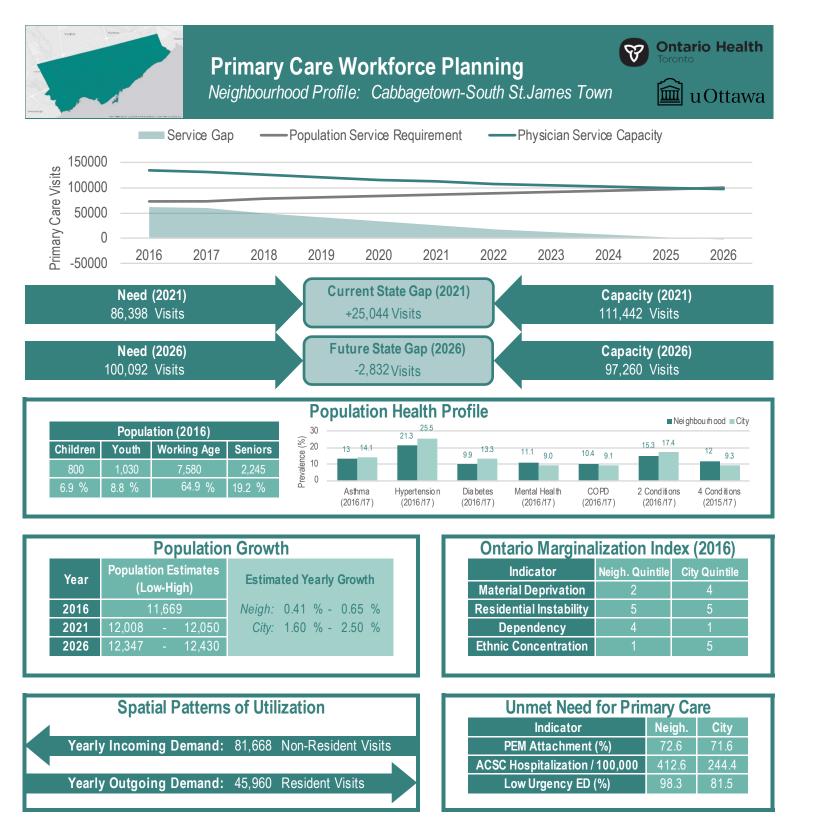
Sub-Region 704 Mid-East Toronto

71	Cabbagetown-South St. James Town
72	Regent Park
73	Moss Park
74	North St. James Town
75	Church-Yonge Corridor
77	Waterfront Communities-The Island
98	Rosedale-Moore Park





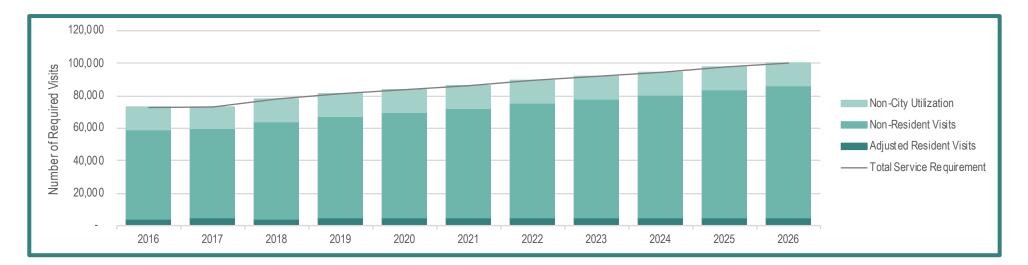
		Pri	mar	y Ca	re V	Vor	for	ce P	rofile						
Number of Comprehensive Primary Care	e Weekly Available	Year	Chiropodists	Dieticians	Midwives	NPs	OTs	Optometrists	Pharmacists	PTs	Psychologists	RNs	RPNs	RTs	SLPs
Physicians	ag(s.⊿	2016	0	61	0	118	41	0	628	39	33	718	1,066	0	0
2016 45	Average Hours Av	2017	0	75	0	75	65	22	670	38	29	540	1,036	0	0
2017 43	ΎΞ	2018	0	62	0	110	38	28	300	35	48	562	1,205	0	0





Total Service Requirements =

- 1 Resident Visits: Number of resident visits expected to be accessed in their neighbourhood of residence based on baseline spatial patterns of utilization
 - 2 Non-Resident Visits: Number of non-resident visits expected to be accessed in the neighbourhood based on baseline spatial patterns of utilization
- 3 Non-City Utilization: Number of visits expected to be utilized by non-city residents in the neighbourhood based on baseline spatial patterns of utilization

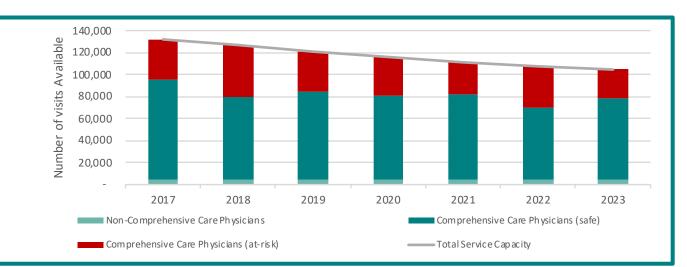


	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026
Number of Residents	12,574	12,649	12,723	12,798	12,872	12,947	13,022	13,096	13,171	13,245	13,320
Resident Visits	48,985	50,016	49,566	49,856	50,147	50,438	50,728	51,019	51,309	51,600	51,891
Proportion of Care Accessed						9.0%					
Within Home Neighbourhood						9.078					
Resident Visits Adjusted for	4,409	4,501	4,461	4,487	4,513	4,539	4,566	4,592	4,618	4,644	4,670
Spatial Patterns of Utilization	т,тоб	7,001	т,тот	7,707	4,010	4,000	4,000	7,002	4,010	7,077	4,070
Non-Resident Visits	54,509	55,116	59,934	62,647	65,360	68,072	70,785	73,497	76,210	78,923	81,635
Non-City Utilization						13,787					
Total Service Requirement	72,705	73,405	78,182	80,921	83,660	86,398	89,137	91,876	94,615	97,354	100,092



