

Capital Program Tables and Class EA Schedules

Preferred Water and Wastewater Servicing Schemes

20-Year Capital Cost Update for Water and Wastewater Infrastructure Works

Timing	Estimated Capital Cost (\$ million) ⁽¹⁾			Allocation of Estimated Capital Cost (\$ million) ⁽¹⁾		
	Water Projects	Wastewater Projects	Total	Existing Developments	New Developments	Total
5 Year Plan (2008-2013)	\$4.72	\$13.33	\$18.05	\$4.29	\$13.76	\$18.05
5 to 10 Year Plan (2013-2018)	\$1.54	\$10.31	\$11.85	\$0.90	\$10.95	\$11.85
10 to 15 Year Plan (2018-2023)	\$11.58	\$15.39	\$26.97	\$3.57	\$23.40	\$26.97
15 to 20 Year Plan (2023-2028)	\$5.16	\$15.57	\$20.73	\$4.59	\$16.14	\$20.73
Total for 20 Year Plan (2008-2028)	\$23.00	\$54.60	\$77.60	\$13.35	\$64.25	\$77.60

Notes:

(1) Capital cost estimate based on 2008\$ and includes engineering and contingencies

Preferred Water and Wastewater Servicing Schemes

5-Year Capital Program and Class EA Schedule Summary

Timing	Town Reference ID	Description	Description of Water Project			Description of Wastewater Project			Allocation of Capital Cost (\$ million) (1)							
			Project ID	Project Name	Class EA Schedule	Estimated Capital Cost (\$ million) (1)	Project ID	Project Name	Class EA Schedule	Estimated Capital Cost (\$ million) (1)	Existing Developments	New Developments	Total			
2008-2009	TN-1	SCADA System for Cedarwood and Lakewood Pumping Stations					WW-0	SCADA System for Cedarwood and Lakewood Pumping Stations	A	\$0.20	\$0.20	\$0.20	\$0.20			\$0.20
2009-2010	TN-2	West Tecumseh Trunk Facilities - North Section	W-1	West Tecumseh Trunk Watermain from CR 22 to CP Railway	B	\$1.85	WW-1	West Tecumseh Trunk Sewer from CR 22 to CP Railway	B	\$3.78	\$0.66	\$4.97	\$5.63			\$5.63
	TNSW-1	North Talbot Road Trunk Facilities	W-3	North Talbot Road Trunk Watermain	A+	\$1.23	WW-2	Diversion Sewer south of CP Railway	B	\$0.36	\$0.11	\$0.25	\$0.36			\$0.36
2010-2011	TN-3	East Tecumseh Trunk Facilities	W-2A	East Tecumseh Hamlet Watermain Connection	A+	\$0.31	WW-3	North Talbot Road Trunk Sewer	A+	\$4.38	\$1.75	\$3.86	\$5.61			\$5.61
	TN-4	Sylvestre Pumping Station Upgrade					WW-4	Sylvestre Pumping Station Upgrade	B	\$0.90	\$0.36	\$0.54	\$0.90			\$0.90
2011-2012	TN-5	Trunk Watermain on Manning Road - North Section	W-2B	Trunk Watermain on Manning Road from CR 22 to CP Railway	A+	\$1.33							\$1.33			\$1.33
	-	-					Winsor-1	Purchase Additional Conveyance Capacity in Northeast Winsor Trunk Sewer, Forest Glade to Little River PCP	-	\$2.87	\$1.15	\$1.72	\$2.87			\$2.87
			Total for 5-Year Plan (2008-2013)			\$4.72				\$13.33	\$4.29	\$13.76	\$18.05			\$18.05

Notes:

(1) Capital cost estimate based on 2008\$ and includes engineering and contingencies

