

RESPIRATORY VIRUS DETECTION REPORT

September 5 to September 11, 2021
(Surveillance Week 2021-36)



In this Respiratory Virus Report, the number of detections of coronavirus reflects only seasonal human coronaviruses, not the novel pandemic coronavirus (SARS-CoV-2) that causes COVID-19. For information on COVID-19, see the [Coronavirus disease \(COVID-19\): Outbreak update](#).

Overall Summary

Respiratory virus detections continue to increase in Canada

- Enterovirus/rhinovirus (495 detections; 19.2% positive), respiratory syncytial virus (479 detections; 7.7% positive), and human parainfluenza virus (137 detections; 5.0% positive) are the most common seasonal respiratory viruses detected in Canada; activity of these viruses has fluctuated in recent weeks
 - Activity of enterovirus/rhinovirus is slightly below expected levels
 - Activity of respiratory syncytial virus is above expected levels; the majority of detections are found in Quebec
 - Activity of human parainfluenza virus is above expected levels
- Detections of other respiratory viruses are low
- The number of tests performed for all viruses are above expected levels
- 32/34 sentinel laboratories reported surveillance data

Abbreviations

Flu: Influenza

Flu A(H1N1)pdm09: Influenza A(H1N1)pdm09

Flu A(H3): Influenza A(H3N2)

Flu A (UnS): Influenza A(Unsubtyped)

RSV: Respiratory syncytial virus

HPIV: Human parainfluenza virus

HMPV: Human metapneumovirus

ADV: Adenovirus

EV/RV: Enterovirus/Rhinovirus

HCoV: Human coronavirus

Atl: Atlantic Canada

BC: British Columbia

Can: Canada

EORLA: Eastern Ontario Regional Laboratory Association

HSC: Health Sciences Centre

N.C.: Data not collected

N.R.: Data not reported for current week

ON: Ontario

PR: Prairies

P.H.O.L.: Public Health Ontario Laboratory

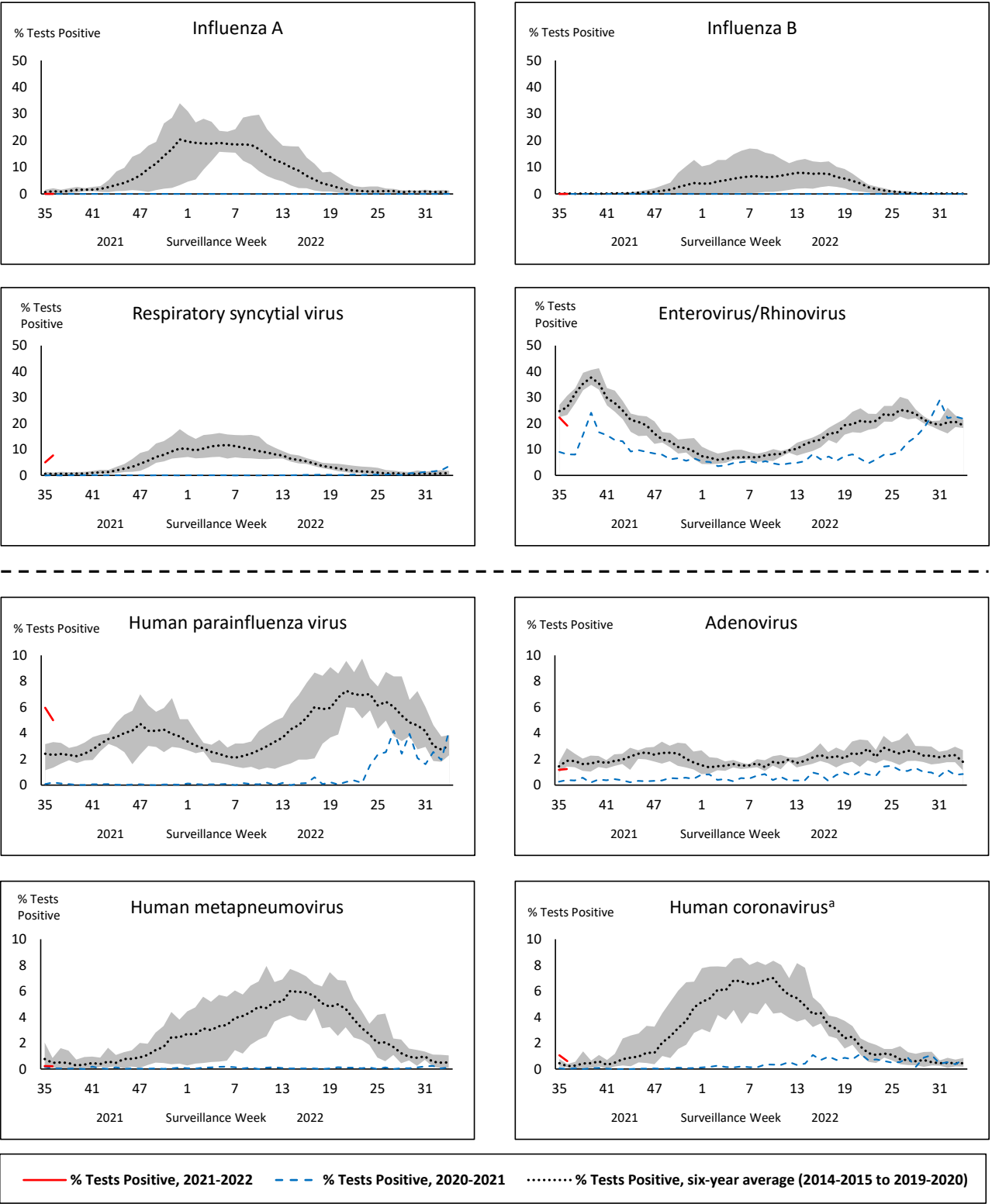
QC: Quebec

Terr: Territories of Canada

UHN: University Health Network



Figure 1: Positive respiratory virus tests (%) reported by participating laboratories in Canada by surveillance week compared to average and range from 2014-2015 to 2019-2020 season



Shaded area represents the maximum and minimum % of respiratory virus tests positive reported by week from seasons 2014-2015 to 2019-2020

Note: Data from week 11 of the 2019-2020 season onwards is excluded from the historical comparison due to the COVID-19 pandemic

Note: % Tests Positive scale changes across the dashed line

^a Human coronavirus excludes human coronaviruses SARS-CoV, MERS-CoV and SARS-CoV-2; Includes seasonal human coronaviruses HCoV-229E, HCoV-OC43, HCoV-NL63, HCoV-HKU1.