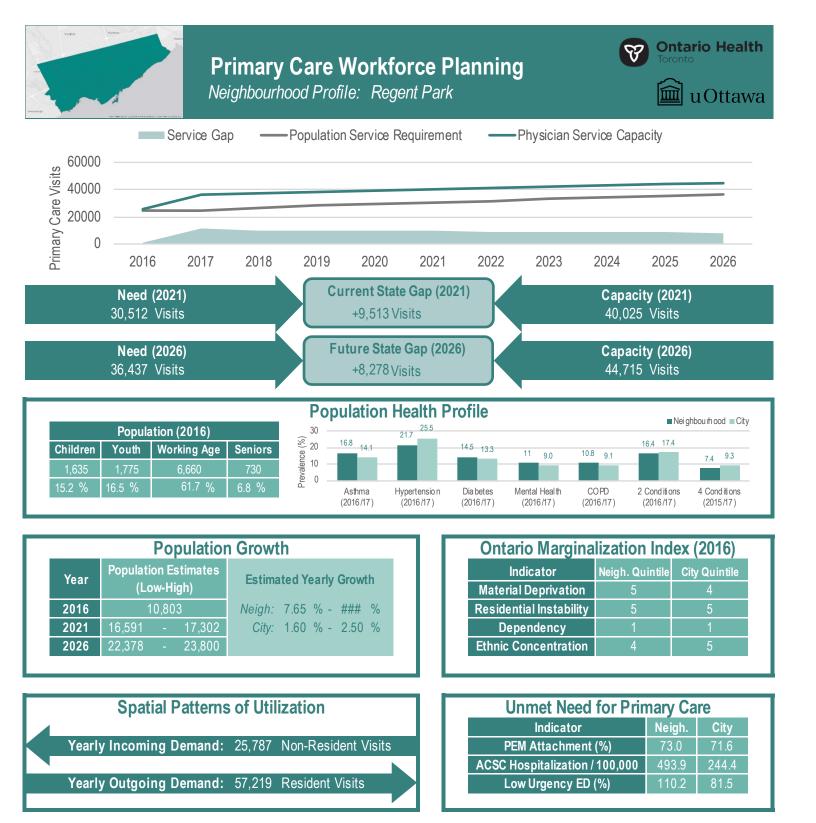


Examine the Sources of Service Capacity at a Neighbourhood Level
Total Service Capacity =
Comprehensive Care Physicians' Safe Service Capacity: Estimated number of services provided by comprehensive care physicians who are not expected to be at risk of exit from the workforce
Comprehensive Care Physicians' At-Risk Service Capacity: Estimated number of services provided by comprehensive care physicians who are considered to be at risk of exit from the workforce
Service Capacity Generated by Non-Comprehensive Care Physicians: Estimated number of services provided by non-comprehensive care physicians



Number of	Comprehensive		2017	2018	2019	2020	2021	2022	2023
Primary C	are Physicians	Comprehensive Care Physicians' Safe Service Capacity	91,284	75,849	79,569	76,665	77,073	65,636	73,843
2016	45	Comprehensive Care Physicians' At-Risk Service Capacity	36,335	46,321	37,152	34,691	29,979	37,706	26,370
2010	45	Non-Comprehensive Care Physicians' Service Capacity				4,390			
2017	43	Total Service Capacity	132,009	126,560	121,111	115,746	111,442	107,732	104,603

		Profession y Hours Ava	
Profession		2017	2018
Chiropodists	0	0	0
Dieticians	61	75	62
Midwives	0	0	0
NPs	118	75	110
OTs	41	65	38
Optometrists	0	22	28
Pharmacists	628	670	300
PTs	39	38	35
Psychologists	33	29	48
RNs	718	540	562
RPNs	1,066	1,036	1,205
RTs	0	0	0
SLPs	0	0	0



		Pri	mar	y Ca	re V	Vork	for	ce P	rofile						
Number of Comprehensive Primary Care	e Weekly \vailable	Year	Chiropodists	Dieticians	Midwives	NPs	OTs	Optometrists	Pharmacists	PTs	Psychologists	RNs	RPNs	RTs	SLPs
Physicians	age 's A	2016	30	42	495	98	0	0	110	31	19	95	15	0	0
2016 13	Average Hours Av	2017	30	18	436	108	0	9	129	16	19	88	20	0	0
2017 11	ΑĤ	2018	30	49	611	121	0	8	27	17	6	114	29	0	0

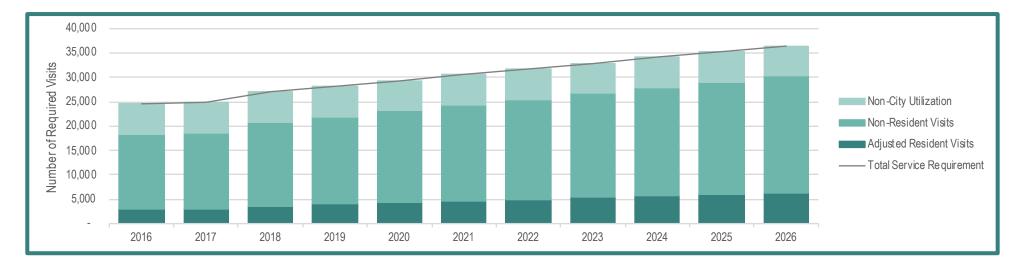




Total Service Requirements =

1 - Resident Visits: Number of resident visits expected to be accessed in their neighbourhood of residence based on baseline spatial patterns of utilization

2 - Non-Resident Visits: Number of non-resident visits expected to be accessed in the neighbourhood based on baseline spatial patterns of utilization

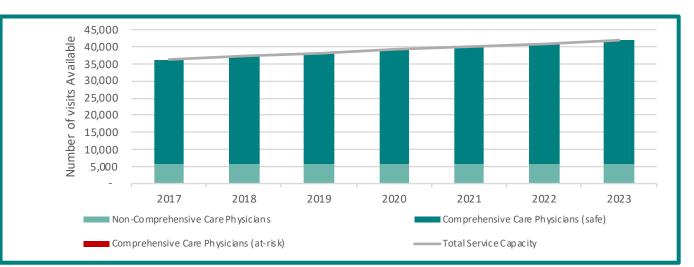


	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026
Number of Residents	11,034	12,312	13,589	14,867	16,145	17,423	18,700	19,978	21,256	22,533	23,811
Resident Visits	39,428	39,627	48,559	53,124	57,690	62,256	66,821	71,387	75,952	80,518	85,084
Proportion of Care Accessed						7.5%					
Within Home Neighbourhood						7.5%					
Resident Visits Adjusted for	2,957	2,972	3,642	3,984	4,327	4,669	5,012	5,354	5,696	6,039	6,381
Spatial Patterns of Utilization	2,337	2,312	3,042	3,304	4,527	4,003	5,012	3,334	5,050	0,000	0,001
Non-Resident Visits	15,445	15,669	17,130	17,973	18,815	19,658	20,501	21,343	22,186	23,029	23,871
Non-City Utilization						6,185					
Total Service Requirement	24,587	24,826	26,957	28,142	29,327	30,512	31,697	32,882	34,067	35,252	36,437



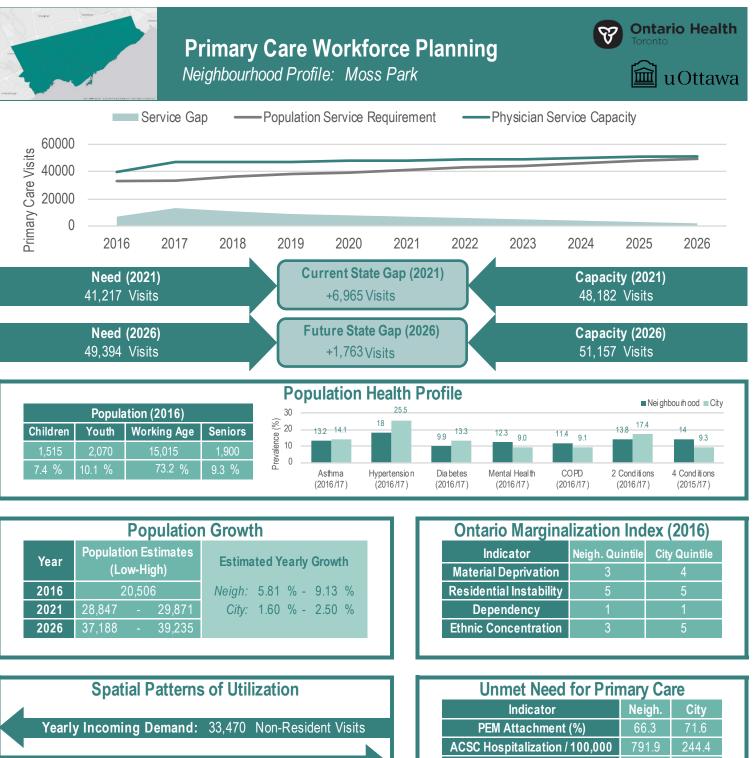
Ontario Health

Examine the Sources of Service Capacity at a Neighbourhood Level
Total Service Capacity =
Comprehensive Care Physicians' Safe Service Capacity: Estimated number of services provided by comprehensive care physicians who are not expected to be at risk of exit from the workforce
Comprehensive Care Physicians' At-Risk Service Capacity: Estimated number of services provided by comprehensive care physicians who are considered to be at risk of exit from the workforce
Service Capacity Generated by Non-Comprehensive Care Physicians: Estimated number of services provided by non-comprehensive care physicians



