

VILLAGE OF DOWNERS GROVE
REPORT FOR THE VILLAGE COUNCIL WORKSHOP
FEBRUARY 13, 2007 AGENDA

SUBJECT:	TYPE:	SUBMITTED BY:
2007 Roadway Improvement Program (CIP Project ST-004)	Resolution Ordinance ✓ Motion Discussion Only	David H. Barber, P.E. Director of Public Works

SYNOPSIS

A motion is requested to approve the scope of the 2007 Roadway Improvement Program and permit the preparation of bid and contract documents and proceed with advertising for bids. The scope of this motion includes crack sealing, preventative sealing and asphalt overlay estimated at \$2,159,800.

STRATEGIC PLAN ALIGNMENT

The Five Year Plan and Goals for 2006-2011 identified *Top Quality Village Infrastructure and Facilities*. A high priority policy action for this goal is the *Long Range Plan for Roadway Improvements*.

FISCAL IMPACT

The FY07 the Capital Improvements Fund 220 includes \$1,116,800 and the Motor Fuel Tax Fund 102 includes \$1,495,000 for the proposed improvements. The projects are further reflected in the 2007 Community Investment Program (CIP) under Project ST-004 which includes additional funds in the amount of \$65,000 for local use roadway materials (asphalt and stone) and \$65,000 for materials testing services for a total ST-004 allocation of \$2,611,800.

RECOMMENDATION

Approve the motion on February 20, 2007 on the consent agenda.

BACKGROUND

The Village is responsible for approximately 164 miles of roadway maintenance. Attached for consideration is a listing of the roadway segments proposed for the 2007 Preventative Seal Program (estimated at about \$113,880), 2007 Crack Seal Program (estimated at about \$77,550) and the 2007 Asphalt Overlay project (estimated at about \$1,968,370) estimated in total at \$2,159,800.

ATTACHMENTS

CIP Project Sheet ST-004
 Roadway Improvement Program Background
 "The Road Show" PowerPoint presentation
 2007 Preventative Seal Program
 2007 Crack Seal Program
 2007 Asphalt Overlay Program
 Proposed 2007 Roadway Maintenance Map

2007-2011 CAPITAL PROJECT SHEET

Proj. #: **ST-004**

Project Description: **Roadway Maintenance Program**

Project Lead: **Michael D. Millette**

Dept.: **Public Works - Engineering**

Fund: **220**

Program: **342**

Project Type:

- New Project/Expansion Changed
 Replacement Maintenance

Priority Setting Factors:	H/S/W	Maint.	Expan.	New	Low	Medium	High	OVERALL
Rating:		X					X	1

BREAKDOWN OF PROJECT COST AND FUNDING SOURCES

Cost Summary	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	Future Yrs	TOTAL
Professional Services	65,000	65,000	65,000	65,000	65,000		325,000
Land Acquisition							-
Infrastructure Improvements	2,481,800	3,070,000	3,470,000	3,870,000	3,870,000		16,761,800
Building Improvements							-
Machinery and Equipment							-
Other/Miscellaneous	65,000	65,000	65,000	65,000	65,000		325,000
TOTAL COST	2,611,800	3,200,000	3,600,000	4,000,000	4,000,000	-	17,411,800

Funding Source(s)	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	Future Yrs	TOTAL
102-Motor Fuel Tax Fund ▼	1,495,000	1,510,000	1,525,000	1,540,000	1,555,000		7,625,000
220-Capital Improvements Fund ▼	1,116,800	1,690,000	2,075,000	2,460,000	2,445,000		9,786,800
▼							-
▼							-
TOTAL FUNDING SOURCES	2,611,800	3,200,000	3,600,000	4,000,000	4,000,000	-	17,411,800

1. Briefly Describe and provide justification for this Capital Project Request.

Capital and Motor Fuel Tax funds for ongoing annual maintenance of the Village's 160 miles of streets. Projects to utilize various processes such as crack seals, pavement seals, and resurfacing with new asphalt. The funding listed as 'Other/Miscellaneous' is for asphalt purchased for use by Public Works Streets Division for various patching operations during the year.

2. Describe the project status and completed work.

Annual program.

3. Describe any anticipated grants related to the project.

Motor Fuel Tax (MFT) funding also utilized

4. What impact will the project have on annual operating expenses? Please quantify and describe.

	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	Future Yrs	TOTAL
Projected Operating Expenses	-	-	-	-	-	-	-

Map and/or pictures of Project/Project Area:

Roadway Improvement Program

Roadway maintenance and improvements in the Village are annually provided for via a number of funding sources as well as projects and are often referred to by staff as the *Roadway Improvement Program*. The Community Investment Program (CIP) document is the five-year plan which Council establishes to identify all municipal capital projects (e.g. roads, stormsewers, water distribution system, municipal facilities.) The CIP is an effective tool as many capital projects cross fiscal years due to the time it can take to design and construct a capital project. The first year of the CIP is ultimately adopted via the annual municipal budget which provides funding for projects from multiple funds (e.g. capital fund, motor fuel tax fund, water fund.) As a part of the February 13, 2007, Village Council Workshop the Council will be asked to consider initial action to authorize 2007 work related to crack sealing, preventative sealing and asphalt overlay on 117 segments of roadway in the Village as provided for in the annual budget.

Other roadway projects provided for in FY07 can be found in the CIP and it is noteworthy that several include significant grant funding. These include work on 39th Street from Washington Street to Fairview Avenue (resurfacing), Prairie Avenue from Belmont Road to Fairview Avenue (combination of resurfacing and reconstruction, Woodward Avenue from 63rd Street south to the Village corporation limit south of Oxnard Drive. Also in 2007 there are a few other projects for storm sewer improvements and water line improvements that will also include resurfacing of streets. These additional projects will include Brookbank Road from 55th Street south to the current dead-end south of Blanchard Road and Carpenter Street from 59th south to 63rd Street. Work in the neighborhood will also include the resurfacing of the adjacent streets of 60th Street, 60th Place and 61st Street from Brookbank Road to Main Street. A water line replacement project is also proposed on Lane Place from Maple Avenue south to Summit Street and along Summit Street from Lane Place to Main Street. Since there are a few projects like the above this year work is being packaged a bit differently to take advantage of these multiple contracts and to provide full width paving of the streets in conjunction with the utility work. A portion of the funds in the Roadway Improvement Program will be allocated to these projects to cover the paving costs. Staff estimates that \$62,000 will be needed on the Brookbank Road project, \$207,000 on the Carpenter Street project and \$53,000 on the Lane Place/Summit Street project.

The purpose of the Village's annual Roadway Improvement Program is to preserve 164 miles of roadways in a condition, which is safe and efficient for the motoring public. To achieve this goal, several techniques are utilized on those roads where each technique will be the most effective based on the current condition of the roadway. For some roadways that have deteriorated to a certain degree no further options exist for proper maintenance leaving only the option for full roadway reconstruction. This major effort is a last resort as it is more expensive and involves full excavation to the dirt below it and rebuilding the roadway from the bottom up. The maintenance program, if adequately scheduled and funded is designed to avoid the more costly and much more disruptive reconstruction. As the maintenance strategies are explained below it is important to remember that water not addressed properly can be one of the most destructive elements to roadways. Whether by getting into cracks and freezing thereby causing the cracks to widen or by saturating the stone base underlying the pavement causing frost heave or freeze-thaw stresses in the winter, or in the spring and fall by weakening that sub-base resulting in a reduced load bearing capacity, water is a roadway's worst enemy. Consequently, the majority of maintenance efforts focus on preventing water from getting into and remaining under the pavement. Secondary factors affecting pavement health are the sun, traffic load (primarily trucks) and utility excavations.