Preferred Water and Wastewater Servicing Schemes

5 to 10 Year Capital Program and Class EA Schedule Summary

Timing	Town Reference ID	Description	Description of Water Project			Description of Wastewater Project			Allocation of Capital Cost (\$ million) ⁽¹⁾				
			Project ID	Project Name	Class EA Schedule	Estimated Capital Cost (\$ million) ⁽¹⁾	Project ID	Project Name	Class EA Schedule	Estimated Capital Cost (\$ million) ⁽¹⁾	Existing Developments	New Developments	Total
2013-2014	TN-6	West Tecumseh Trunk Facilities - South Section	W-4	West Tecumseh Trunk Watermain from CP Railway to CR 42	B	\$0.88	WW-6	West Tecumseh Trunk Sewer from CP Railway to CR 42	B	\$1.76	\$0.30	\$2.34	\$2.64
2014-2015	TN-7	Diversion Sewer on County Road 42					WW-7	Diversion Sewer on County Road 42	A+	\$0.55	\$0.55	-	\$0.55
	TN-8	Trunk Watermain on Manning Road - South Section	W-5	Trunk Watermain on Manning Road South of CP Railway	A+	\$0.66					0.05	0.61	\$0.66
2016-2017	-	-					Windsor-2	Purchase Additional Treatment Capacity at Little River PCP	-	\$8.00	-	\$8.00	\$8.00
			Total for 5 to 10 Year Plan (2013-2018)			\$1.54				\$10.31	\$0.90	\$10.95	\$11.85

Notes:

(1) Capital cost estimate based on 2008\$ and includes engineering and contingencies

Preferred Water and Wastewater Servicing Schemes

10 to 15 Year Capital Program and Class EA Schedule Summary

Timing	Town Reference ID	Description	Description of Water Project			Description of Wastewater Project			Allocation of Capital Cost (\$ million) ⁽¹⁾				
			Project ID	Project Name	Class EA Schedule	Estimated Capital Cost (\$ million) ⁽¹⁾	Project ID	Project Name	Class EA Schedule	Estimated Capital Cost (\$ million) ⁽¹⁾	Existing Developments	New Developments	Total
2018-19	TSE-1	South Tecumseh Trunk Facilities - North Section	W-6	South Tecumseh Trunk Watermain from CR 42 to Highway 401	A+	\$4.16	WW-8	South Tecumseh Trunk Sewer from CR 42 to Highway 401	A+	\$10.42	\$1.37	\$13.21	\$14.58
2019-2020	TSE-2	South Tecumseh Trunk Facilities - South Section	W-7	South Tecumseh Trunk Watermain from Highway 401 to Maidstone	A+	\$1.53	WW-9	South Tecumseh Trunk Sewer from Highway 401 to Maidstone	A+	\$3.59	\$0.75	\$4.37	\$5.12
2020-2021	TSE-3	Maidstone Hamlet Trunk Facilities	W-8	Maidstone Hamlet Trunk Watermain	A+	\$0.69	WW-10	Maidstone Hamlet Trunk Sewer	A+	1.38	\$0.41	1.66	\$2.07
	TSE-4	Zone 2 Booster Pumping Station	W-9	Zone 2 Booster Pumping Station	B	\$1.50					\$0.30	\$1.20	\$1.50
2021-22	TSE-5	Zone 2 Water Storage Facility	W-10	Zone 2 Water Storage Facility	B	\$3.70					\$0.74	\$2.96	\$3.70
			Total for 10 to 15 Year Plan (2018-2023)				\$11.58			\$15.39	\$3.57	\$23.40	\$26.97

Notes:

(1) Capital cost estimate based on 2008\$ and includes engineering and contingencies

Preferred Water and Wastewater Servicing Schemes
15 to 20 Year Capital Program and Class EA Schedule Summary