Number of	Comprehensive		2017	2018	2019	2020	2021	2022	2023
Primary C	are Physicians	Comprehensive Care Physicians' Safe Service Capacity	30,531	31,469	32,407	33,345	34,283	35,221	36,159
2016	13	Comprehensive Care Physicians' At-Risk Service Capacity	0	0	0	0	0	0	0
2010	15	Non-Comprehensive Care Physicians' Service Capacity				5,742			
2017	11	Total Service Capacity	36,273	37,211	38,149	39,087	40,025	40,963	41,901

		Profession y Hours Ava	
Profession	2016	2017	2018
Chiropodists	30	30	30
Dieticians	42	18	49
Midwives	495	436	611
NPs	98	108	121
OTs	0	0	0
Optometrists	0	9	8
Pharmacists	110	129	27
PTs	31	16	17
Psychologists	19	19	6
RNs	95	88	114
RPNs	15	20	29
RTs	0	0	0
SLPs	0	0	0



Yearly Outgoing Demand: 101,412 Resident Visits

ACSC Hospitalization / 100,000 79	1.0	
	91.9	244.4
Low Urgency ED (%) 15	58.8	81.5

Primary Care Workforce Profile															
Number of Comprehensive Primary Care	le Weekly Available	Year	Chiropodists	Dieticians	Midwives	NPs	OTs	Optometrists	Pharmacists	PTs	Psychologists	RNs	RPNs	RTs	SLPs
Physicians	'agı	2016	21	86	0	153	0	0	516	158	9	649	359	0	7
2016 16	Average Hours Av	2017	14	71	0	229	0	52	436	245	9	637	507	0	8
2017 13	₹	2018	5	120	0	326	0	69	201	7	11	568	515	0	8

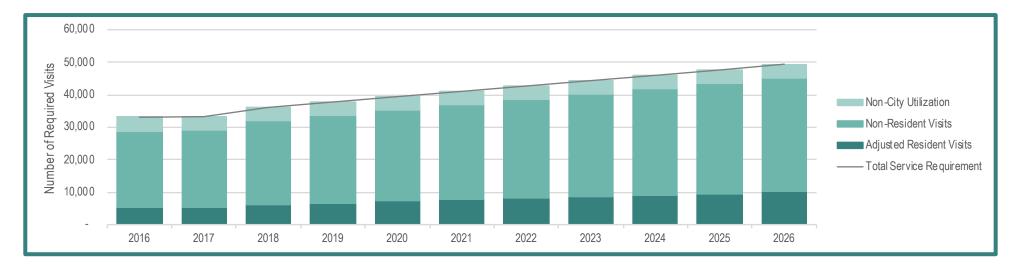




Total Service Requirements =

1 - Resident Visits: Number of resident visits expected to be accessed in their neighbourhood of residence based on baseline spatial patterns of utilization

2 - Non-Resident Visits: Number of non-resident visits expected to be accessed in the neighbourhood based on baseline spatial patterns of utilization

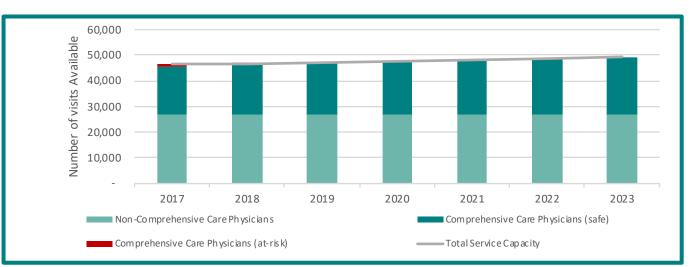


	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026				
Number of Residents	19,643	21,484	23,325	25,166	27,007	28,848	30,688	32,529	34,370	36,211	38,052				
Resident Visits	74,592	76,086	88,573	95,564	102,555	109,545	116,536	123,526	130,517	137,508	144,498				
Proportion of Care Accessed		7.0%													
Within Home Neighbourhood		1.0%													
Resident Visits Adjusted for	5,221	5,326	6,200	6,689	7,179	7,668	8,158	8,647	9,136	9,626	10,115				
Spatial Patterns of Utilization	5,221	5,520	0,200	0,003	1,115	7,000	0,100	0,047	3,150	3,020	10,115				
Non-Resident Visits	23,361	23,637	25,653	26,799	27,945	29,091	30,237	31,383	32,529	33,675	34,821				
Non-City Utilization						4,458									
Total Service Requirement	33,040	33,421	36,311	37,947	39,582	41,217	42,853	44,488	46,124	47,759	49,394				



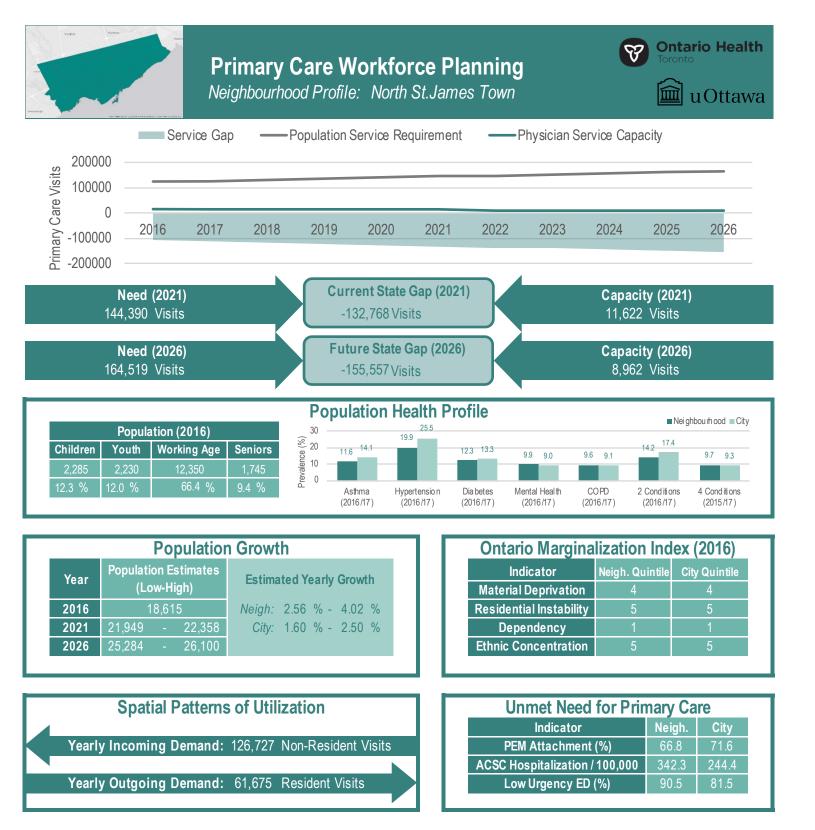


Examine the Sources of Service Capacity at a Neighbourhood Level
Total Service Capacity =
Comprehensive Care Physicians' Safe Service Capacity: Estimated number of services provided by comprehensive care physicians who are not expected to be at risk of exit from the workforce
Comprehensive Care Physicians' At-Risk Service Capacity: Estimated number of services provided by comprehensive care physicians who are considered to be at risk of exit from the workforce
Service Capacity Generated by Non-Comprehensive Care Physicians: Estimated number of services provided by non-comprehensive care physicians



