



Timeline of Outreach related to the Section 106 and NEPA Process for the Iowa City Gateway

The NEPA and Section 106 processes for the Iowa City Gateway Project began in December 2010. Throughout both processes, City of Iowa City, consultant and the Iowa DOT staff have actively sought to conduct an open, transparent process. Traditional public involvement activities included:

- Three public meetings and a public hearing,
- Multiple paid advertisements and media stories related to the milestones associated with each public event,
- A project mailing list of nearly 2,000 residents and property owners,
- A project web site that encouraged citizen participation and kept citizens apprised of each stage of the project,
- Coordination with the City of Iowa City's Historic Preservation Commission regarding the Section 106 process that was led by the Office of the State Archaeologist and Iowa City based architectural historians,
- Presentations to neighborhood and civic groups,
- City and consultant staff made available for on-site and neighborhood based meetings,
- City and consultant staff available for in-person meetings, email correspondence and telephone conversations.

Very early in the process, and in some cases prior to the start of each process, residents of the Bella Vista neighborhood, 1818 Dubuque Street and 1501 Ridge Road took full advantage of City staff's willingness to meet and discuss resident concerns about the project. Repeatedly over the past three years, staff met and discussed the project with residents, provided answers and sought to minimize or avoid impacts to their properties. Following below is a summary timeline of communications and meetings that have occurred the past three years with residents of Bella Vista and Dubuque Street. The summary includes references to the Bates page numbers where more information about a given meeting, correspondence, or event may be found.

Fall 2010 – Spring 2011 Activities

Although the project kicked off in December of 2010, conversations with concerned residents in the project corridor began as early as August of that year.

August 18, 2010 – Prior to the formal project kickoff, Dr. Tony Colby, owner of 5 Bella Vista contacted City staff with multiple questions regarding the project. This correspondence continued back and forth between Dr. Colby and staff through early 2011. It culminated with an in person visit to Dr. Colby's home to discuss the project.



January 2011 – Soon following the project kick off, Joe Coulter, owner of 1818 Dubuque Street visited City staff in person with questions regarding the project. City staff met with Mr. Coulter again in person at his home in February 2011 to discuss the project. These were the first of multiple conversations that have taken place with Mr. Coulter during the course of the project.

March 3, 2011 Public Meeting #1 – More than 150 attendees had an opportunity to learn about the project process, provide input regarding corridor needs, ask questions, sign up to receive project information, and see a short presentation and the project and its current status. The meeting was publicized via postcards mailed to over 2,000 addresses within and adjacent to the study area, paid advertising in six issues of the Iowa City Press-Citizen and online edition, and press releases sent to the local media and posted on the city web site.

March – April 2011 – Through contact with Dr. Colby and at his urging, City staff corresponded repeatedly with Bella Vista residents to schedule an in person meeting at one of the Bella Vista homes. Residents contacted as part of the discussion included Barbara Latenser (12 Bella Vista), Scott McDonough (10 BV), James Harris (8 BV), Tony Colby (5 BV) and another nearby homeowner, Jen Wagner. Number 6 Bella Vista was for sale/unoccupied at the time. City and Consultant staff met in person with Scott McDonough and Barbara Latenser, at Mr. McDonough's home on April 6, 2011 to discuss the project and better understand homeowner questions and concerns. This included tours of both 12 and 10 Bella Vista, as well as a tour of the neighborhood with Mr. McDonough and Ms. Latenser.

(Materials related to these meetings and activities may be found between Bates numbered pages 01 to 65)

Summer – Winter 2011 Activities

July 13, 2011 Public Meeting #2 – More than 100 persons attended an open-house from 4:30 to 5:30, followed by a presentation and short question and answer session. This meeting included information on improvement alternatives, reasonable alternatives, alternative screening criteria, and bridge alternatives. The meeting was advertised via postcards mailed to over 2,000 addresses within and adjacent to the study area, email notifications to past meeting attendees who had provided valid email address, paid advertising in six issues of the Press-Citizen and advertising in the Daily Iowan, press releases to the local media, and the presentation was recorded and aired by local access cable TV.

December 8, 2011 – Drop-in Center to present three alternatives – Because of wide public interest in the project, the draft alternatives were posted to the project website on November 25, 2012. For those that wanted to review maps, ask questions, or submit comments in person, a drop-in center was held on December 8, 2011 at the Robert A. Lee Community Center. Approximately 30 citizens attended the drop-in center, including Joe Coulter, owner of 1818 Dubuque and John Stefaniak, owner of 1501 Ridge Road.