Table 1: Respiratory virus detections for the week ending September 11, 2021 (surveillance week 2021-36)

Reporting Laboratory	Flu Tested	A(H1)pdm09 Positive	A(H3) Positive	A(UnS) Positive	Total Flu A Positive	Total Flu B Positive	RSV Tested	RSV Positive	HPIV Tested	HPIV 1 Positive	HPIV 2 Positive	HPIV 3 Positive	HPIV 4 Positive	Other HPIV Positive	ADV Tested	ADV Positive	HMPV Tested	HMPV Positive	EV/RV Tested	EV/RV Positive	HCoV Tested	HCoV Positive
Newfoundland	451	0	0	0	0	0	451	4	451	0	0	0	0	1	451	1	451	0	451	77	N.C.	N.C.
Prince Edward Island	58	0	0	0	0	0	58	0	58	0	0	12	0	0	58	3	58	0	58	20	58	0
Nova Scotia	41	0	0	0	0	0	41	0	36	0	2	3	0	0	36	0	36	0	36	4	36	0
New Brunswick	125	0	0	0	0	0	121	0	108	0	0	1	0	0	108	0	108	0	108	1	108	0
Atlantic	675	0	0	0	0	0	671	4	653	0	2	16	0	1	653	4	653	0	653	102	202	0
Région Nord-Est	463	0	0	0	0	0	127	39	0	0	0	0	0	0	0	0	0	0	N.C.	N.C.	0	0
Québec-Chaudière-Appalaches	29	0	0	0	0	0	62	22	25	0	0	3	0	0	25	1	25	0	N.C.	N.C.	25	0
Centre-du-Québec	41	0	0	0	0	0	42	12	12	0	0	1	0	0	12	0	12	0	N.C.	N.C.	12	0
Montréal-Laval	755	0	0	0	0	0	757	332	110	1	0	1	0	0	110	6	110	1	N.C.	N.C.	110	0
Ouest du Québec	45	0	0	0	0	0	45	10	2	0	0	0	0	0	0	0	2	0	N.C.	N.C.	2	0
Montréal	36	0	0	0	0	0	36	11	0	0	0	0	0	0	0	0	0	0	N.C.	N.C.	0	0
Province of Québec	1369	0	0	0	0	0	1069	426	149	1	0	5	0	0	147	7	149	1	N.C.	N.C.	149	0
P.H.O.L. - Ottawa	271	0	0	0	0	0	271	29	271	0	0	0	0	59	271	10	271	0	271	99	271	6
EORLA	84	0	0	0	0	0	84	1	9	0	0	0	0	0	9	0	0	0	9	3	0	0
P.H.O.L. - Kingston	18	0	0	0	0	0	18	1	18	0	0	0	0	3	18	1	18	0	18	5	18	0
UHN / Mount Sinai Hospital	348	0	0	1	1	0	348	0	10	0	0	0	0	0	10	0	10	0	10	0	10	0
P.H.O.L. - Toronto	129	0	0	0	0	0	129	0	129	0	0	0	0	7	129	0	129	0	129	22	129	0
Sick Kids Hospital - Toronto	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.
Sunnybrook & Women's College HSC	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.	N.R.
P.H.O.L. - Sault Ste. Marie	1	0	0	0	0	0	1	0	1	0	0	0	0	0	1	0	1	0	1	0	1	0
P.H.O.L. - Timmins	5	0	0	0	0	0	5	0	5	0	0	0	0	2	5	0	5	0	5	0	5	0
St. Joseph's - London	29	0	0	0	0	0	29	1	29	0	0	3	0	0	29	0	29	0	29	3	29	0
P.H.O.L. - London	39	0	0	0	0	0	39	0	39	0	0	0	0	0	39	0	39	0	39	6	39	0
P.H.O.L. - Orillia	11	0	0	0	0	0	11	1	11	0	0	0	0	0	11	0	11	0	11	3	11	0
P.H.O.L. - Thunder Bay	3	0	0	0	0	0	3	0	3	0	0	0	0	0	3	0	3	0	3	0	3	0
P.H.O.L. - Sudbury	9	0	0	0	0	0	9	0	9	0	0	0	0	0	9	0	9	0	9	1	9	0
P.H.O.L. - Hamilton	19	0	0	0	0	0	19	0	19	0	0	0	0	0	19	0	19	4	19	5	19	0
P.H.O.L. - Peterborough	9	0	0	0	0	0	9	0	9	0	0	0	0	0	9	0	9	0	9	2	9	0
St. Joseph's - Hamilton	218	0	0	0	0	0	212	4	212	0	0	16	0	0	212	2	212	0	212	19	0	0
Province of Ontario	1193	0	0	1	1	0	1187	37	774	0	0	19	0	71	774	13	765	4	774	168	553	6
Province of Manitoba	1291	0	0	0	0	0	1291	2	19	0	0	0	0	0	19	0	79	1	19	1	79	0
Province of Saskatchewan	68	0	0	0	0	0	68	1	73	0	0	1	1	0	73	2	73	0	73	15	73	0
Province of Alberta	1607	0	0	0	0	0	761	2	761	0	1	11	0	0	761	5	761	0	761	155	761	7
Prairies	2966	0	0	0	0	0	2120	5	853	0	1	12	1	0	853	7	913	1	853	171	913	7
British Columbia	930	0	0	0	0	0	930	5	308	0	0	7	0	1	308	3	308	0	302	54	298	0
Yukon	165	0	0	0	0	0	237	2	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.
Northwest Territories	6	0	0	0	0	0	3	0	3	0	0	0	0	0	3	0	3	0	3	0	3	0
Nunavut	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Territories	171	0	0	0	0	0	240	2	3	0	0	0	0	0	3	0	3	0	3	0	3	0
CANADA	7304	0	0	1	1	0	6217	479	2740	1	3	59	1	73	2738	34	2791	6	2585	495	2118	13

The data in the RVDSS report represent surveillance data available at the time of writing. Data missing from the current week are denoted by N.R. Data not collected by reporting lab denoted by N.C.

