Technology

Section G.4.j

MUFIDS

The flight information displays are located throughout the terminal and airsides. These displays are networked to the individual airlines and the system receives the feed and displays the information on the screens. Replacement schedules support the updates to software every 5 years, while displays and servers carry a 7 year life. Located in the GOAA IT processing room in the North Terminal, second level and networked throughout the airport.

Unit Count	2	12	60	151	36	62	116	82	1	9	4	8
Life In Years	7	7	7	7	7	7	7	7	5	7	25	25
MUFIDS System	Servers	PCs	LCD Boards -Replaced With Monitors	LED's	Plasma Screens Replaced With TFT's	Motivation	Ferro graph	Philips	Software	Sony	Monitor Housings - Terminal	Monitor Housings - Airside
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 9	Section 10	Section 11	Section 12
2005	-	-	-	-	-	-	-	-	-	9	-	-
2006	-	-	10	-	-	-	-	82	-	-	-	-
2007	-	-	10	-	-	-	-	-	-	-	-	-
2008	2	12	10	151	36	-	116	-	-	-	-	-
2009	-	-	10	-	-	-	-	-	1	-	-	-
2010	-	-	10	-	-	62	-	-	-	-	-	-
2011	-	-	10	-	-	-	-	-	-	-	-	-
2012	-	-	-	-	-	-	-	-	-	9	-	-
2013	-	-	10	-	-	-	-	82	-	-	-	-
2014	-	-	10	-	-	-	-	-	1	-	-	-
2015	2	12	10	151	36	-	116	-	-	-	-	-
2016	-	-	10	-	-	-	-	-	-	-	-	-
2017	-	-	10	-	-	62	-	-	-	-	-	-
2018	-	-	10	-	-	-	-	-	-	-	-	-
2019	-	-	-	-	-	-	-	-	1	9	-	-
2020	-	-	10	-	-	-	-	82	-	-	-	-
2021	-	-	10	-	-	-	-	-	-	-	-	-
2022	2	12	10	151	36	-	116	-	-	-	-	-
2023	-	-	10	-	-	-	-	-	-	-		
2024	-	-	10	-	-	62	-	-	1	-		

Information Technology

Section G.4.k

MUFIDS – East/West Atrium Replacement

This represents replacement of the West end LCD system anticipated at 1 million dollars and the East end MUFIDS replacement and relocation to accommodate the planned East Atrium expansion.

Information Technology

Section G.4.I

Noise Monitoring System

Noise monitors (13) located in the neighboring communities of OIA and OEA transmit sound levels that the over flying aircraft make and uplink this information to a head end system that records and reports this information along with various complaints that are called in. With the exception of minor replacements, this system is not scheduled for replacement till 2017.

Unit Count	13	1	2	1
Life In Years	15	15	7	7

Noise Monitoring System	Monitors	Head End	Modems	Printer					
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 9
2005	-	-	-	-	-	-	-	-	-
2006	-	-	-	-	-	-	-	-	-
2007	-	-	-	-	-	-	-	-	-
2008	-	-	2	1	-	-	-	-	-
2009	-	-	-	-	-	-	-	-	-
2010	-	-	-	-	-	-	-	-	-
2011	-	-	-	-	-	-	-	-	-
2012	-	-	-	-	-	-	-	-	-
2013	-	-	2	1	-	-	-	-	-
2014	-	-	-	-	-	-	-	-	-
2015	-	-	-	-	-	-	-	-	-
2016	-	-	-	-	-	-	-	-	-
2017	13	1	-	-	-	-	-	-	-
2018	-	-	2	1	-	-	-	-	-
2019	-	-	-	-	-	-	-	-	-
2020	-	-	-	-	-	-	-	-	-
2021	-	-	-	-	-	-	-	-	-
2022	-	-	-	-	-	-	-	-	-
2023	-	-	2	1	-	-	-	-	-
2024	-	-	-	-	-	-	-	-	-

Information Technology

Section G.4.m

Paging System

This operation supports terminal and airside voice communications including the speaker systems used to carry these messages.

