2007

PICKETT RAY & SILVER, INC.

333 Mid Rivers Mall Drive
St. Peters, MO 63376

Phone: 636-297-1211
Fax: 636-297-1104
www.prs3.com

Wyndgate

Addendum to reflect As-Built Conditions

Stormwater Detention Report

01267.SUPO.02R

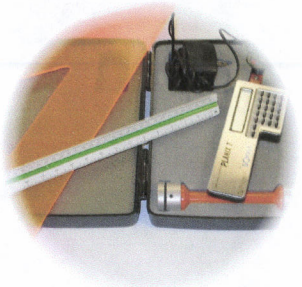
January 2007

Prepared For:

Summit Pointe, L.C.
239 Fox Hill Road
St. Charles, Missouri 63301
636-940-9300

Prepared By:

Pickett, Ray & Silver, Inc.
333 Mid Rivers Mall Drive
St. Peters, Missouri 63376
636-397-1211

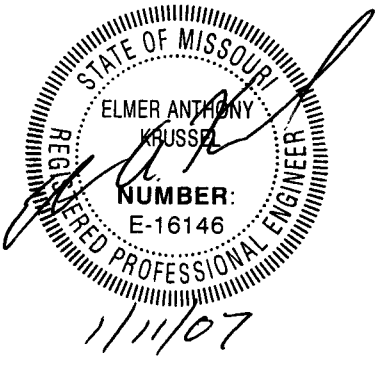


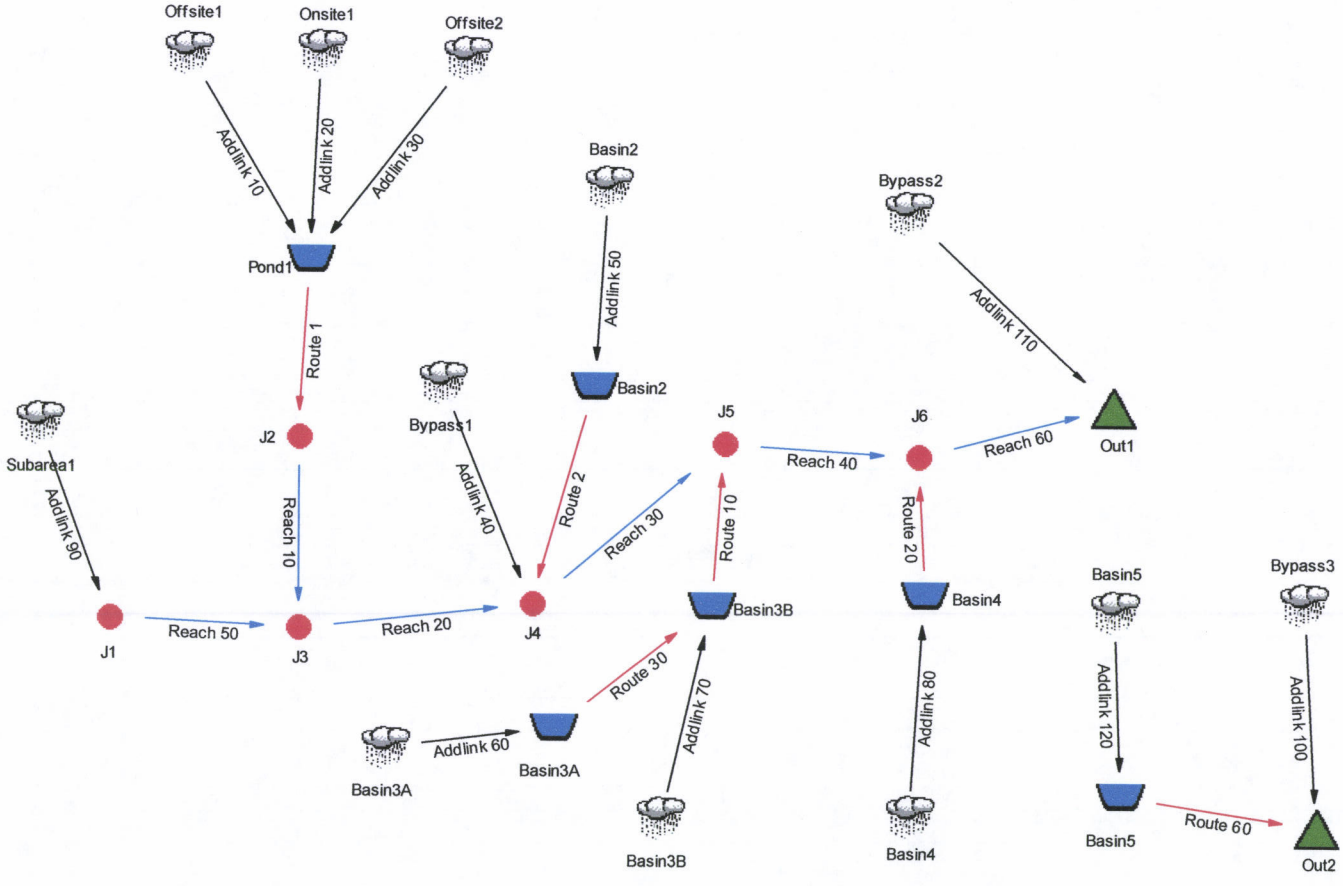
The Improvement Plans and Stormwater Detention Report for Wyndgate were approved in 2004. Nearly all of the construction is completed and "as-built" plans of the storm sewer construction have been completed. Detention Pond 1 and Basins 2 and 4 were not completed per the approved design. This report is an addendum to the Stormwater Detention Report to reflect the As-Built Pond and Basins 2 and 4.

