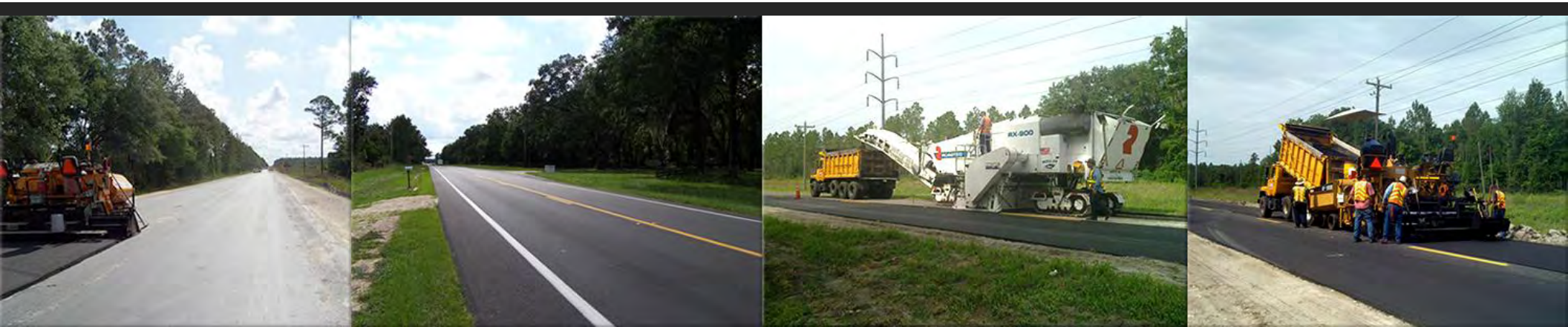
Pavement Management Program Update Report 2010

Presentation to the Alachua County Board of County Commissioners
October 5, 2010



Recommendations

- Receive the report;
- Direct staff to pursue Option 1: Proactive Capital Maintenance plan, including:
  - multimodal features for arterial, collector and local roads in the urban cluster,
  - stormwater features, and
  - life-cycle set-asides for new infrastructure

Recommendations (cont.)

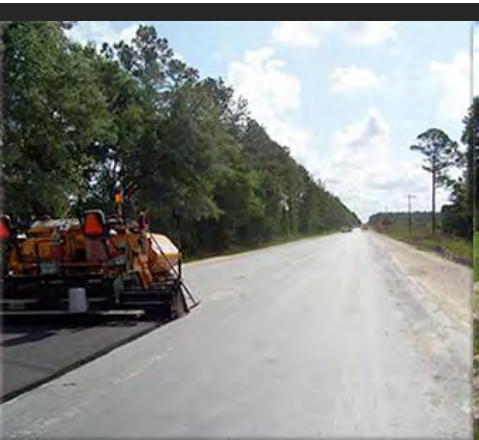
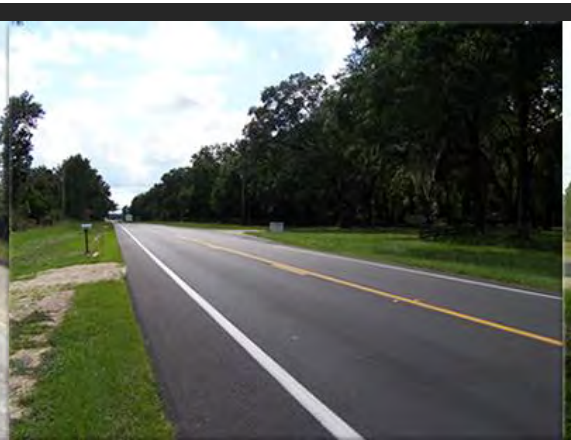
- Direct the County Manager and his staff to work with community leaders on a sales tax referendum for pavement management, as well as:
  - Continuing support of special assessment districts and
  - Continuing support of nickel gas tax

Presentation Overview

- Effective Pavement Management
- Alachua County Pavement Inventory
- Recent Roadway Infrastructure Projects/Ongoing Projects
- Current Pavement Condition/Pavement Deterioration
- Future of Pavement Management Program
- Recommendations



Effective Pavement Management


Effective Pavement Management Program

Definitions

- The practice of **planning** for pavement maintenance and rehabilitation with the goal of **maximizing the value and life** of a pavement network.
- A systematic process of collecting and analyzing pavement data so that **cost-effective** strategies can be selected to provide and **maintain** pavements in a serviceable condition.

Effective Pavement Management Program

Value of Program

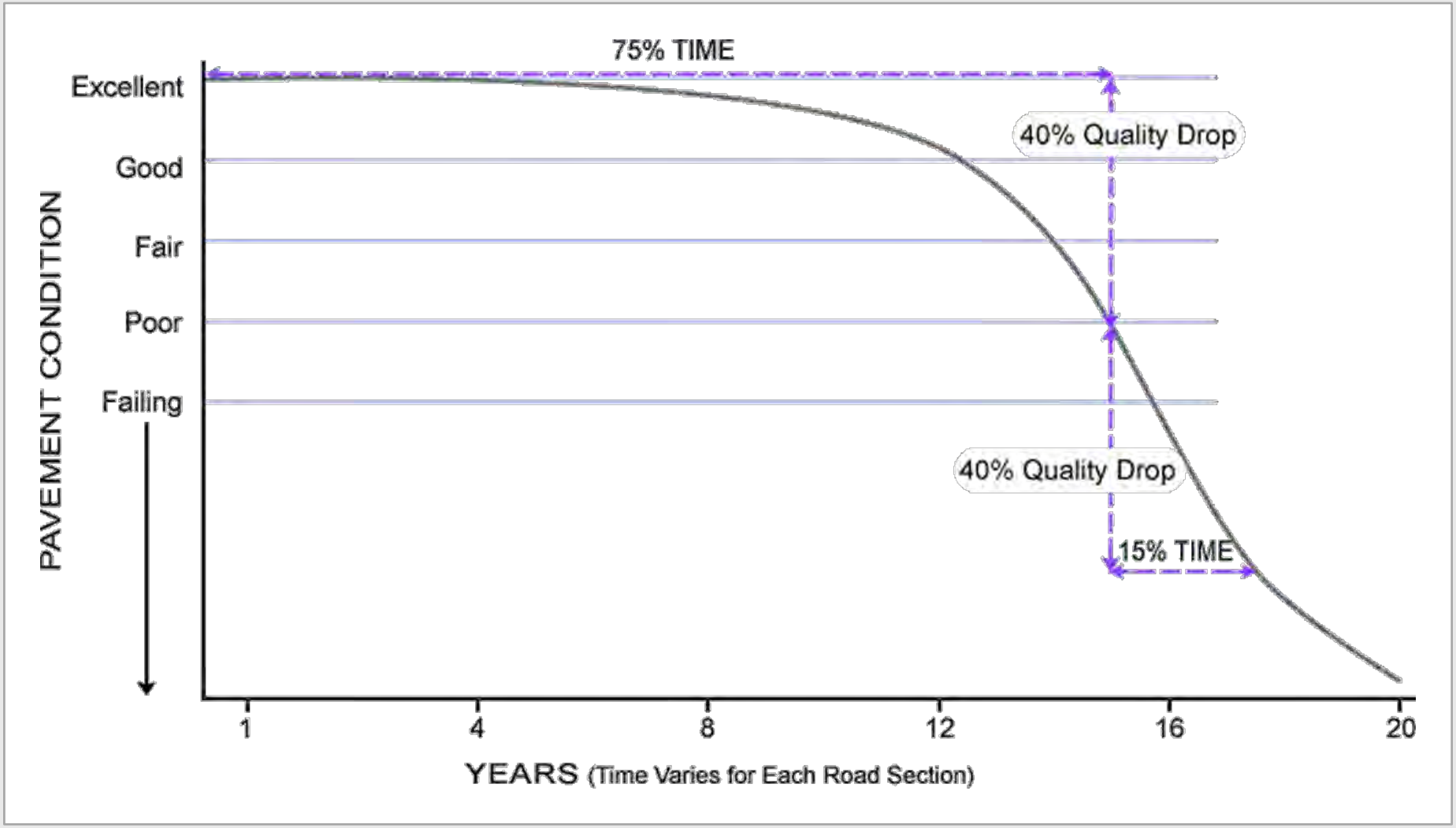
- **Identify and prioritize** rehabilitation needs
  - Select projects and rehabilitation techniques on an objective, rational basis
- Assist in determining **cost-effective treatment strategies**
  - Demonstrate impacts of alternate strategies
  - Allocate funds so an agency can get the most “bang for the buck”