Timing	Town Reference ID	Description	Description of Water Project			Description of Wastewater Project			Allocation of Capital Cost (\$ million) ⁽¹⁾					
			Project ID	Project Name	Class EA Schedule	Estimated Capital Cost (\$ million) ⁽¹⁾	Project ID	Project Name	Class EA Schedule	Estimated Capital Cost (\$ million) ⁽¹⁾	Existing Developments	New Developments	Total	
2023-24	-	-					Windsor-3	Purchase Additional Conveyance Capacity in Northeast Windsor Trunk Sewer, Banwell Road to 8th Concession Road	-			\$1.56	\$3.64	\$5.20
	TSE-6	County Road 46 Trunk Watermain	W-11	County Road 46 Trunk Watermain	A+	\$1.83						\$0.63	\$1.20	\$1.83
2024-2025	TSW-2	Southwest Tecumseh Trunk Facilities	W-12	Southwest Tecumseh Trunk Watermain	A+	\$3.33	WW-11	Southwest Tecumseh Trunk Sewer	A+	\$5.37	\$2.40	\$6.30	\$8.70	
2025-2026	-	-					Windsor-4	Purchase Additional Treatment Capacity at Little River PCP	-			-	\$5.00	\$5.00
			Total for 15 to 20 Year Plan (2023-2028)			\$5.16				\$15.57	\$4.59	\$16.14	\$20.73	

Notes:

(1) Capital cost estimate based on 2008\$ and includes engineering and contingencies

Service Area Capital Cost Summary

Preferred Water and Wastewater Servicing Schemes

20-Year Capital Cost Update for Water and Wastewater Infrastructure Works

Project Location	Estimated Capital Cost (\$ million) ⁽¹⁾			Allocation of Estimated Capital Cost (\$ million) ⁽¹⁾		
	Water Projects	Wastewater Projects	Total	Existing Developments	New Developments	Total
North Service Area	\$5.03	\$8.39	\$13.42	\$2.29	\$11.13	\$13.42
Southeast (SE) Service Area	\$13.41	\$15.39	\$28.80	\$4.20	\$24.60	\$28.80
Southwest (SW) Service Area	\$4.56	\$9.75	\$14.31	\$4.15	\$10.16	\$14.31
Purchase of Additional Capacity from Windsor Wastewater System	-	\$21.07	\$21.07	\$2.71	\$18.36	\$21.07
Total for 20 Year Plan (2008-2028)	\$23.00	\$54.60	\$77.60	\$13.35	\$64.25	\$77.60

Notes:

(1) Capital cost estimate based on 2008\$ and includes engineering and contingencies

Preferred Water and Wastewater Servicing Schemes

20-Year Capital Cost Update for Infrastructure Requirements in North Service Area

