Final Report Influenza Vaccine Coverage Staff of Acute Care Facilities British Columbia, 2022/23

Background

Immunization coverage assessment is an important part of a quality immunization program and serves three main functions:

- i) Identifying populations with low levels of immunization coverage
- ii) Evaluating the delivery of immunization programs
- iii) Informing program planning

Targets for coverage among staff of acute care facilities were formerly 60% at the provincial level, but were updated to 80% as BC is signatory to the national targets by 2025.^{1,2}

Objectives

To quantify the proportion of staff in BC acute care facilities who:

- i) Were vaccinated against influenza in the 2022/23 season
- ii) Self-reported their vaccination or vaccine declination including by job type

Methods

Please refer to the separate Methods document for a full description of methods including definitions, data sources, and analyses as well as changes to methodology that should be used to interpret coverage trends over time.

Results

Reporting of facilities (Table 1)

- All 92 acute care facilities in BC were included
- All 92 acute care facilities used data from the WHITE database

2022/23 influenza vaccination coverage (Figures 1-3, Table 2)

- 49% (37,040/75,406) of staff in acute care facilities in BC reported influenza vaccine receipt, the lowest since the Influenza Prevention Policy was enacted in 2012/2013
- 45% to 60% coverage was the range across the five health authorities and PHSA
- 40% to 64% coverage was the range across the sixteen health service delivery areas and PHSA
- 0% to 78% coverage was the range across all acute care facilities in BC
- 12% to 66% coverage was the range across the 31 facilities with 500 or more staff
- 12/93 (13%) facilities had coverage of 60% or higher
- 0/93 (0%) facilities met the provincial and national coverage target of 80%

¹Immunize BC: a strategic framework for immunization in B.C. 2007. Victoria, BC: British Columbia Ministry of Health. Available at: http://www.health.gov.bc.ca/library/publications/year/2007/immunizebc.pdf

²Public Health Agency of Canada. Vaccination Coverage Goals and Vaccine Preventable Disease Reduction Targets by 2025. Available at: https://www.canada.ca/en/public-health/services/immunization-vaccine-priorities/national-immunization-strategy/vaccination-coverage-goals-vaccine-preventable-diseases-reduction-targets-2025.html

Table 1. Acute care facilities included by health authority, 2022/23

Health authority	Number of acute care facilities
Interior	27
Fraser	13
Vancouver Coastal	15
Vancouver Island	13
Northern	18
Provincial Health Services ³	6
British Columbia	92

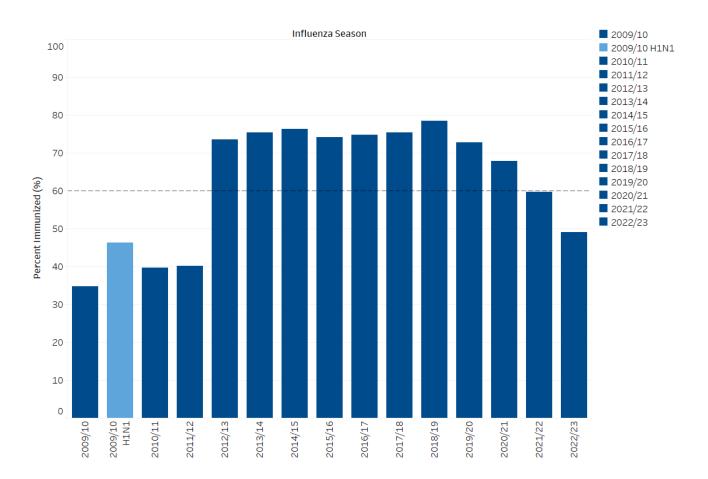


Figure 1. Influenza immunization coverage for staff of acute care facilities by influenza season, British Columbia 2009/10 – 2022/23

³Provincial Health Service Authority acute care facilities include: BC Cancer Agency (Abbotsford, Centre for the Southern Interior, Vancouver, Vancouver Island), BC Children & Women's Health Centre, and Fraser Valley Cancer Centre