The reporting laboratory previously listed as CHEO - Ottawa is now listed as EORLA to better reflect data submitted by this provider.

Specimens from Yukon (YT), Northwest Territories (NT) and Nunavut (NU) are sent to reference laboratories in other provinces and reported results reflect specimens identified as originating from YT, NT or NU.

Results from British Columbia comprise of specimens from the following sites: BC Children's and Women's Hospital, Children's and Women's Hospital Laboratory, Fraser Health Medical Microbiology Laboratory, Island Health, Providence Health Care, Powell River Hospital, St. Paul's Hospital, Vancouver General Hospital, Victoria General Hospital, BCCDC Public Health Laboratory, Interior Health Authority sites and Northern Health Authority sites.

Delays in the reporting of data may cause data to change retrospectively.

Influenza co-detections may cause the sum of A(H1)pdm09, A(H3), and A(UnS) positive results to exceed the sum of Total Flu A Positive results.

Table 2: Cumulative respiratory virus detections from August 29, 2021 to September 11, 2021 (surveillance week 2021-35 to 2021-36)

Reporting Laboratory	Flu Tested	A(H1)pdm09 Positive	A(H3) Positive	A(UnS) Positive	Total Flu A Positive	Total Flu B Positive	RSV Tested	RSV Positive	HPIV Tested	HPIV 1 Positive	HPIV 2 Positive	HPIV 3 Positive	HPIV 4 Positive	Other HPIV Positive	ADV Tested	ADV Positive	HMPV Tested	HMPV Positive	EV/RV Tested	EV/RV Positive	HCoV Tested	HCoV Positive
Newfoundland	933	0	0	0	0	0	933	4	933	0	0	1	0	3	933	5	933	0	933	180	N.C.	N.C.
Prince Edward Island	111	0	0	0	0	0	111	0	111	0	0	14	0	0	111	5	111	0	111	38	111	0
Nova Scotia	87	0	0	0	0	0	87	0	74	0	2	6	0	0	74	0	74	0	74	6	74	0
New Brunswick	169	0	0	0	0	0	153	0	115	0	0	1	0	0	108	0	115	0	115	1	115	0
Atlantic	1300	0	0	0	0	0	1284	4	1233	0	2	22	0	3	1226	10	1233	0	1233	225	300	0
Région Nord-Est	666	0	0	0	0	0	153	47	0	0	0	0	0	0	0	0	0	0	N.C.	N.C.	0	0
Québec-Chaudière-Appalaches	58	0	0	0	0	0	112	29	53	0	0	3	0	0	53	1	53	0	N.C.	N.C.	53	0
Centre-du-Québec	51	0	0	0	0	0	53	15	23	0	0	6	0	0	23	0	23	0	N.C.	N.C.	23	0
Montréal-Laval	1316	0	0	1	1	0	1318	556	208	1	0	3	0	0	208	12	208	4	N.C.	N.C.	208	0
Ouest du Québec	69	0	0	0	0	0	69	20	3	0	0	0	0	0	0	0	3	0	N.C.	N.C.	3	0
Montréal-Laval	57	0	0	0	0	0	57	22	0	0	0	0	0	0	0	0	0	0	N.C.	N.C.	0	0
Province of Québec	2217	0	0	1	1	0	1762	689	287	1	0	12	0	0	284	13	287	4	N.C.	N.C.	287	0
P.H.O.L. - Ottawa	569	0	0	0	0	0	569	43	569	0	0	0	0	130	569	20	569	2	569	228	569	16
EORLA	173	0	0	0	0	0	173	4	34	0	0	2	0	0	34	0	0	0	34	6	25	1
P.H.O.L. - Kingston	46	0	0	0	0	0	46	1	46	0	0	0	0	11	46	3	46	0	46	15	46	0
UHN / Mount Sinai Hospital	748	0	0	1	1	0	748	0	26	0	0	0	0	0	26	0	26	0	26	1	26	0
P.H.O.L. - Toronto	281	0	0	0	0	0	281	1	281	0	0	0	0	19	281	1	281	0	281	45	281	0
Sick Kids Hospital - Toronto	28	0	0	0	0	0	0	0	28	0	0	1	0	0	28	0	28	0	28	11	28	0
Sunnybrook & Women's College HSC	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
P.H.O.L. - Sault Ste. Marie	3	0	0	0	0	0	3	0	3	0	0	0	0	0	3	0	3	0	3	0	3	0
P.H.O.L. - Timmins	10	0	0	0	0	0	10	0	10	0	0	0	0	2	10	0	10	0	10	0	10	0
St. Joseph's - London	46	0	0	0	0	0	46	1	46	0	0	4	0	0	46	0	46	0	46	6	46	0
P.H.O.L. - London	64	0	0	0	0	0	64	0	64	0	0	0	0	1	64	0	64	0	64	9	64	0
P.H.O.L. - Orillia	26	0	0	0	0	0	26	1	26	0	0	0	0	0	26	0	26	0	26	8	26	0
P.H.O.L. - Thunder Bay	19	0	0	0	0	0	19	0	19	0	0	0	0	0	19	0	19	0	19	9	19	0
P.H.O.L. - Sudbury	17	0	0	0	0	0	17	0	17	0	0	0	0	0	17	0	17	0	17	2	17	0
P.H.O.L. - Hamilton	24	0	0	0	0	0	24	0	24	0	0	0	0	1	24	0	24	4	24	5	24	0
P.H.O.L. - Peterborough	16	0	0	0	0	0	16	0	16	0	0	0	0	1	16	0	16	0	16	3	16	0
St. Joseph's - Hamilton	430	0	0	0	0	0	424	5	424	0	0	41	0	0	424	2	424	1	424	48	0	0
Province of Ontario	2500	0	0	1	1	0	2466	56	1633	0	0	48	0	165	1633	26	1599	7	1633	396	1200	17
Manitoba	2464	0	0	0	0	0	2464	2	42	0	0	0	0	0	42	1	155	1	42	16	155	0
Province of Saskatchewan	122	0	0	0	0	0	122	1	142	0	0	1	1	0	142	2	142	0	142	34	142	0
Province of Alberta	3222	0	0	1	1	0	1402	3	1402	0	1	20	5	0	1402	8	1402	0	1402	280	1402	15
Prairies	5808	0	0	1	1	0	3988	6	1586	0	1	21	6	0	1586	11	1699	1	1586	330	1699	15
British Columbia	1955	0	0	1	1	0	1955	8	623	0	0	11	0	2	623	4	623	0	613	98	609	2
Yukon	361	0	0	0	0	0	433	2	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.	N.C.
Northwest Territories	13	0	0	0	0	0	9	0	9	0	0	0	0	0	9	1	9	0	9	2	9	0
Nunavut	2	0	0	0	0	0	2	0	2	0	0	0	0	0	2	0	2	0	2	0	2	0
Territories	376	0	0	0	0	0	444	2	11	0	0	0	0	0	11	1	11	0	11	2	11	0
CANADA	14156	0	0	4	4	0	11899	765	5373	1	3	114	6	170	5363	65	5452	12	5076	1051	4106	34