Prior to this event, Joe Coulter twice met with City staff in person at City offices to discuss issues related to the project and the three alternatives presented at the drop-in center.



(Materials related to activities during this period are found between Bates numbers 66 to 90)

2012 Activities

Following the drop in center, the project team spent most of 2012 working on the environmental assessment of the reasonable alternatives. This included the analysis related to the Section 106 process. However, during this time project and consultant staff continued to be in contact with residents. In late March 2012, homeowners along the study corridor were reminded of the project as City staff sent notices regarding the noise analysis and other field work. Also in March of 2012, television media outlets interviewed City Manager Tom Markus regarding progress on the project.

August of 2012 – City staff met with the Iowa City Historic Preservation Commission to review study progress. The City’s Project Manager made a presentation on study progress and the impacts of the preferred alternative on cultural resources. The meeting concluded with the Historic Preservation Commission voting unanimously by a vote of 8-0 on a motion to send a statement to the Iowa DOT Cultural and Historic Resources Staff and to the State Historic Preservation Office, finding that the proposed Gateway Project is a needed community improvement. The Commission found that efforts had been made to avoid and mitigate impacts on historic properties and were in favor of the project as presented.

Fall 2012 – Activities related to cultural resources wrapped up in fall 2012. On September 9, 2012 the Iowa State Historic Preservation Office concurred with Iowa DOT Cultural Resource staff with the conditions proposed of avoidance and minimum impact, the determination for this project is Conditional No Adverse Effect. On November 2, the FHWA concurred with the Iowa DOT’s recommendation that a de minimus impact and its associated documentation be required for the project.

(Materials related to activities during this period are found between Bates numbers 91 and 217)

Winter – Spring 2013 Activities

January 2013 – The Stefaniaks, owners of 1501 Ridge Road asked for and received a status update regarding the project.

February 2013 – Tony Colby contacted City staff regarding rumors that the project would include demolition or alterations to structures on Bella Vista. The City’s Project Manager assured Dr. Colby and Jen Wagner that this was not the case. She also provided updated exhibits to Dr. Colby regarding the temporary construction impacts to his property and made Dr. Colby and Ms. Wagner aware of the upcoming public hearing and EA comment period.

April 2, 2013 – Following a phone call and email correspondence with Tony Colby, city staff followed up with an email to all Bella Vista residents to share the latest information regarding the project.

April 4, 2013 Drop-In Center and Public Hearing – The April 4, 2013 Public Hearing included a drop-in center from 4:30-6:00 pm and a formal presentation and question and answer session at 6:30 pm. At



the meeting, roughly 45 attendees had an opportunity to learn about the recommendations in the Environmental Assessment. Attendees also had the opportunity to provide formal comments that were recorded in the official Public Hearing Transcript provided to Iowa DOT and FHWA along with all other comments provided during the public comment period from March 13 to April 15, 2013. The meeting was advertised via postcards mailed to over 2,000 addresses within and adjacent to the study area, email notifications to past meeting attendees who had provided valid email address, paid advertising in six issues of the Press-Citizen and advertising in the Daily Iowan, press releases to the local media

April 12, 2013 – Public Works Director Rick Fosse and City Planner Bob Miklo met at Joe Coulter’s house to discuss Historic Preservation. JB Barnhouse was present as well to discuss moving the garage to the north side of the property and providing an alternate access.

April – May 2013 – Following the public hearing and after the conclusion of the EA comment period, there was a great deal of communication between staff and residents of Bella Vista and Dubuque Street. During this time, the City Manager and staff toured the Bella Vista neighborhood with residents and met to answer questions and concerns regarding the project.

(See material related to these activities starting at Bates number 218 through 555)

Summer 2013

May 31, 2013 – Prior to FHWA’s signing of the Finding of No Significant Impact, local citizens appealed to the Iowa DOT Cultural Resources Section to re-evaluate the finding of a Conditional No Adverse Effect to historic resources in the Dubuque Street corridor. As a result, Iowa DOT Cultural Resources engaged the Highway Archeology Program (HAP) to conduct an independent review of the Section 106 Historic Evaluation process. The conclusion of the independent review agreed that there had been no design changes since the original finding of Conditional No Adverse Effect was made in October 2012. The reviewers also agreed with the October 2012 finding of Conditional No Adverse Effect on cultural and historic resources in the project area.

