ORDINANCE No. 2015-34

AN ORDINANCE OF THE MAYOR AND THE CITY COUNCIL OF THE CITY OF DORAL, FLORIDA, ADOPTING THE 2015 ANNUAL UPDATE TO THE CAPITAL IMPROVEMENTS ELEMENT OF THE COMPREHENSIVE PLAN CONSISTENT WITH SECTION 163 FLORIDA STATUTES; PROVIDING FOR TRANSMITTAL OF THE CAPITAL IMPROVEMENTS SCHEDULE TO THE FLORIDA DEPARTMENT OF OPPORTUNITY; PROVIDING FOR CONFLICTS; PROVIDING FOR SEVERABILITY; AND PROVIDING FOR AN EFFECTIVE DATE

WHEREAS, local governments are annually required to update the Capital Improvements Element (CIE) in the Comprehensive Plan in order to ensure that the required level of service standard for the public facilities listed in Section 163.3180, Florida Statutes are achieved and maintained over the planning period; and

WHEREAS, in December 2011, the Capital Improvement Planning Working Group was formed to establish the City's Capital Improvement Program (CIP);

WHEREAS, the Planning and Zoning Department is simultaneously submitting the 5-Year Capital Improvement Element (CIE) update which is the method for tying the CIP into the City of Doral Comprehensive Plan and which ensures that concurrency requirements set forth by the Comprehensive Plan are being met by projects contemplated in the CIP; and

WHEREAS, the City Council hereby finds that the adoption of this ordinance is in the best interest and welfare of the residents of the City.

NOW, THEREFORE, BE IT ORDAINED BY THE CITY COUNCIL OF THE CITY OF DORAL AS FOLLOWS:

Section 1. Recitals. The recitals set forth above are true and correct and incorporated herein by this reference.

Section 2. Adoption of the Capital Improvements Element Update. The City Council hereby adopts the "2015 Annual Update to the Capital Improvements Element" of the City's Comprehensive Development Master Plan, which is attached to this Ordinance as Exhibit "A."

Section 3. Conflicts. All ordinances or code provisions in conflict herewith are hereby repealed.

Section 4. Severability. If any section, clause, sentence, or phrase of this Ordinance is for any reason held invalid or unconstitutional by a court of competent jurisdiction, the holding shall not affect the validity of the remaining portions of this Ordinance.

Section 5. Effective Date. This Ordinance shall be effective immediately upon passage by the City Council on second reading.

The foregoing Ordinance was offered by Vice Mayor Ruiz who moved its adoption. The motion was seconded by Councilmember Cabrera and upon being put to a vote, the vote was as follows:

Mayor Luigi Boria	Yes
Vice Mayor Sandra Ruiz	Yes
Councilman Pete Cabrera	Yes
Councilwoman Christi Fraga	Yes
Councilwoman Ana Maria Rodriguez	Absent/Excused

PASSED AND ADOPTED on FIRST READING this 5 day of August, 2015.

PASSED AND ADOPTED on SECOND READING this 16 day of September, 2015.

LUIGI BORIA, MAYOR

ATTEST:

CONNIE DIAZ, CITY CLERK

APPROVED AS TO FORM AND LEGAL SUFFICIENCY
FOR THE USE AND RELIANCE OF THE CITY OF DORAL ONLY:

WEISS, SEROTA, HELFMAN, COLE & BIERMAN, P.L.
CITY ATTORNEY

Exhibit “A”

City of Doral

Comprehensive Plan 2015-16
Capital Improvements Element
Update

September 16, 2015

City of Doral Comprehensive Plan

2015 - 16 Capital Improvements Element Update

Prepared by:

ILER PLANNING

August 7, 2015

DORAL COMPREHENSIVE PLAN
CAPITAL IMPROVEMENTS ELEMENT UPDATE
August 7, 2015

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INTRODUCTION

This document represents the annual update to the Capital Improvements Element (CIE) of the City of Doral Comprehensive Plan. Pursuant to Subsection 163.3177(3)(b)1, Florida Statutes, local governments are required to review the CIE on an annual basis and modify as necessary to maintain a financially feasible 5-Year Schedule of Capital Improvements (SCI).

The CIE Update includes all capital projects for which the City has fiscal responsibility, including stormwater management, parks and recreation, and transportation. The Update also includes capital improvement projects which are the responsibility of other government agencies and entities, including water supply, sanitary sewer, solid waste, public school facilities and transportation facilities. These "non-Doral" projects are funded by Miami-Dade County, Miami-Dade Public School Board, Miami-Dade Metropolitan Planning Organization (MPO) and the Florida Department of Transportation (FDOT).

This document also provides level of service (LOS) analyses for all public facilities in the City based on population projections and related data. Projects included in the updated 5-Year SCI are needed to address projected public facility needs in order to meet future LOS demand.

In addition, the CIE Update must demonstrate consistency with all other elements of the Comprehensive Plan. Each of the capital projects listed in the updated 5-Year SCI are consistent with applicable elements. When approved and adopted, this CIE update will supplement the adopted Comprehensive Plan. The 2015/16-2019/20 SCI herein will replace the current version in the adopted Plan and updated data, inventory and analysis (DIA) will replace the older DIA.

I. Population Estimates and Projections

Population projections in comprehensive plans are used to forecast demand on public facilities and services. The current population projections for Doral are contained in the adopted 2014 Capital Improvements Update.

In developing Doral's population projections for this CIE Update, various demographic sources including population estimates derived from the University of Florida, Bureau of Economic and Business Research (BEBR), and the U.S. Census were reviewed and analyzed. Recent population projections contained in Miami-Dade County's adopted 20-Year Regional Water Supply Plan (2008) also provides another source of current and future population trends.

Table 1 below shows the historical and current estimates, and future projections of Doral's population through the year 2030. The projections were derived from the City's Comprehensive Plan Update project being conducted this year.

Table 1: Population Estimates and Projections

YEAR	POPULATION
2000	21,000
2005	33,633
2010	45,704
2011	47,648
2012	48,450
2013	50,213
2014	54,116
2015	55,586
2020	71,282
2025	91,409
2030	103,421

Sources: 2010 U.S. Census and University of Florida BEBR; Iler Planning (2015).

The population levels in Table 1 are utilized as the City's current population projections in this CIE Update to determine the City's public facility needs during the 5-year planning period from 2015/16 to 2020/21. During the 2015-25 period the City is expected to grow by an estimated 6.3% per year which is similar to the growth experienced in the past 10 year period. City staff has calculated there are 11,871 dwelling units approved in site plans by the City but un-built as of 2015 which provides an estimated future population capacity of 39,174. This future residential capacity has been factored into the projections above. With these approved units and available vacant land, Doral has ample residential inventory to accommodate future growth through 2025.

II. Level-of-Service Analysis

A. Transportation

There are approximately 204 lane miles of roads within Doral maintained by two (2) separate government jurisdictions: City of Doral and Miami-Dade County. Each jurisdiction provides routine maintenance for their roadways. However, all roadway traffic control such as speed limit signs, stop signs and traffic signals fall under the jurisdiction of, and are maintained by, Miami-Dade County. Doral maintains 57.7 miles of roadway. Over the years, the City has taken over maintenance jurisdiction for many public roads and streets in Doral through inter-local agreements with the County. The expressways surrounding Doral on three sides (SR 821/Homestead Extension of the Florida Turnpike, SR 836/Dolphin Expressway and SR 826/Palmetto Expressway) are either State-owned or County-owned.

The City updated its Transportation Master Plan (TMP) in 2005. The TMP is a long-range 20-year plan that guides Doral's mobility improvements within the City and with regional destinations. The TMP inventoried and analyzed level of service (LOS) for existing roadways and projected future roadway LOS in the years 2015 and 2030. The Plan also identifies and prioritizes projects needed to address current and future transportation deficiencies, and methods for financing transportation and capacity-related improvements needed to maintain adopted LOS standards.

Adopted LOS standards for roadway facilities are contained in Policies 2.2.1, 2.2.2 and 2.2.3 of the City's Transportation Element. Generally, local roadways have an adopted LOS standard of D; where specialized transit exists, the LOS threshold is D + 120%; and on State facilities, the adopted LOS threshold is E. LOS analysis contained in this CIE update is based on 2012-13 traffic counts and they show all nearly all of Doral's roadway links are operating within acceptable LOS. Only 3 links are currently operating above adopted LOS (1 east/west roadway segment and 2 north/south roadway segments) within the City's limits; Tables 2 and 3 below show the existing (2013) roadway conditions in the City recently collected as part of the City's bi-annual traffic monitoring program.