Unit Count					
Life In Years					
Parking System	Paging Stations	Workstations	Head End	Airside Controller	Speakers
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5
2005	-	-	-	3	1500
2006	-	-	-	-	3000
2007	-	-	-	-	3000
2008	-	-	-	-	-
2009	-	-	-	-	-
2010	-	-	1	-	-
2011	-	7	-	1	-
2012	-	-	-	-	-
2013	-	-	-	-	-
2014	150	-	-	-	-
2015	-	-	-	3	-
2016	-	-	-	-	-
2017	-	-	-	-	1500
2018	-	-	-	-	-
2019	-	7	-	-	-
2020	-	-	1	-	1500
2021	-	-	-	1	3000
2022	-	-	-	-	3000
2023	-	-	-	-	-
2024	150	-	-	-	-

Information Technology

Section G.4.n
Parking System

The parking operation at OIA is a critical revenue producer and merits continuous replacement of key components such as vehicle sensors, ticket dispensers, cashier terminals, cameras etc. All of these components are networked to the head end system and carry a life cycle of 7 to 15 years. Located in the first level parking office at the North Terminal and networked throughout the airport.

Parking System	Servers	Workstations	Printers	Ticket Spitters	Gates	Cashier Terminals	Cameras	Hand Held Units	Software	Bar Code Readers	Magnetic Loops
Unit Count	2	6	4	22	88	29	41	11	1	25	274
Life In Years	7	7	7	12	12	12	10	10	7	15	10
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 8	Section 9	Section 10
2005	-	-	-	-	-	-	-	5	-	-	27
2006	2	6	4	-	-	-	10	-	1	-	27
2007	-	-	-	-	-	-	-	-	-	-	27
2008	-	-	-	-	-	-	-	-	-	-	27
2009	-	-	-	-	-	-	-	-	-	25	27
2010	-	-	-	-	88	-	-	-	-	-	27
2011	-	-	-	-	-	-	-	-	-	-	27
2012	-	-	-	-	-	-	-	-	1	-	27
2013	2	6	4	-	-	-	-	-	-	-	27
2014	-	-	-	-	-	-	-	5	-	-	27
2015	-	-	-	22	-	29	10	-	-	-	27
2016	-	-	-	-	-	-	-	-	-	-	27
2017	-	-	-	-	-	-	-	-	-	-	27
2018	-	-	-	-	-	-	-	-	-	-	27
2019	-	-	-	-	-	-	-	-	1	-	27
2020	2	6	4	-	-	-	-	-	-	-	27
2021	-	-	-	-	-	-	-	-	-	-	27
2022	-	-	-	-	88	-	-	-	-	-	27
2023	-	-	-	-	-	-	-	-	-	-	27
2024	-	-	-	-	-	-	-	-	-	25	27

Information Technology

Section G.4.o

Radio Communications

The replacement schedule for radios includes airfield and emergency vehicle radios as well as over 500 hand held units. Most of these units are changed out on a regular basis with a portion planned for each year.

Unit Count	4	90	45	390	169
Life In Years	15	10	15	15	15

Radio Communications System	Communications Consoles	Airfield Radios	Emergency Vehicle Radios	Hand Held Units	Hand Held Units (digital)				
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 9
2005	n/a	9	-	-	-	-	-	-	-
2006	n/a	9	-	-	-	-	-	-	-
2007	n/a	9	-	-	-	-	-	-	-
2008	n/a	9	-	-	-	-	-	-	-
2009	n/a	9	-	39	16	-	-	-	-
2010	n/a	9	-	39	16	-	-	-	-
2011	n/a	9	-	39	16	-	-	-	-
2012	n/a	9	-	39	16	-	-	-	-
2013	n/a	9	-	39	16	-	-	-	-
2014	n/a	9	45	39	16	-	-	-	-
2015	n/a	9	-	39	16	-	-	-	-
2016	n/a	9	-	39	16	-	-	-	-
2017	n/a	9	-	39	16	-	-	-	-
2018	n/a	9	-	39	16	-	-	-	-
2019	n/a	9	-	-	-	-	-	-	-
2020	n/a	9	-	-	-	-	-	-	-
2021	n/a	9	-	-	-	-	-	-	-
2022	n/a	9	-	-	-	-	-	-	-
2023	n/a	9	-	-	-	-	-	-	-
2024	n/a	9	-	39	16	-	-	-	-

Information Technology

Section G.4.p
Telecommunications

The telecommunication effort at OIA mirrors a small phone company. The main switch supports voice mail and voice communications. Over 3000 handsets operate in this environment supplying service to GOAA, its tenants, airlines and concessions. The fees for these services are administrated via a telecom specific billing system. Located in the GOAA IT processing room in the North Terminal, second level and networked throughout the airport.