Number of Comprehensive			2017	2018	2019	2020	2021	2022	2023
Primary C	are Physicians	Comprehensive Care Physicians' Safe Service Capacity	19,150	19,745	20,340	20,935	21,530	22,125	22,720
2016	16	Comprehensive Care Physicians' At-Risk Service Capacity	807	318	0	0	0	0	0
2010	10	Non-Comprehensive Care Physicians' Service Capacity				26,652		22,125 0 48,777	
2017	13	Total Service Capacity	46,609	46,715	46,992	47,587	48,182	48,777	49,372

Allied Health Professionals Average Weekly Hours Available											
Profession		2017	2018								
Chiropodists	21	14	5								
Dieticians	86	71	120								
Midwives	0	0	0								
NPs	153	229	326								
OTs	0	0	0								
Optometrists	0	52	69								
Pharmacists	516	436	201								
PTs	158	245	7								
Psychologists	9	9	11								
RNs	649	637	568								
RPNs	359	507	515								
RTs	0	0	0								
SLPs	7	8	8								



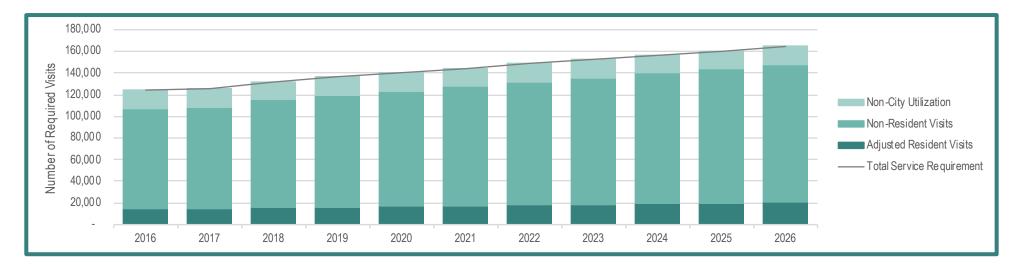
Primary Care Workforce Profile															
Number of Comprehensive Primary Care	e Weekly \vailable	Year	Chiropodists	Dieticians	Midwives	NPs	OTs	Optometrists	Pharmacists	PTs	Psychologists	RNs	RPNs	RTs	SLPs
Physicians	ag(s A	2016	0	3	0	12	0	0	201	44	0	297	367	0	0
2016 (1-5)	Average Hours Av	2017	0	14	0	19	0	0	192	37	4	273	343	0	0
2017 (1-5)	₹ ⊥	2018	0	0	0	0	0	0	30	0	4	298	397	0	0





Total Service Requirements =

- 1 Resident Visits: Number of resident visits expected to be accessed in their neighbourhood of residence based on baseline spatial patterns of utilization
- 2 Non-Resident Visits: Number of non-resident visits expected to be accessed in the neighbourhood based on baseline spatial patterns of utilization

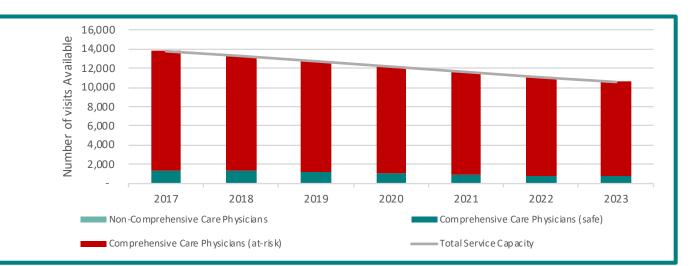


	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026				
Number of Residents	18,364	19,100	19,836	20,572	21,308	22,044	22,780	23,516	24,252	24,988	25,724				
Resident Visits	66,087	65,875	71,384	74,033	76,681	79,330	81,979	84,627	87,276	89,925	92,573				
Proportion of Care Accessed		22.0%													
Within Home Neighbourhood		22.0%													
Resident Visits Adjusted for	14,539	14,492	15,704	16,287	16,870	17,453	18,035	18,618	19,201	19,783	20,366				
Spatial Patterns of Utilization	14,000	14,432	15,704	10,207	10,070	17,400	10,000	10,010	13,201	13,703	20,300				
Non-Resident Visits	92,981	94,113	99,867	103,310	106,754	110,197	113,640	117,084	120,527	123,970	127,413				
Non-City Utilization						16,740									
Total Service Requirement	124,260	125,345	132,312	136,338	140,364	144,390	148,416	152,442	156,468	160,494	164,519				





Examine the Sources of Service Capacity at a Neighbourhood Level
Total Service Capacity =
Comprehensive Care Physicians' Safe Service Capacity: Estimated number of services provided by comprehensive care physicians who are not expected to be at risk of exit from the workforce
Comprehensive Care Physicians' At-Risk Service Capacity: Estimated number of services provided by comprehensive care physicians who are considered to be at risk of exit from the workforce
Service Capacity Generated by Non-Comprehensive Care Physicians: Estimated number of services provided by non-comprehensive care physicians



Number of Comprehensive			2017	2018	2019	2020	2021	2022	2023
Primary C	are Physicians	Comprehensive Care Physicians' Safe Service Capacity	1,386	1,275	1,164	1,053	942	831	720
2016	(1-5)	Comprehensive Care Physicians' At-Risk Service Capacity	12,364	11,943	11,522	11,101	10,680	10,259	9,838
2010	(1-5)	Non-Comprehensive Care Physicians' Service Capacity				0			
2017	(1-5)	Total Service Capacity	13,750	13,218	12,686	12,154	11,622	11,090	10,558

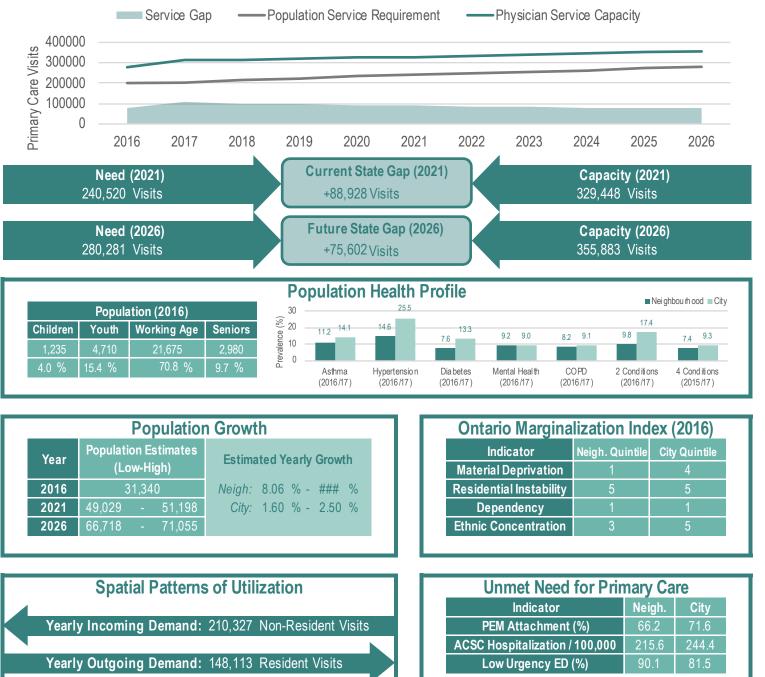
Allied Health Professionals Average Weekly Hours Available											
Profession		2017	2018								
Chiropodists	0	0	0								
Dieticians	3	14	0								
Midwives	0	0	0								
NPs	12	19	0								
OTs	0	0	0								
Optometrists	0	0	0								
Phamacists	201	192	30								
PTs	44	37	0								
Psychologists	0	4	4								
RNs	297	273	298								
RPNs	367	343	397								
RTs	0	0	0								
SLPs	0	0	0								