The following table shows peak discharge from Wyndgate in the creek where it leaves the property on the east property line.

Storm Frequency	PEAK DISCHARGE (CFS)		
	Before Predevelopment	Approved Design	As-Built
15 Year	1,193	1,146	1,150
25 Year	1,403	1,315	1,319
100 Year	1,976	1,756	1,762

In each of the storms analyzed, the peak discharge from the development is less than the peak runoff before development. A summary report of the computer model is attached and the complete report for the as-built model is on the attached CD. The report can be opened using notepad or most other word processing software.




Offsite1
Onsite1
Offsite2
Addlink 10
Addlink 20
Addlink 30
Pond1
Route 1
J2
Subarea1
Addlink 90
J1
Reach 50
J3
Reach 10
Reach 20
Bypass1
Addlink 40
Basin2
Addlink 50
Route 2
J4
Reach 30
J5
Route 10
Basin3B
Reach 40
J6
Route 20
Basin4
Addlink 80
Bypass2
Addlink 110
Out1
Reach 60
Basin5
Addlink 120
Route 60
Bypass3
Addlink 100
Out2
Basin3A
Addlink 60
Route 30
Addlink 70

MASTER DESIGN STORM SUMMARY

Network Storm Collection: 2 Year

Return Event	Total Depth in	Rainfall Type	RNF ID
15	5.2000	Synthetic Curve	TypeII 24hr
25	5.7000	Synthetic Curve	TypeII 24hr
100	7.0000	Synthetic Curve	TypeII 24hr

ICPM CALCULATION TOLERANCES

Target Convergence= .000 cfs +/-
Max. Iterations = 35 loops
ICPM Time Step = .0500 hrs
Output Time Step = .0500 hrs
ICPM Ending Time = 35.0000 hrs

MASTER NETWORK SUMMARY
SCS Unit Hydrograph Method

(*Node=Outfall; +Node=Diversion;)
(Trun= HYG Truncation: Blank=None; L=Left; R=Rt; LR=Left&Rt)

Node ID		Type	Return Event	HYG Vol cu.ft	Trun	Qpeak hrs	Qpeak cfs	Max WSEL ft	Max Pond Storage cu.ft
BASIN2		AREA	15	273261		12.1000	75.00		
BASIN2		AREA	25	312030		12.1000	85.53		
BASIN2		AREA	100	415166		12.1000	113.14		
BASIN2	IN	POND	15	273261		12.1000	75.00		
BASIN2	IN	POND	25	312030		12.1000	85.53		
BASIN2	IN	POND	100	415166		12.1000	113.14		

ICPM CALCULATION TOLERANCES

Target Convergence=	.000	cfs +/-
Max. Iterations =	35	loops
ICPM Time Step =	.0500	hrs
Output Time Step =	.0500	hrs
ICPM Ending Time =	35.0000	hrs