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Delays in the reporting of data may cause data to change retrospectively. Due to these delays, the sum of weekly report totals do not add up to cumulative totals.

Influenza co-detections may cause the sum of A(H1N1)pdm09, A(H3), and A(UnS) positive results to exceed the sum of Total Flu A Positive results.

Figure 2: Number of positive respiratory virus tests reported by participating laboratories in Canada by surveillance week

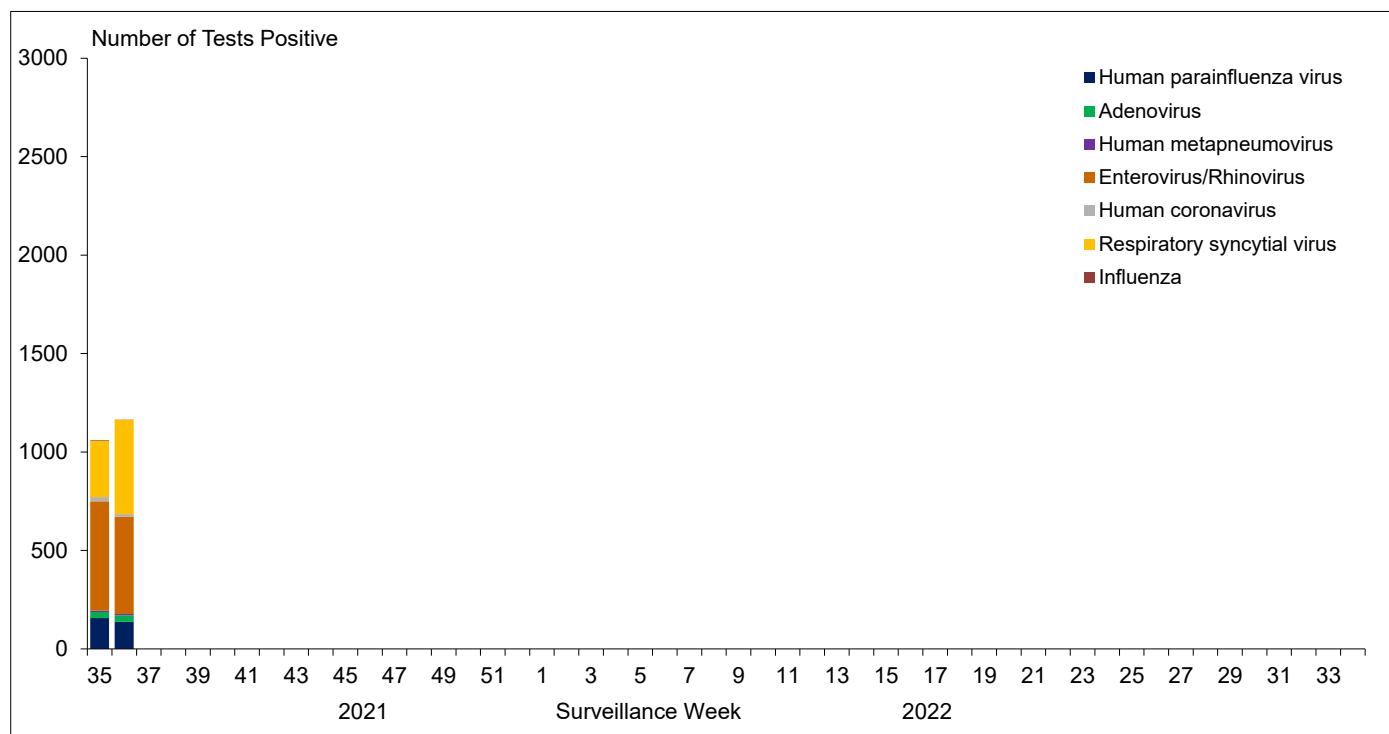


Figure 3: Positive Influenza (Flu) tests (%) in Canada by region by surveillance week