Primary Care Workforce Planning

Neighbourhood Profile: Church-Yonge Corridor





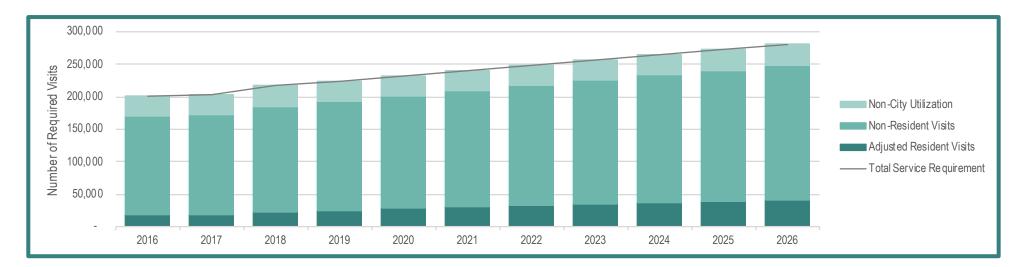
Primary Care Workforce Profile															
Number of Comprehensive Primary Care	e Weekly \vailable	Year	Chiropodists	Dieticians	Midwives	NPs	OTs	Optometrists	Pharmacists	PTs	Psychologists	RNs	RPNs	RTs	SLPs
Physicians	age 's A	2016	164	306	24	81	42	0	1,344	853	231	2,967	728	0	22
2016 97	Average Hours Av	2017	204	278	17	201	68	192	1,440	961	232	2,960	717	26	20
2017 78	A H	2018	133	175	23	198	94	179	455	273	303	3,188	982	20	36





Total Service Requirements =

- 1 Resident Visits: Number of resident visits expected to be accessed in their neighbourhood of residence based on baseline spatial patterns of utilization
- 2 Non-Resident Visits: Number of non-resident visits expected to be accessed in the neighbourhood based on baseline spatial patterns of utilization
- 3 Non-City Utilization: Number of visits expected to be utilized by non-city residents in the neighbourhood based on baseline spatial patterns of utilization

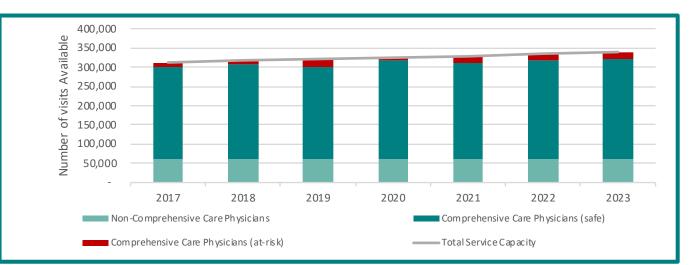


	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026			
Number of Residents	32,938	36,842	40,745	44,649	48,552	52,456	56,359	60,263	64,166	68,070	71,973			
Resident Visits	112,264	114,791	138,874	152,178	165,483	178,787	192,092	205,396	218,701	232,005	245,310			
Proportion of Care Accessed		16.7%												
Within Home Neighbourhood		10.7%												
Resident Visits Adjusted for	18,748	19,170	23,192	25,414	27,636	29,857	32,079	34,301	36,523	38,745	40,967			
Spatial Patterns of Utilization	10,740	13,170	20,102	20,414	21,000	23,007	52,015	54,501	50,525	50,745	40,307			
Non-Resident Visits	150,631	152,661	162,091	167,821	173,552	179,282	185,012	190,743	196,473	202,203	207,933			
Non-City Utilization						31,381								
Total Service Requirement	200,760	203,212	216,664	224,616	232,568	240,520	248,473	256,425	264,377	272,329	280,281			



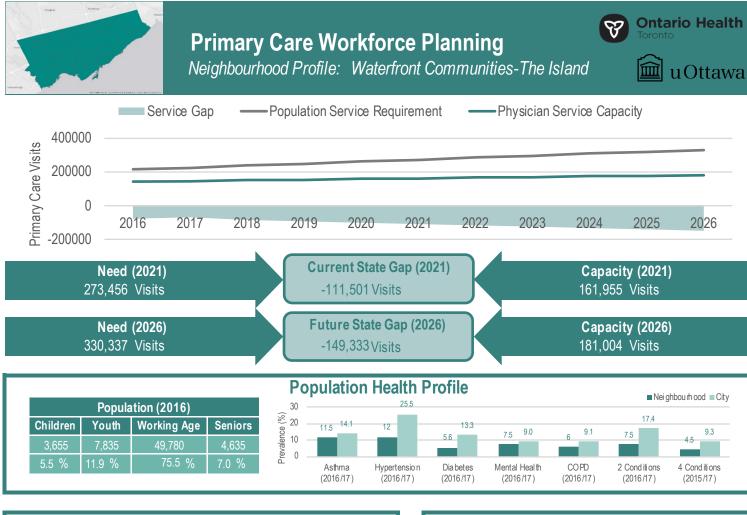


Examine the Sources of Service Capacity at a Neighbourhood Level
Total Service Capacity =
Comprehensive Care Physicians' Safe Service Capacity: Estimated number of services provided by comprehensive care physicians who are not expected to be at risk of exit from the workforce
Comprehensive Care Physicians' At-Risk Service Capacity: Estimated number of services provided by comprehensive care physicians who are considered to be at risk of exit from the workforce
Service Capacity Generated by Non-Comprehensive Care Physicians: Estimated number of services provided by non-comprehensive care physicians



Number of	Comprehensive		2017	2018	2019	2020	2021	2022	2023
Primary C	are Physicians	Comprehensive Care Physicians' Safe Service Capacity	240,052	246,045	239,750	256,398	250,626	257,590	262,105
2016	97	Comprehensive Care Physicians' At-Risk Service Capacity	11,519	9,814	20,397	8,037	18,415	16,268	16,639
2010	97	Non-Comprehensive Care Physicians' Service Capacity				60,407			
2017	78	Total Service Capacity	311,978	316,266	320,554	324,842	329,448	334,265	339,151

Allied Health Professionals Average Weekly Hours Available						
Profession	2016	2017	2018			
Chiropodists	164	204	133			
Dieticians	306	278	175			
Midwives	24	17	23			
NPs	81	201	198			
OTs	42	68	94			
Optometrists	0	192	179			
Phamacists	1,344	1,440	455			
PTs	853	961	273			
Psychologists	231	232	303			
RNs	2,967	2,960	3,188			
RPNs	728	717	982			
RTs	0	26	20			
SLPs	22	20	36			



Population Growth									
Y	′ear	Populatio (Lo	on Es w-Hi		Estima	ited Y	early	Growt	h
2	016	6	5,91	3	Neigh:	8.94	% -	###	%
2	021	#####	-	#####	City:	1.60	% -	2.50	%
2	026	#####	-	#####					

Spatial Patterns of Utilization

Yearly Incoming Demand: 194,869 Non-Resident Visits

Yearly Outgoing Demand: 248,054 Resident Visits

Ontario Marginalization Index (2016)							
Indicator	Neigh. Quintile	City Quintile					
Material Deprivation	1	4					
Residential Instability	5	5					
Dependency	1	1					
Ethnic Concentration	3	5					