At about this same time, Bella Vista residents invited City staff to a neighborhood meeting and tour. At the meeting, residents were able to express concerns and ask questions. The meeting was attended by the City Manager as well as engineering staff.

(See material related to the HAP Evaluation starting at Bates number 0556 to 590, 866 to 877 and 1052 to 1065)

June and July 2013 – Coinciding with the request of the DOT to engage the Highway Archaeology Program, local citizens appealed to the Historic Preservation Commission (HPC) to rescind its letter of support for the Iowa City Gateway Project. The original appeal was made at the June HPC meeting. Residents in the project corridor were invited to attend and present their concerns at the July 11 HPC meeting. City Project Manager, Melissa Clow, and resident Joe Coulter each provided a powerpoint presentation. Other Bella Vista residents expressed their concerns throughout the four-plus hour



meeting. The HPC tabled the request to rescind its letter of support in order to obtain more information and consider the request.

At its meeting on July 26, 2013, the HPC voted 7-1 with one abstention to amend the previous letter of support. While still in support of the project, the HPC amended the previous letter with strong recommendations to:

- Minimize grading and tree removal on historic properties;
- Address drainage issues at 1818 N. Dubuque Street; and
- Adopt design methods that would allow a thinner bridge deck therefore lowering the proposed grade of the Dubuque Street and Park Road intersection.

(See material related to the appeal to the HPC and their summer meetings starting at Bates number 591 through 1286)

August 2013

Following the decisions of the Highway Archaeology Program and the Historic Preservation Commission, Bella Vista residents contacted the Advisory Council for Historic Preservation (ACHP) regarding their concerns about the project.

FIGURE 2

Iowa River and Park Road Bridge												
Condition Comparisons (using the 100yr or lesser flow Ayers HEC-RAS model)												
By: John Blancett, PE - HNTB												
		50yr		100yr		200yr		2008		500yr		Comments
Flowrate (cfs)		22,000		29,000		36,430		41,800		45,000		
Existing Conditions												
Water Surface Elevation												
	at Parkview Terrace / City Park	648.92		651.32		653.60		655.31		656.68		xsec 31345
	at Taft Speedway / Idyllwild	648.56		651.17		653.59		655.35		656.74		xsec 29763
	at Mayflower	648.34		651.04		653.52		655.29		656.69		xsec 27911
	at Backwater Cross-section (upstream of Kimball)	648.08		650.83		653.39		655.17		656.58		xsec 27226
	Immediately Upstream of Bridge	647.82		650.46		653.05		654.86		656.32		xsec 26494
	Immediately Downstream of Bridge	647.69		650.22		652.40		653.97		655.57		xsec 26352
	Water Surface Elevations used for setting Apex of Bridge underside	647.82		650.73		653.05		653.98		655.56		
	Difference with Immediately Downstream of the Bridge	0.13		0.51		0.65		0.01		-0.01		xsec 26352
Proposed Conditions												
			Difference		Difference		Difference		Difference		Difference	
			Prop vs Ex		Prop vs Ex		Prop vs Ex		Prop vs Ex		Prop vs Ex	
			(inches)		(inches)		(inches)		(inches)		(inches)	
	Deck Arch (Apex at 100yr +1ft)	651.73										
	at Parkview Terrace / City Park	648.93	0.1	651.27	-0.6	653.42	-2.2	655.01	-3.6	656.50	-2.2	xsec 31345
	at Taft Speedway / Idyllwild	648.58	0.2	651.11	-0.7	653.40	-2.3	655.05	-3.6	656.56	-2.2	xsec 29763
	at Mayflower	648.35	0.1	650.97	-0.8	653.31	-2.5	654.97	-3.8	656.49	-2.4	xsec 27911
	at Backwater Cross-section (upstream of Kimball)	648.10	0.2	650.76	-0.8	653.09	-3.6	654.75	-5.0	656.30	-3.4	xsec 27226
	Immediately Upstream of Bridge	647.84	0.2	650.43	-0.4	652.68	-4.4	654.31	-6.6	655.87	-5.4	xsec 26494
	Immediately Downstream of Bridge	647.71	0.2	650.24	0.2	652.38	-0.2	653.96	-0.1	655.54	-0.4	xsec 26352
	Top of Pier (Bottom of Arch)	636.73										
	Deck Arch (Apex at 200yr +1ft)	654.05										
	at Parkview Terrace / City Park	648.91	-0.1	651.23	-1.1	653.33	-3.2	654.93	-4.6	656.47	-2.5	xsec 31345
	at Taft Speedway / Idyllwild	648.55	-0.1	651.07	-1.2	653.30	-3.5	654.96	-4.7	656.53	-2.5	xsec 29763
	at Mayflower	648.32	-0.2	650.93	-1.3	653.21	-3.7	654.88	-4.9	656.47	-2.6	xsec 27911
	at Backwater Cross-section (upstream of Kimball)	648.06	-0.2	650.71	-1.4	652.98	-4.9	654.66	-6.1	656.27	-3.7	xsec 27226
	Immediately Upstream of Bridge	647.81	-0.1	650.38	-1.0	652.58	-5.6	654.22	-7.7	655.84	-5.8	xsec 26494
	Immediately Downstream of Bridge	647.71	0.2	650.24	0.2	652.38	-0.2	653.96	-0.1	655.54	-0.4	xsec 26352
	Top of Pier (Bottom of Arch)	639.05										