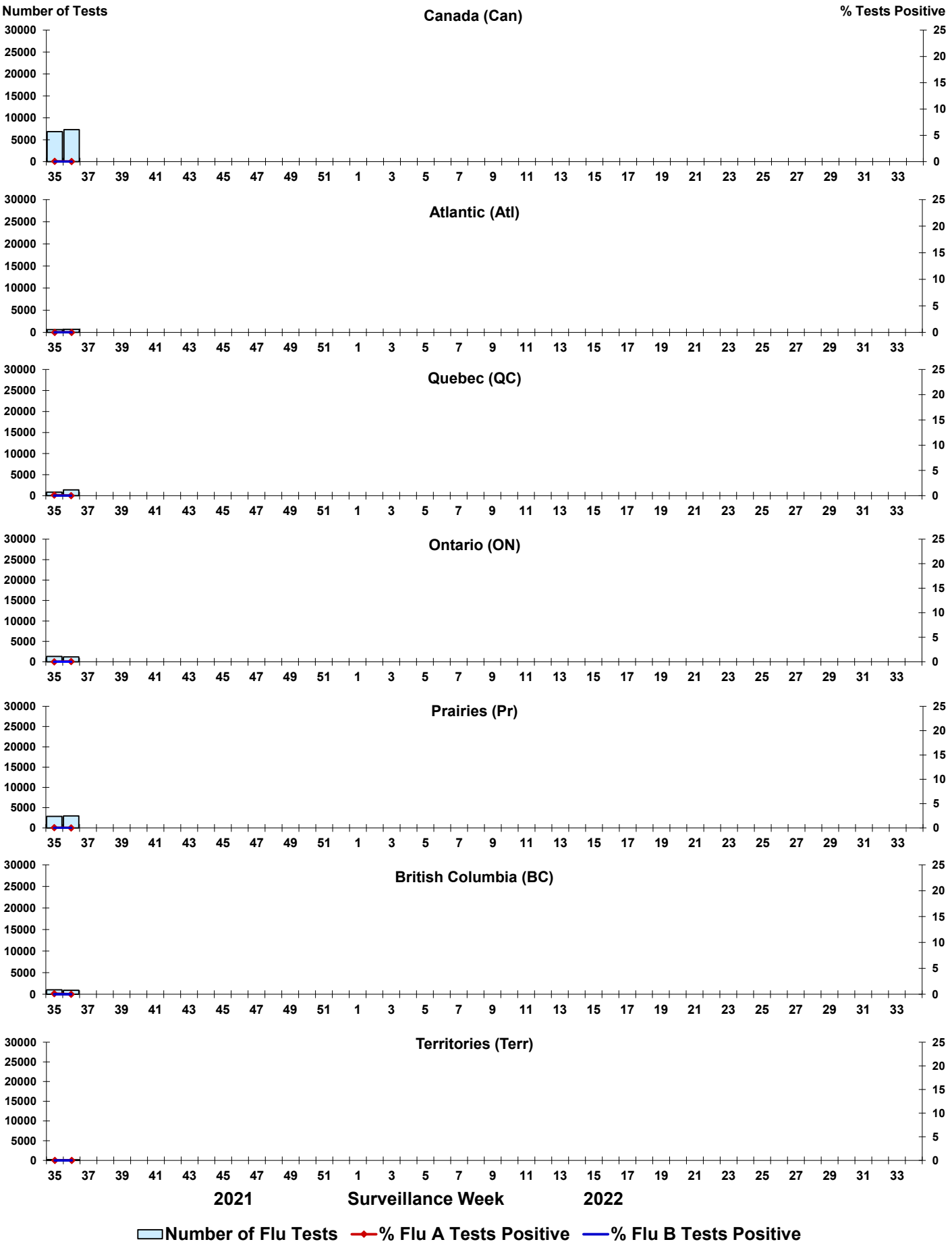


Figure 4: Positive Respiratory syncytial virus (RSV) tests (%) in Canada by region by surveillance week