Unit Count	12	1	4	3000	1	1	13	8	1	1	1	1

Telecommunications System	VOIP	Billing System	PBX Remote Shelf	Digital Handsets	Server	Software Upgrades	Batteries	Multiplexers	Voice Mail System	Main Switch Upgrade Phase 1	Main Switch Upgrade Phase 2	Main Switch Upgrade Phase 3
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 9	Section 10	Section 11	Section 12
2005	1	-	-	200	1	1	2	2	2	-		
2006	1	1	-	200	-	-	2	-	-	1		
2007	1	-	-	200	-	1	2	2	2	-	1	
2008	-	-	1	200	-	-	2	-	-	-		1
2009	-	-	-	200	-	1	2	2	2	-		
2010	-	-	-	200	1	-	2	-	-	-		
2011	-	-	-	200	-	1	1	2	2	-		
2012	-	-	1	200	-	-	2	2	2	-		
2013	-	1	-	200	-	1	2	-	-	-		
2014	-	-	-	200	-	-	2	2	2	-		
2015	-	-	-	200	1	1	2	-	-	-		
2016	-	-	1	200	-	-	2	2	2	1		
2017	-	-	-	200	-	1	2	-	-	-	1	
2018	-	-	-	200	-	-	1	2	2	-		1
2019	-	-	1	200	-	1	2	2	2	-		
2020	-	1	-	200	1	-	2	-	-	-		
2021	-	-	-	200	-	1	2	2	2	-		
2022	-	-	-	200	-	-	2	-	-	-		
2023	-	-	1	200	-	1	2	2	2	-		
2024/	-	-	-	200	-	-	2	-	-	-		

Information Technology

Section G.4.q
GOAA - Software
Integration software to accommodate the common and preferred uses of Authority tenants and concessions will drive much of this schedule. Also included here is the replacement of financial application software needed to support the GOAA administrative needs.

Unit Count	1	1	1	1
Life In Years	3	3	3	3
IT Network & Network Infrastructure System	Client Software	Server Operating System & Tools	Financial Applications	Integration Software
Fiscal Year	Section 1	Section 2	Section 3	Section 4
2005				
2006	1	2	1	
2007				1
2008				
2009	1	2	1	
2010				
2011				
2012	1	2	1	1
2013				
2014				
2015	1	2	1	
2016				
2017				1
2018	1	2	1	
2019				
2020				
2021	1	2	1	
2022				1
2023				
2024	1	2	1	

Miscellaneous Projects

Section G.5.a
Holiday Decorations
In addition to the various hanging wall and floor decorations that appear throughout the airport during the holiday season, the 40' trees have a replacement schedule over 3 years (2006-2008).

Passenger Movement

Section G.6.a
AGT – People Movers
The people mover train cars carry a 12 year life cycle. During 2006 and 2007 the cars servicing Airside 4 are scheduled for replacement. Also scheduled is the planned replacement to Station Doors to the Airside 2 train, power generators and other central control equipment. The shuttle cabinets for Airsides 1 & 3 are planned for a 2011 change out.

Passenger Movement

Section G.6.d

AGT – Running Surfaces

There are 8 running surfaces (2 per Airside) servicing the AGT operation at OIA. Each running surface has a 25 year life and a 3.5 million dollar replacement/refurbishment cost. Scheduled for 2010 is the Airsides 1 & 3 running surface renovations.

Unit Count	24	4	4	8	8	8	192	1	8	
Life In Years	12	50	25	25	25	25	12	25	25	
AGT System	Cars	Guide way - Structural Steel	Power Generators (1 Meg)	Power Distribution (switchgear & breakers)	Shuttle Cabinets	Guide way Running Surface	Station Doors	Central Control Equipment	Power & Signal Rails	
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 9	Section 10
2005	-	-	-	-	-	-	-	-	-	-
2006	3	-	-	2	-	-	48	-	-	-
2007	3	-	2	-	-	-	96	1	-	-
2008	-	-	-	-	-	-	-	-	-	-
2009	-	-	-	-	-	-	-	-	-	-
2010	-	-	-	-	-	-	-	-	-	-
2011	-	-	-	-	4	4	48	-	-	-
2012	-	-	-	-	-	-	-	-	-	-
2013	-	-	-	-	-	-	-	-	-	-
2014	-	-	-	-	-	-	-	-	-	-
2015	-	-	-	-	-	-	-	-	-	-
2016	12	-	-	-	-	-	-	-	-	-
2017	6	-	-	-	-	-	48	-	-	-
2018	-	-	-	-	-	-	96	-	4	-
2019	-	-	1	-	-	-	-	-	-	-
2020	-	-	-	-	-	-	-	-	-	-
2021	-	-	-	2	2	2	48	-	-	-
2022	-	-	-	-	-	-	-	-	-	-
2023	3	-	-	4	-	-	-	-	-	-
2024	3	-	-	-	-	-	-	-	-	-
	-	-	-	-	-	-	-	-	-	-