FIGURE 2

		50yr		100yr		200yr		2008		500yr		Comments
	Flowrate (cfs)	22,000		29,000		36,430		41,800		45,000		
Deck Arch (Apex at 2008 +1ft)												
		654.98										
	at Parkview Terrace / City Park	648.90	-0.2	651.22	-1.2	653.31	-3.5	654.89	-5.0	656.44	-2.9	xsec 31345
	at Taft Speedway / Idyllwild	648.54	-0.2	651.05	-1.4	653.28	-3.7	654.92	-5.2	656.50	-2.9	xsec 29763
	at Mayflower	648.31	-0.4	650.91	-1.6	653.19	-4.0	654.84	-5.4	656.43	-3.1	xsec 27911
	at Backwater Cross-section (upstream of Kimball)	648.05	-0.4	650.69	-1.7	652.96	-5.2	654.62	-6.6	656.23	-4.2	xsec 27226
	Immediately Upstream of Bridge	647.80	-0.2	650.36	-1.2	652.56	-5.9	654.17	-8.3	655.80	-6.2	xsec 26494
	Immediately Downstream of Bridge	647.71	0.2	650.24	0.2	652.38	-0.2	653.96	-0.1	655.54	-0.4	xsec 26352
	Top of Pier (Bottom of Arch)	639.98										
Deck Arch (Apex at 500yr +1ft)												
		656.56										
	at Parkview Terrace / City Park	648.90	-0.2	651.20	-1.4	653.28	-3.8	654.85	-5.5	656.38	-3.6	xsec 31345
	at Taft Speedway / Idyllwild	648.54	-0.2	651.04	-1.6	653.26	-4.0	654.88	-5.6	656.44	-3.6	xsec 29763
	at Mayflower	648.30	-0.5	650.89	-1.8	653.16	-4.3	654.80	-5.9	656.37	-3.8	xsec 27911
	at Backwater Cross-section (upstream of Kimball)	648.04	-0.5	650.67	-1.9	652.93	-5.5	654.57	-7.2	656.17	-4.9	xsec 27226
	Immediately Upstream of Bridge	647.79	-0.4	650.34	-1.4	652.52	-6.4	654.13	-8.8	655.74	-7.0	xsec 26494
	Immediately Downstream of Bridge	647.71	0.2	650.24	0.2	652.38	-0.2	653.96	-0.1	655.54	-0.4	xsec 26352
	Top of Pier (Bottom of Arch)	641.56										
Partial Thru Arch (Apex at 100yr +1ft)												
		651.73										
	at Parkview Terrace / City Park	648.94	0.2	651.27	-0.6	653.41	-2.3	655.03	-3.4	656.57	-1.3	xsec 31345
	at Taft Speedway / Idyllwild	648.59	0.4	651.11	-0.7	653.39	-2.4	655.07	-3.4	656.63	-1.3	xsec 29763
	at Mayflower	648.37	0.4	650.97	-0.8	653.30	-2.6	654.98	-3.7	656.56	-1.6	xsec 27911
	at Backwater Cross-section (upstream of Kimball)	648.11	0.4	650.76	-0.8	653.08	-3.7	654.77	-4.8	656.37	-2.5	xsec 27226
	Immediately Upstream of Bridge	647.86	0.5	650.43	-0.4	652.68	-4.4	654.33	-6.4	655.94	-4.6	xsec 26494
	Immediately Downstream of Bridge	647.71	0.2	650.24	0.2	652.38	-0.2	653.96	-0.1	655.54	-0.4	xsec 26352
	Top of Pier (Bottom of Haunch)	634.73										
Partial Thru Arch (Apex at 200yr +1ft)												
		654.05										
	at Parkview Terrace / City Park	648.93	0.1	651.24	-1.0	653.34	-3.1	654.91	-4.8	656.48	-2.4	xsec 31345
	at Taft Speedway / Idyllwild	648.58	0.2	651.08	-1.1	653.31	-3.4	654.94	-4.9	656.54	-2.4	xsec 29763
	at Mayflower	648.35	0.1	650.94	-1.2	653.22	-3.6	654.86	-5.2	656.47	-2.6	xsec 27911
	at Backwater Cross-section (upstream of Kimball)	648.09	0.1	650.72	-1.3	652.99	-4.8	654.64	-6.4	656.27	-3.7	xsec 27226
	Immediately Upstream of Bridge	647.84	0.2	650.39	-0.8	652.59	-5.5	654.20	-7.9	655.85	-5.6	xsec 26494
	Immediately Downstream of Bridge	647.71	0.2	650.24	0.2	652.38	-0.2	653.96	-0.1	655.54	-0.4	xsec 26352
	Top of Pier (Bottom of Haunch)	637.05										