The Village's annual Roadway Improvement Program consists of two types of work: preventative sealing or milling and resurfacing. The least expensive operations are included in the area of preventative sealing and these techniques include several methods that are employed depending on the defects being addressed

in each operation. The techniques employed include crack sealing, crack filling, micro-surfacing and slurry sealing. Each of these techniques, when performed at the appropriate time, is necessary to extend the life of the pavement to the full duration of its usefulness and is focused on addressing defects in the surface of the pavement to prevent water intrusion and to restore the surface. No strength is added to the roadway with these operations. Not all of these techniques are appropriate to every section of pavement as explained below. Milling and Resurfacing, while more expensive than preventative seals is still far less expensive than full reconstruction and involves the grinding of the surface layer of pavement, patching deteriorated sections of the underlying roadway and curb and resurfacing the street with a new layer of asphalt. The surface layer is usually in range of 1-1/2” to 3” in thickness. Usually what has been removed is replaced so this operation also doesn’t usually involve increasing the strength of the roadway.

In order to maintain the roadway system effectively, the Village implemented a Pavement Management System originally developed by the University of Wisconsin called PASER. The PASER system requires periodic visual assessment of pavement conditions. The Village had been performing these inspections on an annual basis, but has now switch to a bi-annual schedule owing to the amount of staff time (about eight weeks) to fully evaluate every square yard of pavement within the Village. The system provides an easy-to-understand ten-point scale as follows:

- 10 – 8 Roadway is OK as is (Good Condition)
- 7 – 5 Roadway needs Preventative maintenance
- 4 – 3 Roadway need rehabilitation (milling and resurfacing)
- 2 – 1 Roadway is significantly deteriorated (Needs Reconstruction)

Based our recent update after work in 2006 the Villages roadways are classified in the PASER system as follows.

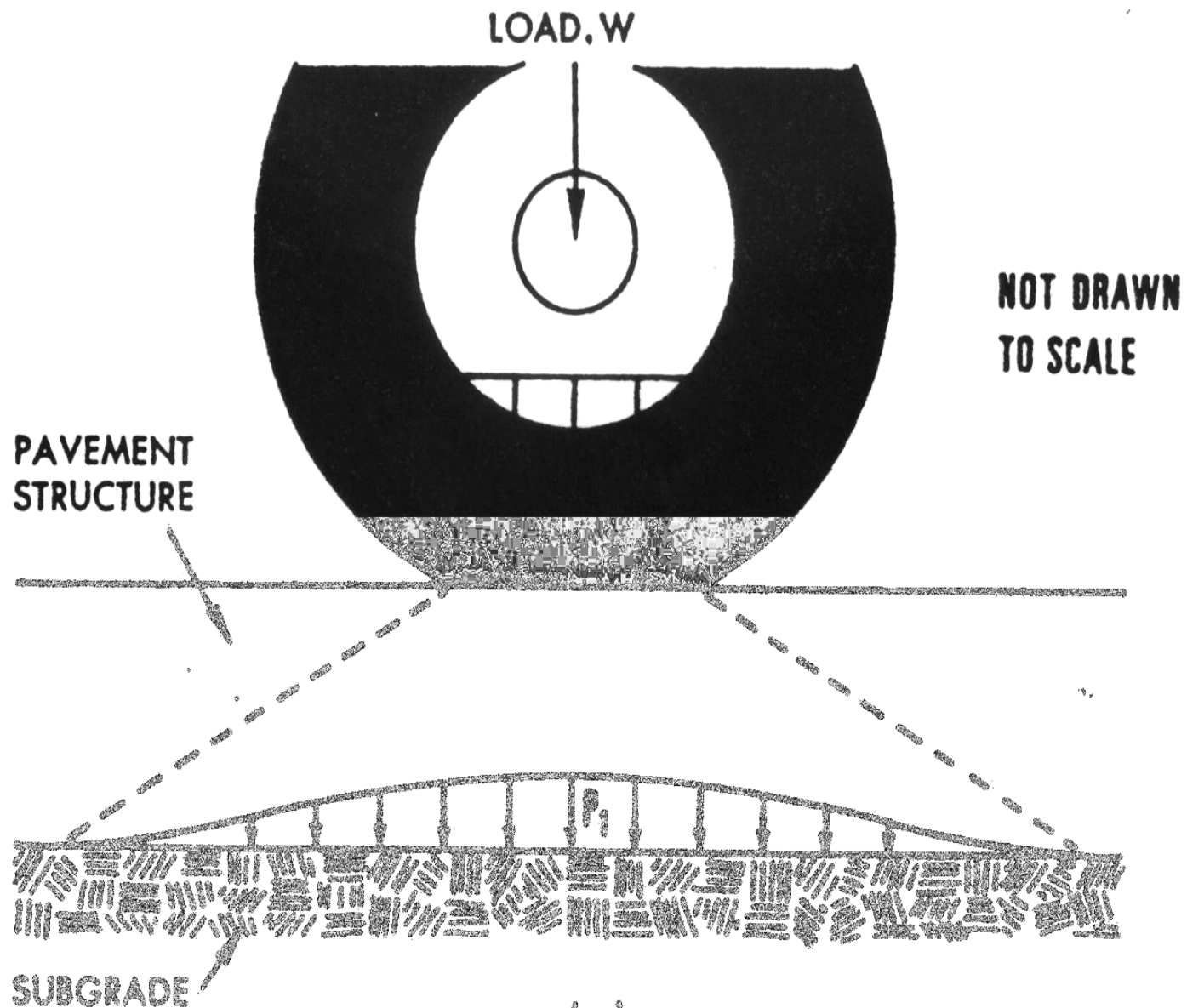
PASER Rating	Area of Roadway (SY)	Percent of System	
1	7,750	0.30%	
2	67,254	2.60%	
3	624,141	24.10%	
4	412,574	15.93%	
5	512,282	19.78%	Weighted Average PASER Rating
6	214,480	8.28%	
7	102,007	3.94%	
8	234,036	9.04%	
9	389,919	15.06%	
10	<u>24,944</u>	0.96%	
	2,589,387		

Based on the Village’s pavement management system the average rating for our Village streets is 5.35. This is up slightly from the 4.95 rating in 2004 and 4.96 rating in 2003. Ratings were not computed at the end of 2005. This places the average rating for all Village streets just at the upper end of the fair condition. Of all streets 27% are listed in the Poor condition (ratings of 1, 2 and 3) and 36% in the Fair condition (ratings of 4 or 5) and the remaining 37% in the Good category. The Village has not been able to fully fund roadway improvements in several of the past few years and the annual work programs have been focused on roadways with ratings in the 3 and 4 category. We currently have about 40% of the Village streets in these two categories which is far more roadways than we have funds available to improve. In 2007 there are several efforts underway to address the Village’s roadway systems.