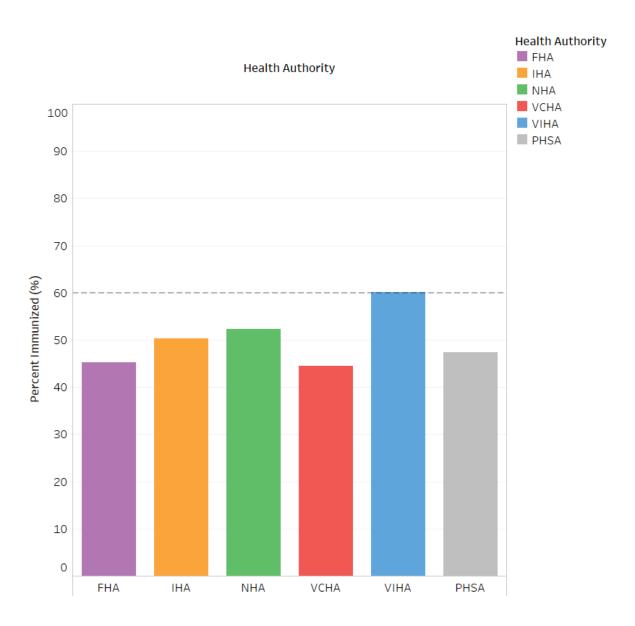


Figure 2. Influenza immunization coverage for staff of acute care facilities by health authority, British Columbia 2022/23

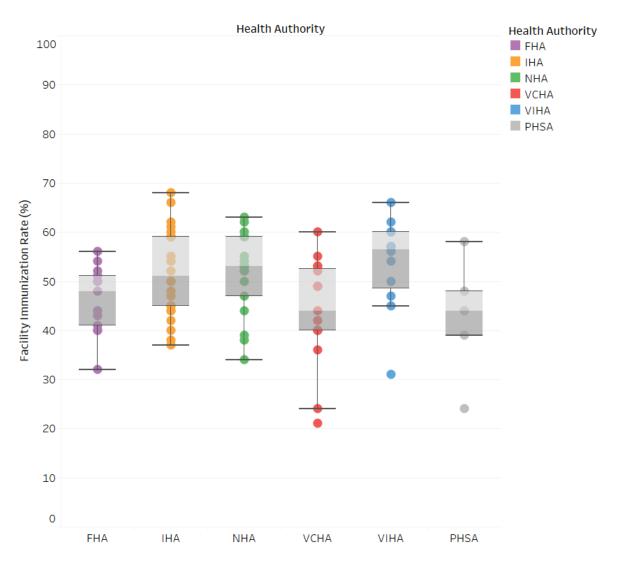


Figure 3. Influenza immunization coverage for staff of acute care facilities per facility and by health authority, British Columbia 2022/23

Figure 3 illustrates the distribution of influenza vaccine coverage for residents of LTCFs by facility in each health authority for the 2022/23 influenza season. The horizontal lines represent the minimum*, 25th percentile, median (transition from light to dark grey), 75th percentile, and maximum.

^{*} After excluding outliers. Outliers are those below the 25th percentile minus 1.5 times the interquartile range.

Table 2. Immunization coverage for staff of acute care facilities by health authority and health service delivery area, 2012/13 to 2022/23

						Inf	luenza sea	son				
Health authority		2012/13	2013/14	2014/15	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23
INTERIOR	immunized	6,540	7,419	8,152	7,982	8,482	8,958	8,802	8,742	7,945	6,389	6,181
	total staff	8,593	10,726	10,647	10,989	10,936	11,060	10,781	11,593	12,123	11,600	12,271
	% immunized	76	69	77	73	78	80	82	75	66	55	50
East Kootenay	immunized	684	739	780	758	767	822	764	838	742	626	618
	total staff	812	970	953	982	966	995	913	1,017	1,102	1,091	1,161
	% immunized	84	76	82	77	79	83	84	82	67	57	53
Kootenay Boundary	immunized	706	817	928	891	915	950	919	928	813	627	576
	total staff	995	1,230	1,197	1,220	1,184	1,224	1,197	1,252	1,342	1,257	1,260
	% immunized	71	66	78	73	77	78	77	74	61	50	46
Okanagan	immunized	3,323	3,901	3,886	3,829	4,134	4,359	4,380	4,262	3,828	3,040	2,883
	total staff	4,593	5,845	5,283	5,509	5,520	5,529	5,437	5,872	6,126	5,875	6,118
	% immunized	72	67	74	70	75	79	81	73	63	52	47
Thomps Carib Shuswap	immunized	1,827	1,962	2,558	2,504	2,666	2,827	2,739	2,714	2,562	2,096	2,104
	total staff	2,193	2,681	3,214	3,278	3,266	3,312	3,234	3,452	3,553	3,377	3,732
	% immunized	83	73	80	76	82	85	85	79	72	62	56
FRASER	immunized	11,013	15,247	15,399	15,547	14,110	14,213	13,566	13,141	12,720	10,436	9,187
	total staff	14,883	19,001	19,262	19,742	18,057	18,032	17,434	18,388	18,726	18,592	20,299
	% immunized	74	80	80	79	78	79	79	72	68	56	45
Fraser East	immunized	2,053	2,761	2,859	2,745	2,504	2,491	2,379	2,448	2,236	1,457	1,555
	total staff	2,781	3,510	3,635	3,655	3,310	3,318	3,155	3,464	3,435	3,372	3,849
	% immunized	74	79	79	75	76	75	75	71	65	43	40
Fraser North	immunized	4,390	5,893	5,790	6,007	5,588	5,641	5,413	5,103	4,962	4,474	3,940
	total staff	5,825	7,301	7,167	7,492	7,038	6,931	6,749	6,939	7,020	7,037	7,741
	% immunized	75	81	81	80	79	81	80	74	71	64	51
Fraser South	immunized	4,570	6,593	6,750	6,795	6,018	6,081	5,774	5,590	5,522	4,505	3,695
	total staff	6,277	8,190	8,460	8,595	7,709	7,783	7,530	7,985	8,271	8,183	8,729
	% immunized	73	81	80	79	78	78	77	70	67	55	42