Table 2. Existing (2013) East/West Roadway Segments Bi-directional

CITY OF DORAL - ROADWAY TRAFFIC DATA - YEAR 2013

EAST - WEST ROADWAYS

ROAD	LOCATION		JURISDICTION	FUNCTION CLASSIFICATION[1]	No. of LANES	2013		STANDARD	2013 EXISTING		AVAILABLE	2 WAY VOLUME					
						AADT	LOS	VPH[2]	VPD	V/C	VPD	K	STANDARD LOS	STANDARD VPH	2013 EXISTING VPH	2013 EXISTING LOS	AVAILABLE VPH
NW 12 ST	EAST OF	NW 84 AV	COUNTY	MINOR ARTERIAL	4LD	27,850	C	D	35,900	27,850	C	8,050	0.094	D	3,230	2,630	C	600
NW 12 ST	EAST OF	NW 93 CT	COUNTY	MINOR ARTERIAL	4LD	26,600	C	D	35,900	26,600	C	9,300	0.081	D	3,230	2,160	C	1,070
NW 12 ST	EAST OF	NW 107 AV	COUNTY	MINOR ARTERIAL	4LD	27,400	C	D	35,900	27,400	C	8,500	0.079	D	3,230	2,175	C	1,055
NW 17/19 ST	EAST OF	NW 107 AV	CITY	LOCAL ROAD	4LD	8,050	C	D	29,200	8,050	C	21,150	0.107	D	2,630	865	C	1,765
NW 25 ST	WEST OF	NW 102 AV	COUNTY	MINOR ARTERIAL	4LD	24,300	C	D	35,900	24,300	C	11,600	0.084	D	3,230	2,045	C	1,185
NW 25 ST	EAST OF	NW 112 AV	COUNTY	MINOR ARTERIAL	4LD	20,450	C	D	35,900	20,450	C	15,450	0.087	D	3,230	1,770	C	1,460
NW 33 ST	WEST OF	NW 79 AV	CITY	LOCAL ROAD	2LU	7,000	D	C	13,400	7,000	D	6,400	0.100	D	1,200	700	D	500
NW 33 ST	WEST OF	NW 84 AV	CITY	LOCAL ROAD	4LD	9,900	C	D	29,200	9,900	C	19,300	0.120	D	2,630	1,185	C	1,445
NW 33 ST	WEST OF	NW 87 AV	CITY	COLLECTOR	4LD	13,900	D	D	29,200	13,900	D	15,300	0.109	D	2,630	1,510	D	1,120
NW 33 ST	EAST OF	NW 104 AV	CITY	COLLECTOR	4LD	13,000	C	D	29,200	13,000	C	16,200	0.112	D	2,630	1,450	D	1,180
NW 33 ST	WEST OF	NW 107 AV	CITY	LOCAL ROAD	2LU	9,300	D	D	13,400	9,300	D	4,100	0.111	D	1,200	1,035	D	165
NW 34 ST	WEST OF	NW 114 AV	CITY	LOCAL ROAD	2LU	11,050	D	D	13,400	11,050	D	2,350	0.131	D	1,200	1,445	F	-245
NW 36 ST	WEST OF	NW 82 AV	COUNTY	PRINCIPAL ARTERIAL	6LD	49,900	C	D	54,000	49,900	C	4,100	0.071	D	4,860	3,555	C	1,305
NW 36/41 ST	EAST OF	NW 94 AV	COUNTY	PRINCIPAL ARTERIAL	6LD	46,100	C	D	54,000	46,100	C	7,900	0.075	D	4,860	3,435	C	1,425
NW 41 ST	WEST OF	NW 102 AV	COUNTY	PRINCIPAL ARTERIAL	6LD	43,050	C	D	54,000	43,050	C	10,950	0.081	D	4,860	3,480	C	1,380
NW 41 ST	EAST OF	NW 112 AV	COUNTY	PRINCIPAL ARTERIAL	6LD	38,100	C	D	54,000	38,100	C	15,900	0.077	D	4,860	2,915	C	1,945
NW 50 ST	WEST OF	NW 109 AV	CITY	LOCAL ROAD	2LU	4,550	C	D	13,400	4,550	C	8,850	0.121	D	1,200	550	C	650
NW 52 ST	EAST OF	NW 107 AV	CITY	LOCAL ROAD	4LD	7,300	C	D	29,200	7,300	C	21,900	0.117	D	2,630	855	C	1,775
NW 53 ST	WEST OF	NW 79 AV	CITY	LOCAL ROAD	4LD	4,300	C	D	29,200	4,300	C	24,900	0.098	D	2,630	420	C	2,210
NW 58 ST	EAST OF	NW 84 AV	COUNTY	MINOR ARTERIAL	4LD	13,900	C	D	35,900	13,900	C	22,000	0.084	D	3,230	1,170	C	2,060
NW 58 ST	WEST OF	NW 92 AV	COUNTY	MINOR ARTERIAL	4LD	28,250	C	D	35,900	28,250	C	7,650	0.093	D	3,230	2,630	C	600
NW 58 ST	EAST OF	NW 102 AV	COUNTY	MINOR ARTERIAL	4LD	22,550	C	D	35,900	22,550	C	13,350	0.094	D	3,230	2,130	C	1,100
NW 58 ST	WEST OF	NW 109 AV	COUNTY	MINOR ARTERIAL	4LD	17,450	C	D	35,900	17,450	C	18,450	0.094	D	3,230	1,645	C	1,585
NW 74 ST	WEST OF	NW 97 AV	COUNTY	MINOR ARTERIAL	6LD	27,550	C	D	54,000	27,550	C	26,450	0.113	D	4,860	3,105	C	1,755
NW 74 ST	WEST OF	NW 107 AV	COUNTY	MINOR ARTERIAL	4LD	21,700	C	D	35,900	21,700	C	14,200	0.108	D	3,230	2,340	C	890
NW 78 ST	WEST OF	NW 107 AV	CITY	LOCAL ROAD	2LU	2,150	C	D	13,400	2,150	C	11,250	0.091	D	1,200	195	C	1,005
NW 82 ST	WEST OF	NW 109 AV	CITY	LOCAL ROAD	2LU	3,800	C	D	13,400	3,800	C	9,600	0.104	D	1,200	395	C	805
NW 86 ST	WEST OF	NW 107 AV	CITY	LOCAL ROAD	2LU	2,900	C	D	13,400	2,900	C	10,500	0.114	D	1,200	330	C	870
NW 90 ST	WEST OF	NW 107 AV	CITY	LOCAL ROAD	2LU	1,900	C	D	13,400	1,900	C	11,500	0.116	D	1,200	220	C	980

1. Taken from 2010 Doral Transportation Master Plan Roadway Functional Classification figure.
2. Based on 2012 Quality/Level of Service Generalized Volumes for Florida's Urbanized Areas.

Source: City of Doral 2013 Bi-annual Traffic Monitoring

Table 3. Existing (2013) North/South Roadway Segments Bi-directional

CITY OF DORAL - ROADWAY TRAFFIC DATA - YEAR 2013

NORTH - SOUTH ROADWAYS

ROAD	LOCATION	JURISDICTION	FUNCTION CLASSIFICATION	No. of LANES	2013 ADT	LOS	STANDARD ADT	2013 EXISTING V/C	AVAILABLE V/C	2-WAY VOLUME PEAK HOUR DIRECTION	STANDARD	2013 EXISTING V/C	AVAILABLE V/C
NW 79 AV	SOUTH OF NW 37 ST	CITY	COLLECTOR	4LD	15,250	C	35,900	15,250	C	20,650	0.085	D	3,230	1,295	C	1,935
NW 79 AV	SOUTH OF NW 53 ST	CITY	COLLECTOR	4LD	13,500	C	35,900	15,500	C	20,400	0.092	D	3,230	1,430	C	1,800
NW 82 AV	SOUTH OF NW 21 ST	CITY	COLLECTOR	4LD	12,350	C	35,900	12,350	C	23,550	0.096	D	3,230	1,185	C	2,045
NW 82 AV	SOUTH OF NW 31 ST	CITY	COLLECTOR	2LU	8,700	C	16,000	8,700	C	7,300	0.098	D	1,440	850	C	590
NW 84 AV	NORTH OF NW 17 ST	CITY	LOCAL ROAD	4LD	8,150	C	29,200	8,150	C	21,050	0.094	D	2,630	770	C	1,860
NW 87 AV	NORTH OF NW 17 ST	COUNTY	MINOR ARTERIAL	6LD	40,550	C	54,000	40,550	C	13,450	0.077	D	4,860	3,120	C	1,740
NW 87 AV	SOUTH OF NW 33 ST	COUNTY	MINOR ARTERIAL	6LD	38,050	C	54,000	38,050	C	15,950	0.082	D	4,860	3,125	C	1,735
NW 87 AV	SOUTH OF NW 52 ST	COUNTY	MINOR ARTERIAL	4LD	19,700	C	35,900	19,700	C	16,200	0.102	D	3,230	2,015	C	1,215
NW 97 AV	SOUTH OF NW 17 ST	COUNTY	COLLECTOR	4LD	24,300	C	35,900	24,300	C	11,600	0.097	D	3,230	2,365	C	865
NW 97 AV	NORTH OF NW 33 ST	COUNTY	COLLECTOR	4LD	19,500	C	35,900	19,500	C	16,400	0.081	D	3,230	1,585	C	1,645
NW 97 AV	SOUTH OF NW 52 ST	COUNTY	COLLECTOR	4LD	16,850	C	35,900	16,850	C	19,050	0.102	D	3,230	1,720	C	1,510
NW 97 AV	NORTH OF NW 58 ST	COUNTY	COLLECTOR	2LU	3,700	C	16,000	3,700	C	12,300	0.089	D	1,440	330	C	1,110
NW 102 AV	NORTH OF NW 52 ST	CITY	LOCAL ROAD	4LD	7,450	C	29,200	7,450	C	21,750	0.104	D	2,630	775	C	1,855
NW 107 AV	NORTH OF NW 19 ST	COUNTY	MINOR ARTERIAL	6LD	43,250	C	54,000	43,250	C	10,750	0.074	D	4,860	3,210	C	1,650
NW 107 AV	SOUTH OF NW 29 TR	COUNTY	MINOR ARTERIAL	4LD	24,900	C	35,900	24,900	C	11,000	0.068	D	3,230	1,695	C	1,535
NW 107 AV	SOUTH OF NW 52 ST	COUNTY	MINOR ARTERIAL	4LD	24,200	C	35,900	24,200	C	11,700	0.082	D	3,230	1,980	C	1,250
NW 107 AV	NORTH OF NW 66 ST	COUNTY	COLLECTOR	4LD	23,600	C	35,900	23,600	C	12,300	0.083	D	3,230	1,970	C	1,260
NW 107 AV	NORTH OF NW 78 ST	COUNTY	COLLECTOR	4LD	20,250	C	35,900	20,250	C	15,650	0.087	D	3,230	1,760	C	1,470
NW 109 AV	SOUTH OF NW 82 ST	CITY	LOCAL ROAD	2LU	400	C	13,400	400	C	13,000	0.150	D	1,200	60	C	1,140
NW 112 AV	SOUTH OF NW 30 ST	CITY	LOCAL ROAD	2LD	9,700	C	16,800	9,700	C	7,100	0.096	D	1,520	935	C	585
NW 112 AV	NORTH OF NW 41 ST	CITY	LOCAL ROAD	2LD	9,100	D	14,000	9,100	D	4,900	0.099	D	1,260	900	D	360
NW 112 AV	NORTH OF NW 74 ST	CITY	LOCAL ROAD	2LD	1,750	C	14,000	1,750	C	12,250	0.120	D	1,260	210	C	1,050
NW 112/114 AV	NORTH OF NW 86 ST	CITY	LOCAL ROAD	4LD	6,350	C	29,200	6,350	C	22,850	0.139	D	2,630	880	C	1,750
NW 114 AV	NORTH OF NW 36 TR	CITY	LOCAL ROAD	2LD	13,650	D	14,000	13,650	E	350	0.118	D	1,260	1,610	F	-350
NW 114 AV	NORTH OF NW 50 ST	CITY	LOCAL ROAD	2LD	14,350	D	14,000	14,350	E	-350	0.094	D	1,260	1,350	F	-90
NW 114 AV	NORTH OF NW 60 ST	CITY	LOCAL ROAD	4LD	15,900	D	29,200	15,900	C	13,300	0.104	D	2,630	1,650	C	980
NW 114 AV	SOUTH OF NW 78 ST	CITY	LOCAL ROAD	4LD	12,550	D	29,200	12,550	C	16,650	0.108	D	2,630	1,355	C	1,275
NW 117 AV	SOUTH OF NW 34 ST	CITY	LOCAL ROAD	2LU	7,950	D	13,400	7,950	C	5,450	0.094	D	1,200	745	C	455
NW 117 AV	SOUTH OF NW 58 ST	CITY	LOCAL ROAD	2LU	600	D	13,400	600	C	12,800	0.375	D	1,200	225	C	975

1. Taken from 2010 Doral Transportation Master Plan Roadway Functional Classification figure
2. Based on 2012 Quality/Level of Service Generalized Volumes for Florida's Urbanized Areas.