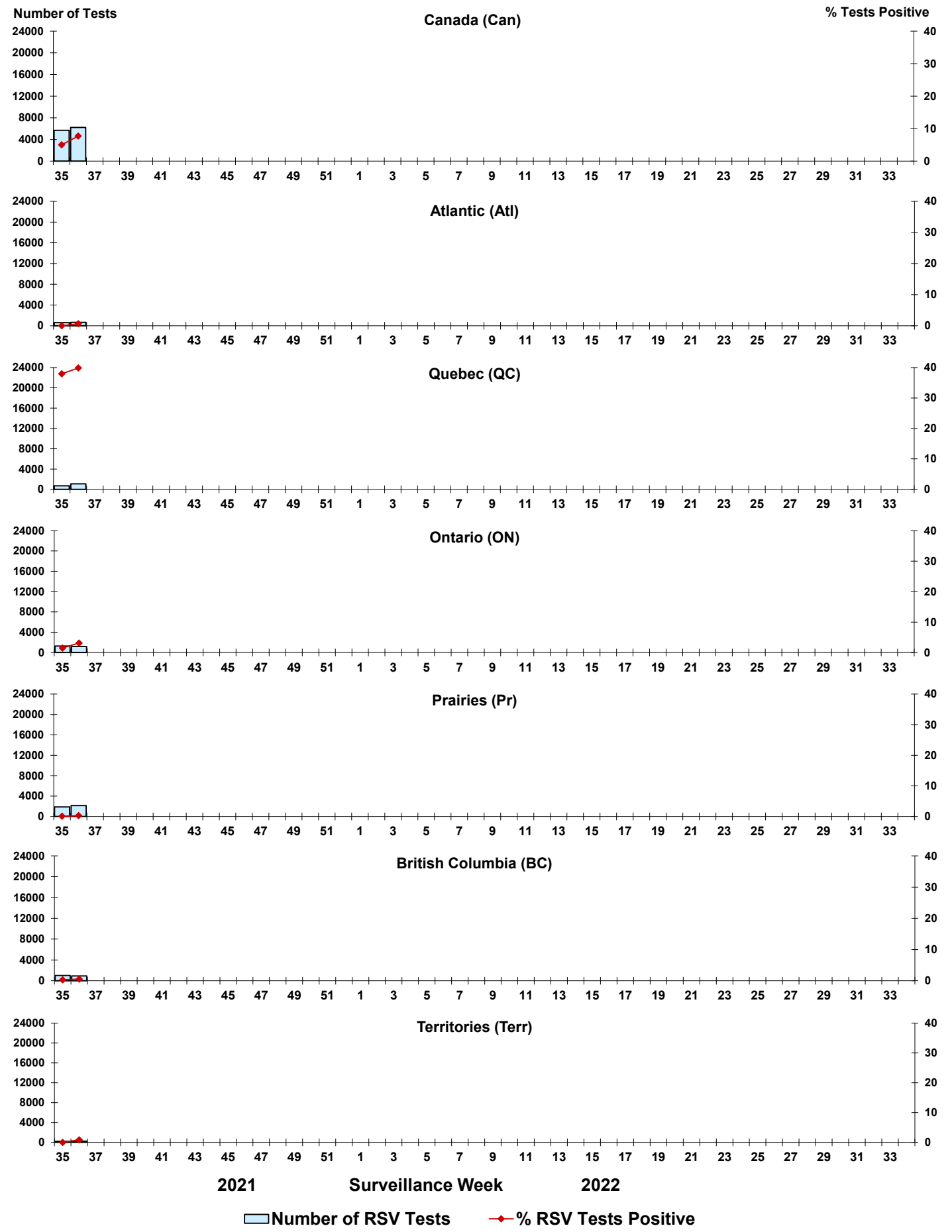


Figure 5: Positive Human parainfluenza virus (HPIV) tests (%) in Canada by region by surveillance week

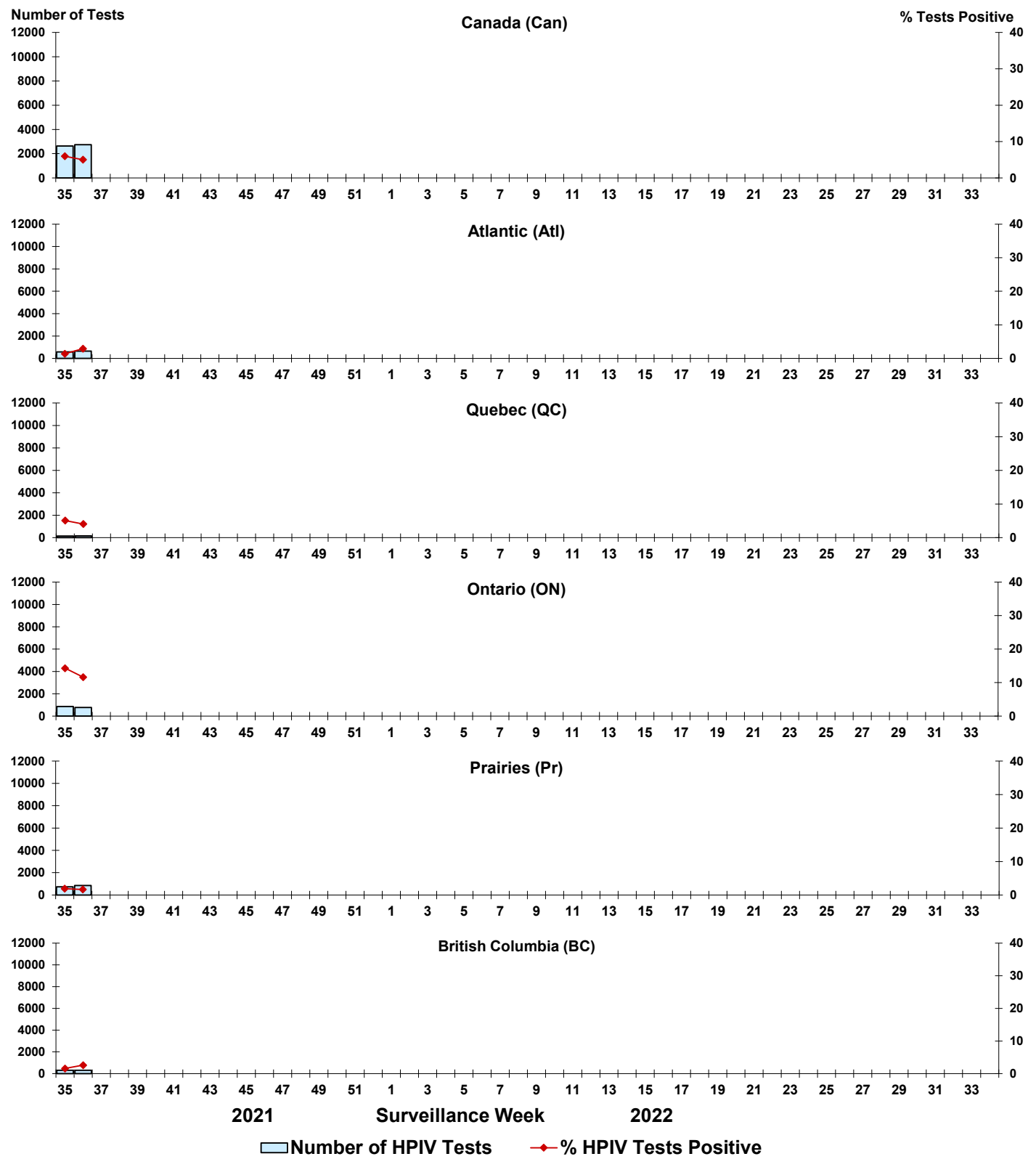


Figure 6: Positive Adenovirus (ADV) tests (%) in Canada by region by surveillance week