Unmet Need for Primary Care						
Indicator	Neigh.	City				
PEM Attachment (%)	67.3	71.6				
ACSC Hospitalization / 100,000	167.2	244.4				
Low Urgency ED (%)	69.3	81.5				

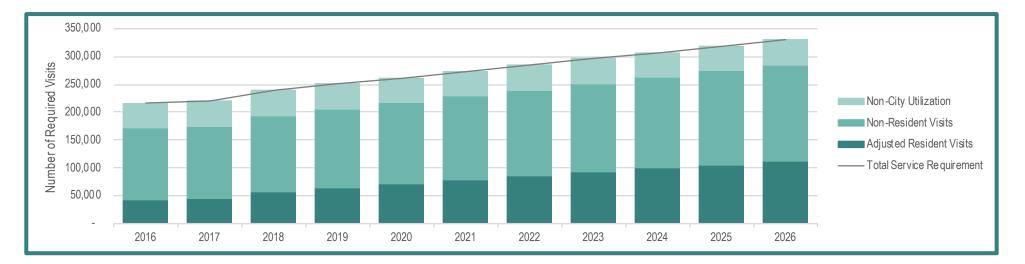
Primary Care Workforce Profile															
Number of Comprehensive Primary Care	e Weekly \vailable	Year	Chiropodists	Dieticians	Midwives	NPs	OTs	Optometrists	Pharmacists	PTs	Psychologists	RNs	RPNs	RTs	SLPs
Physicians	ag('s ∤	2016	24	93	0	58	95	0	2,216	903	46	494	625	0	0
2016 44	Average Hours Av	2017	26	84	0	27	130	246	2,260	959	69	495	784	0	0
2017 36	A H	2018	44	93	0	34	149	221	570	549	84	387	790	0	0





Total Service Requirements =

- 1 Resident Visits: Number of resident visits expected to be accessed in their neighbourhood of residence based on baseline spatial patterns of utilization
- 2 Non-Resident Visits: Number of non-resident visits expected to be accessed in the neighbourhood based on baseline spatial patterns of utilization

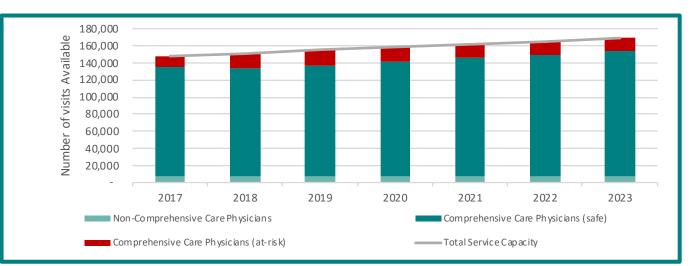


	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026
Number of Residents	56,638	65,745	74,852	83,960	93,067	102,174	111,281	120,388	129,496	138,603	147,710
Resident Visits	181,700	190,832	240,133	269,350	298,567	327,783	357,000	386,217	415,433	444,650	473,867
Proportion of Care Accessed						23.9%					
Within Home Neighbourhood						23.970					
Resident Visits Adjusted for	43,426	45,609	57,392	64,375	71,357	78,340	85,323	92,306	99,289	106,271	113,254
Spatial Patterns of Utilization	40,420	40,000	51,552	04,070	11,001	70,040	00,020	92,000	55,205	100,271	113,234
Non-Resident Visits	128,593	130,267	137,380	141,773	146,167	150,560	154,954	159,347	163,740	168,134	172,527
Non-City Utilization						44,556					
Total Service Requirement	216,576	220,432	239,328	250,704	262,080	273,456	284,833	296,209	307,585	318,961	330,337





Examine the Sources of Service Capacity at a Neighbourhood Level
Total Service Capacity =
Comprehensive Care Physicians' Safe Service Capacity: Estimated number of services provided by comprehensive care physicians who are not expected to be at risk of exit from the workforce
Comprehensive Care Physicians' At-Risk Service Capacity: Estimated number of services provided by comprehensive care physicians who are considered to be at risk of exit from the workforce
Service Capacity Generated by Non-Comprehensive Care Physicians: Estimated number of services provided by non-comprehensive care physicians



Number of	Comprehensive		2017	2018	2019	2020	2021	2022	2023
Primary C	are Physicians	Comprehensive Care Physicians' Safe Service Capacity	128,286	127,108	129,899	134,651	138,588	141,955	147,301
2016	0040	Comprehensive Care Physicians' At-Risk Service Capacity	12,493	17,195	17,928	16,700	16,287	16,444	14,643
2010	44	Non-Comprehensive Care Physicians' Service Capacity				7,080			
2017	36	Total Service Capacity	147,859	151,383	154,907	158,431	161,955	165,479	169,024

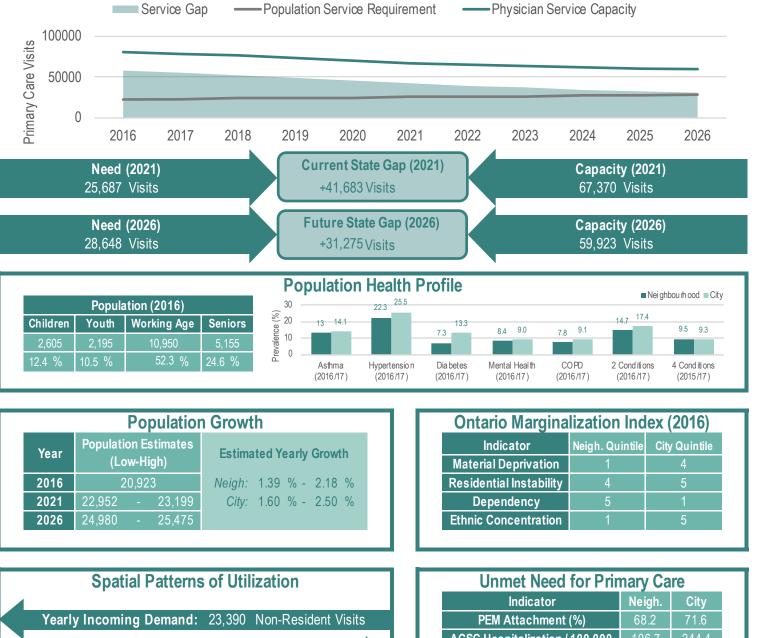
	Allied Health Professionals Average Weekly Hours Available						
Profession		2017	2018				
Chiropodists	24	26	44				
Dieticians	93	84	93				
Midwives	0	0	0				
NPs	58	27	34				
OTs	95	130	149				
Optometrists	0	246	221				
Phamacists	2,216	2,260	570				
PTs	903	959	549				
Psychologists	46	69	84				
RNs	494	495	387				
RPNs	625	784	790				
RTs	0	0	0				
SLPs	0	0	0				



Primary Care Workforce Planning

Neighbourhood Profile: Rosedale-Moore Park





Yearly Outgoing Demand: 85,092 Resident Visits

Unmet Need for Primary Care							
Indicator	Neigh.	City					
PEM Attachment (%)	68.2	71.6					
ACSC Hospitalization / 100,000	106.7	244.4					
Low Urgency ED (%)	67.0	81.5					

Primary Care Workforce Profile																
Number o Comprehen Primary Ca	sive are	e Weekly Available	Year	Chiropodists	Dieticians	Midwives	NPs	OTs	Optometrists	Pharmacists	PTs	Psychologists	RNs	RPNs	RTs	SLPs
Physiciar	าร	ag(s ≱	2016	91	30	0	0	15	0	562	217	406	312	324	0	38
2016	30	Average Hours Av	2017	72	32	0	0	48	170	543	283	416	261	241	0	35
2017	26	Α̈́Η	2018	77	2	0	5	22	170	314	104	406	165	494	0	29