Effective Pavement Management Program

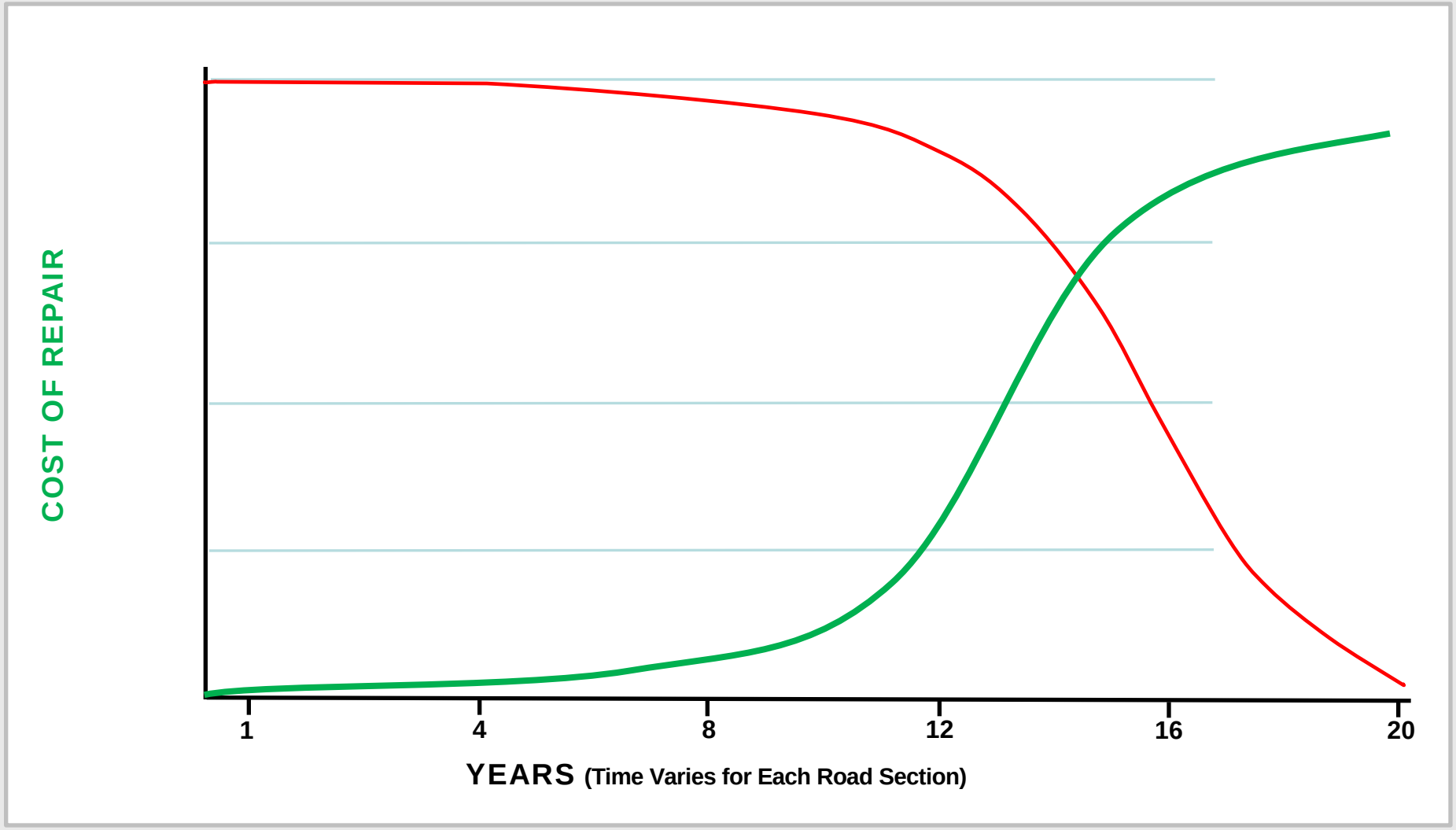
- Maintain roadways in good repair for the least cost
  - Routine pavement inspections
  - Scheduled preventative maintenance
  - Scheduled milling & resurfacing

Never let a road reach the need for Structural Repair

Pavement Deterioration Curve



Deferred Maintenance



Effective Pavement Management Program

Outputs of Program – Analysis

- **Inventory reports**
  - Condition ratings
  - By functional classification
  - By surface type
- Pavement **distress data** analysis
  - Overall condition
  - Rate of deterioration
  - Cause of deterioration

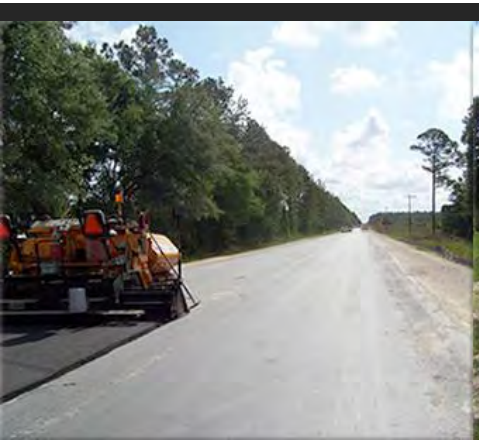
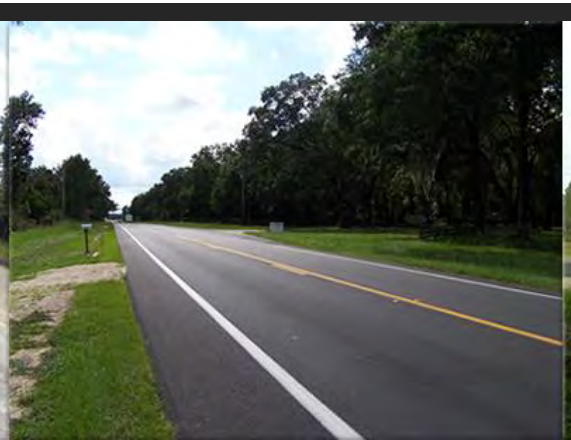
Effective Pavement Management Program

Outputs of Program – Deliverables

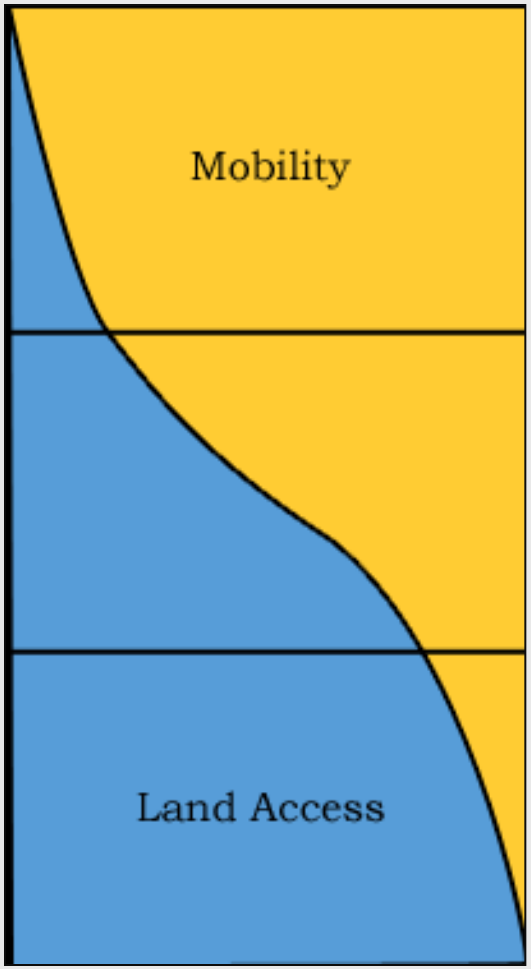
- **Prioritized list** of maintenance and rehabilitation needs
- Evaluation of **impact of various program** approaches through a comparison of conditions, backlog, or other measures
- Determination of **budget needs**



Alachua County Pavement Inventory


Roadway Functional Classifications



Type of Roadway

← Arterials
Higher mobility
Lower degree of access

← Collectors
Balance between mobility and access

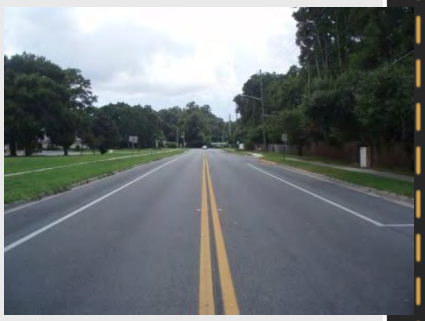
← Locals
Lower mobility
Higher degree of access

County Examples

Tower Road

NW 39th Ave

NW 51st Street



Schoolhouse Road

Firestation Road

Paved Roadway Miles

Miles by Functional Classification

Arterial	Collector	Local	Subdivision	Total
22.36 miles	341.38 miles	58.34 miles	255.12 miles	677.2 miles

Miles by Functional Classification in Urban Cluster

Arterial	Collector	Local	Subdivision	Total
22.36 miles	55.66 miles	19.94 miles	204.95 miles	302.92 miles

Two overarching principals:

- Urban roads cost more to maintain than rural roads
- Higher functionally classified roads cost more to maintain than lower functionally classified roads