Timing	Town Reference ID	Description	Description of Water Project				Description of Wastewater Project				Allocation of Capital Cost (\$ million) ⁽¹⁾			
			Project ID	Project Name	Class EA Schedule	Estimated Capital Cost (\$ million) ⁽¹⁾	Project ID	Project Name	Class EA Schedule	Estimated Capital Cost (\$ million) ⁽¹⁾	Existing Developments	New Developments	Total	
2006-2009	TN-1	SCADA System for Cedarwood and Lakewood Pumping Stations					WW-0	SCADA System for Cedarwood and Lakewood Pumping Stations	A	\$0.20	\$0.20		\$0.20	
			W-1	West Tecumseh Trunk Watermain from CR 22 to CP Railway	B	\$1.85	WW-1	West Tecumseh Trunk Sewer from CR 22 to CP Railway	B	\$3.78	\$0.66	\$4.97	\$5.63	
	2009-2010	TN-2	West Tecumseh Trunk Facilities - North Section				WW-2	Diversion Sewer south of CP Railway	B	\$0.36	\$0.11	\$0.25	\$0.36	
				W-2A	East Tecumseh Hamlet Watermain Connection	A+	\$0.31	WW-3	East Tecumseh Trunk Sewer	A+	\$0.84	0.06	1.09	\$1.15
				W-2B	Trunk Watermain on Manning Road from CR 22 to CP Railway	A+	\$1.33	WW-4	Sylvestre Pumping Station Upgrade	B	\$0.90	\$0.36	\$0.54	\$0.90
2010-2011	TN-3	East Tecumseh Trunk Facilities												
	TN-4	Sylvestre Pumping Station Upgrade												
2013-2014	TN-6	West Tecumseh Trunk Facilities - South Section	W-4	West Tecumseh Trunk Watermain from CP Railway to CR 42	B	\$0.88	WW-6	West Tecumseh Trunk Sewer from CP Railway to CR 42	B	\$1.76	\$0.30	\$2.34	\$2.64	
			W-5	Trunk Watermain on Manning Road from CP Railway to CR 42	A+	\$0.66	WW-7	Diversion Sewer on County Road 42	A+	\$0.55	\$0.55		\$0.55	
	2014-2015	TN-7	Diversion Sewer on County Road 42											
5 to 10 Year Plan (2013 to 2018)	TN-8	Trunk Watermain on Manning Road - South Section				\$1.54				\$2.31	\$0.90	\$2.95	\$3.85	
			Sub-Total for 5 to 10 Year Plan (2013-2018)											
Sub-Total for 5-Year Plan (2008-2013)						\$3.49				\$6.08	\$1.39	\$9.18	\$9.57	
Sub-Total for 5 to 10 Year Plan (2013-2018)						\$1.54				\$2.31	\$0.90	\$2.95	\$3.85	
20-YEAR CAPITAL COST FOR PROJECTS IN NORTH SERVICE AREA						\$5.03				\$8.39	\$2.29	\$11.13	\$13.42	

Notes:

(1) Capital cost estimate based on 2008\$ and includes engineering and contingencies

Preferred Water and Wastewater Servicing Schemes

20-Year Capital Cost Update for Infrastructure Requirements in Southeast (SE) Service Area

Timing	Town Reference ID	Description	Description of Water Project				Description of Wastewater Project				Allocation of Capital Cost (\$ million) ⁽¹⁾			
			Project ID	Project Name	Class EA Schedule	Estimated Capital Cost (\$ million) ⁽¹⁾	Project ID	Project Name	Class EA Schedule	Estimated Capital Cost (\$ million) ⁽¹⁾	Existing Developments	New Developments	Total	
10 to 15 Year Plan (2018 to 2023)	TSE-1	South Tecumseh Trunk Facilities - North Section	W-6	South Tecumseh Trunk Watermain from CR 42 to Highway 401	A+	\$4.16	WW-8	South Tecumseh Trunk Sewer from CR 42 to Highway 401	A+	\$10.42	\$1.37	\$13.21	\$14.58	
	TSE-2	South Tecumseh Trunk Facilities - South Section	W-7	South Tecumseh Trunk Watermain from Highway 401 to Maidstone	A+	\$1.53	WW-9	South Tecumseh Trunk Sewer from Highway 401 to Maidstone	A+	\$3.59	\$0.75	\$4.37	\$5.12	
	TSE-3	Maidstone Hamlet Trunk Facilities	W-8	Maidstone Hamlet Trunk Watermain	A+	\$0.69	WW-10	Maidstone Hamlet Trunk Sewer	A+	1.98	\$0.41	1.66	\$2.07	
	TSE-4	Zone 2 Booster Pumping Station	W-9	Zone 2 Booster Pumping Station	B	\$1.50					\$0.30	\$1.20	\$1.50	
	TSE-5	Zone 2 Water Storage Facility	W-10	Zone 2 Water Storage Facility	B	\$3.70					\$0.74	\$2.96	\$3.70	
			Sub-Total for 10 to 15 Year Plan (2018-2023)								\$11.58	\$3.57	\$23.40	\$26.97
15 to 20 Year Plan (2023 to 2028)	TSE-6	County Road 46 Trunk Watermain	W-11	County Road 46 Trunk Watermain	A+	\$1.83					\$0.63	\$1.20	\$1.83	
				Sub-Total for 15 to 20 Year Plan (2023-2028)								\$1.83	\$0.63	\$1.20
			20-YEAR CAPITAL COST FOR PROJECTS IN SOUTHEAST SERVICE AREA								\$13.41	\$4.20	\$24.60	\$28.60