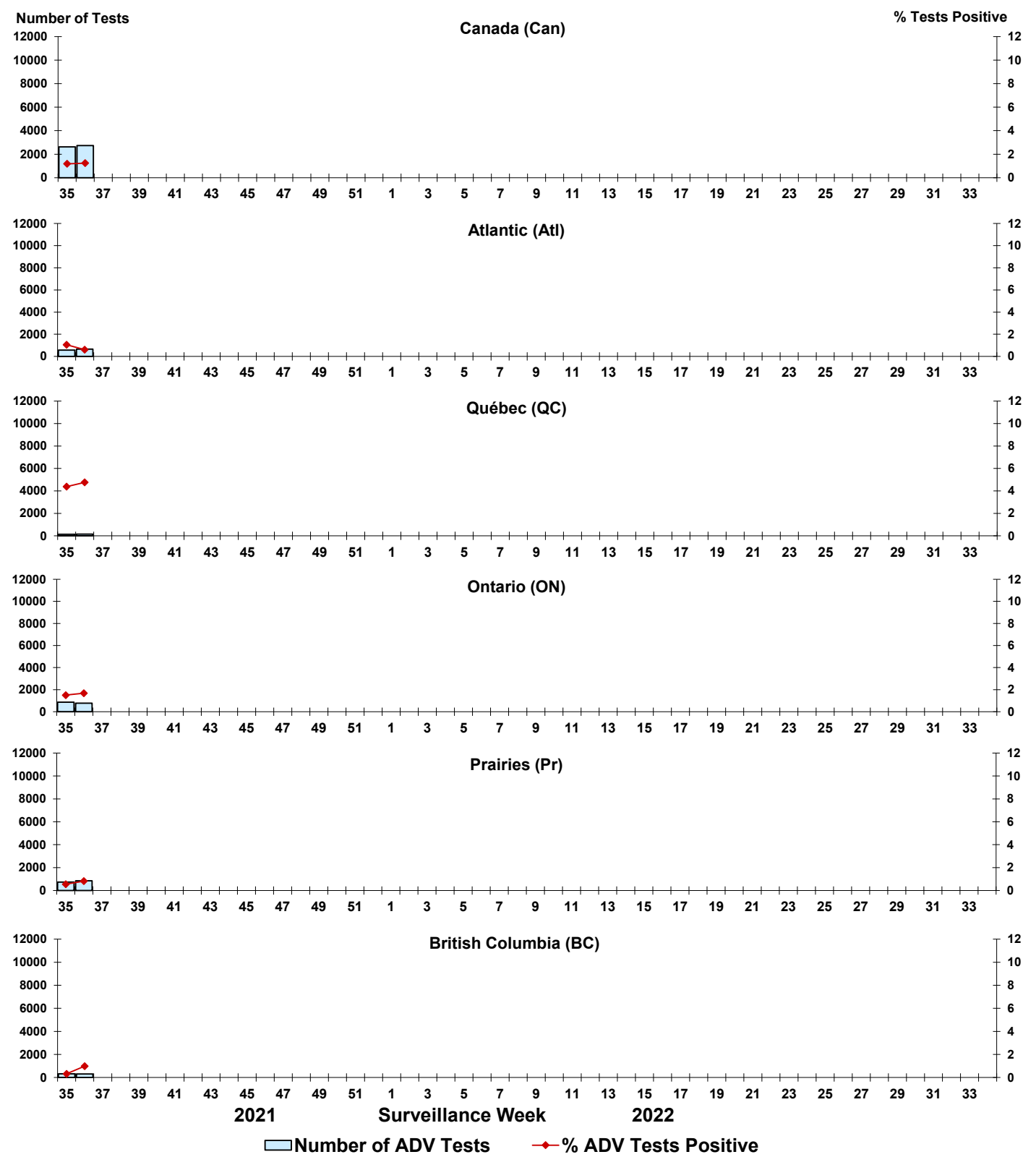


Figure 7: Positive Human metapneumovirus (HMPV) tests (%) in Canada by region by surveillance week