Unimproved Roadway Miles

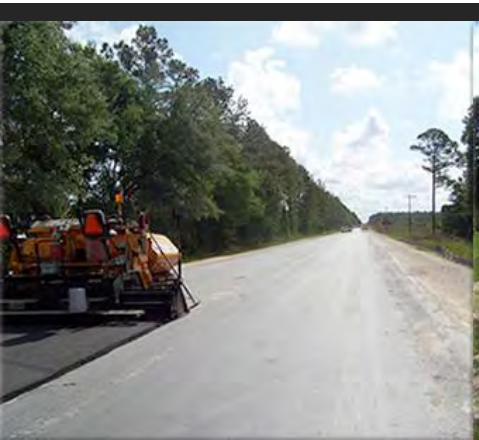
Miles by Functional Classification

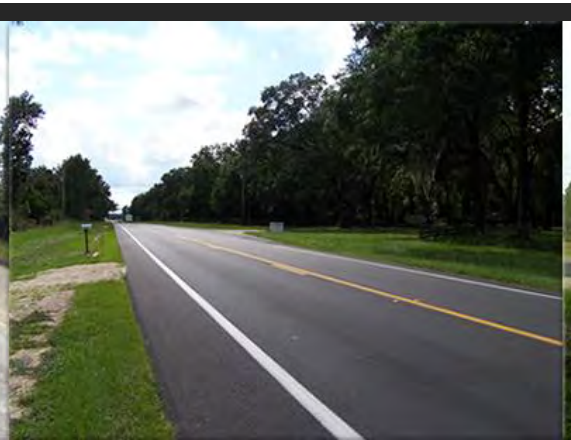
Arterial	Collector	Local	Subdivision	Total
	27 miles	212 miles		239 miles

Surface Treated Miles by Functional Classification

Arterial	Collector	Local	Subdivision	Total
	7.9 miles	10.7 miles		18.6 miles

Recent Roadway Infrastructure Projects/ Ongoing Projects





Roadway Infrastructure Projects

Current Funding

- **Transportation Trust Fund** (Operating Gas Taxes)
  - February 17, 2005 – $9,300,000 ($8,300,000 from Gas Tax reserves, $1,000,000 from General Fund) for 12.6 miles
- **Gas Tax Bond Initiative** (Operating Gas Taxes & General Fund)
  - April 19, 2005 – $33,000,000 for 55 miles

Roadway Infrastructure Projects

Current Funding

- **Infrastructure Sales Tax Bond Initiative**
  - 2006 – $18,600,000 of $80,000,000 infrastructure Sales Tax Bond initiative
- **Nickel Local Option Gas Tax**
  - June 16, 2007 – 75% of Nickel Local Option Gas Tax
- **Stimulus Funding** (American Reinvestment and Recovery Act)
  - 2009 – two roads were partially funded through FDOT ($1,400,000)

Roadway Infrastructure Projects

Progress to Date

- **27 resurfacing projects** currently funded (113 miles)
  - 5 funding sources
    - Transportation Trust Fund (Operating gas taxes)
    - Gas tax bond initiative (Operating gas taxes and General Fund)
    - Infrastructure Sales tax bond initiative
    - Nickel local option gas tax
    - American Reinvestment and Recovery Act (Stimulus)

Roadway Infrastructure Projects

Progress to Date

Transportation Trust Fund		**$9,300,000**	
ROADWAY	**MILES**	**ESTIMATED**	**FINAL PROJECT COST**
NW/NE 53rd Avenue	4	$2,200,000	$1,387,929
SW 20/24th Avenue	2.4	$1,200,000	$1,135,085
NW CR 236	3.2	$2,900,000	$1,750,521
SW 8th Avenue	3	$3,000,000	$2,360,234

NW/NE 53rd Ave
Constructed: 2005

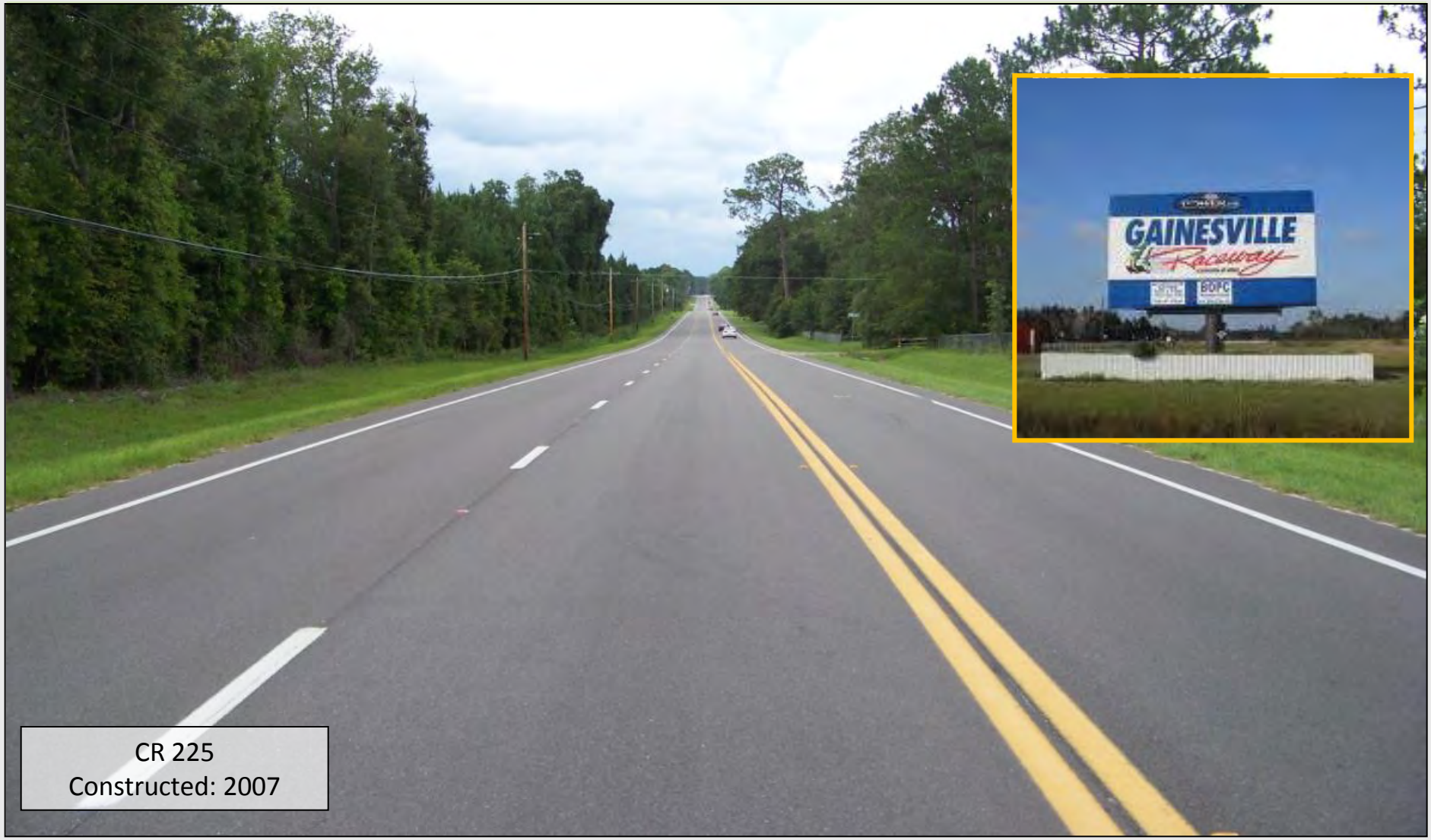
Roadway Infrastructure Projects

Progress to Date

Gas Tax Bond Initiative		**$33,000,000**	
ROADWAY	**MILES**	**ESTIMATED**	**FINAL PROJECT COST**
Sunningdale S/D	4	$529,000	$274,948
Jacks/Pine Acres S/D	2.4	$126,000	$133,740
Arredondo Estates S/D	3.2	$652,000	$442,686
NW 182nd Avenue	3	$2,300,000	$1,511,703
NE CR 225	7	$4,500,000	$5,085,194
SW 20th Avenue	1	$850,000	$1,229,931
NW 51st Street	1	$700,000	$1,114,974
NW 39th Avenue	2.5	$1,650,000	$1,188,438
NE CR 1474	4.3	$2,900,000	$2,635,542
SE CR 325	8	$5,300,000	TBD (Bidding for Construction)
Pine Hill Estates	3	$529,000	$314,923
NW CR 241	10	$6,600,000	TBD (Finalizing Construction)
SW 91st Street	1	$700,000	TBD (Bidding for Construction)
Fort Clarke Forest	1.5	$264,000	$188,925
SW 122nd Street	4.4	$2,900,000	TBD (Under Construction)
Main Street	2	$2,500,000	TBD (Bidding for Construction)

Roadway Infrastructure Projects

Progress to Date



CR 225
Constructed: 2007

Roadway Infrastructure Projects

Progress to Date

Infrastructure Sales Tax Bond Initiative		$18,600,000	
ROADWAY	**MILES**	**ESTIMATED**	**FINAL PROJECT COST**
SW CR 337	8	$8,300,000	TBD (Under Design)
NW CR 236	5	$3,500,000	TBD (Under Design)
Other roadway projects	N/A	$6,800,000	TBD (Ongoing)