Source: City of Doral 2013 Bi-annual Traffic Monitoring

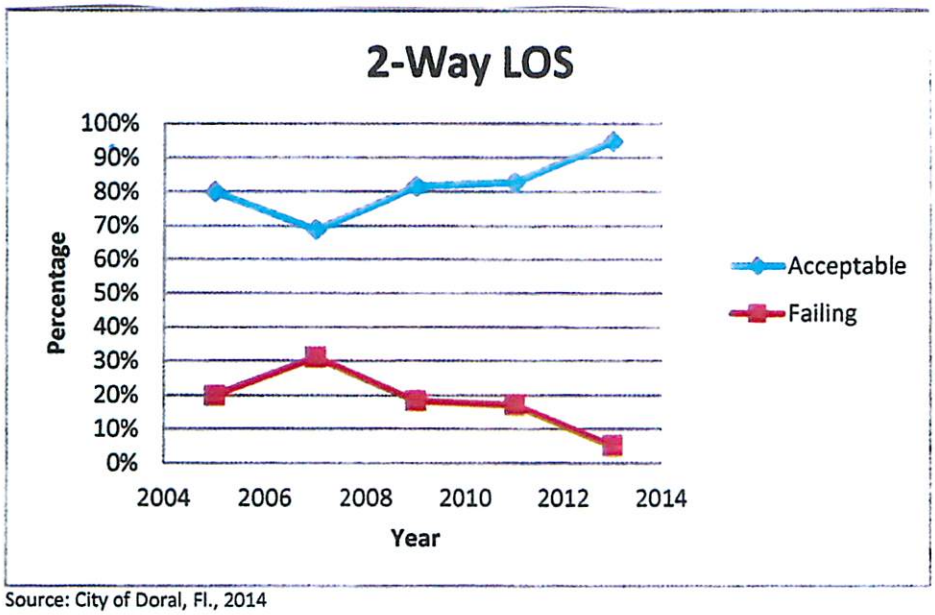
Three (3) of the roadway links listed in the Tables 2 and 3 above are operating at LOS F. They are:

- NW 34th St. west of NW 114th Ave.
- NW 114th Ave. north of NW 36th Terrace
- NW 114th Ave. north of NW 50th St.

Overall, nearly all of Doral's roadway network is currently (2009) operating within acceptable LOS. Bi-directional LOS has seen steady improvement and is approaching 100% of road links at LOS "D" or better. The large majority (67 percent) of deficient links are on County roads. Figure 1 and Table 4 below summarize the 2-way LOS conditions for the overall road network. Due to the interrupted grid system within the City in conjunction with the physical constraints bordering the City, the roadway network faces challenges to maintain and improve LOS in the future.

The major issues facing the City of Doral are connectivity and regional traffic. Traffic is forced onto a few major roadways as it moves east and west. The City is constrained by Okeechobee Road on the north with only NW 107th Avenue connecting Doral to the cities to its north; SR 826/Palmetto Expressway to the east with only the section lines of NW 58th Street, NW 36th Street/Doral Boulevard, NW 25th Street and NW 12th Street connecting Doral to the cities and their airport to its east; SR 836/Dolphin Expressway to the south with only NW 87th Avenue, NW 97th Avenue and NW 107th Avenue connecting with the cities to its south; and with SR 821/Florida's Turnpike to the having only NW 41st Street/Doral Boulevard as an outlet. Regional traffic impacts stem from the City's role as a major employment center and its location next to the Miami International Airport (MIA). Projected traffic conditions in 2015, assuming no transportation improvements are made to the existing network, are shown in Tables 5 and 6.

Figure 1. Bi-directional LOS Conditions



Source: City of Doral, Fl., 2014

Table 4. Bi-directional Conditions – Acceptable and Failing Links

Bi-directional (2-Way)			
	Acceptable	Failing Links	
2005	80%	20%	100%
2007	69%	31%	100%
2009	82%	18%	100%
2011	83%	17%	100%
2013	95%	5%	100%

Source: City of Doral, FL., 2014

Table 5: Future (2015) East/West Roadway Segments Bi-directional Conditions

ROAD	LIMITS	JURIS-DICTION	FUNCTIONAL CLASSFICATION	NO. OF LANES	2015 AADT *	STANDARD			2-WAY VOLUME		
										2015 FUTURE	
						LOS	VPH **	VPH ***	VPH *	LOS **	LOS ***
NW 12 St.	SR 826 - 87 Ave.	County	Minor Arterial	4D	45000	D	2950	3230	3600	F	F
	87 Ave. - 97 Ave.	County	Minor Arterial	4	44500	D	2950	3230	3300	F	F
	97 Ave. - 107 Ave.	County	Minor Arterial	4D	56000	D	2950	3230	4500	F	F
NW 17 - 19 St.	97 Ave. - 107 Ave.	City	Local Road	4D	10500	D	2950	2630	1000	C	C
NW 25 St.	SR 826 - 87 Ave.	County	Minor Arterial	6	45000	D	4450	3230	3400	D	F
	87 Ave. - 97 Ave.	County	Minor Arterial	4	60500	D	2950	3230	4500	F	F
	97 Ave. - 107 Ave.	County	Minor Arterial	4	34000	D	2950	3230	2700	D.	C
	107 Ave. - 117 Ave.	County	Collector	4	13000	D	2950	3230	1500	C	C
NW 33 St.	79 Ave. - 82 Ave.	City	Local Road	2	5500	D	950	1200	600	D	C
	82 Ave. - 87 Ave.	City	Local Road	4D	8500	D	2070	2630	1200	D	D
	87 Ave. - 92 Ave.	City	Local Road	4	3000	D	2070	2630	400	C	C
	97 Ave. - 107 Ave.	City	Collector	4D	7500	D	2950	2630	800	C	C
	107 Ave. - 112 Ave.	City	Local Road	2	4000	D	950	1200	700	D	D
NW 34 St.	112 Ave. - 117 Ave.	City	Local Road	2	7500	D	2950	1200	800	C	D
NW 36 St.	SR 826 - 87 Ave.	County	Principal Arterial	6D	63500	D	4680	4860	4900	F	F
NW 36/41 St.	87 Ave. - 97 Ave.	County	Principal Arterial	6D	72000	D	4680	4860	5800	F	F
NW 41 St.	97 Ave. - 107 Ave.	County	Principal Arterial	6D	84000	D	4680	4860	7200	F	F
	107 Ave. - 117 Ave.	County	Principal Arterial	6D	44000	D	4680	4860	3700	C	C
NW 50 St.	107 Ave. - 117 Ave.	City	Local Road	2	3500	D	950	1200	500	D	C
NW 53 St.	79 Ave. - 87 Ave.	City	Local Road	4D	7000	D	2070	2630	800	C	C
NW 58 St.	SR 826 - 87 Ave.	County	Minor Arterial	4D	38000	D	2950	3230	3300	F	F
	87 Ave. - 97 Ave.	County	Minor Arterial	4D	73500	D	2950	3230	7200	F	F
	97 Ave. - 107 Ave.	County	Minor Arterial	4D	38500	D	2950	3230	3600	F	F
	107 Ave. - 117 Ave.	County	Local Road	4D	22500	D	2950	3230	2100	D	C
NW 74 St.	107 Ave. - 117 Ave.	State	Minor Arterial	6D	8000	D	4680	3230	600	C	C
NW 78 St.	107 Ave. - 109 Ave.	City	Local Road	2	3500	D	2070	1200	300	C	C
	109 Ave. - 114 Ave.	City	Local Road	2	2000	D	950	1200	300	C	C
NW 82 St.	107 Ave. - 116 Ave.	City	Local Road	2	4500	D	950	1200	500	D	C
NW 86 St.	107 Ave. - 116 Ave.	City	Local Road	2	3000	D	950	1200	400	C	C
NW 90 St.	107 Ave. - 112 Ave.	City	Local Road	2	2000	D	950	1200	300	C	C

* 2015 Volumes taken from the 2005 Transportation Master Plan (The Corradino Group, Inc.)

** Based on 2009 Quality/Level of Service Generalized Volumes for Florida's Urbanized Areas.

*** Based on 2012 Quality/Level of Service Generalized Volumes for Florida's Urbanized Areas.

Based on 2012 traffic standards, Tables 5 and 6 show that a total of 16 roadway links listed below will operate above adopted LOS within the City by 2015. These 2015 roadway deficiencies represent 27 percent of the primary roadway segments analyzed, an increase of 2 percent from 2009.

- NW 12th St. from SR 826 to NW 87th Ave.
- NW 12th St. from NW 87th Ave. to NW 97th Ave.
- NW 12th St. from NW 97th Ave. to NW 107th Ave.
- NW 25th St. from SR 826 to 87th Ave.
- NW 25th St. from NW 87th Ave. to NW 97th Ave.
- NW 36th St. from SR 826 to 87th Ave.
- NW 36th/41st St. from NW 87th Ave. to NW 97th Ave.
- NW 41st St. from NW 97th Ave. to NW 107th Ave.
- NW 58th St. from SR 826 to NW 87th Ave.
- NW 58th St. from NW 87th Ave. to NW 97th Ave.
- NW 58th St. from NW 97th Ave. to NW 107th Ave.
- NW 82nd Ave. from NW 25th St. to 41st St.
- NW 107th Ave. from NW 25th St. to NW 41st St.
- NW 107th Ave. from NW 41st St. to NW 58th St.
- NW 114th Ave. from NW 34th St. to NW 41st St.
- NW 114th Ave. from NW 41st St. to NW 58th St.