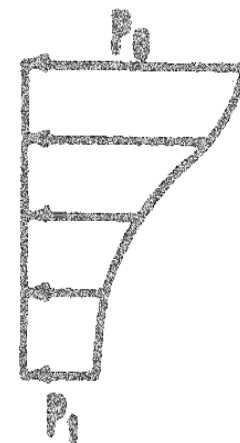
THE ROAD SHOW

**The Real Story of the
Downers Grove Street
Maintenance Program**





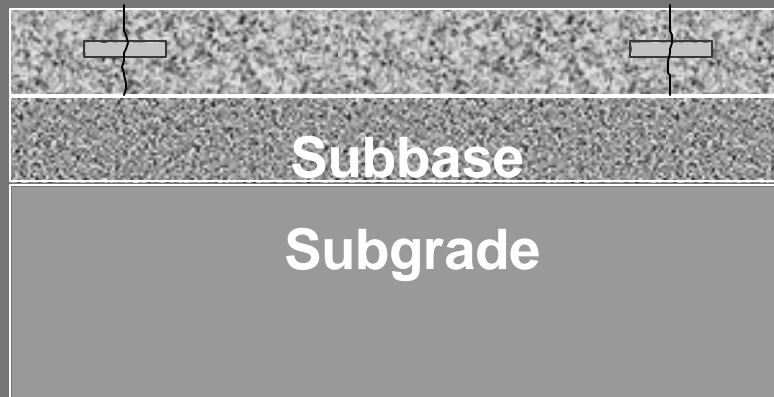
(a)



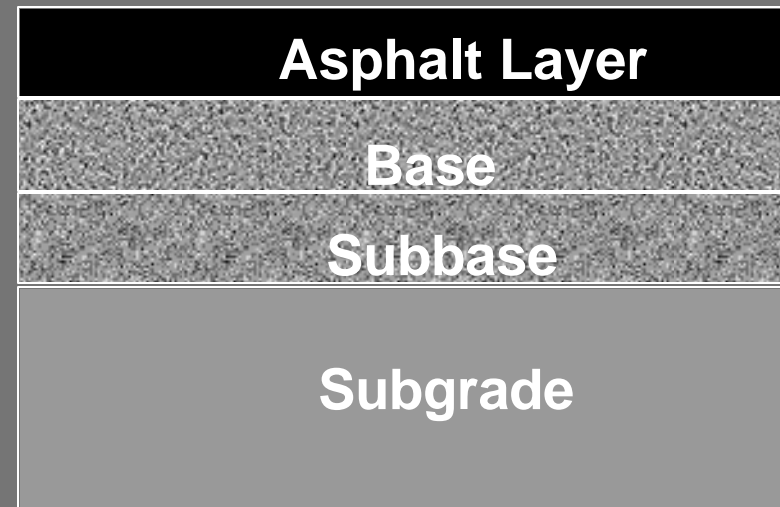
(b)

Different Pavement Types

Concrete Section



Asphalt Section



Pavement Deterioration

- **Over Time**
 - Fatigue & Deflection
 - Crack From the Bottom First
- **Environmental Stress**
 - Ultra Violet Rays Dry Oils
 - Temperature Extremes & Cycling
 - Chemical Degradation
- **Changed Conditions**
 - Soil Stability & Drainage
 - Pavement Cuts
 - Change in Traffic



Life of an Asphalt Street - 1



“Almost” New Street

Life of an Asphalt Street - 2



“Transverse Cracking”

Life of an Asphalt Street - 3



“Start of Block Cracking”

Life of an Asphalt Street - 4



Street Cuts Shorten Pavement Life



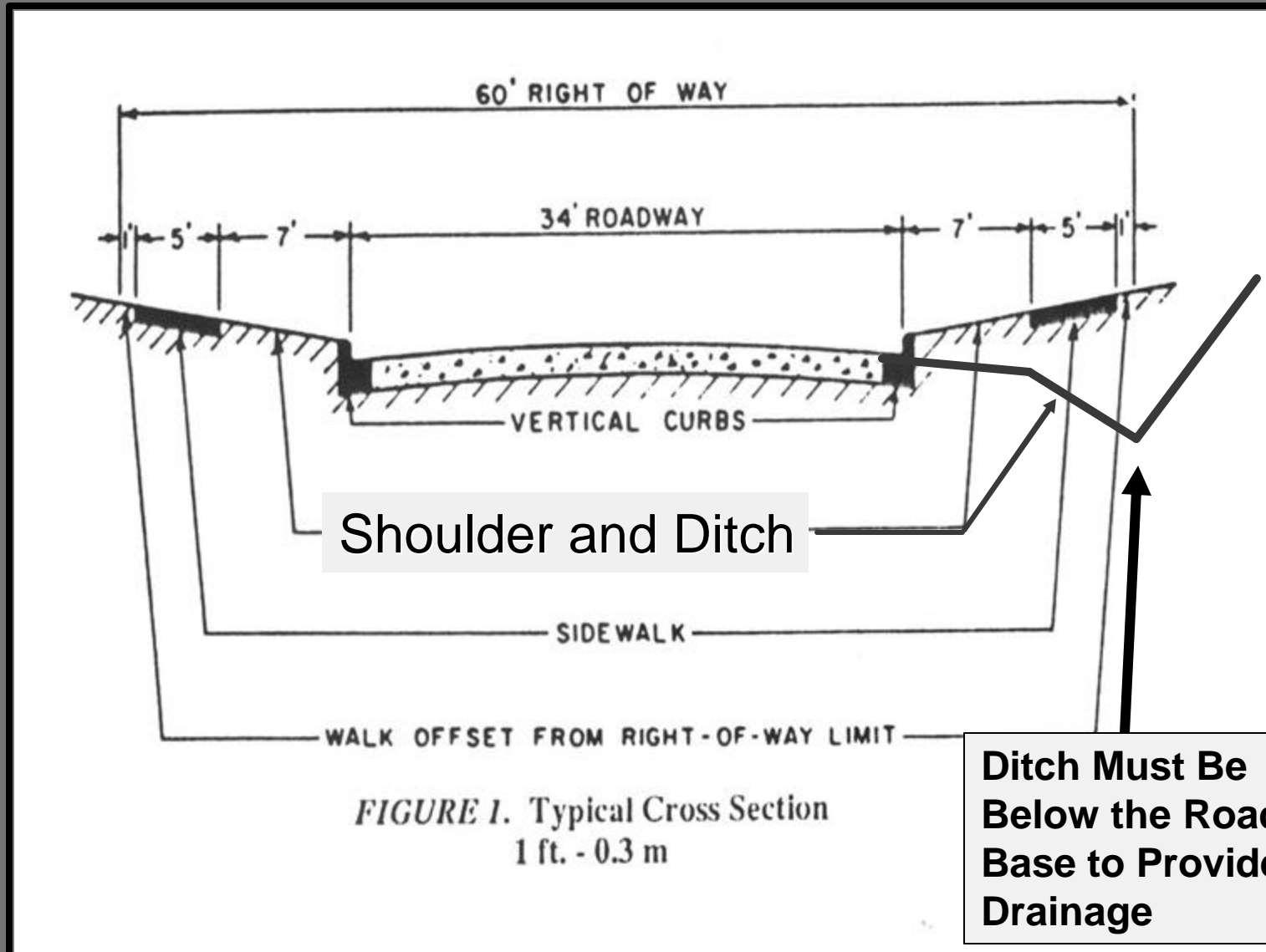
Deterioration next to patch

Maintenance Extends Useful Life

- **Fill & Seal Cracks**
 - Keeps Out Water
- **Surface Seals**
 - Protect from UV Rays (Sun Impact)
- **Spot Repairs**
 - Repairs Base Damage/Weak Spots
- **Add Thickness**
 - Increases Strength
- **Maintain Drainage Systems**
 - Remove Water from Base