Roadway Infrastructure Projects

Progress to Date

Nickel Local Option Gas Tax (75%) — $2,100,000 per year

ROADWAY	MILES	ESTIMATED	FINAL PROJECT COST
NW 16th/23rd Ave	5	$6,500,000	TBD (Under Design)
SW 62nd Ave/63rd Blvd	3	$4,000,000	TBD (Under Design)
NW CR 231	7	$5,600,000	TBD (Under Design)
NW CR 235	12	$10,000,000	-
NW 43rd Street	4	$4,200,000	-

Nickel Local Option Gas Tax (15%) — $420,000 per year

ROADWAY	MILES	ESTIMATED	FINAL PROJECT COST
Unimproved Road Surface Treatment	N/A	$420,000	TBD (Ongoing)

Nickel Local Option Gas Tax (10%) — $280,000 per year

ROADWAY	MILES	ESTIMATED	FINAL PROJECT COST
Bicycle/Pedestrian Projects	N/A	$280,000	TBD (Ongoing)

Roadway Infrastructure Projects

Progress to Date

Stimulus (American Reinvestment and Recovery Act) $1,563,183

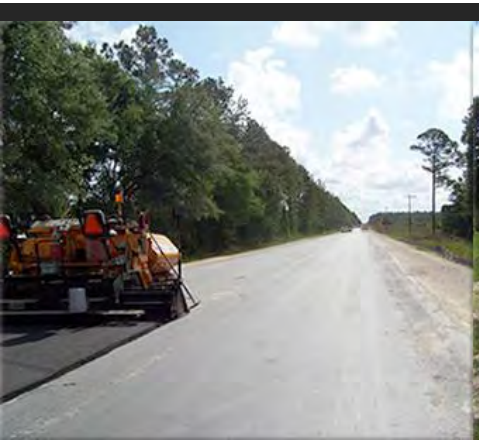
ROADWAY	MILES	ESTIMATED	FINAL PROJECT COST
N Main Street	2	$1,100,000	$981,332
SW 122nd Street	0.8	$650,000	$400,946
Sidewalk Projects	N/A	$260,000	$180,905

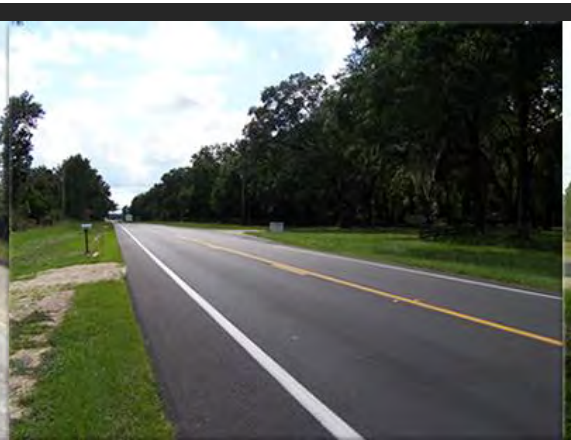
Roadway Infrastructure Projects

Progress to Date

- **27 resurfacing projects** currently funded (113 miles)
  - 15 projects have been completed (43.7 miles)
    - 2006: 6 projects – 17.0 miles
    - 2007: 3 projects – 11.5 miles
    - 2008: 5 projects – 12.2 miles
    - 2009: 1 project – 3.0 miles
  - 5 projects scheduled for completion by 2011
  - 4 projects scheduled for completion by 2012
  - 3 projects scheduled beyond 2013

Current Pavement Condition/ Pavement Deterioration





Current Pavement Condition

Pavement Condition Analysis

Staff evaluation

- **6-month visual evaluation** of all roads on County system
  - Identification of surface defects, surface deformations, cracks, and patches and potholes
  - Identification of reason for deterioration
- **Categorization of pavement** according to method of repair needed

Current Pavement Condition

Pavement Condition Analysis: Explanation of Categories

No Repair Needed

NW 51st Street, Resurfaced 2008

SW 20th Avenue, Resurfaced 2008

Surface Rating	Visible Distress	General Condition
No Repair Needed	None.	New construction. Recent overlay. Like new.

Current Pavement Condition

Pavement Condition Analysis: Explanation of Categories

Minor Repair Needed (Mill, Resurface)

County Road 241, Resurfaced 2002

County Road 241, Resurfaced 2002

Surface Rating	Visible Distress	General Condition
Minor Repair Needed	Surface shows some traffic wear and raveling. Longitudinal cracks (open 1⁄4”) due to reflection or paving joints. Transverse cracks (open 1⁄4”) spaced 10’ or more apart, little or slight crack raveling. No patching or very few patches in excellent condition.	Surface aging. Sound structural condition.

Current Pavement Condition

Pavement Condition Analysis: Explanation of Categories

Major Repair Needed (Mill, ARMI Layer, Resurface)

NW 94th Avenue, Paved 1979

SE 43rd Street, Paved 1979

Surface Rating	Visible Distress	General Condition
Major Repair Needed	Moderate to severe raveling (loss of fine and coarse aggregate). Longitudinal & transverse cracks (open 1⁄2”) show signs of slight raveling and secondary cracks. Block cracking. Extensive to severe flushing or polishing.	Severe deterioration.

Current Pavement Condition

Pavement Condition Analysis: Explanation of Categories

Structural Repair Needed

NW 32nd Avenue, Paved 1978

NW 32nd Avenue, Paved 1978

Surface Rating	Visible Distress	General Condition
Structural Repair Needed	Alligator cracking (over 25% of surface). Severe distortions (over 2" deep) Extensive patching in poor condition. Severe distress with extensive loss of surface integrity.	Needs patching and repair prior to major overlay.

Current Pavement Condition

Pavement Condition Analysis: Explanation of Categories

Full Pavement Reconstruction Needed

CR 236, Paved 1976

CR 231, Paved 1960

Surface Rating	Visible Distress	General Condition
Full Pavement Reconstruction Needed	Closely spaced longitudinal & transverse cracks often showing raveling & crack erosion. Severe block cracking. Some alligator cracking (less than 25% of surface). Patches in fair to poor condition. Moderate rutting or distortion (1” or 2” deep). Occasional potholes.	Needs patching and repair prior to major overlay.