According to the City's current TMP, roadway LOS may be improved with the following transportation strategies:

- Transportation Demand Management Strategies
  - Traffic Calming
  - Flextime
  - Transit Improvement
  - Car Sharing
  - Ridesharing
  - Pedestrian and Bicycle Improvements
  - Smart Growth

- Roadway Capacity Improvements

Table 6: Future (2015) North/South Roadway Segments Bi-directional Conditions

ROAD	LIMITS	JURIS-DICTION	FUNCTIONAL CLASSFICATION	NO. OF LANES	2015 AADT *	2-WAY VOLUME					
						STANDARD			2015 FUTURE		
						LOS	VPH **	VPH ***	VPH *	LOS **	LOS ***
NW 79 Ave.	25 St. - 36 St.	City	Collector	4D	21000	D	2950	3230	1900	C	C
	36 St. - 58 St.	City	Collector	4D	27500	D	2950	3230	2400	D	C
NW 82 Ave.	12 St. - 25 St.	City	Collector	4D	21500	D	2070	3230	2000	D	C
	25 St. - 41 St.	City	Local Road	2	16000	D	950	1440	1700	F	F
NW 84 Ave.	12 St. - 25 St.	City	Local Road	4D	11500	D	2950	2630	1100	C	C
NW 87 Ave.	12 St. - 25 St.	County	Minor Arterial	6D	44500	D	4450	4860	3400	D	C
	25 St. - 36 St.	County	Minor Arterial	6D	46500	D	4450	4860	3800	D	C
	36 St. - 58 St.	County	Minor Arterial	4D	22000	D	2950	3230	2200	D	C
NW 97 Ave.	12 St. - 25 St.	County	Collector	4D	27500	D	2950	3230	2500	D	C
	25 St. - 33 St.	County	Collector	4D	26000	D	2950	3230	2400	D	C
	33 St. - 41 St.	County	Collector	4D	26000	D	2950	3230	2400	D	C
	41 St. - 58 St.	County	Collector	4D	20500	D	2950	3230	2000	C	C
	58 St. - 66 St.	County	Collector	2	11000	D	1390	1440	1200	D	C
NW 102 Ave.	41 St. - 58 St.	City	Local Road	4D	9000	D	2070	2630	1200	D	D
NW 107 Ave.	12 St. - 25 St.	County	Minor Arterial	6D	50000	D	4450	4860	3900	D	C
	25 St. - 41 St.	County	Minor Arterial	4D	41500	D	2950	3230	3300	F	F
	41 St. - 58 St.	County	Minor Arterial	4D	47000	D	2950	3230	3800	F	F
	58 St. - 74 St.	County	Collector	4D	37500	D	2950	3230	3200	F	D
	74 St. - 90 St.	County	Collector	4D	13500	D	2950	3230	1300	C	C
NW 109 Ave.	50 St. - 58 St.	City	Local Road	2	3000	D	950	1200	500	D	C
NW 112 Ave.	25 St. - 33 St.	City	Local Road	2D	12500	D	950	1520	1300	F	C
	41 St. - 58 St.	City	Local Road	2D	9500	D	950	1260	1000	E	D
	74 St. -79 Ln.	City	Local Road	4	3500	D	2070	1260	500	C	C
NW 112 Ave. - CT.	82 St. - 90 St.	City	Local Road	4D	3500	D	2070	2630	500	C	C
NW 114 Ave.	34 St. - 41 St.	City	Local Road	2D	13000	D	950	1260	1300	F	E
	41 St. - 58 St.	City	Local Road	2	36000	D	950	1260	3200	F	F
	58 St. - 74 St.	City	Local Road	4D	21500	D	2070	2630	2100	E	D
	74 St. - 80 St.	City	Local Road	4D	8500	D	2070	2630	1200	D	D
NW 117 Ave.	25 St. - 33 St.	City	Local Road	2	7500	D	950	1200	900	D	D
	50 St. - 58 St.	City	Local Road	2	1000	D	950	1200	300	C	C

Source: City of Doral 20005 Transportation Master Plan (The Corradino Group, Inc.)

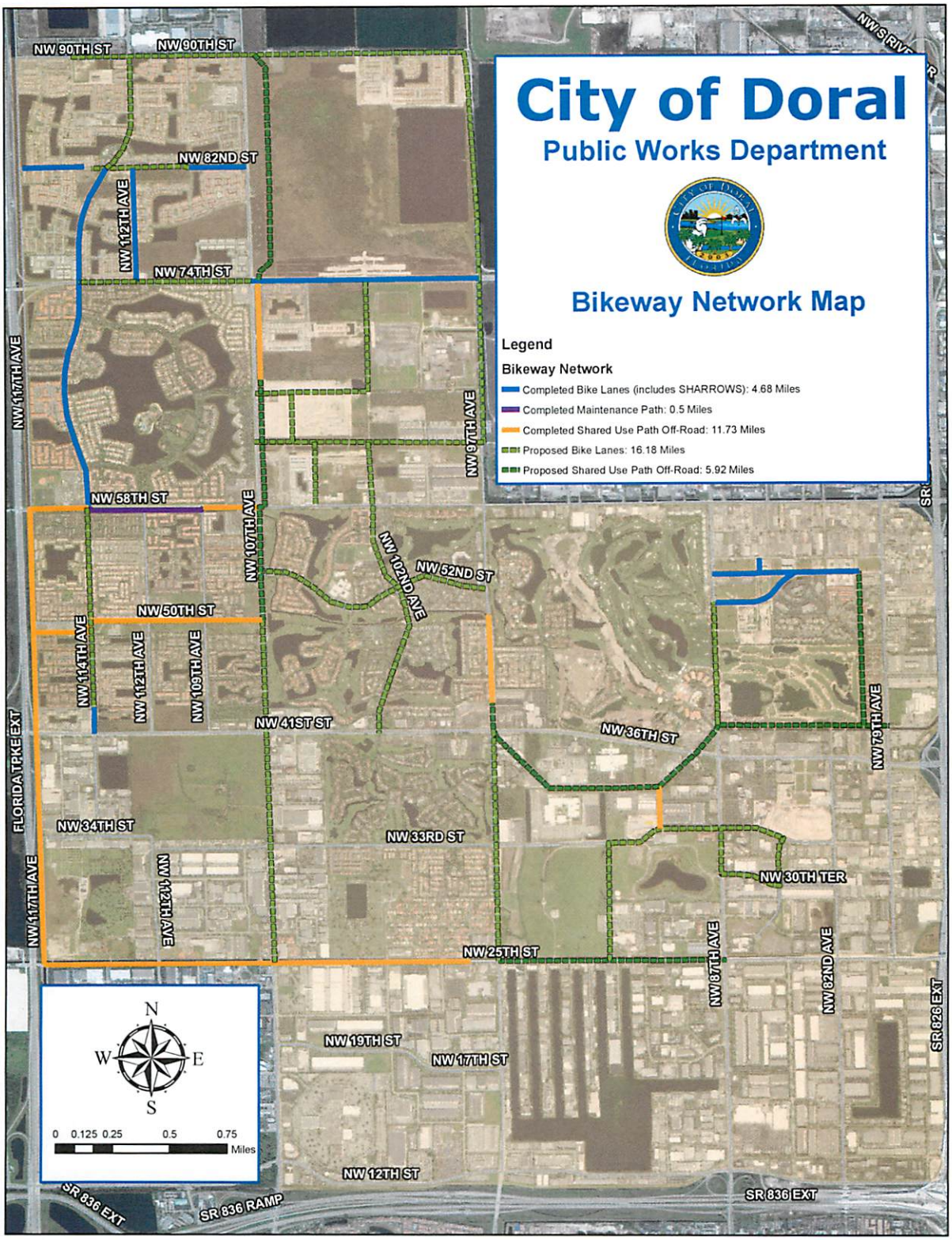
* 2015 Volumes.taken from the 2010 Transportation Master Plan (The Corradino Group, Inc.)

** Based on 2009 Quality/Level of Service Generalized Volumes for Florida's Urbanized Areas.

*** Based on 2012 Quality/Level of Service Generalized Volumes for Florida's Urbanized Areas.

Doral's overall transportation goal is to encourage intra-city trips utilizing multi-modal transportation strategies to reduce dependence on automotive trips and improve daily roadway LOS. The City is currently served by Miami-Dade Transit (MDT) bus routes 36, 71, 87, 132, 137, 238, the 95-Express Earlington Heights (952); the nearby Hialeah Metro Rail station; and by the City's local circulator, the Doral Trolley. The Doral Trolley, which was launched in February 2008, has proven to be a successful transportation alternative within the community. It provides three (3) free routes with a bus about every 0-60 minutes. The Trolley System operates about 510 hours a week at a cost of $30,310 per week. The system carries about 9,000 passengers weekly or approximately 26 passengers each hour, which exceeds the 10 passenger per hour goal since initializing the program. Additionally, the majority of the City is interconnected by sidewalks. The City has developed a Bikeway Network Plan (2010) that proposes a series of bike lanes and multi-use paths. The City has constructed 13.14 miles of multi-use paths and bike lanes to date of a total of 33.72 miles planned. Figure 2 shows the bikeway network in Doral.

Figure 2. Bikeway Network Map



De Minimus Impact Report

Pursuant to Section 163.3180(6), F.S. local governments must submit a de minimus impact report with the Capital Improvements Element update. A de minimus impact is defined as an impact that would not affect more than 1 percent of the maximum volume at adopted LOS of the affected transportation facility; no impact is a de minimus if the sum of the existing roadway volumes and the projected volumes from approved projects on a transportation facility would exceed 110 percent of the maximum volume at the adopted LOS and provided that an impact of a single-family home on an existing lot will constitute a de minimus impact on all roadways regardless of the level of deficiency of the roadway. Based on the above definition of a de minimus impact, the City has nothing to report.

5-Year LOS Projects

To address the LOS deficiencies now and expected by 2019, the City has programmed 11 multi-modal capacity projects through the 5-year planning period. These projects are listed in Table 7,below and will be funded primarily by the City's Transportation Fund.

Table 7. City Transportation Projects FY 2016-2020

PROJECT	LOCATION	TYPE OF WORK	CONSTRUCTION YEAR
Transit Circulator (Trolley)	Citywide	Operation, Expansion, Stop Improvements	Ongoing
Transit Mobility & Infrastructure	Citywide	Transit Infrastructure Improvements	Ongoing
Bicycle Sharing Program	Citywide	Bicycle Sharing Program	Ongoing
NW 41st St.	NW 79th Av. to NW 87th Av.	Roadway Reconstruction	2016/2017
NW 102nd Av. & NW 62nd St	NW 62nd St. – 300' South NW 102nd Av. – 660' East	Roadway Widening	2016/2017
NW 102nd Av.	NW 66th St. to NW 74th St.	New Roadway Construction	2016/2017
NW 66th St.	NW 102nd Av. to NW 97th Av.	New Roadway Construction	2015/2016
NW 92nd Av.	NW 28 St .to NW 33 St.	New Roadway Construction	2015/2016
NW 82nd St.	NW 112th Av. to NW 114th Av.	New Roadway Construction	2015/2016
NW 99th Av.	NW 64th St. to NW 66th St.	New Roadway Construction	2017/2018
NW 82nd Av.	NW 27th St. to NW 33rd St.	Roadway Widening	2016/2017
NW 112th Av. & NW 114th Av.	NW 41st St. to NW 58th St.	Roadway Improvements – Two Way Pairs	2018/2019
NW 114th Av.	NW 34th St. to NW 39th St.	Roadway Widening	2017/2018
NW 34th St.	NW 117th Av. to 112th Av.	Roadway Widening	2018/2019

PROJECT	LOCATION	TYPE OF WORK	CONSTRUCTION YEAR
NW 112th Av.	NW 25th St. to NW 34th St.	Roadway Widening	2019/2020
NW 117th Av.	NW 58th St. to 900' North	New Roadway Construction	2017/2018
NW 12th St.	NW 97th Av. to NW 89th Ct.	Sidewalk Improvements	2016/2017
NW 102nd Av.	NW 17th St. to NW 25th St.	Bicycle Path	2017/2018
NW 97th Av.	NW 70th St. to 74th St.	Roadway Widening	Ongoing
NW 52nd St.	NW 97th Av. to 107th Av.	Bike lanes and sidewalk	2014/2015
NW 102nd Av.	NW 41st St. to 58th St.	Bike lanes and sidewalk	2014/2015
NW 109 Av.	NW 42nd St.- 43rd St.	Roadway Improvements – Widening Intersection	2014/2015
NW 33rd St.	NW 79th Av. - 82nd Av.	Roadway Improvements	2014/2015

Source: Doral Public Works Department (2015)

In addition to the City-funded transportation projects listed above, a number of capacity improvement project in the City has been identified in the current Miami-Dade County Metropolitan Planning Organization (MPO) Transportation Improvement Program (TIP). The TIP is a staged multi-year program that prioritizes all federally-funded transportation projects as well as all other priority transportation projects funded by State and/or local governments over the next 5-year period. The projects are shown in Table 8.