Rural Cross-section



Maintenance Methods for Asphalt Streets

- Crack Fill/Seal
- Chip Seal
- Slurry Seal
- Cold Patch
- Spray Patch
- Thin Overlay (3/4")
- Overlay (2" – 3")
- White Top w/ PCC

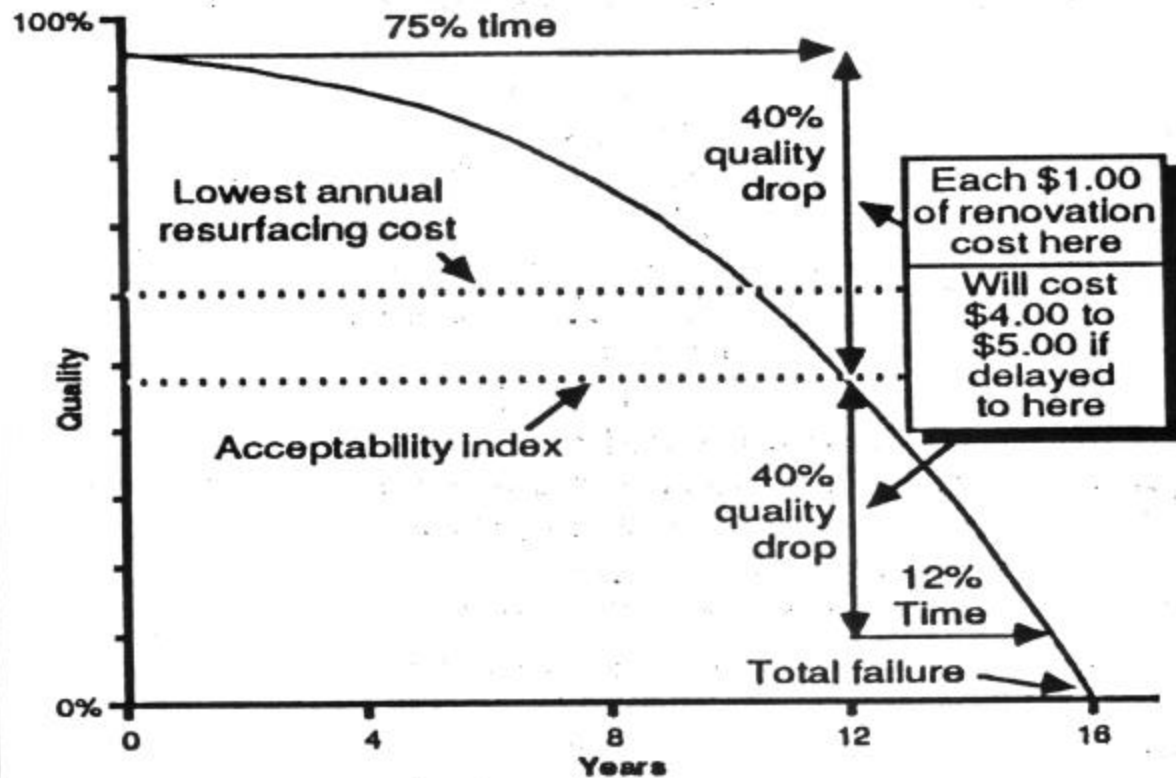


Maintenance Methods for Concrete Streets

- Crack & Joint Fill
- Mud Pack
- Grind Small Faults
- Epoxy Patch
- Overlay with Asphalt
- Joint Repair
- Partial Depth Repair
- Full Depth Repair
- Slab Replacement