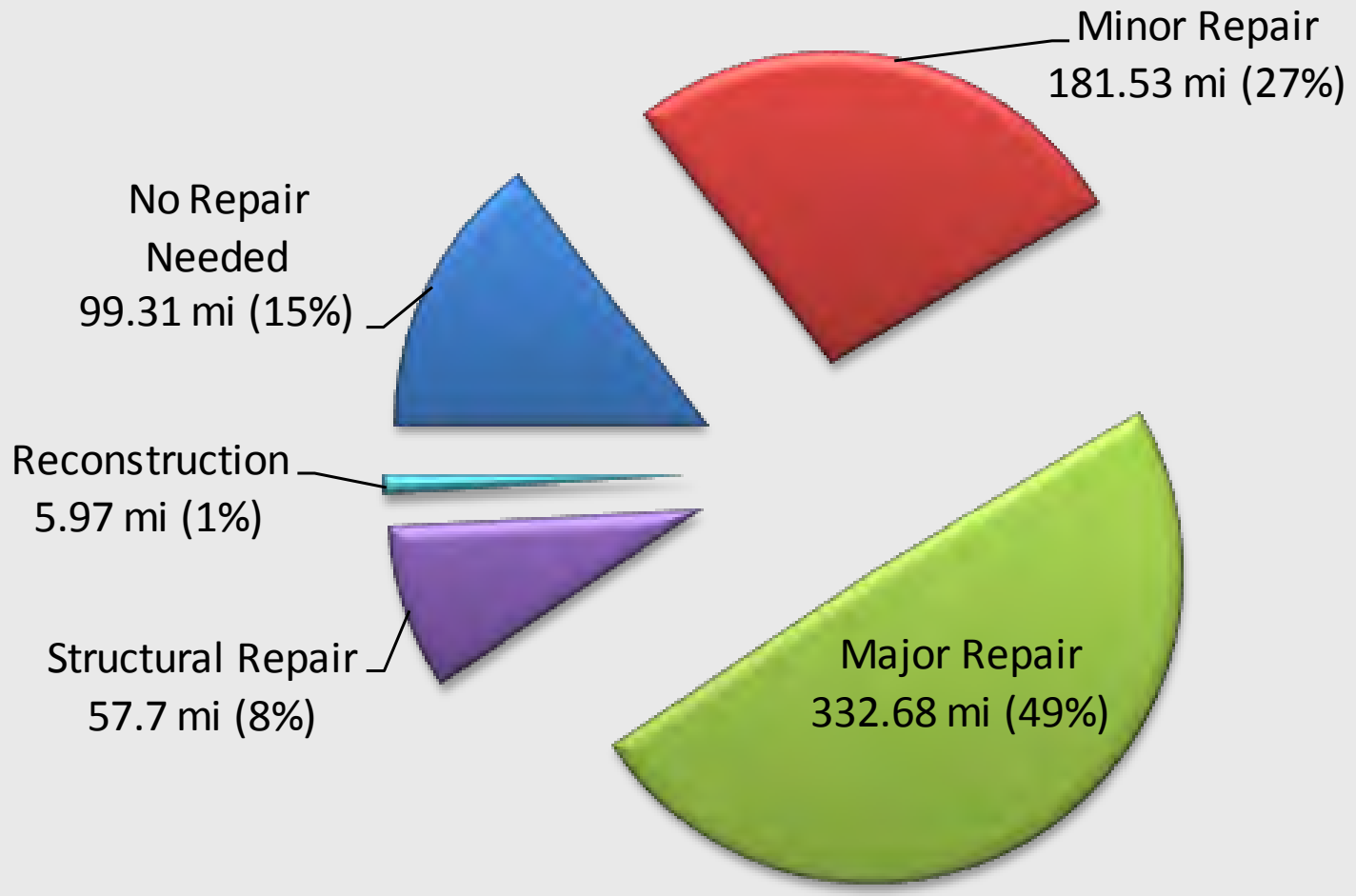
Current Pavement Condition

Pavement Condition Analysis: Explanation of Categories

Condition Category	Repair strategy
No Repair	N/A
Minor Repair	Mill the top 1 to 1.5 inch of asphalt and resurface
Major Repair	Mill 1.5 inches of asphalt, place a rubberized crack relief membrane, resurface
Structural Repair	Completely mill off all asphalt, rework specific areas of the road base, replace structural and friction courses of asphalt
Reconstruction	Completely remove all asphalt and limerock layers along a substantial portion of the roadway segment, replace structural limerock, replace structural and friction courses of asphalt

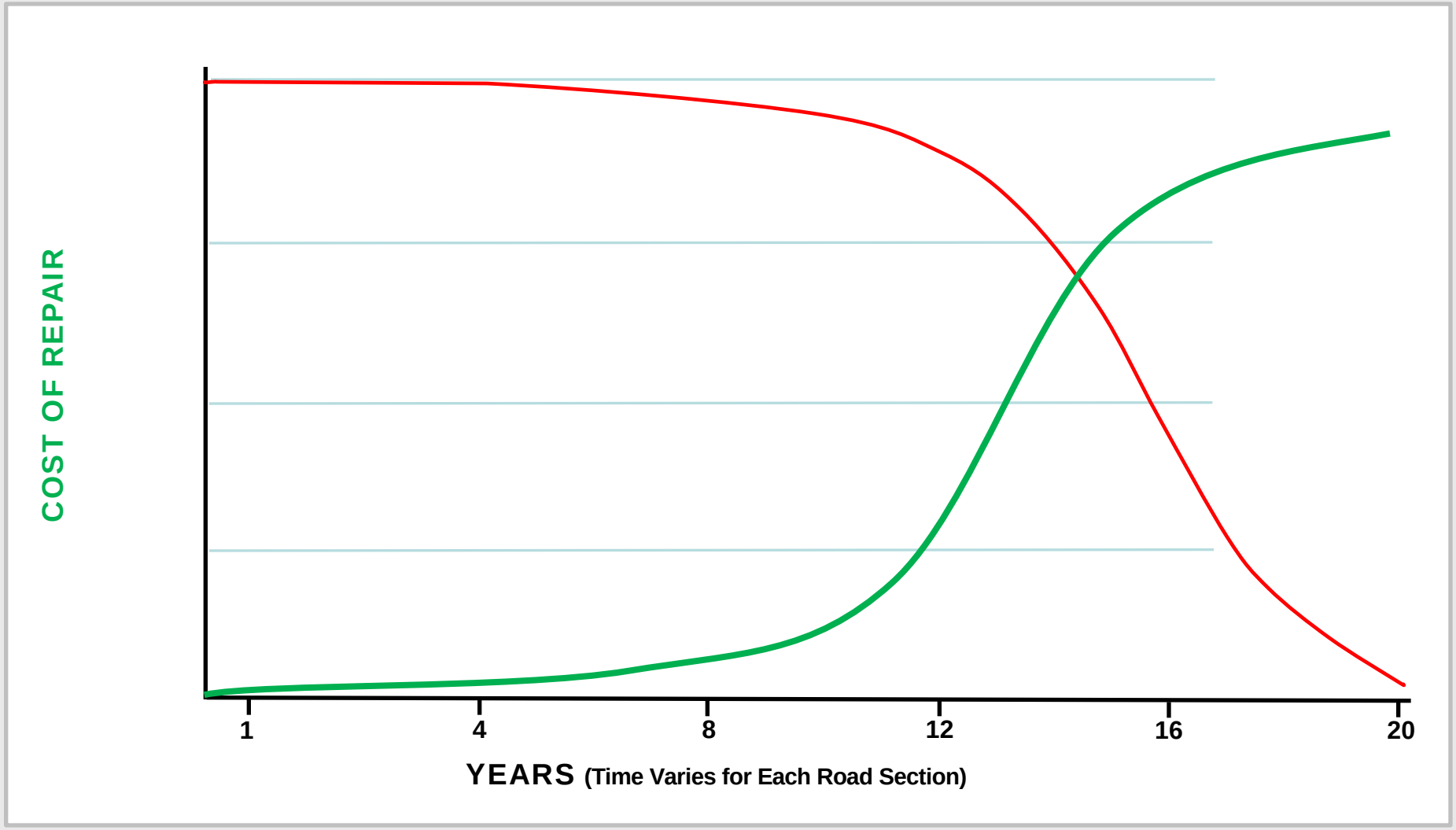
Current Pavement Condition

2010 Pavement Condition Analysis



Total Paved Miles: 677

Deferred Maintenance

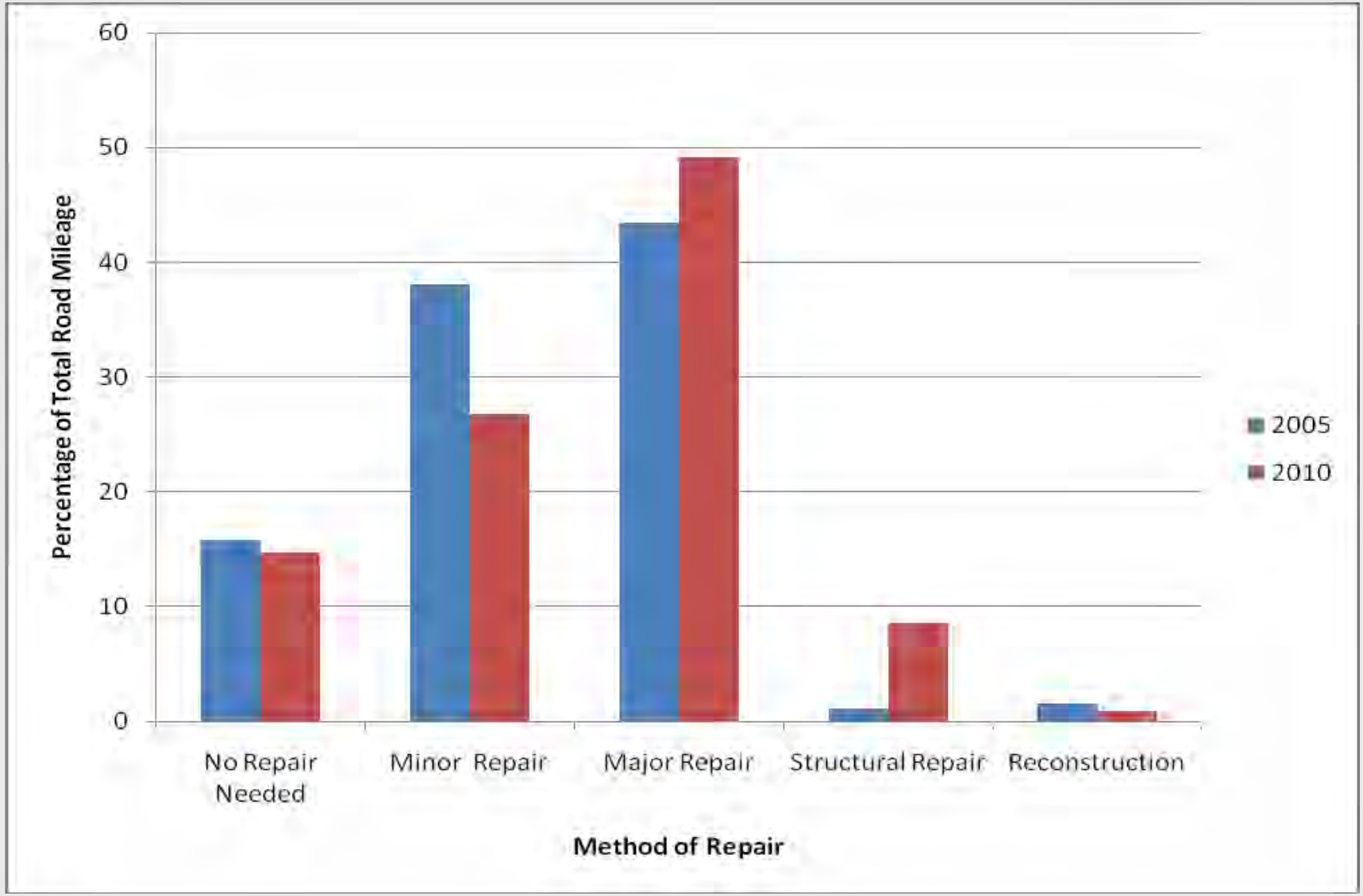


Current Pavement Condition

- Since 2005, factors effecting deterioration:
  - Pavement continues to age.
  - Traffic volumes have changed. From 2005 to 2008, traffic volumes increased by an average of 2% per year.
  - Number of roadway miles maintained by the County increased.
  - County has repaired 43.7 miles and has funding to repair an additional 56.2 miles.
  - Roadway routine maintenance level of service has dropped, proportionately with the budget.