Table 8: Planned State and County Transportation Projects in Doral Area 2015-2020

FACILITY	LIMITS	TYPE OF WORK	RESPONSIBLE AGENCY	CONSTRUCTION TIMEFRAME	ESTIMATED COST
NW 97TH Av.	NW 70th St. to 74th St.	Road improvement	MDC/ Doral	2015	$1.35 million
NW 97th Av.	NW 52nd St. to 70th St.	Road widening 2 to 4 lanes	MDC	2015-16	$7.32 million
NW 58th St.	S.R. 826 to NW 97th Avenue	Road reconstruction and sidewalks	MDC	2015	$10.6 million
NW 74th St.	NW 114th Av. to 107th Av.	Widening & noise walls	MDC	2015	$6.65 million
NW 74th St.	S.R. 826 to NW 87th Av.	Reconstruction & widening	MDC	2015-16	$7.2 million
NW 87th Av.	NW 74th St. to 103rd St.	New 2-lane roadway	MDC	2015-2020	$33 million
FL Turnpike	S.R. 836 to NW 74th St.	Add lanes and reconstruction	FL Turnpike Enterprise	2015-2020	$180 million
S.R. 826 (Palmetto Expressway)	Flagler St. to NW 154th St.	Managed lanes	FDOT	2015-16	$96.5 million
S.R. 836 (Dolphin Expressway)	Interchange at NW 87th Av.	Interchange and NW 12th St. improvements	MDX	2015-16	$81 million
Dolphin Station Transit Terminal	West of FL Turnpike, north of NW 12th St.	Truck parking; park and ride lot	FDOT	2015-2020	$25 million

Source: Miami-Dade County MPO TIP, 2015.

Other roadway improvement projects for facilities that are currently failing and/or projected to fail that are not programmed into the FY 2016-2020 SCI may be added to the Schedule in future CIE Updates as funding becomes available at the Federal, State and local levels of government.

The City is doing all it can to address roadway deficiencies which occur primarily on City roadways. The 23 multi-modal capacity projects in Table 7 over the 5-year planning period are a testament to substantial effort by the City to mitigate existing and projected roadway deficiencies. Most of the excessive traffic congestion in Doral is caused by regional trip-making, including high levels of trucks accessing nearby and distant communities. The City is a major employment center within the County, and over 100,000 people enter Doral each workday bringing regional trips into the City. Combine this with "cut-through" traffic between I-95, the Florida Turnpike, SR826 and Miami International Airport, and regional traffic becomes a difficult burden on the City. The Bicycle System Master Plan and Doral Trolley are innovative examples of how the City is using all available options to mitigate LOS deficiencies. Doral has also implemented higher density mixed-use downtown, and in outlying satellite nodes to reduce the number and length of vehicle trips. In 2014 Doral adopted a Transit Mobility Plan that identifies multi-modal transportation enhancements to improve vehicle, transit, bicycle and pedestrian connections, and overall functioning of the City's transportation system. The City is working closely with County and State agencies to address LOS needs on their roadways through 2020 and beyond.

B. Potable Water Service

Doral receives water service from Miami-Dade County Water and Sewer Department's (WASD) Hialeah/Preston Water Treatment Plant (WTP). The plant is owned and operated by WASD, who is responsible for maintaining the distribution and treatment facilities serving the City. All together, WASD owns and operates three (3) regional water treatment plants throughout the County. The current capacity of WASD's regional water system is 473 million gallons per day (MGD). Infrastructure Element Policy 5A.1.1 of the City's Comprehensive Plan establishes the adopted level of service (LOS) standard for potable water at 126.82 gallons per capita per day.

Regional water system capacity projections have been provided by the County based on current water system capacity, planned capacity projects, and current and projected demand from retail water customers within the County. A summary of WASD's projected potable water demand and rated capacity is provided in Table 9 below.

Table 9: Miami-Dade WASD Water System Capacity and Demand Comparison

YEAR	RATED CAPACITY (MGD)	FINISH WATER DEMAND (MGD)	POPULATION SERVED
2015	463.93	327.37	2,266,092
2020	464.74	342.37	2,370,769
2025	464.74	357.25	2,475,446

MGD = Million Gallons per Day.
Source: WASD Water Supply Facilities Work Plan (2015).

Table 9 shows that the County will have sufficient water system capacity though 2020. Therefore, LOS is expected to be maintained through 2020 and beyond for the portion of the regional water system serving the City of Doral. In 2015, the City updated their 20-Year Water Supply Facilities Work Plan, which includes several text amendments to the Doral Comprehensive Plan. The goal of the water supply planning process is to determine the local water needs, and develop sound and workable solutions and policies to meet those needs. The Plan references the initiatives already identified by WASD to ensure adequate water supply for the City of Doral. According to the State guidelines, the Plan and the Comprehensive Plan must address the development of traditional and alternative water supplies, service delivery and conservation, and reuse programs necessary to serve existing and new developments for at least a 10-year planning period.

5-Year LOS Projects

Miami-Dade County's 20-Year Water Supply Facilities Work Plan identifies an Alternative Water Supply Project (AWSP) for the Hialeah/Preston WTP in three (3) phases to be planned and constructed from 2007 through 2027. The overall project will provide an additional capacity of 17.5 MGD for the Hialeah/Preston WTP. Phase 1 of the AWSP is complete and will add an initial 10 MGD of capacity.

C. Sanitary Sewer Facilities

The adopted level of service (LOS) standard for sanitary sewer in Doral is 100 gallons per capita per day, as noted in Policy 5B.1.1 of the Infrastructure Element of the Comprehensive Plan. Sanitary sewer

service in the City is provided by Miami-Dade County's Water and Sewer Department (WASD). The LOS standard for wastewater in the County requires all regional water treatment plants to operate with a physical capacity of no less than the annual average daily sewage flow. According to the County's 2010 Evaluation and Appraisal Report (EAR), the County's system has historically maintained this baseline requirement. Currently, the County has a regional wastewater system capacity of 375.5 million gallons per day (MGD). Table 10 shows the projected regional system wastewater demand and system capacity through 2020.

Table 10: Miami-Dade County WASD Regional Wastewater System Capacity and Wastewater Flow

YEAR	POPULATION SERVED	TREATMENT CAPACITY (MGD)	WASTEWATER FLOW (MGD)
2015	2,273,852	375.5	316
2020	2,424,933	394	328
2025	2,576,015	401	337

MGD = Million Gallons per Day.
Source: WASD Water Supply Facilities Work Plan (2015).

According to Table 10, WASD's regional wastewater system will have enough capacity through 2020. Therefore, LOS for sanitary sewer will be maintained in the portions of the City served by WASD's wastewater collection system.

5-Year LOS Projects

No capacity-related projects for the County's wastewater system have been identified for the 5-year period.