MASTER NETWORK SUMMARY
SCS Unit Hydrograph Method

(*Node=Outfall; +Node=Diversion;)
(Trun= HYG Truncation: Blank=None; L=Left; R=Rt; LR=Left&Rt)

Node ID	Type	Return Event	HYG Vol cu.ft	Trun	Qpeak hrs	Qpeak cfs	Max WSEL ft	Max Pond Storage cu.ft
BASIN2	OUT POND	15	273261		12.3500	36.22	579.73	52419
BASIN2	OUT POND	25	312030		12.4000	38.64	580.52	64776
BASIN2	OUT POND	100	415166		12.3000	74.18	581.77	86573
BASIN3A	AREA	15	736750		12.1500	185.97		
BASIN3A	AREA	25	856233		12.1500	216.84		
BASIN3A	AREA	100	1179491		12.1500	299.42		
BASIN3A	POND	15	736751		12.1500	185.97		
BASIN3A	POND	25	856233		12.1500	216.84		
BASIN3A	POND	100	1179491		12.1500	299.42		
BASIN3A	OUT POND	15	736788		12.4500	79.47	571.42	159214
BASIN3A	OUT POND	25	856276		12.4000	89.70	572.13	196899
BASIN3A	OUT POND	100	1179576		12.4500	110.98	573.68	305395
BASIN3B	POND	15	747895		12.4000	80.46		
BASIN3B	POND	25	869331		12.4000	90.87		
BASIN3B	POND	100	1197962		12.4000	112.38		
BASIN3B	OUT POND	15	747917		12.6000	77.37	568.16	29667
BASIN3B	OUT POND	25	869342		12.6500	86.46	568.52	34199
BASIN3B	OUT POND	100	1197985		12.6500	109.60	569.20	42709
BASIN3B	AREA	15	11107		12.0500	3.44		
BASIN3B	AREA	25	13055		12.0500	4.07		
BASIN3B	AREA	100	18387		12.0500	5.79		

ICP C ICPM CALCULATION TOLERANCES
Tar Target Convergence= .000 cfs +/-
Max I Max. Iterations = 35 loops
ICP ICPM Time Step = .0500 hrs
Out Output Time Step = .0500 hrs
ICP ICPM Ending Time = 35.0000 hrs

MASTER NETWORK SUMMARY
SCS Unit Hydrograph Method

(*Node=Outfall; +Node=Diversion;)
(Trun= HYG Truncation: Blank=None; L=Left; R=Rt; LR=Left&Rt)

Node ID	Node ID	Type	Return Event	HYG Vol cu.ft	Trun	Qpeak hrs	Qpeak cfs	Max WSEL ft	Max Pond Storage cu.ft
BYPASS2	BASIN4	AREA	15	90257		12.1500	23.54		
BYPASS2	BASIN4	AREA	25	105180		12.1500	27.51		
BYPASS2	BASIN4	AREA	100	145662		12.1500	38.16		
BYPASS3	BASIN4 IN	POND	15	90257		12.1500	23.54		
BYPASS3	BASIN4 IN	POND	25	105180		12.1500	27.51		
BYPASS3	BASIN4 IN	POND	100	145662		12.1500	38.16		
J1	BASIN4 OUT	POND	15	90257		12.4500	9.45	583.92	20718
J1	BASIN4 OUT	POND	25	105179		12.5000	10.03	584.50	26418
J1	BASIN4 OUT	POND	100	145662		12.5500	11.52	585.84	42791
J2	BASIN5	AREA	15	158941		12.1000	47.49		
J2	BASIN5	AREA	25	186272		12.1000	55.82		
J2	BASIN5	AREA	100	260841		12.1000	78.24		
J3	BASIN5 IN	POND	15	158941		12.1000	47.49		
J3	BASIN5 IN	POND	25	186272		12.1000	55.82		
J3	BASIN5 IN	POND	100	260841		12.1000	78.24		
J4	BASIN5 OUT	POND	15	158924		12.7000	7.68	557.82	69784
J4	BASIN5 OUT	POND	25	186254		12.4000	18.34	558.23	75017
J4	BASIN5 OUT	POND	100	260823		12.2500	50.84	558.95	84596
J5	BYPASS1	AREA	15	898134		12.1500	215.37		
J5	BYPASS1	AREA	25	1005090		12.1500	239.77		
J5	BYPASS1	AREA	100	1285189		12.1500	302.90		