Passenger Movement

Section G.6.b

Elevators

There are approximately 110 elevators serving OIA and they carry a 20 year life. Vertical circulation is greatly improved when the older units are replaced with the newer traction models.

Unit Count	4	4	16	12	27		12	1	11	23
Life In Years	20	20	20	20	20	20	20	20	20	20

Elevator System	Geared - 9 landings	Geared - 8 landings	Geared - 7 landings	Geared - 4 landings	Geared - 3 landings	Geared - 2 landings	Gearless - 11 landings	Hydraulic - 4 landings	Hydraulic - 3 landings	Hydraulic - 2 landings
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 9	Section 10
2005	-	-	-	4	14	-	-	-	1	2
2006	-	-	-	-	-	-	-	-	-	-
2007	-	-	-	-	-	-	-	-	-	1
2008	-	-	-	-	-	-	-	-	-	-
2009	-	-	-	-	-	-	-	-	-	-
2010	-	-	-	-	-	-	-	-	-	-
2011	-	-	-	-	13	-	-	-	4	4
2012	-	-	-	-	-	-	8	-	1	3
2013	4	4	-	-	-	-	-	-	2	-
2014	-	-	-	-	-	-	-	-	-	-
2015	-	-	-	-	-	-	-	-	-	-
2016	-	-	-	-	-	-	-	-	-	-
2017	-	-	-	-	-	-	-	-	-	-
2018	-	-	-	-	-	-	-	-	-	-
2019	-	-	-	-	-	-	4	-	-	-
2020	-	-	-	-	-	-	-	1	-	2
2021	-	-	-	-	-	-	-	-	1	6
2022	-	-	-	-	-	-	-	-	-	-
2023	-	-	-	-	-	-	-	-	2	-
2024	-	-	16	-	-	-	-	-	-	4

Passenger Movement

Section G.6.c

Escalator & Moving Walkways

Approximately 86 escalators and moving walkways service the main terminal. Like the elevators, a 20 year life cycle drives the replacement schedule.

Unit Count	62	4	4	8	8	1	5		
Life In Years	20	20	20	20	20	20	5		
Escalator & Walkway System	Escalator - Single Drive	Escalator - Multi-drive 2 lvl	Escalator - Multi-drive 3 lvl	Moving Walkway - Tunnels	Moving Walkway - Terminals	Wheel Chair Lift	Workstations		
Fiscal Year	Section 1	Section 2	Section 3	Section 4	Section 5	Section 6	Section 7	Section 8	Section 9
2005	-	-	-	-	-	-	-	-	-
2006	-	-	-	-	-	-	-	-	-
2007	2	-	-	-	-	-	-	-	-
2008	-	-	-	-	-	-	-	-	-
2009	-	-	-	-	-	-	5	-	-
2010	-	-	-	-	-	-	-	-	-
2011	19	4	4	8	8	-	-	-	-
2012	2	-	-	-	-	-	-	-	-
2013	-	-	-	-	-	1	-	-	-
2014	-	-	-	-	-	-	5	-	-
2015	-	-	-	-	-	-	-	-	-
2016	-	-	-	-	-	-	-	-	-
2017	12	-	-	-	-	-	-	-	-
2018	-	-	-	-	-	-	-	-	-
2019	20	-	-	-	-	-	5	-	-
2020	-	-	-	-	-	-	-	-	-
2021	3	-	-	-	-	-	-	-	-
2022	4	-	-	-	-	-	-	-	-
2023	-	-	-	-	-	-	-	-	-
2024	-	-	-	-	-	-	5	-	-

Signage

Section G.7.a

Terminal Signage

The passenger terminal contains 395 signs that range in cost from $4,500 to $25,000 with a 20 year life. However, many sign replacements are scheduled around information requirements incorporated in the signage programs.