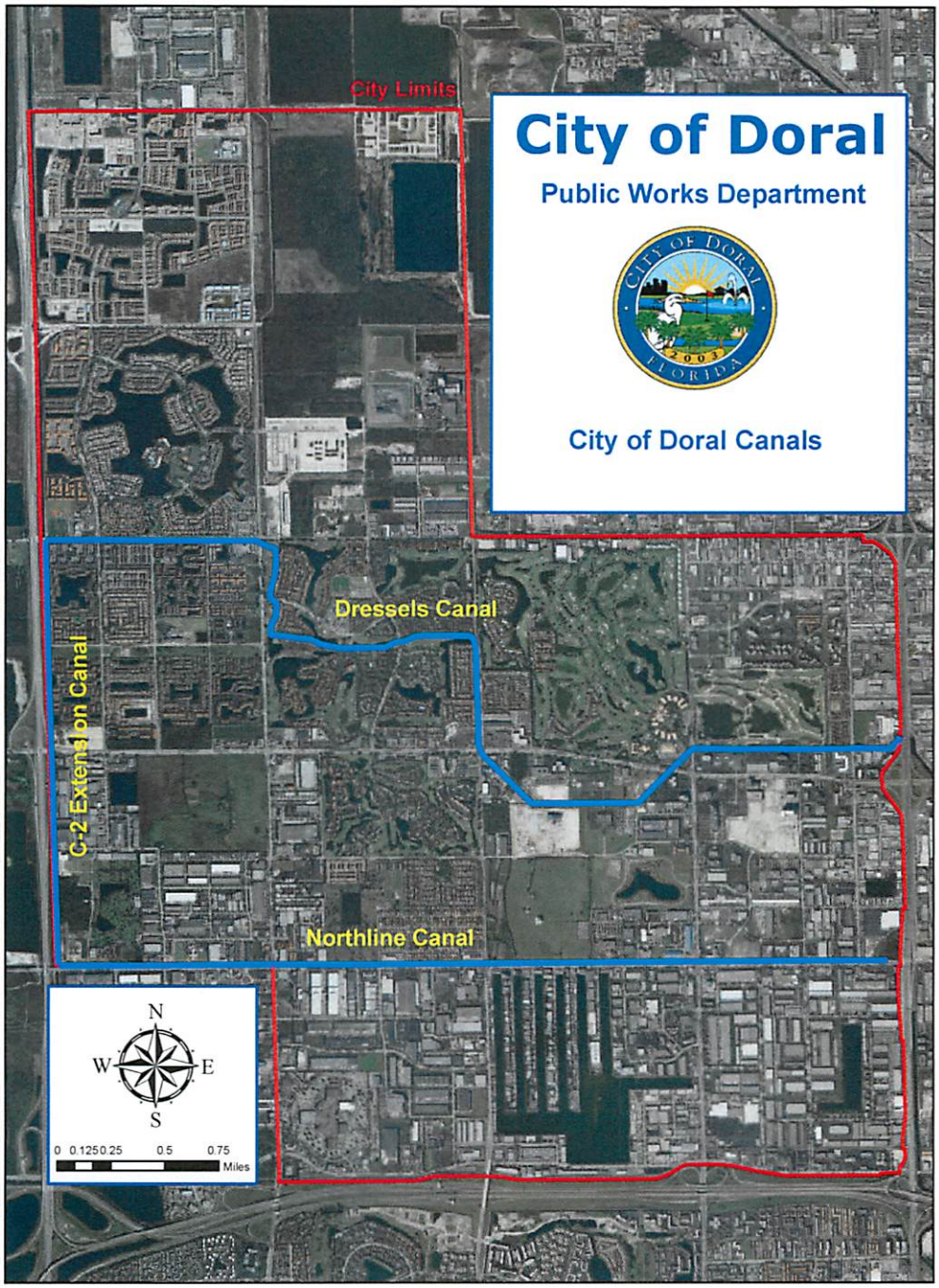
D. Stormwater Management

The City of Doral falls within the boundaries of the C-4 and C-6 Basins within the Central Miami-Dade Watershed. These basins are drained by South Florida Water Management District (SFWMD) primary canals C-4 and C-6 which flow from the Everglades to Biscayne Bay. There are three (3) main secondary canals which convey stormwater from the city to the C-4 and C-6 canals: the Northline Canal, located along the north side of NW 25th Street, the C-2 Extension Canal, located along NW 117th Avenue, and the Dressels Canal which crosses the City from NW 117th Avenue to the Palmetto Expressway. Figure 3 depicts the canal system in Doral.

Doral adopts the following system-wide drainage level of service (LOS) standards for new development and redevelopment in Policy 5C.1.1 of the Infrastructure Element:

- *Water Quality Standard.* Stormwater facilities shall meet the design and performance standards established in Chapter 62-25, Rule 25.025, Chapter 40-E, Chapter 40E-40, Florida Administration Code (FAC), and Section 24-48, of the Code, with the retention of the first inch of runoff onsite to meet the water quality standards required by Chapter 62-302, Rule 862-302.500, FAC, and Section 24-42 of the Code.

Figure 3. Doral Canal System



* *Water Quantity Standard.* Where two or more standards impact a specific development, the most restrictive standard shall apply:

  + Post-development runoff shall not exceed the pre-development runoff rate for a 25-year storm event, up to and including an event with 24-hour duration.

  + Treatment of the runoff from the 5-year storm event, 24-hour duration, in accordance with Section D-4, Part 2, Miami-Dade County Public Works Manual and Sec. 24-48.3 (7) and Rule 40E-40.302, FAC, "Basis of Review, Volume IV Manual."

  + Treatment of the runoff from the first one inch of rainfall onsite or the first 0.5 inch of runoff from impervious areas, whichever is greater.

* *Flooding Standard.* During the 10-year return design storm event, flooding of minor arterials should be below the crown of the roadway.

The City requires all new developments to provide adequate on-site drainage prior to the issuance of a building permit to maintain LOS standard for drainage. However, there were a number of pre-existing deficient drainage conditions when the City was incorporated in 2003. In 2006, Doral adopted it's first Stormwater Master Plan to inventory existing stormwater drainage conditions, and to identify and prioritize projects to correct existing deficiencies and improve level-of-service. Since the adoption of the Stormwater Master Plan, the City's Public Works Department has completed all projects listed in the Plan except for those improvements which are the responsibility of the County or private property owners. In 2014 the City completed an updated Stormwater Master Plan which forms the basis for the Stormwater 5-year Schedule of Capital Improvements.

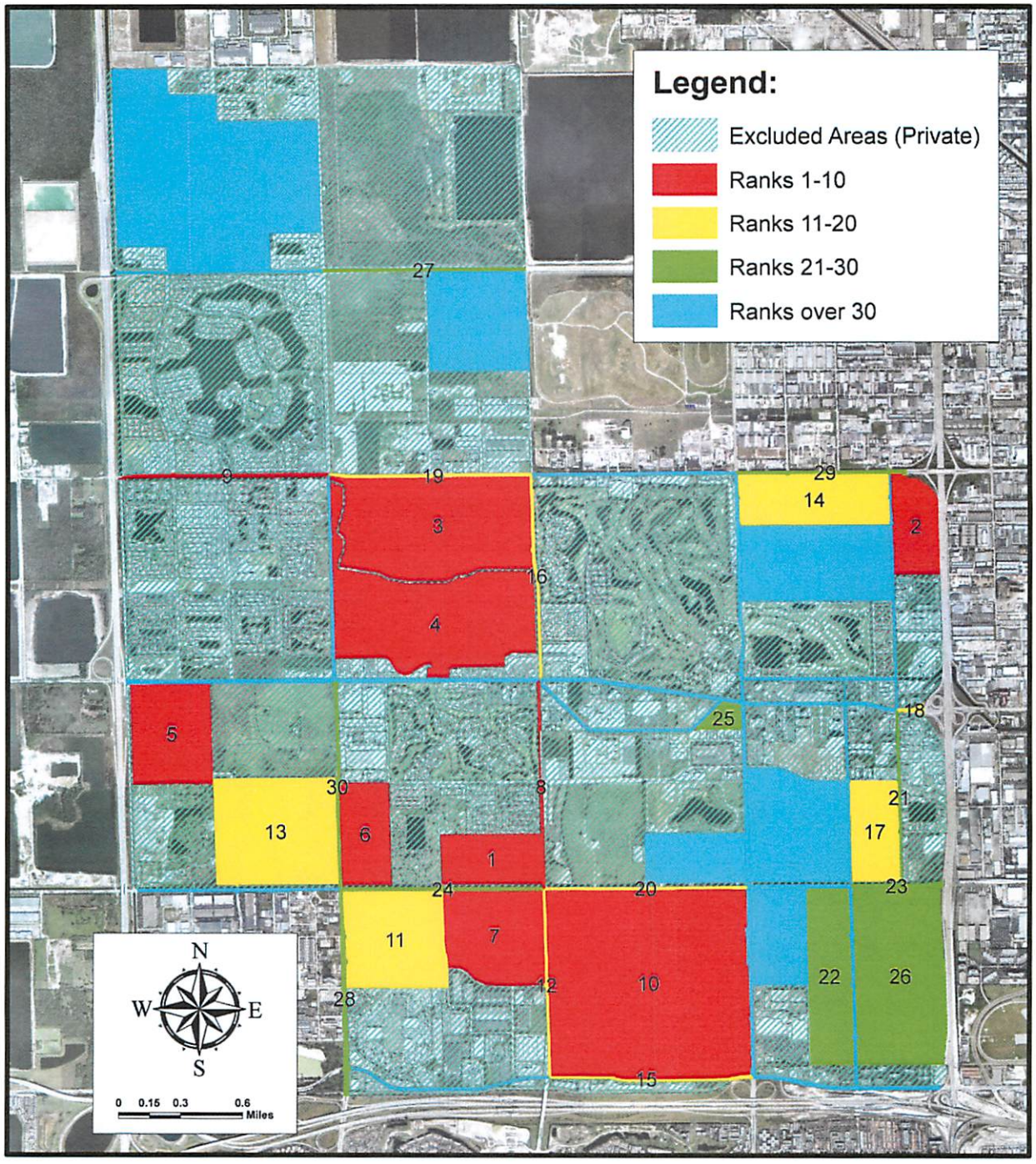
The City's Stormwater Master Plan (SWMP) serves as a planning-level engineering document that analyzes the current condition of the City's existing storm water management systems, identifies high priority flood prone areas, and establishes a five-year capital improvement plan to implement the most cost effective projects to address these areas. SWMP's are typically updated on 5-year cycles, at a minimum, and this current version of the SWMP supersedes the most recent SWMP update that was performed for the City in 2009. The analysis performed for this SWMP takes into consideration the primary components of the existing storm water management system (manholes, inlets, and major conveyance pipes), canals and lakes, topography, land uses, as well as groundwater elevations, and historical rainfall when analyzing the primary existing drainage infrastructure throughout the City. These elements are all combined and analyzed within a mathematical Hydraulic and Hydrologic model that simulates the performance of the City's primary drainage systems using design rainfall events. The City's secondary drainage storm water management systems, such as individual inlets, manholes, and minor conveyance systems which control drainage within the sub-basin, are not analyzed as a part of this SWMP because this SWMP is a planning-level analysis. The secondary drainage systems are typically analyzed in the design phase and not in the Master Planning study phase.

The results of this SWMP analysis serve to help identify and prioritize general areas where major drainage systems are deficient and define the extent of the deficiencies. With problem areas identified, planning-level drainage projects can be developed and prioritized with the intent of alleviating flooding in flood prone areas. Additionally, planning-level construction costs for these projects can be determined in order to budget and define the implementation schedule for the proposed planning-level

projects. As with most planning-level documents of this type, the projects presented in this SWMP do not require the City to allocate funding for, or require the City to design and construct projects in this order or magnitude. The main intent of the contents of this SWMP is to serve as a guide for the City in order to identify problem areas, develop potential future projects, and correlating those future projects with a planning-level cost. With those items identified, the City can then internally decide which areas to concentrate engineering efforts and funding based on the recommendations of the SWMP.

Figure 4 below showing drainage sub-basins is the result of the prioritization process which identifies those critical areas for stormwater improvement projects and establishes a 5-Year Capital Improvement Plan to implement the most cost-effective projects.

Figure 4. Prioritized Drainage Sub-Basins



5-Year LOS Projects

Although all projects have been completed in the Stormwater Master Plan, the City has continued to provide funding for repair and maintenance City-wide through the Stormwater Fund. Two (2) important projects are the Canal Bank Stabilization Program and Citywide general stormwater improvements and maintenance, including catch basin maintenance, street sweeping, canal maintenance, and floating debris removal. Table 11 below shows the projects and costs for planned stormwater improvements planned during the next 5 years. The total cost of the 5-year program is aproximately $7.88 million.