Table 2 (cont'd). Immunization coverage for staff of acute care facilities by health authority and health service delivery area, 2012/13 to 2022/23

		Influenza season										
Health authority		2012/13	2013/14	2014/15	2015/16	2016/17	201718	2018/19	2019/20	2020/21	2021/22	2022/23
VANCOUVER COASTAL	immunized	5,553	12,060	12,274	12,702	12,000	11,471	11,741	11,303	11,231	10,239	8,683
	total staff	7,828	15,982	16,312	16,785	16,249	15,615	16,074	17,159	17,588	17,401	19,533
	% immunized	71	75	75	76	74	73	73	66	64	59	44
Richmond	immunized	792	1,055	1,086	1,119	1,024	1,002	1,097	976	914	853	784
	total staff	993	1,327	1,285	1,353	1,297	1,252	1,415	1,382	1,379	1,386	1,524
	% immunized	80	80	85	83	79	80	78	71	66	62	51
Vancouver	immunized	3,364	8,994	9,093	9,558	9,091	8,508	8,792	8,423	8,525	7,772	6,561
	total staff	4,996	12,003	12,400	12,767	12,430	11,876	12,186	12,942	13,292	13,161	14,702
	% immunized	67	75	73	75	73	72	72	65	64	59	45
N Shore/Coast Garibaldi	immunized	1,397	2,011	2,095	2,025	1,885	1,907	1,852	1,904	1,792	1,614	1,338
	total staff	1,839	2,652	2,627	2,665	2,522	2,487	2,473	2,835	2,917	2,854	3,307
	% immunized	76	76	80	76	75	77	75	67	61	57	40
VANCOUVER ISLAND	immunized	6,143	8,241	7,811	7,593	7,653	7,432	9,154	9,713	9,486	8,600	8,130
	total staff	8,345	11,360	11,119	11,592	11,585	11,447	11,454	12,072	12,797	12,701	13,506
	% immunized	74	73	70	66	66	65	80	81	74	68	60
South Van Island	immunized	3,975	4,722	4,458	4,312	4,345	4,148	5,029	5,345	5,334	4,866	4,786
	total staff	5,295	6,402	6,395	6,585	6,487	6,402	6,290	6,605	6,947	6,901	7,482
	% immunized	75	74	70	65	67	65	80	81	77	71	64
Central Van Island	immunized	1,673	2,070	2,060	1,970	1,967	2,023	2,507	2,678	2,454	2,224	2,027
	total staff	2,401	3,119	3,080	3,231	3,247	3,342	3,255	3,436	3,532	3,486	3,753
	% immunized	70	66	67	61	61	62	77	78	69	64	54
North Van Island	immunized	495	1,449	1,293	1,311	1,341	1,261	1,618	1,690	1,698	1,510	1,317
	total staff	649	1,839	1,644	1,776	1,851	1,803	1,909	2,031	2,318	2,314	2,271
	% immunized	76	79	79	74	72	72	85	83	73	65	58