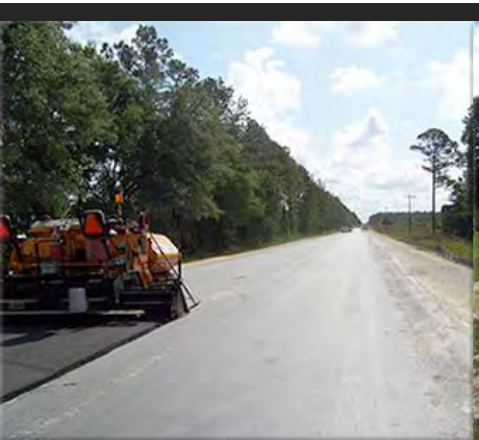
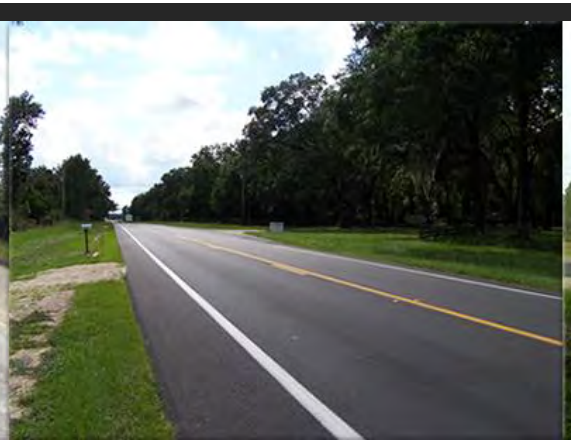
Current Pavement Condition

2005 & 2010 Comparison of Roadway Infrastructure





Future of Pavement Management Program


Future of Pavement Management Program

Components:

- Type of program
- Multimodal features
- Stormwater features
- Capital repair & new infrastructure replacement
- Funding

Future of Pavement Management Program

Program Options

Option 1: Proactive Capital Maintenance

Option 2: Maintain Current Pavement Condition

Option 3: Maintain Status Quo

Future of Pavement Management Program

Program Options: Pavement Rehabilitation Costs

- Structural
  - Method of rehabilitation
  - Functional classification
- Correction of deficient lane widths
  - Default: 11-foot lane widths unless constrained
- Paved shoulders (Comp. Plan TME Policy 1.6.8)
  - Default: 4-foot paved shoulders unless constrained
- Etc. (mobilization, maintenance of traffic, clearing and grubbing, grading, stabilization, striping, erosion control, drainage)

Future of Pavement Management Program

Lane Widths

Safety benefits

- Reduction in run-off-road, head-on and sideswipe crashes
  - Provides space/separation
  - Reduces user conflicts

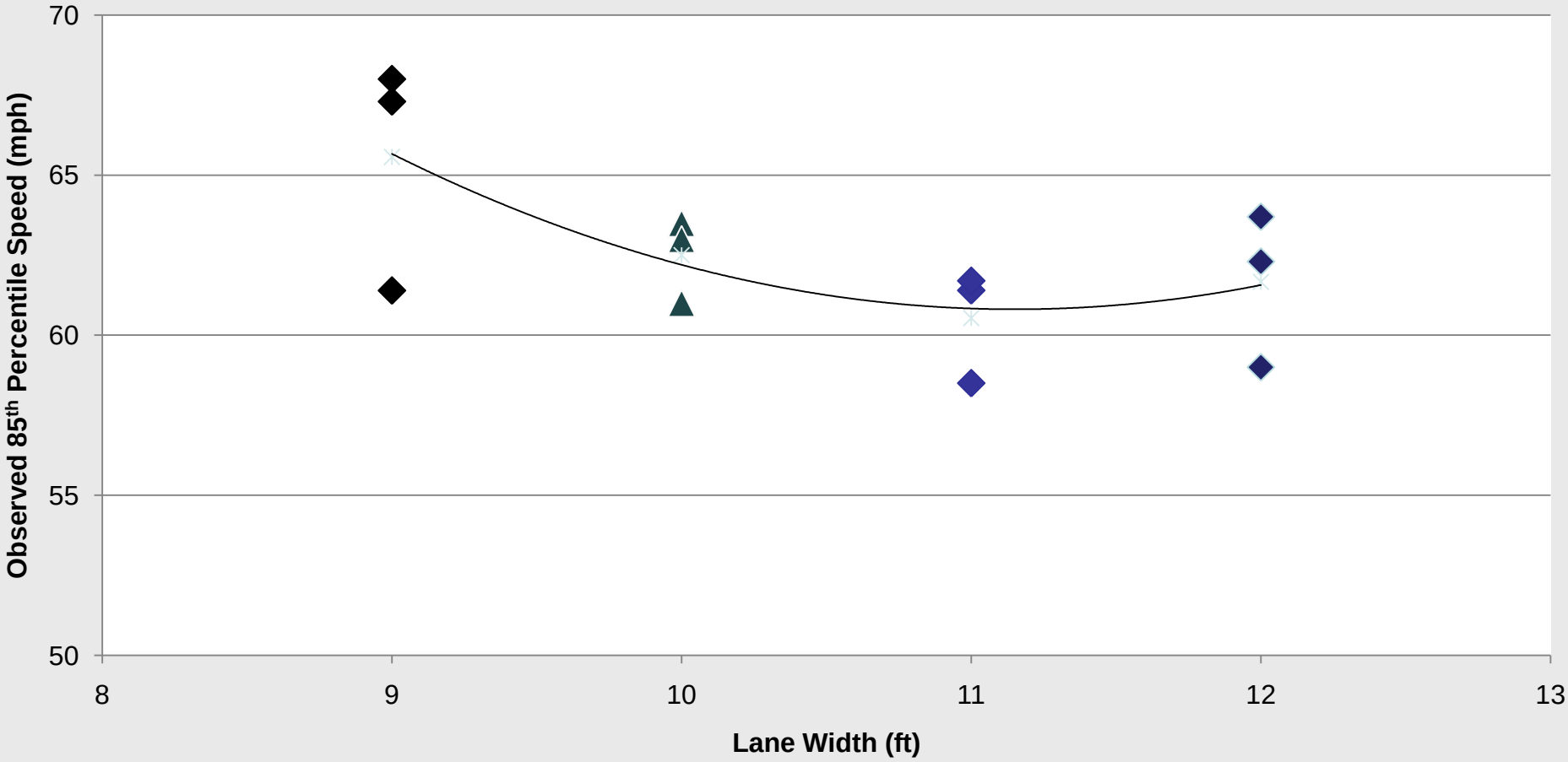
Widen Travel Lane (ft)	Crash Reduction* (%)
1	12%
2	23%
3	32%
4	40%

* Source: Publication No. FHWA-SA-07-013, Toolbox of Countermeasures and Their Potential Effectiveness for Roadway Departure Crashes, 2008.

Future of Pavement Management Program

Lane Widths

TRAVEL SPEEDS RE. TO LANE WIDTH ON COMPARABLE ALACHUA COUNTY ROADS



Future of Pavement Management Program

Paved Shoulders

- Required by Alachua County Comprehensive Plan – Transportation Mobility Element

Policy 1.6.8

Bike lanes or paved shoulders shall be provided whenever turn lanes are constructed on a rural cross-section arterial or collector roadways. Bike lanes or paved shoulders shall be provided in conjunction with the resurfacing or reconstruction of all rural cross-section arterial and collector roadways unless prohibited due to stormwater, environmental or right-of-way constraints.

Future of Pavement Management Program

Paved Shoulders

Maintenance benefits

- Reduction in costs for routine service and repairs
  - Reduces edge-of-pavement repairs
  - Extends pavement life
  - Reduces resident requests/service calls
  - Reduces edge-of-pavement drop-offs
  - Provides more space for shoulder maintenance operations

Future of Pavement Management Program

Paved Shoulders

Safety benefits

- Reduction in object and run-off-road crashes
  - Provides space/separation
  - Increases sight distance
  - Reduces user conflicts
  - Reduces edge-of-pavement drop-offs
  - Reduces stormwater accumulation in travel lanes

Shoulder Widening per side, (ft)	Crash Reduction* (%)
2	16%
4	29%
6	40%
8	49%

* Source: Publication No. FHWA-SA-07-013, Toolbox of Countermeasures and Their Potential Effectiveness for Roadway Departure Crashes, 2008.