Table 11: City Stormwater Projects and Estimated Costs FY 2016-2020

Project	FY 2015-16	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20
NW 102 Ave. & 27 Terr	$26,918				
NW 114 Ave. & 74 St.	27,543				
NW 113 Ave. & 77 Terr	17,422				
NW 102 Ave. & 26 St.	11,412				
NW 113 Ct. & 82 Terr	10,655				
NW 82 Ave. - NW 12 St. to RR Tracks.	100,000				
Sub Basin F-1		$1,107,582			
Sub Basin H-5	781,710				
Sub Basin J-1	275,000				
Sub Basin J-2	275,000				
Sub Basin F-5	140,430				
Sub Basin C-6		98,829			
Sub Basin C-7	404,989				
Sub Basin H-8		860,760	$339,774		
Sub Basin D-3			238,229		
Sub Basin D-79 Ave			510,401		
Sub Basin A-2			299,064		
Sub Basin A-4				$1,398,536	
NW 114 Ave., NW 50 St. - NW 58 St.					$500,000
NW 114 Ave., NW 58 St. - NW 74 St.					300,000
NW 50 St., NW 114 Av. - NW 112 Av.					60,000
NW 78 Ave., NW 12 St. - NW 15 St.					100,000
TOTALS	**$2,071,079**	**$2,067,171**	**$1,387,468**	**$1,398,536**	**$960,000**

Source: City of Doral Public Works Dept.,2015

E. Solid Waste

The City's adopted level of service (LOS) standard for solid waste is 9.4 pounds per capita per day in Infrastructure Element Policy 5D.1.2 of the Comprehensive Plan. Table 12 below shows the projected solid waste which could be generated in the City through 2030.

Table 12: Solid Waste Generation 2015-2030

YEAR	POPULATION	LOS (lbs./capita/day)	SOLID WASTE GENERATED (tons/day)
2015	55,586	9.4	261
2020	71,282	9.4	335
2025	91,409	9.4	430
2030	103,421	9.4	486

Source: Iler Planning (2015)

The City has an interlocal agreement with Miami-Dade County Department of Public Works and Waste Management (PWWM) for County collection, recycling and disposal of solid waste generated within Doral. According to the County's Comprehensive Development Master Plan, there will be sufficient landfill capacity to serve future development county-wide through 2020. The County's capacity analysis is based on projected demand generated by municipalities who have committed waste flows to the system by interlocal agreement, long-term contracts and anticipated non-committed waste flows in accordance with the County's adopted LOS standard. An average total of 775,000 tons of waste is landfilled per year.

The County is currently preparing a Solid Waste Master Plan which will identify new activities, programs, facilities and technologies to provide sustainable solid waste services to ensure public health and environmental protection for Miami-Dade County residents over the next 50 years. Phase I began in June 2009 with data collection, an assessment of the existing system and a projection of long-term solid waste management needs. This part of the program included public participation, evaluation of regulatory and policy impacts, and financial analysis. Phase I concluded with the identification of alternatives for improvements. Phase II, currently underway, will take the findings from Phase I and build a comprehensive Master Plan for a long-term, sustainable solid waste management system. The Master Plan will identify solutions such as potential new technologies, operations or facilities, as well as a financial analysis and strategy for implementation.

Using the City's projected annual solid waste generation for the years 2015 through 2020, the City will average approximately 108,770 tons per year annually through the 5-year period, which is approximately 9 percent of the County's annual landfill capacity. Thus, there will be sufficient landfill capacity to accommodate the City's solid waste demand through 2020.

5-Year LOS Projects

No new capacity-related projects have been identified for the 5-year period. The County's solid waste LOS will be maintained with the operation of the county-wide solid waste management system.

F. Parks and Recreation

The level of service (LOS) standard for Doral's parks system is contained in Parks and Recreation Element Policy 7.1.1 as follows:

2009-2011: 3.25 acres of developed park land per 1,000 population
2012-2014: 3.75 acres of developed park land per 1,000 population
2015-2020: 4.25 acres of developed park land per 1,000 population

The City currently has 134 acres of developed parks. In addition, the Casa del Sol public golf course, 98 acres in size and located at NW 97th Avenue and Doral Boulevard, is considered a "quasi-public park" which provides recreational opportunities to Doral residents and visitors. Doral's public parks and Casa del Sol together provide 232 acres of recreational facilities which is just below the current LOS standard of 237 acres. Using the adopted LOS standards above, the projected park acreage need is presented over the next 5-year period in Table 13 below. The City will need a total of 303 acres of public park land and/or quasi-public parks to meet the LOS in 2020; this equates to an additional 71 acres of new parks.

Table 13: Projected Parks Level-of-Service Acreage Needs

YEAR	PROJECTED POPULATION	PARK LOS NEED (Acres)
2015	55,586	237
2016	58,725	250
2017	61,864	263
2018	65,003	277
2019	68,142	290
2020	71,282	303

Source: Iler Planning (2015)

5-Year Level-of-Service Projects

Seven (7) park development projects are programmed into the 5-Year SCI to address existing and projected LOS needs through 2020. All of these are planned park projects are listed in Table 14. The following parks projects represent new developed parkland acreage and thus will serve to increase the City's current parks LOS:

	Acres
NW 114th Avenue Park	18
Doral North Park	25
Aquatic Facility	10
Triangle Parcel	1.3
Retention Park	3
Linear Park (new)	29.5
Total New Parks.....	86.8 acres

The proposed projects above will add an additional 86.8 acres of park land giving Doral a total of 318.8 acres by the year 2020. This total is 15.8 acres above the developed parks acreage needed of 303 acres to maintain the adopted level-of-service standard of 4.25 park acres per 1000 population in 2020.

Figure 5. Doral's Park System

Table 14: Planned Parks Projects

PROJECT	LOCATION	COMPLETION	SIZE
NW 114th Avenue Park	NW 114 Ave. & 82 St	Sept. 2016	18
Doral North Park	NW 97 Ave. and NW 74 St.	Sept. 2016	25
Aquatic Facility	NW 97th Ave & 35th St or JCB Park	Sept. 2017	10
Triangle Parcel	Adjacent to Downtown Doral Park	Sept. 2018	1.3
Retention Park	NW 102nd Av. & NW 62nd St.	Sept. 2018	3
Linear Park	NW 50th St. & NW 107th Av.	Sept. 2018	41
Doral Central Park	NW 87th Ave. & NW 30th St.	Sept. 2019	82
Environmental Passive Park (Private)	NW 107 Ave. and NW 74 St.	Concurrent with development	51
Grand Bay Preservation Park (Private)	NW 87th St./NW 86th St. (east of NW 107th Ave.)	Concurrent with development	72

Source: Doral Planning and Zoning Dept., Doral Park Facilities Master Plan (2015)

A detailed description of each proposed park improvement is provided below:

1. *NW 114th Avenue Park* – This City-owned property will be developed and designed as a community park. NW 114th Avenue Park is conceived as a place in which the community can gather to enjoy sports, cultural arts and nature in a safe environment representative of the beautiful City of Doral. The park will encompass 18 acres in Section 7.
2. *Doral North Park* – A plan was created for this 25-acre site as part of the Florida Communities Trust Funds grant application, to use this site for educational, conservation and passive recreation purposes. The proposed plan for this park features: a Nature Center, a multi-purpose field, a campground, restored wetland habitat, a boardwalk, motorized boat launch/ramp with parking, and a future drawbridge/lake connection.
3. *Aquatic Facility* - There has been a demand from the community for an aquatic facility located in Doral. A feasibility study has been prepared and includes findings on Doral's economic and demographics, a market comparison to other counties and cities in South Florida, a national case study, information gathered from stakeholder interviews, target market, facility programming, usage expectations and financial projections. This year the Parks Department has been working with a consultant on conceptual designs and costs for the facility. Public input will be a part of the conceptual design process. Although the location of the 10-acre facility is still under study, one possible site is in Doral Central Park.
4. Doral Central Park– Former known as J.C. Bermudez Park, this 82-acre park is the largest in Doral and home to major events such as EGGstravaganza and the Independence Day Celebration. Its open green spaces and scenic lake views are ideal for corporate gatherings and community events. Central Park is located in the community heart of Doral adjacent to the headquarters of Carnival Cruise Lines and the United States Southern Command. The initial Master Plan for the park was completed in 2008 and is being updated this year.
5. Triangle Parcel - This 1.3 acre tract is located adjacent to Downtown Doral Park and City Hall. This parcel will serve as an addition to Downtown Doral Park and continue the passive park atmosphere that is currently present.

6. Retention Park: This proposed park site is located on 102nd Ave and theoretical NW 62nd Street. The site will be used as a retention area for the Police/Public Works Building with three (3) acres of the five (5) acre parcel dedicated as a passive park site.
7. *Linear Greenway Park* – Areas under FP&L transmission lines adjacent to streets are being used as multi-purpose trails as proposed in the City's Bicycle Master Plan and Parks and Recreation Element Policy 6.2.6. Facilities and features include: multi-purpose trail/service access route with trailhead, naturalistic planted areas/native habitat plantings and public art. The linear park system comprises 41 acres.
8. *Environmental Passive Park (51 acres)* – This proposed park site is located at NW 107th Ave & 74th St and contains wetlands. The site has been identified in the Parks System Master Plan as a future "Environmentally-Protected Park." Low impact observation walkways on the perimeter of the wetlands and educational kiosks are planned.
9. Preservation Park (72 acres) – This proposed park site (72 acres) is currently a highly-impacted wetland located between two residential developments. This natural resource would be restored transforming the site into a unique passive recreation amenity for the residents of Doral. The City's goal is to make this preservation park a public access point; coordination with Miami-Dade County and the SFWMD will be required in the process.

The new park development projects will increase the City's park capacity to a total of 220.8 acres when completed. In order to maintain its LOS standard, the City will need to program and construct 82.2 acres of additional developed parkland in the next 5 years. To meet this need, the City is also considering several future projects including a mountain bike trail on FAA property, soccer field at John I. Smith School and athletic field lighting at Ronald Reagan High School.

G. Education Facilities

Public schools facility planning for Doral is provided by Miami-Dade County Public Schools (MDCPS). Every year, MDCPS is required to update and submit a Five-Year District Facilities Work Plan to demonstrate available and projected student capacity, and related information on project funding for capacity-related projects. The information below summarizes the current and projected level of service (LOS) for public schools serving Doral from the current MDCPS Five-Year District Facilities Work Plan.

The City has 4 public schools within its boundary. In addition, State legislation for public school concurrency requires all public schools to be at or below 100% of permanent FISH utilization by the year 2018. In the interim, public schools may exceed 100% FISH utilization with relocatable classrooms to accommodate the deficiency.

Table 15a provides the 2015-2016 actual Florida Inventory of School Houses (FISH) capacity for public schools serving the City. It shows the 3 grade K-8 schools serving Doral's children are currently operating above 100% of permanent capacity. Doral Senior High School is operating at 79% of capacity. Total enrollment in public schools in Doral this year is 6,785 students.

Table 15b presents the projected 2016-2017 FISH capacity based on permanent classrooms for each of the City's 4 public schools. The table indicates that the 3 K-8 schools will continue to operate well above 100% permanent FISH capacity in 2017. Total student enrollment next year is expected to be 7,007, 3.3% higher than this year.