Notes:
(1) Capital cost estimate based on 2008\$ and includes engineering and contingencies

Preferred Water and Wastewater Servicing Schemes

20-Year Capital Cost Update for Infrastructure Requirements in Southwest (SW) Service Area

Timing	Town Reference ID	Description	Description of Water Project				Description of Wastewater Project				Allocation of Capital Cost (\$ million) ⁽¹⁾		
			Project ID	Project Name	Class EA Schedule	Estimated Capital Cost (\$ million) ⁽¹⁾	Project ID	Project Name	Class EA Schedule	Estimated Capital Cost (\$ million) ⁽¹⁾	Existing Developments	New Developments	Total
5 Year Plan (2008 to 2013)	TSW-1	North Talbot Road Trunk Facilities	W-3	North Talbot Road Trunk Watermain	A+	\$1.23	WW-5	North Talbot Road Trunk Sewer	A+	\$4.38	\$1.75	\$3.86	\$5.61
			Sub-Total for 5-Year Plan (2008-2013)								\$1.75	\$3.86	\$5.61
15 to 20 Year Plan (2023 to 2028)	TSW-2	Southwest Tecumseh Trunk Facilities	W-12	Southwest Tecumseh Trunk Watermain	A+	\$3.33	WW-11	Southwest Tecumseh Trunk Sewer	A+	\$5.37	\$2.40	\$6.30	\$8.70
			Sub-Total for 15 to 20 Year Plan (2023-2028)								\$2.40	\$6.30	\$8.70
			20-YEAR CAPITAL COST FOR PROJECTS IN SOUTHWEST SERVICE AREA								\$4.15	\$10.16	\$14.31

Notes:

(1) Capital cost estimate based on 2008\$ and includes engineering and contingencies

Preferred Water and Wastewater Servicing Schemes

20-Year Capital Cost Update for Purchase of Additional Capacity in Windsor Wastewater System

Timing		Project ID	Name of Wastewater Project	Allocation of Capital Cost (\$ million)		
				Existing Developments	New Developments	Total ⁽¹⁾
5 Year Plan (2008 to 2013)	2011-2012	Windsor-1	Purchase Additional Conveyance Capacity in Northeast Windsor Trunk Sewer, Forest Glade to Little River PCP	\$1.15	\$1.72	\$2.87
Sub-Total for 5 Year Plan (2008-2013)				\$1.15	\$1.72	\$2.87
5 to 10 Year Plan (2013 to 2018)	2016-2017	Windsor-2	Purchase 1.0 MIGD (4.55 MLD) Additional Treatment Capacity at Little River PCP	-	\$8.00	\$8.00
Sub-Total for 5 to 10 Year Plan (2013-2018)				\$0.00	\$8.00	\$8.00
15 to 20 Year Plan (2023 to 2028)	2023-2024	Windsor-3	Purchase Additional Conveyance Capacity in Northeast Windsor Trunk Sewer, Barwell Road to 8th Concession Road	\$1.56	\$3.64	\$5.20
	2025-2026	Windsor-4	Purchase 1.0 MIGD (4.55 MLD) Additional Treatment Capacity at Little River PCP	-	\$5.00	\$5.00
Sub-Total for 15 to 20 Year Plan (2023-2028)				\$1.56	\$8.64	\$10.20
20-Year Capital Cost for Purchase of Additional Capacity in Windsor Wastewater System				\$2.71	\$18.36	\$21.07

Notes:

(1) Estimated cost to be paid by Town of Tecumseh to City of Windsor based on 2004 Wastewater Agreement