Airfield

Section 21.a.i

Runways & Taxiway Rehabilitation – Taxiways E & F w/connectors

This rehabilitation is the removal and replacement of asphalt and concrete in accordance with the Airport Pavement Management Plan.

Airfield

Section 21.a.ii

Runways & Taxiway Rehabilitation – Taxiway E5 widening and E & F Tapers

This rehabilitation is the removal and replacement of asphalt and concrete in accordance with the Airport Pavement Management Plan.

Airfield

Section 21.a.iii

Runways & Taxiway Rehabilitation – 17R & 35L & Taxiway Joint and Slab Replacements

This rehabilitation is the removal and replacement of asphalt and concrete in accordance with the Airport.Pavement Management Plan.

Airfield

Section 21.a.iv

Runways & Taxiway Rehabilitation – Taxiway B1, B4, J, L, Z

This rehabilitation is the removal and replacement of asphalt and concrete in accordance with the Airport Pavement Management Plan.

Airfield

Section 21.a.v

Runways & Taxiway Rehabilitation – Runway 36L

This rehabilitation is the removal and replacement of asphalt and concrete in accordance with the Airport Pavement Management Plan.

Airfield

Section 21.a.vi

Runways & Taxiway Rehabilitation – Runway 36R

This rehabilitation is the removal and replacement of asphalt and concrete in accordance with the Airport Pavement Management Plan.

Airfield

Section 21.a.vii

Runways & Taxiway Rehabilitation – Taxiways A, B2, B6, E, E4, E5, F, G, H, H1and Y

This rehabilitation is the removal and replacement of asphalt and concrete in accordance with the Airport Pavement Management Plan.

Airfield

Section 21.a.viii

Runways & Taxiway Rehabilitation – Runway 36R ALSF-II

This rehabilitation is the removal and replacement of asphalt and concrete in accordance with the Airport Pavement Management Plan.

Airfield

Section 21.b.i

Apron Rehabilitation - Nose dock

This rehabilitation is the removal and replacement of asphalt and concrete in accordance with the Airport Pavement Management Plan.

Airfield

Section 21.b.ii

Apron Rehabilitation – West Ramp (partial: south)
This rehabilitation is the removal and replacement of asphalt and concrete in accordance with the Airport Pavement Management Plan.

Airfield

Section 21.b.iii
Apron Rehabilitation – NWTSA (partial: west)
This rehabilitation is the removal and replacement of asphalt and concrete in accordance with the Airport Pavement Management Plan.

Airfield

Section 21.b.iv
Apron Rehabilitation – West Ramp (partial: north)
This rehabilitation is the removal and replacement of asphalt and concrete in accordance with the Airport Pavement Management Plan.

Airfield

Section 21.b.v
Apron Rehabilitation – Airsides 1 & 3
This rehabilitation is the removal and replacement of asphalt and concrete in accordance with the Airport Pavement Management Plan.

Airfield

Section 21.b.vi
Apron Rehabilitation – West Ramp (partial)
This rehabilitation is the removal and replacement of asphalt and concrete in accordance with the Airport Pavement Management Plan.

Airfield

Section 21.b.vii
Apron Rehabilitation – Alert Area
This rehabilitation is the removal and replacement of asphalt and concrete in accordance with the Airport Pavement Management Plan.

Airfield

Section 21.c
Airfield Lighting Vault Improvements
This represents an ongoing program to continuously upgrade and replace the airfield lighting vault facilities. The anticipated cost is $550,000 per year.

Airfield

Section 21.d
Replace Airfield Signs – 18R & 18L
These signs average about $2,500 per sign and are replaced for usage and technological reasons.

Airfield

Section 21.e
Taxiway Centerline Fixture Replacement
There are 1677 centerline light fixtures (908 runway and 769 taxiway) that are programmed for replacement.

Airfield

Section 21.f
Wind Cones (6 each)
These navigation aids are scheduled for replacement in 2005.

Airfield

Section 21.g
ARFF Facility – Center Field
Refurbishment of the interior of this facility will involve kitchen and living quarter improvements that have reached their useful life by 2009.

Airfield

Section 21.h
ARFF Vehicle Replacement
This replacement represents a front line crash truck for 1 million dollars and a pump vehicle for $300,000.

Airfield

Section 21.i
Airfield Marking, Lighting & Signage
In addition to the above mentioned specific airfield replacements, other lights, signs and markings exceed 10 million dollars over the next 10 years.