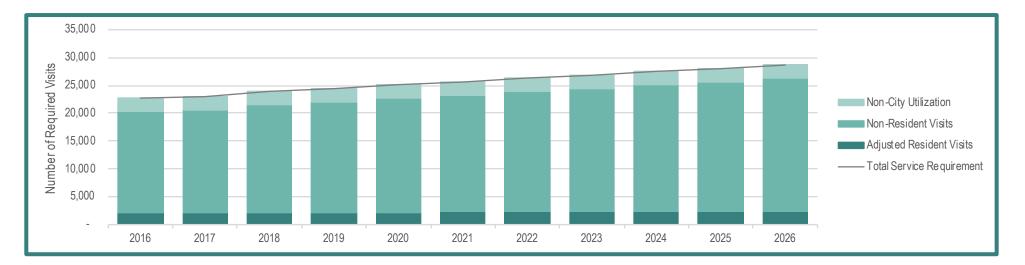




Total Service Requirements =

1 - Resident Visits: Number of resident visits expected to be accessed in their neighbourhood of residence based on baseline spatial patterns of utilization

2 - Non-Resident Visits: Number of non-resident visits expected to be accessed in the neighbourhood based on baseline spatial patterns of utilization

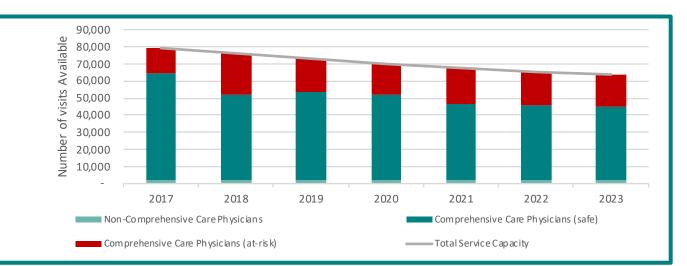


	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026
Number of Residents	22,130	22,578	23,025	23,473	23,921	24,369	24,816	25,264	25,712	26,159	26,607
Resident Visits	79,354	80,764	82,565	84,171	85,776	87,381	88,987	90,592	92,197	93,803	95,408
Proportion of Care Accessed						2.6%					
Within Home Neighbourhood						2.070					
Resident Visits Adjusted for	2,063	2,100	2,147	2,188	2,230	2,272	2,314	2,355	2,397	2,439	2,481
Spatial Patterns of Utilization	2,000	2,100	2,147	2,100	2,200	2,212	2,314	2,300	2,557	2,400	2,401
Non-Resident Visits	18,284	18,555	19,385	19,935	20,486	21,036	21,587	22,137	22,688	23,238	23,789
Non-City Utilization						2,379					
Total Service Requirement	22,726	23,034	23,910	24,503	25,095	25,687	26,279	26,871	27,464	28,056	28,648





Examine the Sources of Service Capacity at a Neighbourhood Level							
Total Service Capacity =							
Comprehensive Care Physicians' Safe Service Capacity: Estimated number of services provided by comprehensive care physicians who are not expected to be at risk of exit from the workforce							
Comprehensive Care Physicians' At-Risk Service Capacity: Estimated number of services provided by comprehensive care physicians who are considered to be at risk of exit from the workforce							
Service Capacity Generated by Non-Comprehensive Care Physicians: Estimated number of services provided by non-comprehensive care physicians							



Number of Comprehensive Primary Care Physicians			2017	2018	2019	2020	2021	2022	2023
		Comprehensive Care Physicians' Safe Service Capacity	62,596	50,209	51,587	49,867	44,684	43,660	42,744
2016	30	Comprehensive Care Physicians' At-Risk Service Capacity	14,446	23,769	19,327	18,035	20,538	19,685	18,867
		Non-Comprehensive Care Physicians' Service Capacity	2,148						
2017	26	Total Service Capacity	79,190	76,126	73,062	70,050	67,370	65,493	63,759

Allied Health Professionals Average Weekly Hours Available								
Profession		2017	2018					
Chiropodists	91	72	77					
Dieticians	30	32	2					
Midwives	0	0	0					
NPs	0	0	5					
OTs	15	48	22					
Optometrists	0	170	170					
Pharmacists	562	543	314					
PTs	217	283	104					
Psychologists	406	416	406					
RNs	312	261	165					
RPNs	324	241	494					
RTs	0	0	0					
SLPs	38	35	29					

Toronto Region Primary Care Workforce Planning Toolkit

Technical Notes – Neighbourhood & Subregion Packages

Project Description

The Toronto Region Primary Care Workforce Planning Toolkit is a fit-for-purpose toolkit to support integrated primary care workforce planning in the Toronto Region. The toolkit is the result of a collaboration between the Health Analytics team at Ontario Health Toronto and consultants from the Canadian Health Workforce Network. A partnership with the City of Toronto, as well as extensive consultation with stakeholders, decision-makers, leaders, and frontline workers in Toronto, informed the development of the toolkit.

The toolkit provides a body of evidence around the current (and projected future) states of population health needs and primary care service provision at a neighbourhood level within the City of Toronto. The goal of the toolkit is to support evidence-based decision-making, particularly with regards to deployment of the primary care workforce and other health system resources. The toolkit looks at population needs and workforce capacity at the neighbourhood, sub-region, and whole city levels. It takes into account variations in population needs, workforce service capacity, and existing assets, and also addresses challenges specific to Toronto, such as patient mobility, anticipated rapid population growth, and physician retirement.

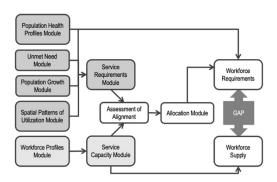
Methodology

The toolkit is composed of a series of modules that assemble information about primary care in the City of Toronto:

- The **Population Health Profiles Module** captures characteristics of the population that impact the need for primary care services.
- The **Population Growth Module** captures neighbourhood-level population growth projections generated by the City of Toronto, allowing us to adjust service requirements to account for anticipated population growth.
- The **Spatial Patterns of Utilization Module** captures a snapshot of primary care utilization patterns and allows us to adjust service requirements to account for patients' care-seeking behaviours.
- The **Unmet Need Module** captures information related to neighbourhood-level unmet healthcare need, which can contribute to an adjustment of service requirements.
- The **Service Requirements Module** estimates primary care service requirements using the CIHI Population Grouping Methodology.
- The **Workforce Profiles Module** captures information about the primary care workforce including physicians and chiropodists, dieticians, midwives, nurse practitioners, optometrists, occupational therapists, pharmacists, psychologists, physiotherapists, registered nurses, registered practical nurses, respiratory therapists, and speech-language pathologists practicing in each neighbourhood.
- The Service Capacity Module estimates the capacity of the workforce to provide primary care services.

Outputs from these modules are synthesized and summarized in the three static dashboards – Neighbourhood Profiles, Service Requirements, and Service Capacity – that are included in the neighbourhood and subregion packages.

This information is a starting point for local stakeholders wishing to better understand the primary care landscape in their communities. Interpretation of these outputs should consider the local context (factors related to both the community and the local workforce). Engagement and consultation with local stakeholders and frontline healthcare providers are essential parts of the planning process.



Definitions

Sub-Regions: Smaller geographic planning regions within Ontario Regions, developed to help better understand and address patient and population needs at the local level. There are 5 central and 6 peripheral sub-regions in the City of Toronto. One sub-region overlaps with a neighbouring Region and only the part of this sub-region located in Toronto has been included in these analyses. More information about sub-regions is available at http://www.torontocentrallhin.on.ca/forhsps/subregions.aspx.