FIGURE 2

		50yr		100yr		200yr		2008		500yr		Comments
	Flowrate (cfs)	22,000		29,000		36,430		41,800		45,000		
	Partial Thru Arch (Apex at 2008 +1ft)	654.98										
	at Parkview Terrace / City Park	648.92	0.0	651.23	-1.1	653.31	-3.5	654.89	-5.0	656.43	-3.0	xsec 31345
	at Taft Speedway / Idyllwild	648.57	0.1	651.07	-1.2	653.28	-3.7	654.92	-5.2	656.49	-3.0	xsec 29763
	at Mayflower	648.34	0.0	650.93	-1.3	653.19	-4.0	654.84	-5.4	656.42	-3.2	xsec 27911
	at Backwater Cross-section (upstream of Kimball)	648.08	0.0	650.71	-1.4	652.96	-5.2	654.62	-6.6	656.23	-4.2	xsec 27226
	Immediately Upstream of Bridge	647.83	0.1	650.38	-1.0	652.55	-6.0	654.17	-8.3	655.80	-6.2	xsec 26494
	Immediately Downstream of Bridge	647.71	0.2	650.24	0.2	652.38	-0.2	653.96	-0.1	655.54	-0.4	xsec 26352
	Top of Pier (Bottom of Haunch)	637.98										
	Partial Thru Arch (Apex at 500yr +1ft)	656.56										
	at Parkview Terrace / City Park	648.91	-0.1	651.22	-1.2	653.29	-3.7	654.84	-5.6	656.37	-3.7	xsec 31345
	at Taft Speedway / Idyllwild	648.55	-0.1	651.05	-1.4	653.26	-4.0	654.87	-5.8	656.43	-3.7	xsec 29763
	at Mayflower	648.32	-0.2	650.91	-1.6	653.17	-4.2	654.79	-6.0	656.36	-4.0	xsec 27911
	at Backwater Cross-section (upstream of Kimball)	648.06	-0.2	650.69	-1.7	652.94	-5.4	654.57	-7.2	656.16	-5.0	xsec 27226
	Immediately Upstream of Bridge	647.81	-0.1	650.36	-1.2	652.53	-6.2	654.12	-8.9	655.73	-7.1	xsec 26494
	Immediately Downstream of Bridge	647.71	0.2	650.24	0.2	652.38	-0.2	653.96	-0.1	655.54	-0.4	xsec 26352
	Top of Pier (Bottom of Haunch)	639.56										
	Haunched Girder (Apex at 100yr +1ft)	651.73										
	at Parkview Terrace / City Park	648.87	-0.6	651.17	-1.8	653.35	-3.0	655.03	-3.4	656.68	0.0	xsec 31345
	at Taft Speedway / Idyllwild	648.50	-0.7	651.00	-2.0	653.32	-3.2	655.07	-3.4	656.74	0.0	xsec 29763
	at Mayflower	648.26	-1.0	650.85	-2.3	653.23	-3.5	654.99	-3.6	656.68	-0.1	xsec 27911
	at Backwater Cross-section (upstream of Kimball)	648.00	-1.0	650.63	-2.4	653.00	-4.7	654.77	-4.8	656.49	-1.1	xsec 27226
	Immediately Upstream of Bridge	647.74	-1.0	650.29	-2.0	652.60	-5.4	654.34	-6.2	656.07	-3.0	xsec 26494
	Immediately Downstream of Bridge	647.71	0.2	650.24	0.2	652.38	-0.2	653.96	-0.1	655.54	-0.4	xsec 26352
	Top of Pier (Bottom of Haunch)	649.23										
	Haunched Girder (Apex at 200yr +1ft)	654.05										
	at Parkview Terrace / City Park	648.87	-0.6	651.15	-2.0	653.21	-4.7	654.81	-6.0	656.43	-3.0	xsec 31345
	at Taft Speedway / Idyllwild	648.50	-0.7	650.98	-2.3	653.18	-4.9	654.84	-6.1	656.49	-3.0	xsec 29763
	at Mayflower	648.26	-1.0	650.83	-2.5	653.08	-5.3	654.76	-6.4	656.42	-3.2	xsec 27911
	at Backwater Cross-section (upstream of Kimball)	648.00	-1.0	650.61	-2.6	652.85	-6.5	654.53	-7.7	656.23	-4.2	xsec 27226
	Immediately Upstream of Bridge	647.74	-1.0	650.27	-2.3	652.44	-7.3	654.08	-9.4	655.80	-6.2	xsec 26494
	Immediately Downstream of Bridge	647.71	0.2	650.24	0.2	652.38	-0.2	653.96	-0.1	655.54	-0.4	xsec 26352
	Top of Pier (Bottom of Haunch)	651.55										

