

30% Concept Design**10/28/2019****Opinion of Probable Construction Cost****Town of Erie****Lynn R. Morgan Water Treatment Facility Hydroelectric Facility**

Description	Unit	Quantity	Unit Cost	Total Cost
DIVISION 01				
General Requirements				\$ 3,000
Materials Testing Allowance	EA	1	\$ 3,000	\$ 3,000
DIVISION 02				
Existing Conditions				\$ 15,000
Miscellaneous Site Demolition	LOT	1	\$ 5,000	\$ 5,000
Relocate existing pump house (by Town)	LOT	-	\$ 6,000	\$ -
Clearing and Grubbing	SF	8,000	\$ 1.25	\$ 10,000
DIVISION 03				
Concrete				\$ 71,343
Base Slab (18" Thick)	CY	29	\$ 600	\$ 17,518
Foundation beams	CY	7	\$ 800	\$ 5,570
Turbine Equipment Pad	EA	1	\$ 5,000	\$ 5,000
Electrical Equipment Pads	EA	3	\$ 500	\$ 1,500
EPDM Roof, OWSJ	SF	526	\$ 20	\$ 10,510
Double T Roof Topping	CY	6	\$ 500	\$ 3,244
Drilled Piers	EA	8	\$ 3,500	\$ 28,000
DIVISION 04				
Masonry				\$ 34,348
8" CMU	SF	1,717	\$ 20	\$ 34,348
DIVISION 05				
Metals				\$ 7,500
Pipe Supports	EA	5	\$ 1,500	\$ 7,500
DIVISION 06				
Wood, Plastics and Composites				\$ 15,000
Rough Carpentry	LS	1	\$ 10,000	\$ 10,000
Anchors and Fasteners	LS	1	\$ 5,000	\$ 5,000
DIVISION 07				
Thermal and Moisture Protection				\$ 26,768
Downspouts	LS	1	\$ 5,000	\$ 5,000
Caulking/Sealant	LS	1	\$ 8,000	\$ 8,000
EPDM Roofing	SF	544	\$ 12	\$ 6,533
Building Insulation	SF	1,504	\$ 3	\$ 4,512
Roof Insulation	SF	544	\$ 5	\$ 2,722
DIVISION 08				
Openings				\$ 24,500
Double Man door	EA	-	\$ 6,000	\$ -
Glass Block Windows	LS	-	\$ 5,000	\$ -
Single Man Door	EA	3	\$ 3,500	\$ 10,500
Overhead Door	EA	1	\$ 14,000	\$ 14,000

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DIVISION 09				
Finishes				\$ 18,475
Painting-Walls	SF	2,119	\$ 4.00	\$ 8,475
Painting-Pipe	LS	1	\$ 10,000	\$ 10,000
DIVISION 10				
Specialties				\$ 500
Fire Extinguishers	EA	1	\$ 500	\$ 500
DIVISION 22				
Plumbing				\$ 8,000
Raw water tap, BFP, PRV	EA	1	\$ 1,000	\$ 1,000
Raw water hose bib & support rack	EA	1	\$ 1,500	\$ 1,500
Floor drain with p-trap	EA	1	\$ 1,000	\$ 1,000
Sanitary drain, 2 inch material?	LF	35	\$ 100	\$ 3,500
Sanitary drain connection	EA	1	\$ 1,000	\$ 1,000
DIVISION 23				
HVAC				\$ 29,000
Mini-split wall mounted heat pump	EA	1	\$ 8,000	\$ 8,000
Exhaust Fan - Turbine Room	EA	1	\$ 5,000	\$ 5,000
Unit Heater	EA	2	\$ 2,000	\$ 4,000
Ductwork and Fittings	LS	1	\$ 2,000	\$ 2,000
Grilles, Diffusers & louvers	EA	4	\$ 500	\$ 2,000
Controls	LS	1	\$ 8,000	\$ 8,000
DIVISION 26				
Electrical				\$ 184,000
Switchgear modification	LS	1	\$ 45,000	\$ 45,000
Panelboards	EA	1	\$ 6,000	\$ 6,000
Duct Bank	LF	80	\$ 125	\$ 10,000
Conduit, Conductors, and Grounding	LS	1	\$ 40,000	\$ 40,000
Lighting	EA	8	\$ 1,000	\$ 8,000
30KVA transformer	EA	1	\$ 8,000	\$ 8,000
Enclosed Controller	EA	2	\$ 2,000	\$ 4,000
PF Capacitors (opt)	KVAR	150	\$ 20	\$ 3,000
Automation and Integration	LS	1	\$ 60,000	\$ 60,000
DIVISION 31				
Earthwork				\$ 12,343
Erosion Control	LS	1	\$ 5,000	\$ 5,000
Excavation	CY	94	\$ 15	\$ 1,406
Backfill	CY	47	\$ 20	\$ 937
Finished Grading	LS	1	\$ 5,000	\$ 5,000

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Description	Unit	Quantity	Unit Cost	Total Cost
DIVISION 32				
Exterior Improvements				\$ 5,755
4" Sidewalk	SF	80	\$ 18	\$ 1,440
Aggregate Surfacing	CY	26	\$ 40	\$ 1,037
Subgrade Preparation	SY	156	\$ 5	\$ 778
Reseeding	SF	2,500	\$ 1	\$ 2,500
DIVISION 33				
Utilities				\$ 56,300
12" Steel Pipe + 10% Allowance for Fittings	LF	212	\$ 150	\$ 31,800
12 inch connection	EA	2	\$ 4,000	\$ 8,000
8" drain pipe	LF	-	\$ 100	\$ -
12" Butterfly Valve	EA	3	\$ 3,500	\$ 10,500
8 foot manhole (flowmeter)	EA	1	\$ 6,000	\$ 6,000
DIVISION 46				
Equipment				\$ 377,838
Turbine and included accessories	EA	1	\$ 295,838	\$ 295,838
12" Mag Meter	EA	1	\$ 12,000	\$ 12,000
Mag Meter Vault	EA	-	\$ 5,000	\$ -
Installation	EA	1	\$ 70,000	\$ 70,000
Construction Sub Total				\$ 890,000
General Requirements	12.0%			\$ 106,800
Bonds & Insurance	1.5%			\$ 13,350
Sub Total				\$ 1,010,150
Contractor Overhead & Profit	10.0%			\$ 101,015
Construction Cost				\$ 1,111,165
Design Development Contingency	10.0%			\$ 111,117
Construction Contingency	10.0%			\$ 111,117
Total				\$ 1,333,398
Engineering	15.0%			\$ 200,010
Total Project Cost				\$ 1,533,408