SIMPLE-Monthly Pollutant Loading Model Results - Lemon Bay Coastal Basin TN

Section 1 TN Loading has decreased by 6% from 2001-2016

Irrigation was the component that saw the greatest decreasing in loading from 2001-2016 (-52%)

Section 2 Stormwater Runoff is the greatest contributor to TN in the Lemon Bay Coastal Basin, contributing 42% of

the total load.

Section 3 Lemon Bay Coastal Basin is not a major TN contributor to the Lemon Bay watershed.

Section 1

Lemon Bay Coastal

Total Nitrogen

Pollutant Loading Trend	Decrease	-6%	2001 to 2016
Components of the Trend			
Stormwater Runoff	No Change	0%	2001 to 2016
Baseflow	No Change	0%	2001 to 2016
Septic Systems	Decrease	-14%	2001 to 2016
Point Source	No Change	0%	2001 to 2016

Irrigation Decrease -52% 2001 to 2016
Atmospheric Deposition Not Modeled 2001 to 2016

Year	Total	Runoff	Baseflow	Septic	Point Source	Irrigation	Atmospheric
2001	2149.45	849.60	321.60	922.07	0.00	112.48	0.00
2006	2046.54	849.63	321.61	816.96	4.37	53.98	0.00
2011	2056.07	849.63	321.61	830.86	0.00	53.98	0.00
2016	2019.19	849.63	321.61	793.98	0.00	53.98	0.00

Units are pounds per year and modeled using a typical rainfall year.

Jones Edmunds and Associates conducted this modeling for Sarasota County in 2017.

Modeling was conducted only for the parts of basins located within Sarasota County.

Pollutant loading from Atmospheric Deposition (wet and dry) was conducted only for bays.

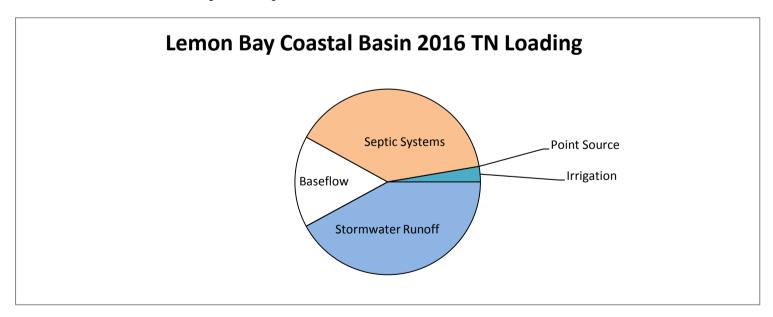
Section 2

Lemon Bay Coastal

Total Nitrogen

2016 Pollutant loading is influenced by some sources more than others

Stormwater Runoff42%Baseflow16%Septic Systems39%Point Source0%Irrigation3%Atmospheric DepositionNot Modeled



Section 3

Lemon Bay Coastal

Total Nitrogen

2016 Pollutant loading to the Lemon Bay Watershed has more than one source

Proportion of loading is Low when % load is compared to % acreage.

5%

Lemon Bay Coastal Basin acreage is 8% and % loading is

Lemon Bay Coatasl Basin is a part of the Lemon Bay Watershed

	Pounds TN 2016	Acreage
Lemon Bay Watershed	37,068	32,369

The following basins contribue to the loading to the Lemon Bay Watershed

	Pounds TN 2016	% of Watershed Load	Acreage	% of Lemon Bay Watershed
Ainger Creek Basin	3,359	9%	5,555	17%
Alligator Creek Basin	15,155	41%	6,787	21%
Woodmere Creek Basin	877	2%	1,475	5%
Forked Creek Basin	5,775	16%	5,863	18%
Gottfried Creek Basin	7,372	20%	7,019	22%
Coastal Lemon Bay	2,019	5%	2,658	8%
Manasota Key	114	0%	697	2%
Lemon Bay	2,397	0%	2,316	7%