FIGURE 2

		50yr		100yr		200yr		2008		500yr		Comments
	Flowrate (cfs)	22,000		29,000		36,430		41,800		45,000		
	Haunched Girder (Apex at 2008 +1ft)	654.98										
	at Parkview Terrace / City Park	648.87	-0.6	651.15	-2.0	653.20	-4.8	654.76	-6.6	656.36	-3.8	xsec 31345
	at Taft Speedway / Idyllwild	648.50	-0.7	650.98	-2.3	653.17	-5.0	654.80	-6.6	656.42	-3.8	xsec 29763
	at Mayflower	648.26	-1.0	650.83	-2.5	653.07	-5.4	654.71	-7.0	656.35	-4.1	xsec 27911
	at Backwater Cross-section (upstream of Kimball)	648.00	-1.0	650.61	-2.6	652.84	-6.6	654.48	-8.3	656.15	-5.2	xsec 27226
	Immediately Upstream of Bridge	647.74	-1.0	650.27	-2.3	652.43	-7.4	654.03	-10.0	655.72	-7.2	xsec 26494
	Immediately Downstream of Bridge	647.71	0.2	650.24	0.2	652.38	-0.2	653.96	-0.1	655.54	-0.4	xsec 26352
	Top of Pier (Bottom of Haunch)	652.48										
	Haunched Girder (Apex at 500yr +1ft)	656.56										
	at Parkview Terrace / City Park	648.87	-0.6	651.15	-2.0	653.20	-4.8	654.74	-6.8	656.26	-5.0	xsec 31345
	at Taft Speedway / Idyllwild	648.50	-0.7	650.98	-2.3	653.17	-5.0	654.77	-7.0	656.32	-5.0	xsec 29763
	at Mayflower	648.26	-1.0	650.83	-2.5	653.07	-5.4	654.68	-7.3	656.25	-5.3	xsec 27911
	at Backwater Cross-section (upstream of Kimball)	648.00	-1.0	650.61	-2.6	652.84	-6.6	654.45	-8.6	656.05	-6.4	xsec 27226
	Immediately Upstream of Bridge	647.74	-1.0	650.27	-2.3	652.42	-7.6	654.00	-10.3	655.61	-8.5	xsec 26494
	Immediately Downstream of Bridge	647.71	0.2	650.24	0.2	652.38	-0.2	653.96	-0.1	655.54	-0.4	xsec 26352
	Top of Pier (Bottom of Haunch)	654.06										
	Notes:											
	"2008" condition is based on that flowrate, not the cofferdam or HESCO's in place											
	xsec 26352 (immediately downstream of bridge) tenths of inches of "rise" in water surface is a common modeling anomaly that not a concern, because subcritical impediments propagate upstream, not downstream											

