Shelly Park Redevelopment Project

Provided to City of Manchester, Iowa

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Project Site Location

Shelly Park is nestled between downtown Manchester and the Maquoketa River. Whitewater Park is located just to the west or upstream of Shelly Park.

Figure 1, Shelly Park located in Manchester, Iowa.

Design Objectives

The new park design includes several improvements, the most important of which is improved accessibility. Currently, the park is not ADA accessible, limiting the amount of people who can enjoy this area. This project will also address park functionality and aesthetics with new retaining walls, light fixtures, trees, grass amphitheater seating, and a new pavilion structure. Lastly, this project will incrementally decrease the flood threat to downtown with the removal of the gazebo and relocating a pavilion shade structure further to the east and out of the river's floodway. Here are two images of the current park layout.

Figure 2 & 3, Pictures of the project site at current conditions

Final Design Details

The finalized site plan of this project is shown in the center of this section. Conceptual pictures are shown to the sides to illustrate design elements.

Figure 4, Swinging benches in Manchester, Iowa.

Figure 5, Terry Trueblood Recreation Center in Iowa City, IA.

Figure 6, Grass Amphitheater at Golden West College.

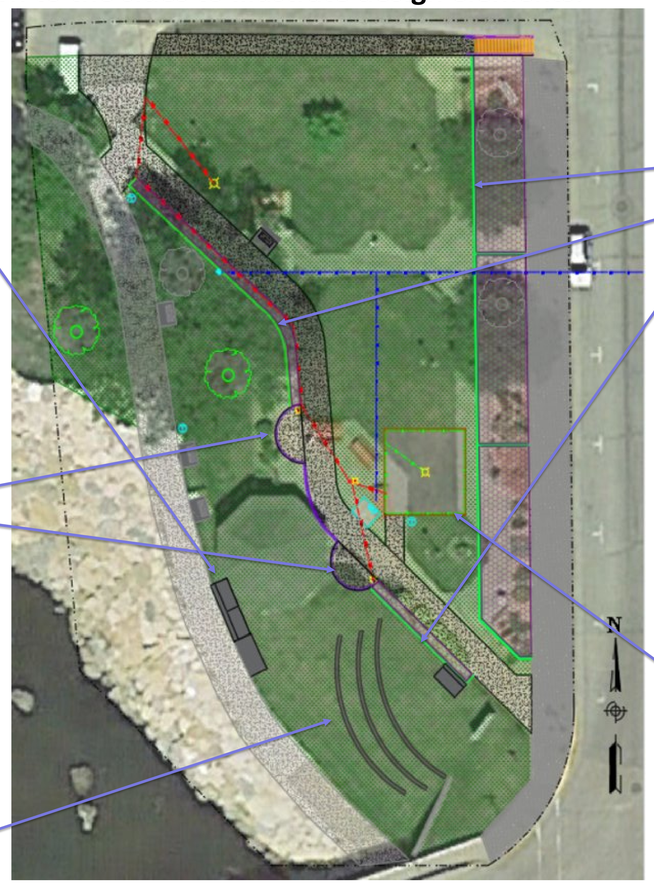

Figure 9, Final site plan with detailed element drawings.

Figure 7, Poured in place concrete retaining wall with limestone veneer in Iowa City, IA.

Figure 8, Laminated Wood Arch Beam Hexagon Pavilion from CedarStore.com.

Project Conclusions & Cost Estimation

All the design details are included in the section above. The new site will have an ADA compliant shared use path for both cyclists and pedestrians. The gazebo is replaced with lookouts for a great view of the river. The site also has a large flexible space in the middle, with a pavilion to provide shade and a water fountain placed at the entrance. New trees will provide additional shade. New retaining walls will improve the overall appearance of the park. The construction cost estimate for the project is shown on the right.

Item Description	Unit Price in U.S. Dollars Wt. Avg.	Amount Needed on Project	Unit	Estimate
Removal of Sidewalks	$ 11.00	536.01	SY	$ 5,896.11
Removal of Segmented Block Retaining Wall	$ 5.00	1315	SF	$ 6,575.00
Removal of Concrete Foundations of Light Poles	$ 70.00	5	EACH	$ 350.00
Removal of Light Poles	$ 50.00	5	EACH	$ 250.00
Removal of Gazebo and Handrails	$ 4,500.00	1	EACH	$ 4,500.00
Clearing and Grubbing of Tree	$ 125.00	1	EACH	$ 125.00
Topsoil, Strip, Salvage, and Spread	$ 11.00	322.5	CY	$ 3,547.50
Excavation, Class 10, Roadway and Borrow	$ 6.84	352	CY	$ 2,407.68
P.C. Concrete Retaining Walls	$ 2,998.14	50	CY	$149,907.00
Limestone Retaining Wall Veneer	$ 15.00	1080	SF	$ 16,200.00
Colored Concrete, 6 IN.	$ 90.00	20	SY	$ 1,800.00
Sidewalks and Bench Slabs, P.C. Concrete, 6 IN.	$ 41.53	314	SY	$ 13,040.42
Electrical Circuits and Conduit	$ 17.67	270	LF	$ 4,770.90
Handholes and Junction Boxes	$ 1,091.12	2	EACH	$ 2,182.24
Control Cabinet, Complete	$ 11,735.17	1	EACH	$ 11,735.17
Lighting Poles	$ 6,081.47	2	EACH	$ 12,162.94
Lookout Handrail Lighting	$ 141.75	71	LF	$ 10,064.25
Colored Lookout Lights	$ 400.00	2	EACH	$ 800.00
Straw Wattle	$ 2.84	125	LF	$ 355.00
Silt Fences	$ 3.06	160	LF	$ 489.60
Sodding	$ 52.21	86	SQ	$ 4,490.06
Ornamental Metal Railing	$ 229.02	71	LF	$ 16,260.42
Trees	$ 233.96	2	EACH	$ 467.92
Water Service Stub, 1 IN	$ 34.46	173	LF	$ 5,961.58
Tapping Valve Assembly, 6 IN	$ 3,666.67	1	EACH	$ 3,666.67
Water Fountain	$ 500.00	1	EACH	$ 500.00
Hose Spiggots	$ 250.00	2	EACH	$ 500.00
Subdrain Tiles	$ 8.93	254	LF	$ 2,268.22
Pavilion Structure and Slab	$ 33,600.00	1	EACH	$ 33,600.00
		SUBTOTAL		$314,873.68
		Engineering Design Services		$ 33,716.00
		Contingency (10%)		$ 31,487.37
		TOTAL		$380,077.05

Design Standards References

2010 Standards for Accessible Design, ADA.gov, 2010 ADA Standards for Accessible Design

Iowa SUDAS Design Manual (2021 Edition), Design Manual | Iowa Statewide Urban Design and Specifications (iowasudas.org)