

1. Water Supply and Distribution Issues
 - a) New Well E9 Pump house and Transmission Main
 - b) Well Drilling and Exploration Program
 - c) Erin/Hillsburgh Water Booster Station
 - d) Hillsburgh Water Storage Reservoir

Water Supply/Demand Needed to Meet New Development

		Year	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	Total
Erin	Estimated New Homes per Year (Assumes Single Detached Equivalent)			250	350	300	300	300	300	300	300	200	175	150	2,925
	Water Max Day Demand (MDD) L/s	22.8	27.5	34.0	39.7	45.3	51.0	56.6	62.2	67.9	71.6	74.9	77.7		
	Residual Water Capacity without E9 Well (with Existing E7 & E8 Wells)	25.0	20.3	13.7	8.1										
	Residual MDD Capacity (L/s) (with Existing E7, E8 & New E9 Wells)				40.1	34.5	28.8	23.2	17.5	11.9	8.2	4.9	2.0		
Hillsburgh	Estimated New Homes per Year (Assumes Single Detached Equivalent)				200	200	200	200	200	225	225	225	225		1,900
	Water Max Day Demand (MDD) L/s	5.7	5.7	5.7	9.9	14.6	17.4	21.6	23.0	27.2	31.4	35.7	39.9		
	Residual Water Capacity without New Well (with Existing H2 & H3 Wells)	13.2	13.2	13.2	9.0	4.3									
	Residual MDD Capacity (with Existing H2, H3 & New Well)					25.3	22.6	18.3	17.0	12.7	8.5	4.3	0.1		

Notes:

1. The number of New Homes each Year is an “Estimate” only.
2. Estimated Number of New Homes includes Intensification within existing Built-Up-Areas and un-connected existing properties being connected in future.
3. Assumes that a new a Well in Hillsburgh with at least 22 L/s capacity will be found.

Summary of Proposed Costs

The following table provided a summary of capital costs and engineering costs to deliver the proposed Water projects.

Program Component	Estimated Constructed Costs (Class – D)	Estimated Engineering Fees
Overall Project Management	-	\$250,000
Class EA Components	-	\$200,000
E9 Wellhouse and Transmission Main	\$9,800,000	\$1,078,000
Erin/ Hillsburgh Booster Pumping Station	\$6,000,000	\$660,000
Hillsburgh Water Storage Reservoir, including Booster Station & Transmission Main	\$11,000,000	\$1,100,000
Well Exploration and Drilling Program (includes Well Drilling Contractors)	\$4,400,000	\$635,000
New Well in Erin (See Note 1)	\$9,000,000	\$990,000
Two New Wells in Hillsburgh (See Note 1)	\$18,000,000	\$1,980,000
TOTAL (Excluding HST):	\$58,200,000	\$6,900,000
	\$65,100,000	

Note: All costs in 2024 dollars.

Phasing of Proposed Water Infrastructure

Summary of costs associated with the Phasing of the proposed Water projects over the next 5 years.

Program Component		2024	2025	2026	2027	2028	Total
Overall Project Management	Engineering	\$50,000	\$50,000	\$50,000	\$50,000	\$50,000	\$250,000
Class EA Components	Engineering	\$75,000	\$125,000				\$200,000
E9 Wellhouse and Transmission Main	Engineering	\$300,000	\$450,000	\$328,000			\$1,078,000
	Construction		\$6,000,000	\$3,800,000			\$9,800,000
Erin/ Hillsburgh Booster Pumping Station	Engineering	\$125,000	\$250,000	\$285,000			\$660,000
	Construction			\$3,000,000	\$3,000,000		\$6,000,000
Hillsburgh Water Storage Reservoir, including Booster Station & Transmission Main	Engineering	\$75,000	\$100,000	\$500,000	\$425,000		\$1,100,000
	Construction			\$5,500,000	\$5,500,000		\$11,000,000
Well Exploration and Drilling Program (includes Well Drilling Contractors)	Engineering	\$150,000	\$375,000	\$110,000			\$635,000
	Construction		\$4,400,000				\$4,400,000
New Well in Erin	Engineering		\$100,000	\$250,000	\$640,000		\$990,000
	Construction			\$4,500,000	\$4,500,000		\$9,000,000
Two New Wells in Hillsburgh	Engineering			\$100,000	\$500,000	\$1,380,000	\$1,980,000
	Construction				\$9,000,000	\$9,000,000	\$18,000,000
		\$775,000	\$11,850,000	\$18,423,000	\$23,615,000	\$10,430,000	\$65,100,000

Notes: All costs in 2024 dollars and have not been adjusted for future construction costs increases.

Anticipated Water Development Charges

Summary of the Anticipated Water Development Charge over the next 10 years.

			2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	Total
Estimated New Homes per Year (Assumes Single Detached Equivalent)			250	350	500	500	500	500	500	525	425	400	375	4,825
Anticipated Water Development Charges (See Note 1)	Single/Semi	\$19,244	\$4,210,375	\$5,894,525	\$8,420,750	\$8,420,750	\$8,420,750	\$8,420,750	\$8,420,750	\$8,841,788	\$7,157,638	\$6,736,600	\$6,315,563	\$81,260,238
	Multiples	\$14,439												

Notes:

1. The number of New Homes each Year is an “Estimate” only.
2. All costs in 2024 dollars and have not been adjusted for future annual DC increases.
3. Assumes 50% of new SDE’s each year are Singles and Semi’s and 50% are Multiples.