Roadway & Parking

Section C.1
Repave Entrance & Exit Roads and Loop Road
This program is the removal and replacement of asphalt and concrete for the above mentioned roads.

Roadway & Parking

Section C.2
Repave South Access Road
This program is the removal and replacement of asphalt and concrete for the above mentioned road.

Roadway & Parking

Section C.3
Repave Heintzelman Boulevard
This program is the removal and replacement of asphalt and concrete for the above mentioned road.

Roadway & Parking

Section C.4
Repave Cargo Road
This program is the removal and replacement of asphalt and concrete for the above mentioned road.

Roadway & Parking

Section C.5
Repave Tradeport Drive
This program is the removal and replacement of asphalt and concrete for the above mentioned road.

Roadway & Parking

Section C.6

Repave Bear Road
This program is the removal and replacement of asphalt and concrete for the above mentioned road.

Roadway & Parking

Section C.7
Repave Other Roadways
This program is the removal and replacement of asphalt and concrete for the above mentioned road.

Roadway & Parking

Section C.8
Roadway Signage
The 55 road signs ranging in replacement cost of $5,000 to $421,000 and 55 housing structures ranging in cost from $5,000 to $40,000 are scheduled to be replaced in part in 2007, 2009 and 2011.

Roadway & Parking

Section C.9
Repave Enplane & Deplane Drives
This program is the removal and replacement of asphalt and concrete for the above mentioned roads.

Roadway & Parking

Section C.10
Repave Parking Lots
This program is the removal and replacement of asphalt and concrete for the above mentioned area.

Roadway & Parking

Section C.11
Pavement Rehabilitation – Bear Road, Casa Verde, HBJ Parking Lot and Secure Roads
This program is the removal and replacement of asphalt and concrete for the above mentioned areas.

Roadway & Parking

Section C.12
Replace Asphalt with Concrete – Commercial Lane A & B sides
This program is the removal and replacement of asphalt and concrete for the above mentioned roads.

Roadway & Parking

Section C.13
Re-stripe Garages & Satellite Facilities
This is the planned striping of parking spaces after fading from use.

Roadway & Parking

Section C.14
Repave Taxi/Bus-Hold Facility, B Side
This program is the removal and replacement of asphalt and concrete for the above mentioned areas.

Roadway & Parking

Section C.15
Garage Structural Repairs – A & B Sides
This is an ongoing program for moderate structure work. This annual repair estimate is $250,000.

Other

Section 15.a
HVAC – Re-duct CEF Building
This represents the CEF building replacement of all duct work

Other

Section 15.b
HBJ Building Structure
This is the establishment of a water & sewage connections to the city services.

Other

Section 15.c
Loop Road Structural Bridge Rehab
This is a planned 20 year restoration of the road surface.

Other

Section 15.d
Dredging Retention Ponds
Periodic servicing as needed of the retention ponds.

Other

Section 15.e
Vehicles – Business/Fleet
This item is a programmed replacement of passenger vehicles and service equipment.

Other

Section 15.f
Replace/Expand Bus Fleet
This item is a programmed replacement of all shuttle busses.

Other

Section 15.g
Building Exterior Metal – Corrosion Control
The airport wide railing and gutter work is addressed here.

Other

Section 15.h.i
Building – Lightning Protection
Currently there are 65 structures at OIA scheduled for Lightning Protection upgrades over the next 20 years. This renewal carries a 20 replacement life at a cost of approximately $5,200 per structure. The anticipated CIP cost is approximately $100,000 through 2013.

Other

Section 15.i.ii
Building Roof Repair
Currently there are 87 roof structures covering 3.7 million square feet at OIA scheduled for refurbishment over the next 20 years. This renewal carries a 20 replacement life at a cost of approximately $3.00 per structure. The anticipated CIP cost is approximately $8.7 million through 2013.

Other

Section 15.i.iii
Building Boiler Components
The only scheduled Boiler replacement is a 2014 change out costing $200,000.

Other

Section 15.i.iv
Building Chillers & Controller
Twenty seven chillers service the North Terminal and four airsides. The replacement life is 15 years at an average cost of $750,000 per unit. Scheduled replacement dates are 2007, 2008 and 2013.

Other

Section 15.i.v
Building Air Conditioners
Currently 224 air conditioning units servicing 70 buildings at OIA are scheduled for replacement over the next 20 years. Anticipated replacements through 2013 are estimated to cost $1.9 million.