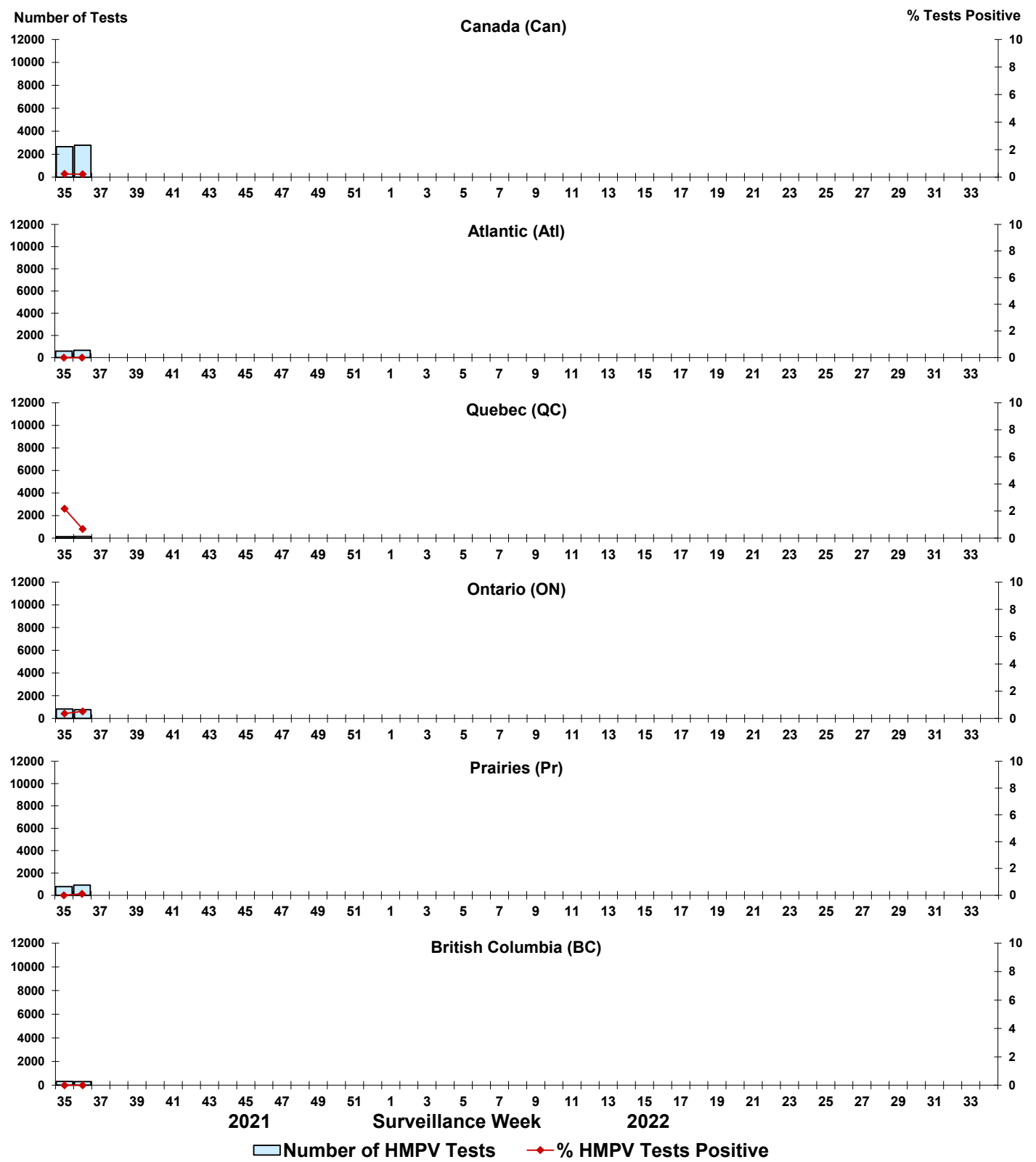


Figure 8: Positive Enterovirus/Rhinovirus (EV/RV) tests (%) in Canada by region by surveillance week

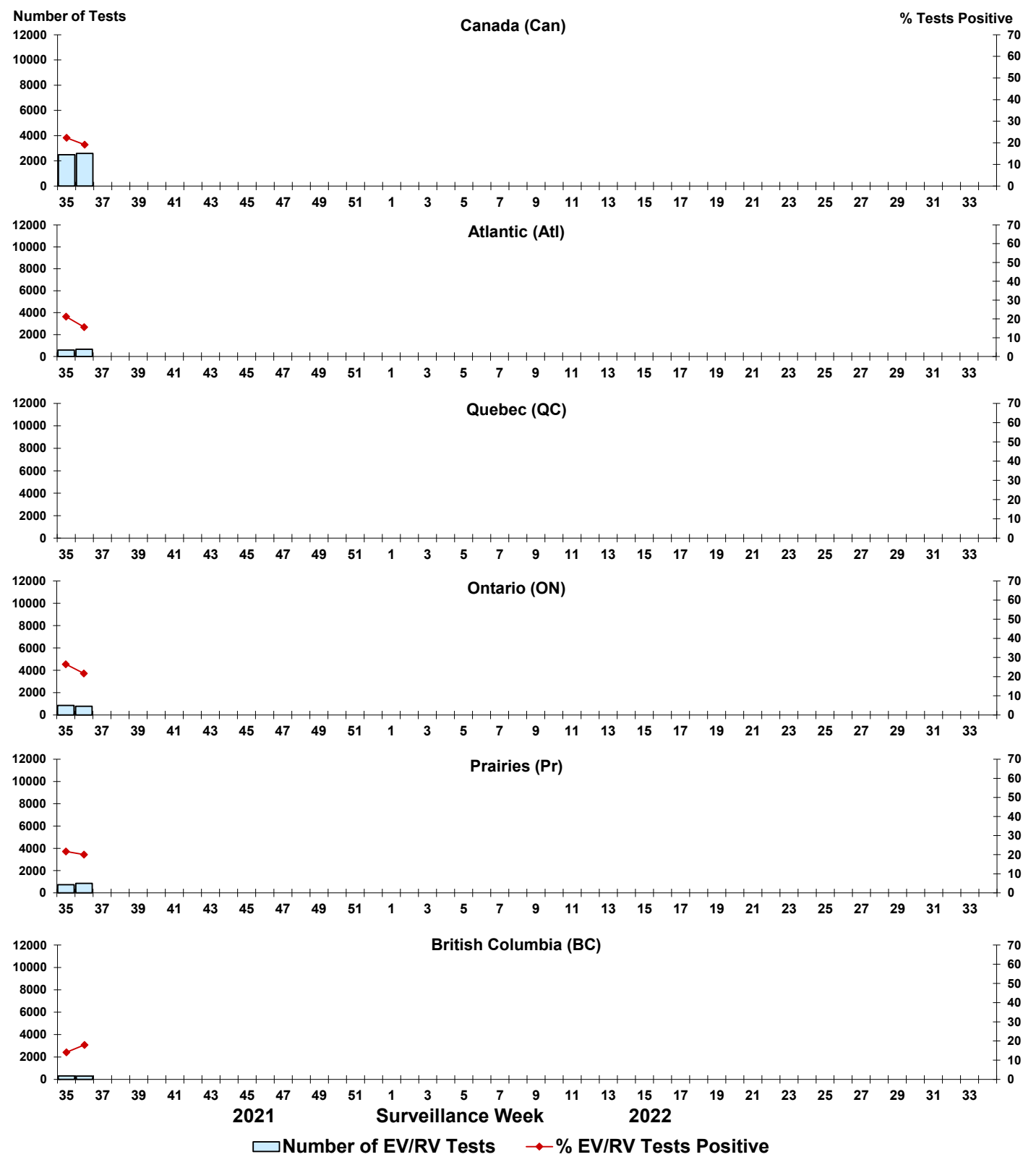


Figure 9: Positive Human coronavirus (HCoV) tests (%) in Canada by region by surveillance week