Table 15a: Schools 2015-16 Permanent (FISH) Capacity

PUBLIC SCHOOL	PERMANENT CAPACITY	STUDENT ENROLLMENT	% CAPACITY
Eugenia B. Thomas K-8 Center	1,422	1,599	112%
John I. Smith K-8 Center	1,355	1,535	113%
Ronald W. Regan/ Doral Senior High School	2,494	1,976	79%
Dr. Rolando Espinosa K-8 Center	1,519	1,675	110%

Source: Miami-Dade County School Board, July 2015.

Table 15b: Schools Projected 2016-2017 Permanent (FISH) Capacity

PUBLIC SCHOOL	PERMANENT CAPACITY	STUDENT ENROLLMENT	% CAPACITY
Eugenia B. Thomas K-8 Center	1,422	1,642	115%
John I. Smith K-8 Center	1,355	1,631	120%
Ronald W. Regan/ Doral Senior High School	2,494	2,056	82%
Dr. Rolando Espinosa K-8 Center	1,519	1,678	110%

Source: Miami-Dade County School Board, July 2015.

5-Year Capacity Projects in Doral

No projects have been identified.

Doral is also home to 6 charter schools serving a total of 4,048 students this year as shown in Table 16 below.

Table 16: Charter Schools in Doral

Charter School Name	Address	Student Capacity*	Actual Enrollment (7-15-15)	Facility Capacity (assigned by Doral)
Doral Academy	2450 NW 97 Ave	2,200	1,107	1,395
JAM Middle School	Doral, FL 33172	600	100	
Doral Middle School	2601 NW 112 Ave.	1,438	1,251	1,595
Doral Academy of Technology	Doral, FL 33172	300	182	
Doral High School	11100 NW 112 Ave.	1,800	1,181	1,200
Doral Performing Arts	Doral FL 33172	403	227	

Source: Charter School Support Office, MDC Public Schools, July 2015. Note: * Capacity per charter contract.

III. CAPITAL IMPROVEMENTS

The data and analysis presented herein shows level of service (LOS) needs in transportation, parks and recreation, and stormwater management. The proposed Schedule of Capital Improvements (SCI) in Tables 19 and 20 is intended to address the maintenance and improvement of public facilities.

Table 17: Projected Revenues for Capacity-Related Projects by Funding Source

FUNDING SOURCES	FY 2014/15		FY 2015/16	FY 2016/17	FY 2017/18	FY 2018/19	FY 2019/2020	5 YEAR TOTAL FY 2016-2020
City-Funded Projects								
Parks & Recreation/ GF	5,500,000		$12,300,000	$10,800,000	$8,250,000	$9,800,000	$5,700,000	**$46,150,000**
Stormwater Fund	$1,000,000		$2,000,000	$1,500,000	$1,500,000	$1,500,000	$1,500,000	**$8,000,000**
Park Impact Fee Fund	$8,000,000		$1,200,000	$1,200,000	$1,200,000	$1,200,000	-0-	**$4,800,000**
Transportation Fund	$1,300,000		$4,000,000	$7,000,000	$3,000,000	$3,500,000	$1,300,000	**$18,800,000**
TOTAL	**$15,800,000**		**$19,800,000**	**$21,000,000**	**$13,950,000**	**$16,000,000**	**$8,500,000**	**$77,750,000**

Source: City of Doral; Iler Planning 2015.

Table 18: Projected 5-Year Expenditures for Capital Improvements by Type

Project Type	FY2014/15 (current)		FY2015/16	FY2016/17	FY2017/18	FY2018/19	FY2019/2020	5-YEAR TOTAL FY 2016-20
City-Funded Projects								
Parks	$16.950,000		$13,500,000	$12,000,000	$15,450,000	$10,000,000	$0	$50,950,000
Drainage	$1, 000,000		$2,071,079	$2,067,171	$1,387,468	$1,398,536	$960,000	$7,884,254
Transportation	$5,831,377		$3,655,000	$7,195,000	$2,945,000	$3,145,000	$1,295,000	$18,235,000
Total	**$23,781,377**		**$19,226,079**	**$21,262,171**	**$19,782,468**	**$14,543,536**	**$2,255,000**	**$77,069,254**

Source: City of Doral; 2015

Revenue projections for capital projects to be funded by Doral are based on the City's adopted 2014-2015 budget and information provided by the City's Planning and Zoning Department. City revenues for capital improvements by type are also identified in Table 18. For example, the Stormwater Fund is used for drainage improvements, the Park Impact Fee Fund is used to finance park improvements, and the Transportation Fund is used for roadway, transit and pedestrian projects. The Capital Improvements Fund is comprised of revenue transfers from the General Fund, and recovery of grant funds from prior years.

An analysis of the projected revenues and planned capital expenditures indicate that the City will maintain financial feasibility through the 5-year planning period. The City is projected to accumulate over $77,750,000 over the 5-year planning period to fund the capital improvements needed to maintain and improve public facility LOS, and has identified a total of $77,069,254 in capital improvement expenditures over the planning period.

Table 19. 2015/16-2019/20 Schedule of Capital Improvements

PROJECT / LOCATION	TYPE OF WORK	FY 2014-15	FY 2015-16	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	TOTAL COST FY 2016-20	FUNDING SOURCE
TRANSPORTATION PROJECTS									
Transit	Trolley Fleet	$360,000	$195,000	$195,000	$195,000	$195,000	$195,000	$975,000	TF
NW 109th Av. (NW 42nd- 43rd St)	New Road Construction	$600,000	$0	$0	$0	$0	$0	$0	TF
NW 102nd Av. (NW 66th- 74th St)	New Road Construction	$0	$0	$2,300,000	$0	$0	$0	$2,300,000	TF
NW 66th St. (NW 97th- 102nd Av)	New Road Construction	$0	$1,700,000	$0	$0	$0	$0	$1,700,000	TF
NW 92nd Av. (NW 28th- 33rd St)	New Road Construction	$0	$600,000	$0	$0	$0	$0	$600,000	TF
NW 82nd St. (112 Ave-114 Ave)	New Road Construction	$0	$660,000	$0	$0	$0	$0	$660,000	Parks
NW 82nd Ave (27 St-33 St)	Roadway Improvements	$0	$0	$300,000	$0	$0	$0	$300,000	TF
NW 99th Ave (64 St-66 St)	New Road Construction	$0	$0	$0	$500,000	$0	$0	$500,000	TF
NW 33 St (79 Ave-82 Ave)	Roadway Improvements	$1,600,000	$0	$0	$0	$0	$0	$0	TF, SW
NW 97 Ave (NW 70th St – 74th St)	New Roadway Construction/Widening	$1,400,000	$0	$0	$0	$0	$0	$0	JPA
Citywide	Transit Mobility & Infrastructure	$371,377	$500,000	$450,000	$400,000	$350,000	$300,000	$2,000,000	TF
Citywide	Pilot Bicycle Sharing Program	$300,000	$0	$150,000	$0	$0	$0	$150,000	TF
NW 41 St (79 Av - 87 Av)	Roadway Reconstruction	$0	$0	$2,700,000	$0	$0	$0	$2,700,000	TF, SW
NW 102 Av. & 62 St.	Roadway Widening	$0	$0	$700,000	$0	$0	$0	$700,000	TF
NW 82 Av. (27 St - 33 St)	Roadway Improvements	$0	$0	$300,000	$0	$0	$0	$300,000	TF

PROJECT / LOCATION	TYPE OF WORK	FY 2014-15	FY 2015-16	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	TOTAL COST FY 2016-20	FUNDING SOURCE
NW 112 Av. & 114 Av. (41 St. - 58 St.)	Roadway Improvements - Two-Way Pair	$0	$0	$0	$0	$2,000,000	$0	$2,000,000	TF
NW 114 Av. (34 St - 39 St)	Roadway Improvements	$0	$0	$0	$600,000	$0	$0	$600,000	TF
NW 34 St. (117 Av - 112 Av)	Roadway Improvements	$0	$0	$0	$0	$600,000	$0	$600,000	TF
NW 112 Av. (25 St - 34 St)	Roadway Improvements	$0	$0	$0	$0	$0	$800,000	$800,000	TF
NW 117 Av. (NW 58 St - North)	New Road Construction	$0	$0	$0	$800,000	$0	$0	$800,000	TF
NW 102 Av. (17 St - 25 St)	Bicycle Path	$0	$0	$0	$450,000	$0	$0	$450,000	TF
NW 12 St. (NW 97 Av - 89 Ct.)	Sidewalk Improvements	$0	$0	$100,000	$0	$0	$0	$100,000	TF
NW 52 St. & 102 Ave.	Roadway Improvements	$1,200,000	$0	$0	$0	$0	$0	$0	TF
5 Year Transportation Cost Sub Total		$5,831,377	$3,655,000	$7,195,000	$2,945,000	$3,145,000	$1,295,000	$18,235,000	

Source: City of Doral Public Works Dept., 2015

Table 19. 2015/16-2019/20 Schedule of Capital Improvements (continued)

Project/Location	Type of Work	FY 2014-15		FY 2015-16	FY 2016-17	FY 2017-18	FY 2018-19	FY 2019-20	Total Cost FY 2016-2020	Fund Source
City Parks										
NW 114th Av. & 82nd St	New Park	$5,500,000		$3,500,000	$0	$0	$0	$0	$3,500,000	GF/Impact Fee
NW 97th Av. & 74th St.	Doral North Park	$0		$10,000,000	$0	$0	$0	$0	$10,000,000	GF
Doral Central Park	Aquatic Facility	$0		$0	$12,000,000	$0	$0	$0	$12,000,000	GF
NW 87th Av. & 30th St	Doral Central Park	$0		$0	$0	$5,000,000	$10,000,0000	$0	$15,000,000	GF/Impact Fee
Adjacent to Downtown Doral Park	Triangle Parcel	$0		$0	$0	$1,000,000	$0	$0	$1,000,000	GF
NW 102 Av. & 62nd St	Retention Park	$0		$0	$0	$2,000,000	$0	$0	$2,000,000	GF
NW 50th St. & 107th Av.	Linear Park	$0		$0	$0	$450,000	$0	$0	$450,000	GF
5 Year Parks Cost Subtotal		$5,500,000		$13,500,000	$12,000,000	$8,450,000	$10,000,000	$0	$43,950,000	
City Stormwater Drainage										
City Wide	Stormwater Drainage	$1,000,000		$2,071,079	$2,067,171	$1,387,468	$1,398,536	$960,000	$7,884,254	SWF
5 Year Drainage Cost Subtotal		$1,000,000		$2,071,079	$2,067,171	$1,387,468	$1,398,536	$960,000	$7,884,254	
Total 5 Year Capital Cost-City		$12,331,377		$19,226,079	$21,262,171	$12,782,468	$14,543,536	$2,255,000	$70,069,254	

Table Key:
TF: Transportation Fund
SWF: Stormwater Fund
GF: General Fund