FIGURE 4

Category	Partial Through Arch Bridge				
	Bridge Elevation	500+1 Bridge	2008+1 Bridge	200+1 Bridge	100+1 Bridge
	Roadway Elevation	2008+1 Road	2008+1 Road	2008+1 Road	2008+1 Road
Pavement & Base		\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000
Lighting and Signals		\$820,000	\$820,000	\$820,000	\$820,000
Structure		\$14,150,000	\$13,940,000	\$13,530,000	\$13,060,000
Grading & Drainage		\$2,870,000	\$2,870,000	\$2,760,000	\$2,660,000
Right of Way Acquisition		\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000
Pavement Marking		\$240,000	\$240,000	\$240,000	\$240,000
Aesthetics		\$980,000	\$980,000	\$980,000	\$980,000
Miscellaneous Costs		\$12,280,000	\$12,230,000	\$12,080,000	\$11,920,000
TOTAL		\$38,630,000	\$38,370,000	\$37,700,000	\$36,970,000

Category	Deck Arch Bridge				
	Bridge Elevation	500+1 Bridge	2008+1 Bridge	200+1 Bridge	100+1 Bridge
	Roadway Elevation	2008+1 Road	2008+1 Road	2008+1 Road	2008+1 Road
Pavement & Base		\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000
Lighting and Signals		\$820,000	\$820,000	\$820,000	\$820,000
Structure		\$14,150,000	\$13,940,000	\$13,530,000	\$13,060,000
Grading & Drainage		\$2,890,000	\$2,860,000	\$2,780,000	\$2,670,000
Right of Way Acquisition		\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000
Pavement Marking		\$240,000	\$240,000	\$240,000	\$240,000
Aesthetics		\$980,000	\$980,000	\$980,000	\$980,000
Miscellaneous Costs		\$12,290,000	\$12,230,000	\$12,090,000	\$11,930,000
TOTAL		\$38,660,000	\$38,360,000	\$37,730,000	\$36,990,000

Category	Deck Girder Bridge				
	Bridge Elevation	500+1 Bridge	2008+1 Bridge	200+1 Bridge	100+1 Bridge
	Roadway Elevation	2008+1 Road	2008+1 Road	2008+1 Road	2008+1 Road
Pavement & Base		\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000
Lighting and Signals		\$820,000	\$820,000	\$820,000	\$820,000
Structure		\$11,550,000	\$11,340,000	\$13,530,000	\$13,060,000
Grading & Drainage		\$2,890,000	\$2,870,000	\$2,780,000	\$2,680,000
Right of Way Acquisition		\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000
Pavement Marking		\$240,000	\$240,000	\$240,000	\$240,000
Aesthetics		\$980,000	\$980,000	\$980,000	\$980,000
Miscellaneous Costs		\$11,570,000	\$11,500,000	\$12,090,000	\$11,930,000
TOTAL		\$35,340,000	\$35,040,000	\$37,730,000	\$37,000,000

FIGURE 4

		Partial Through Arch Bridge									
		500+1 Bridge				2008+1 Bridge		200+1 Bridge		100+1 Bridge	
Category	Roadway Elevation	500+1 Road	2008+1 Road	200+1 Road	100+1 Road	2008+1 Road	100+1 Road	2008+1 Road	200+1 Road	2008+1 Road	100+1 Road
Pavement & Base		\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000
Lighting and Signals		\$820,000	\$820,000	\$820,000	\$820,000	\$820,000	\$820,000	\$820,000	\$820,000	\$820,000	\$820,000
Structure		\$14,550,000	\$14,150,000	\$14,050,000	\$13,570,000	\$13,940,000	\$13,490,000	\$13,530,000	\$13,790,000	\$13,060,000	\$13,060,000
Grading & Drainage		\$3,500,000	\$2,870,000	\$2,710,000	\$2,100,000	\$2,870,000	\$2,020,000	\$2,760,000	\$2,680,000	\$2,660,000	\$1,890,000
Right of Way Acquisition		\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000
Pavement Marking		\$240,000	\$240,000	\$240,000	\$240,000	\$240,000	\$240,000	\$240,000	\$240,000	\$240,000	\$240,000
Aesthetics		\$980,000	\$980,000	\$980,000	\$980,000	\$980,000	\$980,000	\$980,000	\$980,000	\$980,000	\$980,000
Miscellaneous Costs		\$12,580,000	\$12,280,000	\$12,210,000	\$11,900,000	\$12,230,000	\$11,860,000	\$12,080,000	\$12,130,000	\$11,920,000	\$11,710,000
TOTAL		\$39,960,000	\$38,630,000	\$38,300,000	\$36,900,000	\$38,370,000	\$36,700,000	\$37,700,000	\$37,930,000	\$36,970,000	\$35,990,000