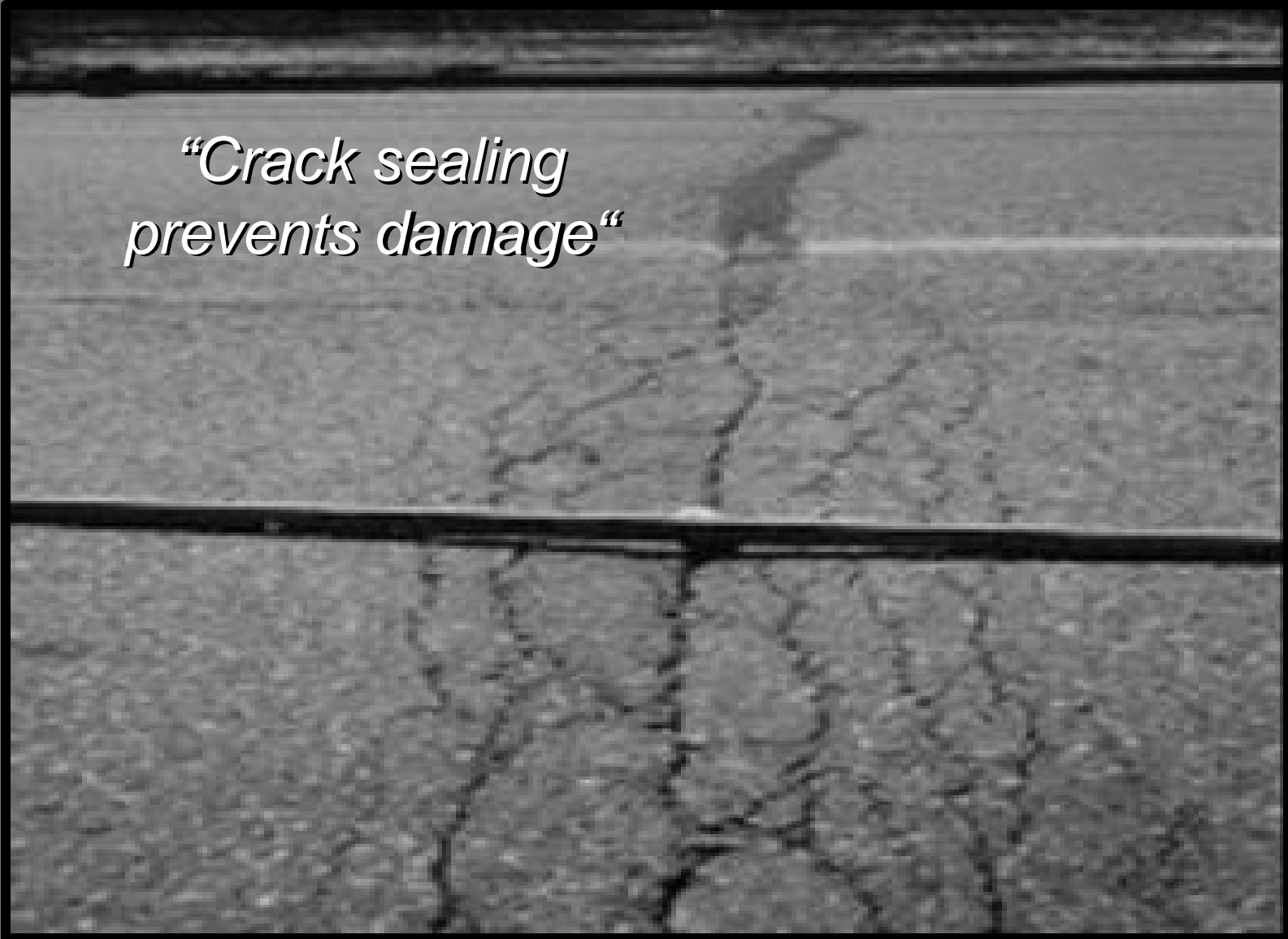
THE HIGH COST OF DEFERRED MAINTENANCE

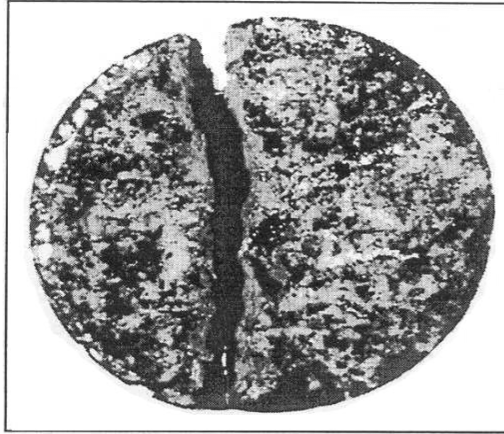


Repair costs skyrocket once the road reaches "fair" condition. Assuming a 16-year life, the quality of this road declined 40% over the first 12 years. Two years later, it dropped another 40%. Repairs at year 14 cost five times as much as those at year 12.

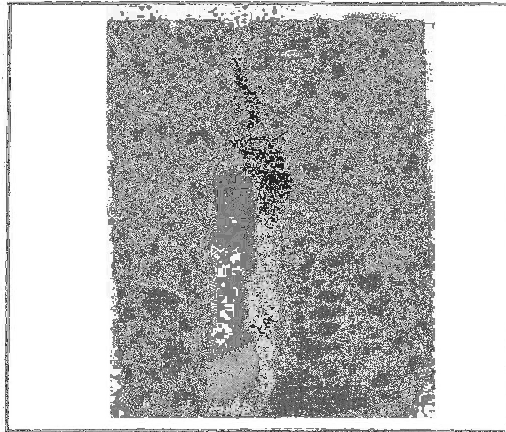
Filling and Sealing Cracks

*“Crack sealing
prevents damage”*





Pavement core



**Deterioration
beneath crack**

Pavement Management System

- Know What You Own
- Know Pavement Condition
- Know Maintenance History
- Project Remaining Useful Life
- Project Maintenance Needs and Costs
- Evaluate Options (Maintain or Replace)
- Pavement Permit System (Street Cuts)
- PASER and PASERWARE Programs