Future of Pavement Management Program

Paved Shoulders – CR 337 Example

CR 337 Example:

- Crash data 2004 to 2008
  - 15 crashes within project limits (6 miles)
- Average traffic
  - 1,000 vehicles per day
- 30% of crashes involve injury
- 85^{th} percentile speed
  - 65 mph

Future of Pavement Management Program

Paved Shoulders – CR 337 Example

	Option #1 No Paved Shoulder	Option #2 2' Paved Shoulder	Option #3 4' Paved Shoulder
Construction Cost	$ 3,360,000	$ 3,500,000	$ 3,640,000
Life of Roadway	20 Year	20 Year	20 year
Roadway Crashes per Year*	5.4	4.5	3.8
Annual Crash Cost*	$ 584,280	$ 490,795	$ 414,839
Life of Road Crash Cost 2033	$11,685,600	$ 9,815,904	$ 8,296,776
Total Cost	$15,045,600	$13,315,904	$11,936,776

* Crash reductions and annual crash cost based on findings from Publication No. FHWA-HRT-05-051, Crash Cost Estimates by Maximum Police-Reported Injury Severity Within Selected Crash Geometries, 2005.

Future of Pavement Management Program

Program Options

Option 1: Proactive Capital Maintenance

- 1st 20 years – address capital maintenance backlog.
- 2nd 20 years – maintains pavement in good condition.

PAVEMENT CAPITAL MAINTENANCE OPTIONS		PAVEMENT REPAIR/YEAR	TOTAL ROADWAY MILES REPAIRED	AVERAGE COST PER MILE
Option 1: Proactive Capital Maintenance Plan	First 20 years	$18,900,000	585 miles	$646,000
	Second 20 years	$7,290,000	677 miles	$215,000
	TOTAL (over 40 years)	**$523,800,000**	**1262 miles**	**$431,000**

Future of Pavement Management Program

Program Options

Option 2: Maintain Current Pavement Condition

- 1st 20 years – address only enough of repair to maintain the pavement in its current condition, deferring capital maintenance backlog until future time.
- 2nd 20 years - address capital maintenance backlog.

PAVEMENT CAPITAL MAINTENANCE OPTIONS		PAVEMENT REPAIR/YEAR	TOTAL ROADWAY MILES REPAIRED	AVERAGE COST PER MILE
Option 2: Maintain Current Pavement Condition	First 20 years	$12,200,000	280 miles	$872,000
	Second 20 years	$18,900,000	585 miles	$646,000
	TOTAL (over 40 years)	**$622,000,000**	**865 miles**	**$719,000**

Future of Pavement Management Program

Program Options

Option 3: Maintain Status Quo

- 1st 20 years – address only repairs that can be made with current funding, deferring capital maintenance backlog until future time.
- 2nd 20 years - address capital maintenance backlog.

PAVEMENT CAPITAL MAINTENANCE OPTIONS		PAVEMENT REPAIR/YEAR	TOTAL ROADWAY MILES REPAIRED	AVERAGE COST PER MILE
Option 3: Maintain Status Quo	First 20 years	$6,020,000	63 miles	$1,910,000
	Second 20 years	$22,300,000	671 miles	$665,000
	TOTAL (over 40 years)	**$567,000,000**	**734 miles**	**$772,000**

Future of Pavement Management Program

Program Options

PAVEMENT CAPITAL MAINTENANCE OPTIONS		PAVEMENT REPAIR/YEAR	TOTAL ROADWAY MILES REPAIRED	AVERAGE COST PER MILE
Option 1: Proactive Capital Maintenance Plan	TOTAL (over 40 years)	$523,800,000	1262 miles	$431,000
Option 2: Maintain Current Pavement Condition	TOTAL (over 40 years)	$622,000,000	865 miles	$719,000
Option 3: Maintain Status Quo	TOTAL (over 40 years)	$567,000,000	734 miles	$772,000

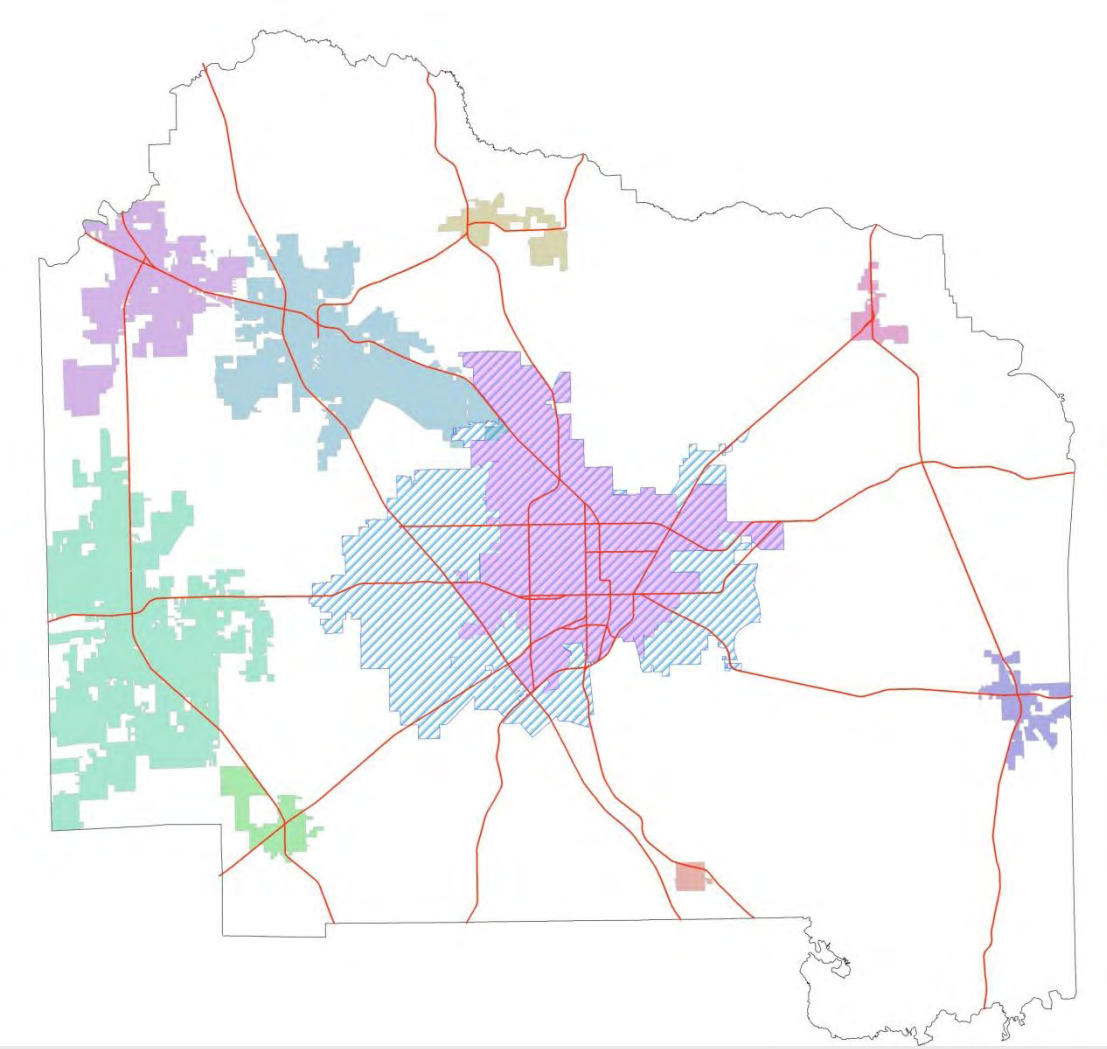
Future of Pavement Management Program

Program Options: Multimodal Features

Type of Roadway	Existing Paths	Added Paths
Arterial/ Collectors	None	8 foot & 6 foot
	1 side	8 foot
	2 sides	None
Local (>1200 trips)	None	8 foot & 6 foot
	1 side	8 foot
	2 sides	None
Local (<1200 trips) & Subdivisions	None	8 foot
	1 or 2 sides	None

Future of Pavement Management Program

Program Options: County Urban Cluster



Future of Pavement Management Program

Program Options: Multimodal Features

PAVEMENT CAPITAL MAINTENANCE OPTIONS WITH MULTIMODAL FEATURES		PAVEMENT REPAIR	+ MULTIMODAL		
			Countywide (All roads)	Urban Cluster (All Roads)	Urban Cluster (Art., Coll., Local)
Option 1: Proactive Capital Maintenance Plan	TOTAL COSTS (over 40 years)	$523,800,000	$224,000,000	$102,400,000	$54,000,000
Option 2: Maintain Current Pavement Condition	TOTAL COST (over 40 years)	$622,000,000	$224,000,000	$102,400,000	$54,000,000
Option 3: Maintain Status Quo	TOTAL COSTS (over 40 years)	$566,400,000	$224,000,000	$102,400,000	$54,000,000