		Deck Arch Bridge									
		500+1 Bridge				2008+1 Bridge		200+1 Bridge		100+1 Bridge	
Category	Roadway Elevation	500+1 Road	2008+1 Road	200+1 Road	100+1 Road	2008+1 Road	100+1 Road	2008+1 Road	200+1 Road	2008+1 Road	100+1 Road
Pavement & Base		\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000
Lighting and Signals		\$820,000	\$820,000	\$820,000	\$820,000	\$820,000	\$820,000	\$820,000	\$820,000	\$820,000	\$820,000
Structure		\$14,550,000	\$14,150,000	\$14,050,000	\$13,570,000	\$13,940,000	\$13,490,000	\$13,530,000	\$13,790,000	\$13,060,000	\$13,060,000
Grading & Drainage		\$3,520,000	\$2,890,000	\$2,730,000	\$2,120,000	\$2,860,000	\$2,030,000	\$2,780,000	\$2,700,000	\$2,670,000	\$1,910,000
Right of Way Acquisition		\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000
Pavement Marking		\$240,000	\$240,000	\$240,000	\$240,000	\$240,000	\$240,000	\$240,000	\$240,000	\$240,000	\$240,000
Aesthetics		\$980,000	\$980,000	\$980,000	\$980,000	\$980,000	\$980,000	\$980,000	\$980,000	\$980,000	\$980,000
Miscellaneous Costs		\$12,580,000	\$12,290,000	\$12,220,000	\$11,920,000	\$12,230,000	\$11,860,000	\$12,090,000	\$12,140,000	\$11,930,000	\$11,710,000
TOTAL		\$39,980,000	\$38,660,000	\$38,330,000	\$36,940,000	\$38,360,000	\$36,710,000	\$37,730,000	\$37,960,000	\$36,990,000	\$36,010,000

		Deck Girder Bridge									
		500+1 Bridge				2008+1 Bridge		200+1 Bridge		100+1 Bridge	
Category	Roadway Elevation	500+1 Road	2008+1 Road	200+1 Road	100+1 Road	2008+1 Road	100+1 Road	2008+1 Road	200+1 Road	2008+1 Road	100+1 Road
Pavement & Base		\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000	\$4,660,000
Lighting and Signals		\$820,000	\$820,000	\$820,000	\$820,000	\$820,000	\$820,000	\$820,000	\$820,000	\$820,000	\$820,000
Structure		\$11,950,000	\$11,550,000	\$11,450,000	\$11,430,000	\$11,340,000	\$10,890,000	\$13,530,000	\$11,190,000	\$13,060,000	\$10,450,000
Grading & Drainage		\$3,520,000	\$2,890,000	\$2,730,000	\$2,120,000	\$2,870,000	\$2,040,000	\$2,780,000	\$2,700,000	\$2,680,000	\$1,910,000
Right of Way Acquisition		\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000	\$2,630,000
Pavement Marking		\$240,000	\$240,000	\$240,000	\$240,000	\$240,000	\$240,000	\$240,000	\$240,000	\$240,000	\$240,000
Aesthetics		\$980,000	\$980,000	\$980,000	\$980,000	\$980,000	\$980,000	\$980,000	\$980,000	\$980,000	\$980,000
Miscellaneous Costs		\$11,850,000	\$11,570,000	\$11,500,000	\$11,320,000	\$11,500,000	\$11,150,000	\$12,090,000	\$11,410,000	\$11,930,000	\$10,980,000
TOTAL		\$36,650,000	\$35,340,000	\$35,010,000	\$34,200,000	\$35,040,000	\$33,410,000	\$37,730,000	\$34,630,000	\$37,000,000	\$32,670,000