Table 2 (cont'd). Immunization coverage for staff of acute care facilities by health authority and health service delivery area, 2012/13 to 2022/23

		Influenza season										
Health authority		2012/13	2013/14	2014/15	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23
NORTHERN	immunized	2,612	2,913	3,012	2,849	3,035	2,956	3,010	3,244	2,872	2,844	2,311
	total staff	3,459	3,992	4,007	4,232	4,117	4,123	3,882	4,289	4,319	4,289	4,415
	% immunized	76	73	75	67	74	72	78	76	67	66	52
Northwest	immunized	673	732	774	736	786	780	770	840	724	695	580
	total staff	909	1,017	1,035	1,078	1,077	1,081	991	1,090	1,069	1,037	1,070
	% immunized	74	72	75	68	73	72	78	77	68	67	54
Northern Interior	immunized	1,473	1,661	1,695	1,618	1,751	1,666	1,759	1,869	1,706	1,752	1,376
	total staff	1,908	2,229	2,228	2,387	2,307	2,325	2,238	2,475	2,512	2,548	2,598
	% immunized	77	75	76	68	76	72	79	76	68	69	53
Northeast	immunized	466	520	543	495	498	510	481	535	442	397	355
	total staff	642	746	744	767	733	717	653	724	738	704	747
	% immunized	73	70	73	65	68	71	74	74	60	56	48
PHSA	immunized	4,038	4,998	4,932	5,215	5,155	5,570	5,479	5,185	4,939	4,485	2,545
	total staff	5,710	6,398	6,233	6,622	6,512	6,778	6,328	6,966	6,892	7,393	5,362
	% immunized	71	78	79	79	79	82	87	74	72	61	48
ВС	immunized	35,899	50,878	51,580	51,888	50,435	50,456	51,752	51,328	49,193	42,993	37,040
	total staff	48,818	67,459	67,580	69,962	67,456	67,055	65,953	70,467	72,445	71,976	75,406
	% immunized	74	75	76	74	75	75	78	73	68	60	49

2022/23 policy compliance results (Figure 4, Table 3)

- Allied health, pharmacy, and management/leadership staff reported the highest coverage;
 this is the same finding as in the previous five influenza seasons
- 49% of staff in acute care facilities in BC reported being vaccinated, 14% reported declining vaccination, and 37% did not report vaccination status and were considered to be unvaccinated for the purpose of this report
 - The low coverage in certain occupation categories (e.g., medical staff) is largely due to non-reporting rather than declining vaccination. In 2022-2023, only 0.3% of medical staff declined vaccination, while 78% did not report their vaccination status

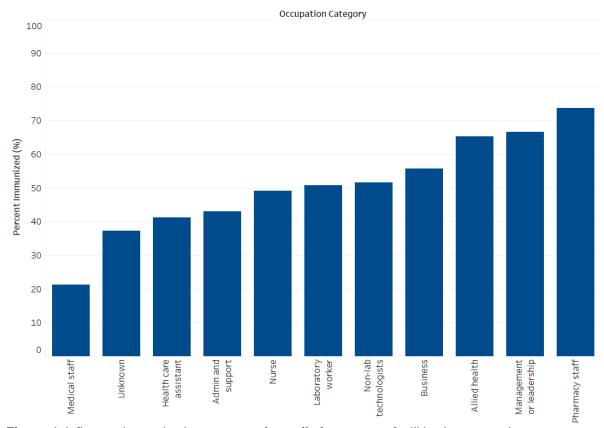


Figure 4. Influenza immunization coverage for staff of acute care facilities by occupation group, British Columbia 2022/23

BC Centre for Disease Control Provincial Health Services Authority

Table 3. Influenza Prevention Policy compliance for acute health care workers by health authority,

	Compliance Status									
	Vaccinated	Vaccinated	Declined	Declined	Not reported	Not reported	Total	Total		
Health Authority	No.	%	No.	%	No.	. %	No.	%		
IHA	6,181	50	2,448	20	3,642	30	12,271	100		
FHA	9,190	45	3,421	17	7,708	38	20,319	100		
VCHA	8,683	45	899	5	9,951	51	19,533	100		
VIHA	8,130	60	2,675	20	2,701	20	13,506	100		
NHA	2,311	52	1,021	23	1,083	25	4,415	100		
PHSA	2,545	47	255	5	2,562	48	5,362	100		
Total	37,040	49	10,719	14	27,647	37	75,406	100		