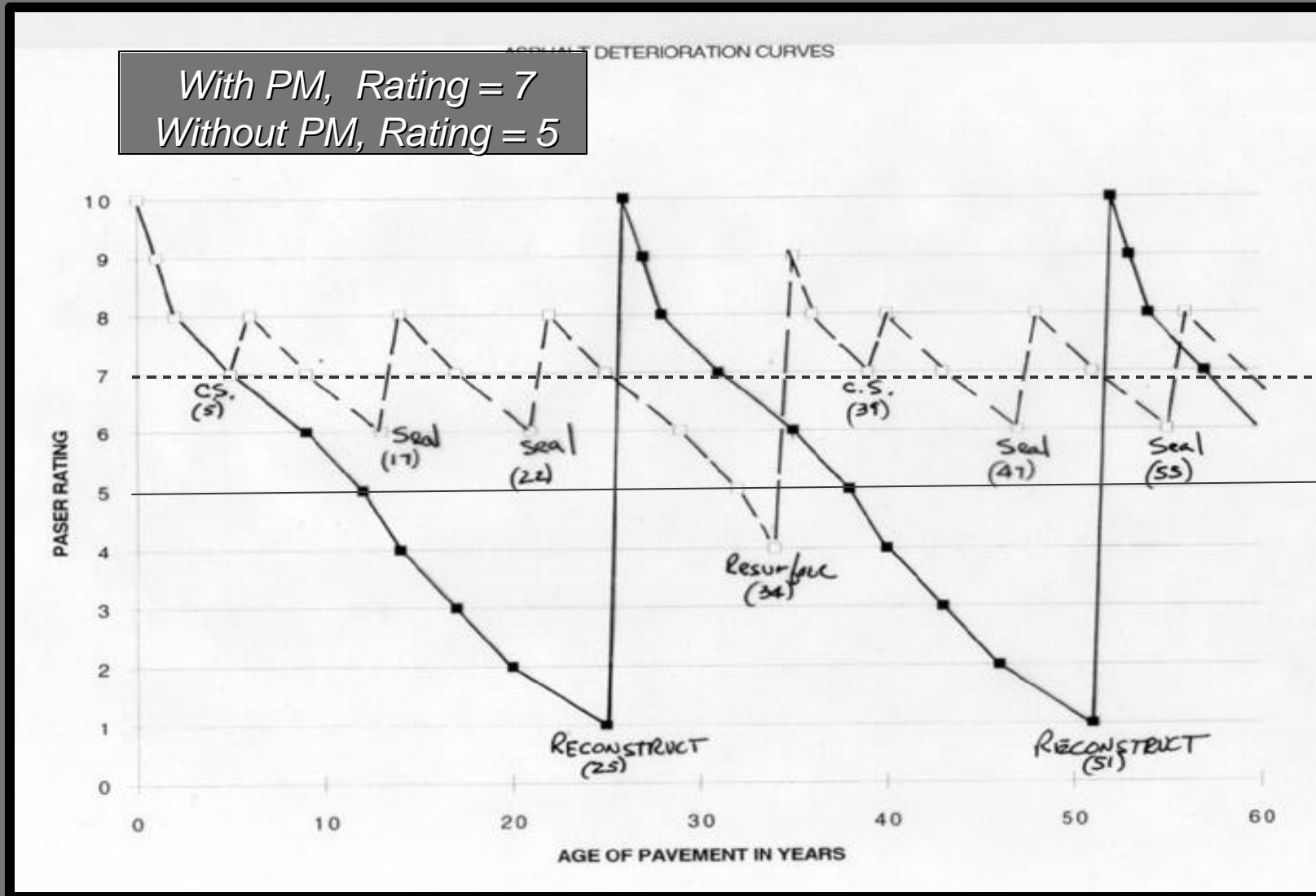


Paser Rating System

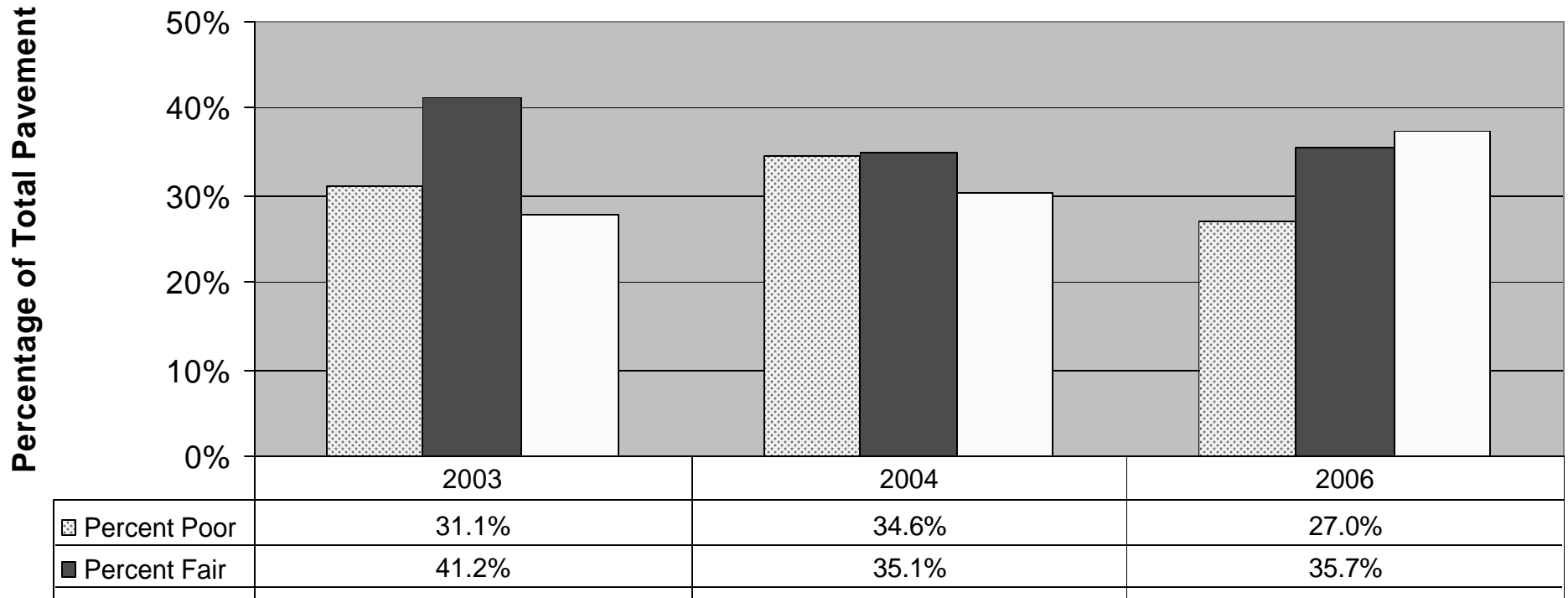
- **Rating 9 & 10** **No Maintenance Required**
- **Rating 8** **Little or No Maintenance**
- **Rating 7** **Routine Maintenance**
- **Rating 5 & 6** **Preservative Treatments**
- **Rating 3 & 4** **Structural Improvements**
- **Rating 1 & 2** **Reconstruction**