Future of Pavement Management Program

Program Options: Stormwater Features

- Meeting water quality/quantity standards for existing roadway structures
- $6,087.00/mile

PAVEMENT CAPITAL MAINTENANCE OPTIONS WITH STORMWATER FEATURES		PAVEMENT REPAIR	+ STORMWATER Quality/ Quantity
Option 1: Proactive Capital Maintenance Plan	TOTAL COSTS (over 40 years)	$523,800,000	$97,500,000
Option 2: Maintain Current Pavement Condition	TOTAL COST (over 40 years)	$622,000,000	$97,500,000
Option 3: Maintain Status Quo	TOTAL COSTS (over 40 years)	$566,400,000	$97,500,000

Future of Pavement Management Program

Capital Repair & New Infrastructure Replacement

- New multimodal facilities will be constructed to support **Mobility Plan**
  - No additional funding exists for capital maintenance of new infrastructure
- **"Replacement" fund** needed as new facilities are built
  - Set aside a proportionate amount every year to fund cost of repair at end of pavement life

Future of Pavement Management Program

Capital Repair & New Infrastructure Replacement

YEAR	SET-ASIDE $
2012	$71,917
2013	$111,382
2014	$211,121
2015	$211,121
2016	$400,216
2017	$400,216
2018	$400,216
2019	$543,843
2020	$1,054,370
2021	$1,444,313

YEAR (CONT.)	SET-ASIDE $ (CONT.)
2022	$1,444,313
2023	$1,444,313
2024	$1,444,313
2025	$1,444,313
2026	$2,090,898
2027	$2,090,898
2028	$2,177,199
2029	$2,177,199
2030	$2,177,199
≥2031	$2,478,712

Future of Pavement Management Program

Decision Points

1. Type of program
   a) Option 1: Proactive Capital Maintenance
   b) Option 2: Maintain Current Pavement Condition
   c) Option 3: Maintain Status Quo
2. Multimodal features
   a) Countywide
   b) Urban cluster (all roads)
   c) Urban cluster (arterial, collector and local roads)
3. Stormwater features
   a) Yes
   b) No
4. Capital repair & new infrastructure replacement
   a) Yes
   b) No

Future of Pavement Management Program

Program Options: Annual Feature Costs

PAVEMENT CAPITAL MAINTENANCE OPTIONS WITH MULTIMODAL & STORMWATER FEATURES		PAVEMENT REPAIR (Per Year)	+ MULTIMODAL (Per Year)			+ STORMWATER Quality/ Quantity (Per Year)
			Countywide (All Roads)	Urban Cluster (All Roads)	Urban Cluster (Art, Coll, Local)	
Option 1: Proactive Capital Maintenance Plan	1st 20 Years	$18,900,000	$11,200,000	$5,120,000	$2,700,000	$4,870,000
	2nd 20 Years	$7,290,000	$0	$0	$0	$0
	TOTAL COSTS	**$523,800,000**	**$224,000,000**	**$102,400,000**	**$54,000,000**	**$97,500,000**
Option 2: Maintain Current Pavement Condition	1st 20 Years	$12,200,000	$4,850,000	$1,910,000	$1,010,000	$2,020,000
	2nd 20 Years	$18,900,000	$6,350,000	$3,210,000	$1,690,000	$2,850,000
	TOTAL COSTS	**$622,000,000**	**$224,000,000**	**$102,400,000**	**$54,000,000**	**$97,500,000**
Option 3: Maintain Status Quo	1st 20 Years	$6,020,000	$1,100,000	$230,000	$120,000	$450,000
	2nd 20 Years	$22,300,000	$10,100,000	$4,890,000	$2,580,000	$4,420,000
	TOTAL COSTS	**$566,400,000**	**$224,000,000**	**$102,400,000**	**$54,000,000**	**$97,500,000**

Future of Pavement Management Program

Funding Issues

Local Gas Taxes are not Indexed

- Revenues do not have an adjustment factor for inflation

Gas Tax Revenues Down

- Road-related maintenance and construction costs increasing at a greater rate than Gas Tax revenues.
- Historically, 2-4% annual growth in Gas Tax revenues.
- Since 2008, revenues from Gas Tax decreased by nearly 7% (more than $600,000).

Reduction of General Fund Supplement to Gas Tax Bond Pledge

- Gas Tax Bond debt service: 15 years toward for $33,000,000 roadway maintenance bond initiative.
  - Debt service original allocation: $3,000,000/year ($1,000,000 in Gas Tax and $2,000,000 in General Fund).
  - Current allocation: $3,123,000/year (1,923,000 in Gas Tax and $1,200,000 in General Fund).

Future of Pavement Management Program

Funding Issues

No Issuance of Further Infrastructure Sales Tax Bond

- Intended allocation: $18.6 million to roadway projects.
- Allocation to date: $4.6 million roadway projects.

Limited Recurring Funding Sources

- All available recurring funding sources committed for at least ten years.

Capacity-Only Funding

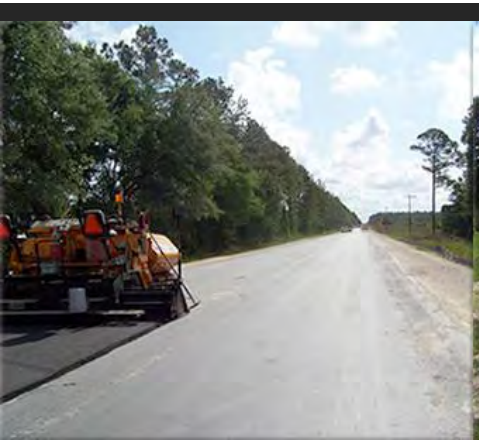
- Roadway funding that cannot be used for pavement maintenance: Campus Development Agreement, Multimodal Impact Fees, Proportionate Fair Share, and Federal and State Earmarks.

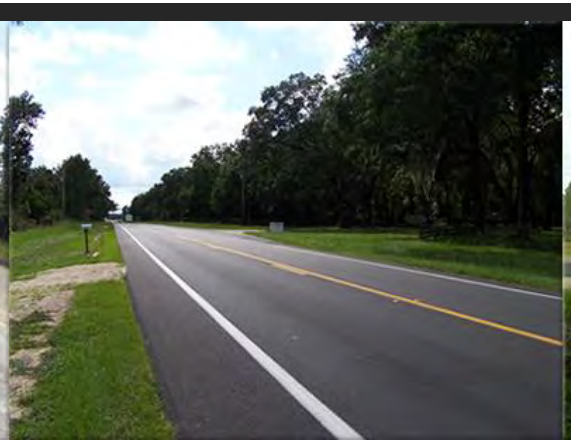
Future of Pavement Management Program

Funding Sources

- **Sales tax**
  - Voter referendum
  - Tied to list of specific projects
  - 1¢ Sales Tax = $28,000,000/year [unincorporated share=XX]
- **Nickel gas tax** (for multimodal and pavement)
- **Stormwater dedicated funding source** (for roadway related projects)
- **Special assessment districts**
- **Tax Increment Financing**

RECOMMENDATIONS





Future of Pavement Management Program

Staff Recommendations: Decision Points

1. Type of program
   a) Option 1: Proactive Capital Maintenance
   ~~b) Option 2: Maintain Current Pavement Condition~~
   ~~c) Option 3: Maintain Status Quo~~
2. Multimodal features
   ~~a) Countywide~~
   ~~b) Urban cluster (all roads)~~
   c) Urban cluster (arterial, collector and local roads)
3. Stormwater features
   a) Yes
   ~~b) No~~
4. Capital repair & new infrastructure replacement
   a) Yes
   ~~b) No~~

Future of Pavement Management Program

Staff Recommendations

1. Type of program
   a) Option 1: Proactive Capital Maintenance
2. Multimodal features
   c) Urban cluster (arterial, collector and local roads)
3. Stormwater features
   a) Yes
4. Capital repair & new infrastructure replacement
   a) Yes

PAVEMENT CAPITAL MAINTENANCE RECOMMENDATIONS		**PAVEMENT REPAIR/YEAR**	**MULTIMODAL Urban Cluster (Art., Coll., Local)**	**STORMWATER Quality/Quantity**	**INFRASTRUCTURE SET-ASIDE**
Option 1: Proactive Capital Maintenance Plan	First 20 years (per year)	$18,900,000	$2,700,000	$4,870,000	$1,200,000
	Second 20 years (per year)	$7,290,000	$0	$0	$2,500,000
	TOTAL (over 40 years)	**$523,800,000**	**$54,000,000**	**$97,500,000**	**$73,400,000**

Recommendations

- Receive the report;
- Direct staff to pursue Option 1: Proactive Capital Maintenance plan, including:
  - multimodal features for arterial, collector and local roads in the urban cluster,
  - stormwater features, and
  - life-cycle set-asides for new infrastructure

Recommendations (cont.)

- Direct the County Manager and his staff to work with community leaders on a sales tax referendum for pavement management, as well as:
  - Continuing support of special assessment districts and
  - Continuing support of nickel gas tax

Pavement Management Program Update Report 2010

Presentation to the Alachua County Board of County Commissioners
October 5, 2010