Neighbourhoods: The 140 City of Toronto neighbourhoods were built by the Social Development, Finance & Administration department at the City of Toronto using Statistics Canada Census Tracts. More information about neighbourhoods is available at https://www.toronto.ca/city-government/data-research-maps/neighbourhoods-communities/neighbourhood-profiles/.

Comprehensive care physician: Primary care physicians who provide comprehensive care according to the algorithm developed at ICES (<u>https://www.cmajopen.ca/content/5/4/E856</u>).

Non-comprehensive care physician: Primary care physicians who practice less than 44 days per year or who otherwise do not meet the criteria to be characterized as providing comprehensive primary care according to the algorithm developed at ICES (<u>https://www.cmajopen.ca/content/5/4/E856</u>).

Individual-level Service Requirements: Predicted number of visits to a primary care physician based on clinical and demographic profiles generated by the CIHI Population Grouping Methodology (<u>https://www.cihi.ca/sites/default/files/document/infosheet_popgroupmethod_en_web_0.pdf</u>).

Neighbourhood-level Service Requirements: Neighbourhood-level service requirements are a function of the number of visits to a primary care physician required by neighbourhood residents and by residents of other neighbourhoods in the City, adjusted for spatial patterns of utilization, along with the number of visits required by patients from outside the City of Toronto and an estimate of unmet need.

Total Service Capacity: Neighbourhood-level service capacity is a function of the estimated number of visits provided by comprehensive care physicians who are not expected to exit the workforce, plus the estimated number of visits provided by comprehensive care physicians who are considered to be at risk of retirement, plus the estimated number of visits provided by non-comprehensive care physicians.

Physician Service Capacity: Physician service capacity is estimated on an individual level (based on the total number of visits provided in 2017 (from IPDB)) with adjustment for age-based changes in workload (from https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6516703/) and aggregated to the neighbourhood level.

At-risk Service Capacity: Visits associated with physicians whose age-based risk of retirement is at least 20%.

Allied Health Provider: Allied health providers include Chiropodists, Dieticians, Midwives, Nurse Practitioners, Optometrists, Occupational Therapists, Pharmacists, Psychologists, Physiotherapists, Registered Nurses, Registered Practical Nurses, Respiratory Therapists, and Speech-Language Pathologists.

Primary Care Activities: Activities relating directly to primary care include General Service Provision, Continuing Care, Comprehensive Primary Care, Chronic Disease Prevention and Management, Public Health, Mental Health and Addiction, Primary Maternity Care, Geriatric Care, Infectious Disease Prevention and Control, and Palliative Care.

Average Weekly Hours Available: The average weekly hours of direct professional services in activities identified as relating directly to primary care, estimated based on past hours worked. Note that this estimate represents normal hours of service that the workforce undertook, not "potential" or "extra" available hours. These are descriptive estimates, not projections, and may not represent future workforce service capacity.

Sources of Data

- **Population Health Profiles:** Ontario Community Health Profiles Partnership (OCHPP)
- Ontario Marginalization Index: OCHPP
- Population Growth: City of Toronto Planning Department
- Unmet Need: OCHPP
- Spatial Patterns of Utilization: Utilization Matrix generated using data from ICES through an AHRQ request
- Service Requirements: CIHI Population Grouping Methodology outputs provided by the Ontario Ministry of Health
- Primary Care Workforce Profile & Service Capacity (Physicians): ICES Physician Database (IPDB) accessed through OCHPP
- Primary Care Workforce Profile & Service Capacity (Other Health Professionals): Health Professions Database (HPDB) outputs provided by the Ontario Ministry of Health

Assumptions

Service requirements are estimated assuming a Medium population growth scenario and a 10-year horizon.

We assume linear residential development and population growth between the base year and the horizon year.

In our baseline scenario, we assume that new residents of a neighbourhood will have a similar profile and service requirements to those currently residing within the neighbourhood.

We adjust for population mobility using a snapshot of spatial patterns of utilization observed in FY 2017/18.

We assume that providers' age-based changes in workload and retirement probabilities will be consistent with those observed in comprehensive primary care physicians practicing in Ontario between 1992 and 2013 (from https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6516703/).

Limitations

Neighbourhood geographies are not specifically designed for primary care health workforce planning.

Some neighbourhoods are split between subregions. In these cases, neighbourhoods have been assigned to a single subregion as follows:

Neighbourhood Name (Number)	Split Between Sub-Regions	Assigned To
Kingsview Village-The Westway (6)	North Etobicoke Malton West Woodbridge &	North Etobicoke Malton
	North York West	West Woodbridge
Willowridge-Martingrove-Richview (7)	North Etobicoke Malton West Woodbridge &	North Etobicoke Malton
	North York West	West Woodbridge
Islington-City Centre West (14)	South Etobicoke & West Toronto	South Etobicoke
Victoria Village (43)	North York Central & East Toronto	East Toronto
Leaside-Bennington (56)	North Toronto & Mid-East Toronto	North Toronto
South Riverdale (70)	Mid-East Toronto & East Toronto	East Toronto
Waterfront Communities-The Island	Mid-West Toronto & Mid-East Toronto	Mid-East Toronto
(77)		
Yonge-St.Clair (97)	Mid-West Toronto & North Toronto	North Toronto
Clairlea-Birchmount (120)	East Toronto & Scarborough South	East Toronto
Birchcliffe-Cliffside (122)	East Toronto & Scarborough South	East Toronto

Sub-Region boundaries do not equate to Ontario Health Team (OHT) boundaries, but are used as a proxy to show the approximate catchment area served by OHTs.

Unmet need is currently not accounted for in the estimate of Service Requirements. A process to define quantitative estimates of unmet need through engagement with local stakeholders is in development for operationalization during the next phase of planning.

Estimates of service capacity for physicians are in *visits*, while estimates of service capacity for allied health providers are in *hours per week*.

The information in the HPDB was provided on an "as-is" basis. The data were originally obtained by the Ministry of Health directly from health regulatory Colleges. The Ministry therefore cannot and does not warrant or represent that the information is accurate, complete, reliable or current.

Spatial patterns of utilization and the primary care workforce are not independent; there is an interaction and observed patterns can change over time. For more information about the neighbourhood- and sub-region-level spatial patterns of utilization methodology, results, and visualizations, please contact Ontario Health Toronto.

Due to the data lags associated with the use of administrative data for planning, the most recent year of data input into this planning exercise is for FY 2018/19 and trends that have since emerged are not reflected in our analysis.

Our workforce model projects forward current capacity available within the system and does not model the impact of entry of new health care providers into the workforce. The neighbourhood-level gaps between service capacity and service requirements illustrated in our outputs can be used to identify neighbourhoods where additional resources are required to meet primary care needs.

Abbreviations

ACSC – Ambulatory Care Sensitive Condition AHRQ – Applied Health Research Question CIHI – Canadian Institute for Health Information COPD – Chronic Obstructive Pulmonary Disease ED – Emergency Department FY – Fiscal Year NP - Nurse Practitioner OCHPP - Ontario Community Health Profiles Partnership **OHT – Ontario Health Teams** OT – Occupational Therapist PEM – Patient Enrolment Model PT – Physiotherapist RN - Registered Nurse **RPN – Registered Practical Nurse** RT – Respiratory Therapist SLP – Speech & Language Pathologist

Contact

For more Information, please contact: Ontario Health Toronto, Health Analytics <u>Healthanalytics@tc.lhins.on.ca</u>

V1 May 2022