Street Condition With and Without Preventive Maintenance



ANNUAL STREET CONDITION RATING COMPARISON



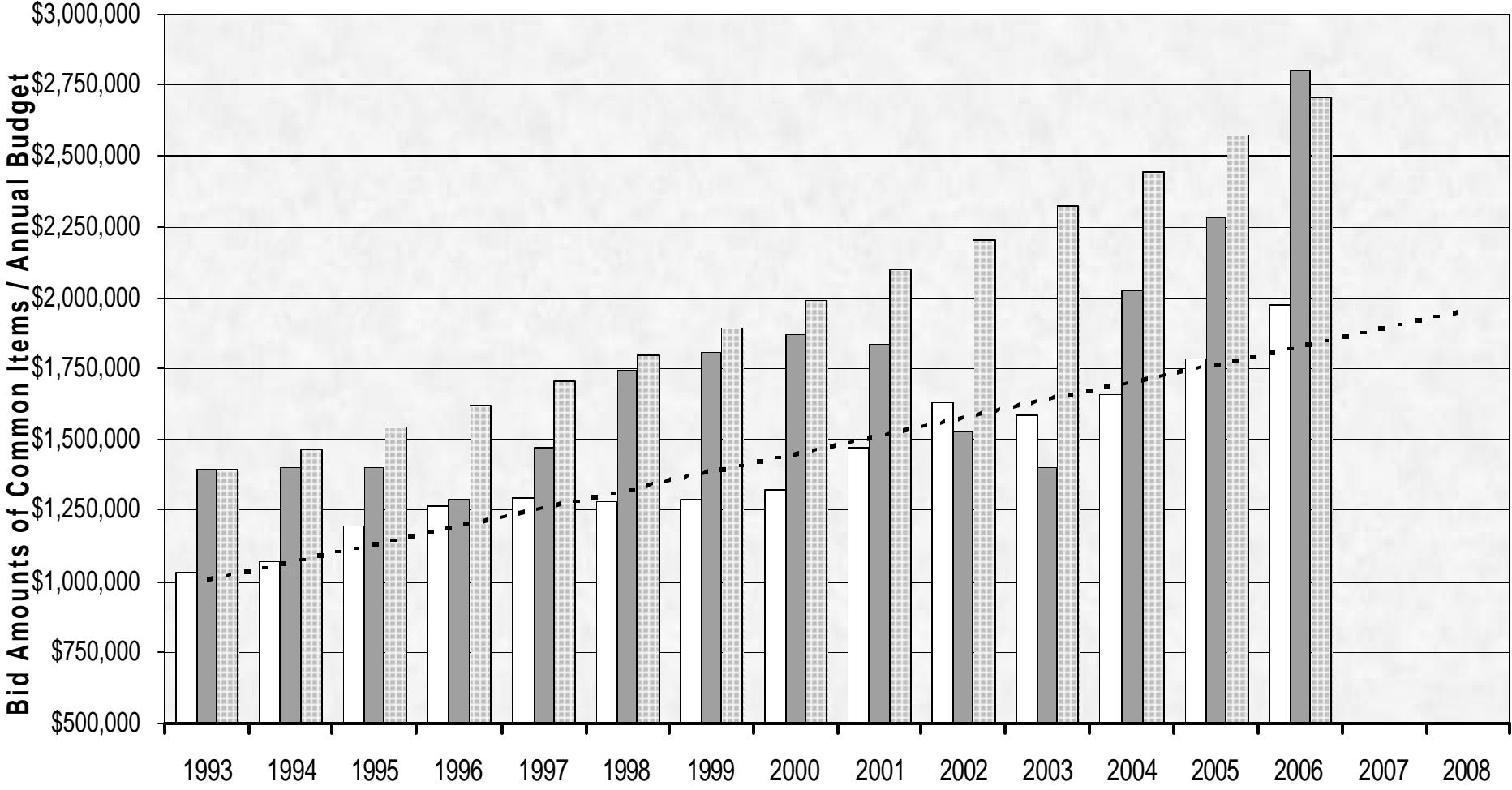
**Average
Rating**





4.95

4.96

5.35

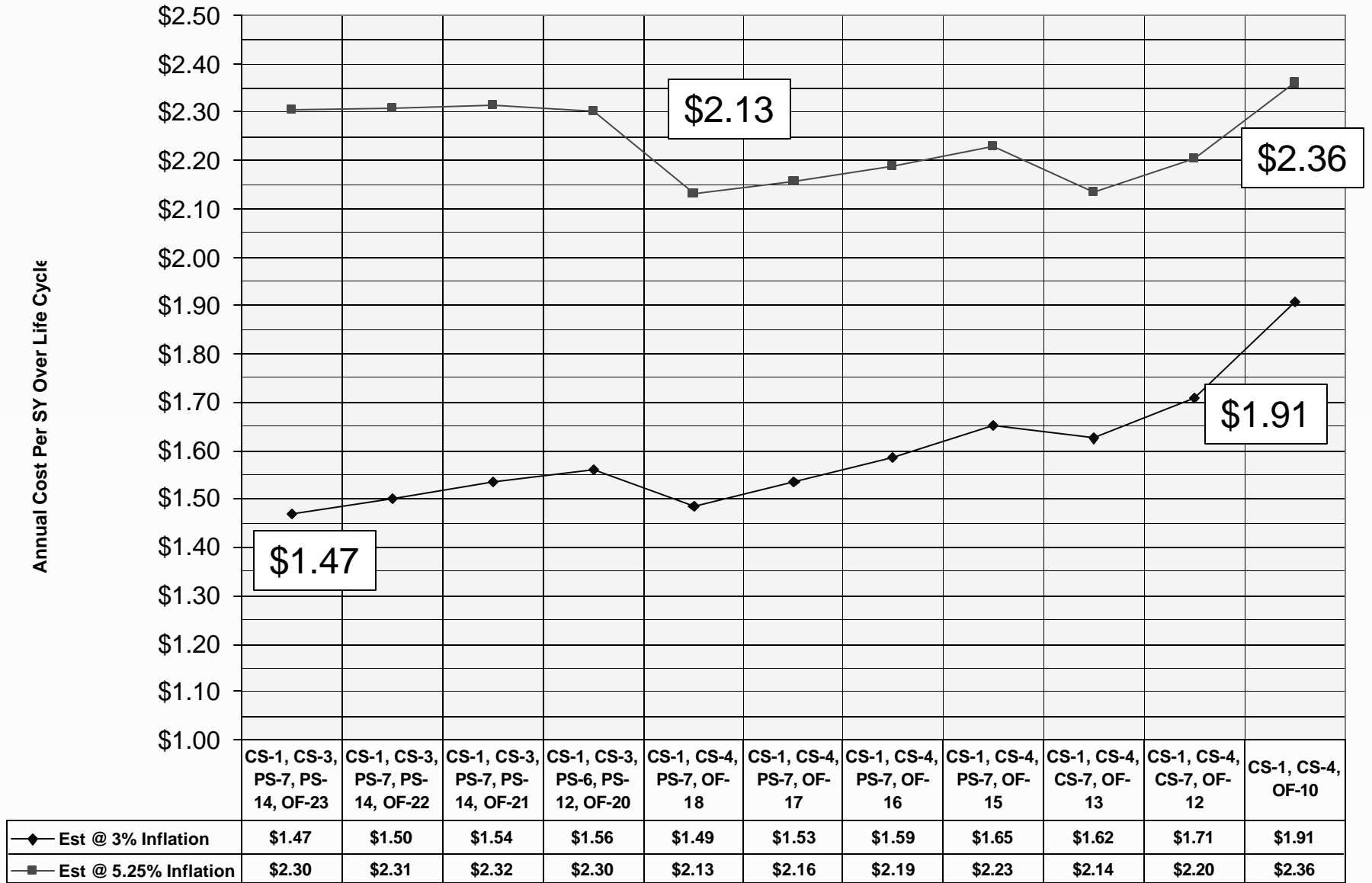
Compare Projected Trend of Annual Bid Cost (25 Common Items) to Budget



-  Common Maintenance Items
-  Total Annual Budget
-  Budget Projected At 5.25%
-  Average Cost Trend

Year

Theoretical Future Cost Per SY - Various Street Maintenance Cycles



Various Scheduled Maintenance

Proposed Needs

- @ 3% Inflation

\$1.47/SY x 2.6M SY \$3.82M

\$1.91/SY x 2.6M SY \$4.97M

- @ 5.25% Inflation

\$2.13/SY x 2.6M SY \$5.54M

\$2.36/SY x 2.6M SY \$6.14M



Future Issues

- Inadequate Design & Drainage
- Level of Funding
- Strengthen Roadway Patching Standards
- Areas Requiring Reconstruction
 - 4 Projects in CIP = \$8,750,000
 - Valley View Estates
 - Knottingham
 - Concord Square, Unit 2
 - Oak Grove, Unit III
- Coordination with Other Projects



**2007 PREVENTIVE SEAL PROJECT
STREETS ESTIMATED FOR MICRO-SURFACING**

STREET SEGMENT	FROM	TO	ESTIMATED COST
61ST ST	BLODGETT AVE	GRAND AVE	\$ 3,810
62ND ST	W. OF GRAND AVE	E. OF GRAND AVE	\$ 1,570
72ND CT	CUL DE SAC	72ND ST	\$ 3,700
73RD ST	HARTFORD RD	FAIRMOUNT AVE	\$ 6,880
74TH ST	HARTFORD RD	YORK RD	\$ 3,440
BLACKBURN CT	CUL DE SAC	BLACKBURN AVE	\$ 2,680
CLAREMONT CT	CLAREMONT	CUL DE SAC	\$ 2,450
DOUGLAS RD	PRAIRIE AVE	OGDEN AVE	\$ 22,430
ELM ST	OGDEN AVE	39TH ST	\$ 16,700
FLORENCE AVE	OTIS AVE	GRANT ST	\$ 2,200
GRAND AVE	61ST ST	63RD ST	\$ 8,500
HARTFORD RD	74TH ST	73RD ST	\$ 3,720
LINCOLN PL	CUMNOR RD	E. END	\$ 2,590
LINCOLN ST	MIDDAUGH AVE	LINSCOTT AVE	\$ 3,040
OTIS AVE	W END	FLORENCE AVE	\$ 3,720
PROSPECT AVE	ROGERS ST	PRAIRIE AVE	\$ 9,010
ROE CT	CUL DE SAC	BLACKBURN AVE	\$ 2,780
STAIR ST	PRENTISS DR	N. END	\$ 2,080
STOCKLEY RD	CANTERBURY PL	74TH ST	\$ 6,100
TRENT RD	74TH ST	73RD ST	\$ 3,520
YORK RD	74TH ST	73RD ST	\$ 2,960
TOTAL ESTIMATED COST			\$ 113,880

**2007 PREVENTIVE SEAL PROJECT
STREETS ESTIMATED FOR CRACK TREATMENT**

STREET SEGMENT	FROM	TO	ESTIMATED COST
31ST ST	CUL DE SAC	HIGHLAND AVE	\$ 1,730
36TH ST	E. OF DOUGLAS	W. OF STERLING RD	\$ 600
39TH CT	CUL DE SAC SW	39TH ST	\$ 210
39TH ST	W. END	SARATOGA	\$ 500
40TH ST	W. END	DOWNERS DR	\$ 380
61ST ST	MAIN ST	BLODGETT AVE	\$ 2,210
68TH ST	FAIRMOUNT AVE	BLACKBURN PL	\$ 620
71ST ST	DUNHAM RD	W. OF BINDER RD	\$ 2,900
73RD ST	WEBSTER ST	BAYBURY RD	\$ 230
ALDRICH PL	CUL DE SAC	WOODWARD AVE	\$ 320
ASHBURY AVE	BAYBURY RD	CANTERBURY PL	\$ 260
ASHLEY CT	BELMONT RD	E CUL DE SAC	\$ 310
BAKER CT	CUL DE SAC	SPRINGSIDE AVE	\$ 320
BARCLAY CT	PRENTISS DR	S END	\$ 540
BAYBURY RD	ASHBURY AVE	73RD ST	\$ 490
BELDEN AVE	MAPLE AVE	CURTISS ST	\$ 310
BLACKOAK DR	SARATOGA AVE	HIGHLAND AVE	\$ 1,090
BLODGETT AVE	55TH ST	ELMWOOD AVE	\$ 1,380
BRIARGATE DR	68TH ST	FAIRMOUNT AVE	\$ 2,260
BUSH PL	PRENTISS DR	N END	\$ 130
CANDLEWOOD CT	CUL DE SAC	CANDLEWOOD DR	\$ 310
CANDLEWOOD DR	W. CUL DE SAC	BLACKOAK DR	\$ 1,740
CANTERBURY PL	75TH ST	CUL DE SAC	\$ 780
CAROL ST	LACEY RD	NORTHCOTT AVE	\$ 700
CHICAGO AVE	FAIRVIEW AVE	CUMNOR RD	\$ 1,080
CHICAGO AVE	DOWNERS DR	MIDDAUGH AVE	\$ 1,530
CORNELL AVE	S END	GRANT ST	\$ 550
CROSS ST	HADDOW AVE	PRAIRIE AVE	\$ 400
CURTISS ST	WASHINGTON ST	MACKIE PL	\$ 900
CURTISS ST	WALNUT AVE	BELMONT RD	\$ 3,650
DEXTER RD	71ST ST	S. OF RICHARDS AVE	\$ 1,570
DICKSON AVE	SPRINGSIDE AVE	HILLCREST DR	\$ 640
DOWNERS DR	40TH ST	HERBERT ST	\$ 540
DUNHAM RD	67TH ST	NORFOLK ST	\$ 1,990
ELM ST	CHICAGO AVE	OGDEN AVE	\$ 1,690
FAIRMOUNT AVE	61ST ST	N END	\$ 130
FAIRMOUNT AVE	OXFORD ST	63RD ST	\$ 1,780
FAIRVIEW AVE	DAVIS ST	OGDEN AVE	\$ 1,180
FLORENCE AVE	OGDEN AVE	N END	\$ 400
FRANKLIN ST	FOREST AVE	MAIN ST	\$ 330
GRANT ST	STONEWALL AVE	CORNELL AVE	\$ 400
HERBERT ST	E. OF SEELEY AVE	W. OF MORTON AVE	\$ 820
HITCHCOCK AVE	WALNUT AVE	W. END	\$ 1,080
KELLY PL	CUL DE SAC	RICHARDS AVE	\$ 440
KENSINGTON PL	PRENTISS DR	WELLINGTON PL	\$ 390
LINCOLN AVE	DOUGLAS RD	FAIRVIEW AVE	\$ 470
LYMAN AVE	55TH ST	MAPLE AVE	\$ 1,210

**2007 PREVENTIVE SEAL PROJECT
STREETS ESTIMATED FOR CRACK TREATMENT**

STREET SEGMENT	FROM	TO	ESTIMATED COST
LYMAN AVE	61ST ST	63RD ST	\$ 1,110
MACKIE PL	MAPLE AVE	CURTISS ST	\$ 230
MAIN ST	FRANKLIN ST	OGDEN AVE	\$ 4,750
MAPLE AVE	DUNHAM RD	MAIN ST	\$ 2,330
MAPLEWOOD PL	CUL DE SAC	MAPLE AVE	\$ 770
MIDHURST RD	OXNARD DR	N. OF WESTFIELD DR	\$ 1,850
NORFOLK ST	SARATOGA AVE	MAIN ST	\$ 850
NORFOLK ST	W. END	DUNHAM RD	\$ 830
OXNARD DR	CUL DE SAC	WOODWARD AVE	\$ 1,780
PLYMOUTH RD	71ST ST	DICKSON AVE	\$ 900
PRAIRIE AVE	CROSS ST	CROSS ST	\$ 100
PRENTISS DR	PUFFER RD	SPRINGSIDE AVE	\$ 3,850
PUFFER RD	PRENTISS DR	S. OF MIDHURST RD	\$ 1,100
RICHARDS AVE	SPRINGSIDE AVE	DEXTER RD	\$ 820
SARATOGA AVE	35TH ST	OAK HILL RD	\$ 1,150
SARATOGA AVE	S END	39TH ST	\$ 280
SEELEY AVE	JANET ST	VIRGINIA ST	\$ 570
SHERMAN AVE	MAPLE AVE	S. LIMITS	\$ 250
SPRINGSIDE AVE	RICHARDS AVE	DEXTER RD	\$ 1,000
STAIR ST	CUL DE SAC	PRENTISS DR	\$ 360
STOCKLEY RD	W. END	CANTERBURY PL	\$ 120
VENARD RD	35TH ST	DREW ST	\$ 1,320
VIRGINIA ST	LACEY RD	LEE AVENUE	\$ 340
WALNUT AVE	N. OF HITCHCOCK AVE	COLLEGE ST	\$ 5,000
WASHINGTON ST	55TH ST	MAPLE AVE	\$ 1,260
WELLINGTON PL	STAIR ST	KENSINGTON PL	\$ 490
WESTFIELD DR	MIDHURST RD	PUFFER RD	\$ 330
WILLARD PL	CUL DE SAC	DEXTER RD	\$ 320
TOTAL ESTIMATED COST			\$ 77,550

**2007 RESURFACING PROJECT
STREETS ESTIMATED FOR ASPHALT OVERLAY**

STREET SEGMENT	FROM	TO	ESTIMATED COST
60TH ST	BLODGETT AVE	E. OF OSAGE	\$ 44,200
62ND CT	FAIRMOUNT AVE	CUL DE SAC	\$ 23,780
62ND ST	PLYMOUTH CT	DUNHAM RD	\$ 77,220
CHICAGO AVE	MIDDAUGH AVE	MAIN ST	\$ 79,580
CURTISS ST	CARPENTER ST	FOREST AVE	\$ 84,310
ELM ST	ROGERS ST	CHICAGO AVE	\$ 171,830
ELMORE AVE	BELMONT RD	LEE AVE	\$ 99,350
FAIRMOUNT AVE	61ST ST	63RD ST	\$ 58,970
FOREST AVE	PRAIRIE AVE	N OF LINCOLN ST	\$ 76,900
GRAND AVE	61ST ST	59TH ST	\$ 73,670
HIGHLAND AVE	PRAIRIE AVE	CHICAGO AVE	\$ 32,410
LINCOLN ST	LINSCOTT AVE	PRINCE ST	\$ 66,730
LINSCOTT AVE	CHICAGO AVE	GRANT ST	\$ 59,160
OSAGE AVE	N OF 60TH ST	S OF 62ND ST	\$ 99,970
PLYMOUTH CT	62ND ST	S END	\$ 17,290
PLYMOUTH ST	61ST ST	62ND ST	\$ 42,900
PROSPECT AVE	WARREN AVE	ROGERS ST	\$ 14,280
ROGERS ST	MAIN ST	MAPLE AVE	\$ 444,950
SARATOGA AVE	GRANT ST	OGDEN AVE	\$ 93,560
STRATFORD LN	MAIN ST	WASHINGTON ST	\$ 51,100
WASHINGTON ST	WARREN AVE	OGDEN AVE	\$ 222,360
WASHINGTON ST	62ND ST	61ST ST	\$ 33,850
TOTAL ESTIMATED COST			\$ 1,968,370

VILLAGE OF DOWNERS GROVE

0 1/8 1/4 1/2 1 MI

- █ RESURFACE
- █ MICRO-SURFACE
- █ CRACK SEAL RUBBER
- █ CRACK FILL FIBER

PRELIMINARY

