

Birth-related Statistics



Birth Introduction

Statistics based on birth events form a crucial part of the demographic profile of communities, regions, provinces, and countries. They are used to derive important indicators of health status, fertility, infant mortality, and population growth. In turn, those indicators are used for health planning, policy formulation, research, and commerce. The tables in this part of the report present birth statistics categorized by maternal characteristics and other related measures. The tables refer only to live births except Table 7 which also includes stillbirths. The mother's usual residence is used to identify geographic location.

Births – General Indicators

Certain birth and parental characteristics that are presented in this section have been shown to be related to the infant's health status or are of general interest. These characteristics include age of mother, age of father, kind of birth (single, twin, or multiple), LHA of usual residence, and mode of delivery.

Table 7 shows the live birth cardinality by mother's age. About 82.0 percent of live births in 2008 were first or second births. Second, third, and subsequent live births tend to have been delivered to progressively older women.

Table 8 shows the number of live births in BC in 2008 by the age of mother and the age of father. It also shows, for each maternal age range, the number of infants born to couples who were not formally married to each other (Out-of-Wedlock).

Over half of the births (50.3 percent) in 2008 were to mothers 30 to 39 years old and 42.4 percent were to mothers in their twenties. Only 3.4 percent were to mothers less than 20 years and 4.0 percent to those 40 or older. For fathers, over half (52.4 percent) were in their thirties, more than a quarter (27.5 percent) were in their twenties, 13.6 percent were in their forties or older and 1.0 percent were less than 20 years old. In 5.5 percent of births, the father's age was not indicated.

Less than one percent (0.8 percent) of births (334) were to couples who were both in their teens; births to couples in which at least one person was a teen, made up 3.6 percent (1,573) of births.

While there were only 110 births (0.2 percent) to mothers age 45 years old and over, 4.2 percent (1,866) of all newborns had fathers in that age group.

Table 9 shows the number of births by birth kind (single, twin, triplet+) according to the mother's age group. In 2008, 4.3 percent of live births to mothers 35 years and older were multiple births; whereas, 2.6 percent of live births to mothers aged 20 to 34 were multiples and teenagers had the lowest proportion (0.8 percent).

In recent decades there has been a gradual increase in multiple birth rates in BC (see Figure 8). The proportions of multiple live births increased from 1.9 percent of all live births in 1986 to 2.9 percent in 2008.

Table 10 shows the 2008 fertility rates in the LHA where the mother resided and by maternal age groups. The table also shows the number of live births to women 15-19 years of age over the five-year period 2003-2007 and the fertility rate for that age group.

In Figure 29 the *Age Specific Fertility Rate* (ASFR) statistics for 15-19 year olds for the five-year period 2003-2007 are shown by LHA. The ASFR is described more fully in the *Glossary* and an example of the calculation method is shown in the *Methodology* section.

Table 11 shows the number and percentage of births in each maternal age group according to their mode of delivery. Generally, the proportion of births that were spontaneous vertex deliveries (which generally require no medical intervention), and to a lesser extent births assisted by vacuum extraction, are higher for younger mothers. On the other hand, deliveries by cesarean section are proportionally higher for older mothers (see also Figure 13).

Cesarean section deliveries in BC increased from 209.58 per 1,000 live births in 1986 to 305.89 in 2008 (see Figure 11).

Table 12 shows live births by the LHA where the mother usually resided and focuses on spontaneous vertex and cesarean section modes of delivery. Spontaneous breech, forceps, and vacuum deliveries are combined into the 'Other' category. The table shows the number and percent of live births that were delivered by cesarean section.

The columns on the right side of the table indicate the total number of live births in 2008 to residents of each LHA and the birth rate per 1,000 population. The LHA with the highest live birth rate was more than five times the rate of the lowest. For more comparisons of cesarean section delivery rates see also Figures 11, 12, and 13.

In Figure 30 the LHAs are grouped by their ratio of observed number of cesarean live births over expected number of cesarean live births for 2008. The figure shows the LHAs in quintiles from those with the highest cesarean ratios (quintile 5) to those with the lowest such rates (quintile 1).

Vital Statistics Information Box

BIRTHS BY MOTHER'S COUNTRY OF BIRTH

BRITISH COLUMBIA, 2008

Area	Province/Country	Births
Canada	Total	29,524
	British Columbia	21,159
	Ontario	2,669
	Alberta	2,483
	Manitoba	858
	Saskatchewan	787
	Quebec	628
	Nova Scotia	282
	Newfoundland & Labrador	229
	New Brunswick	146
	Yukon	75
	Northwest Territories	53
	Prince Edward Island	27
	Nunavut	2
North and Central America	Total	1,256
	United States	700
	Mexico	249
	Other North and Central American Countries	307
South America	Total	326
Europe	Total	2,087
	England	400
	Other United Kingdom	237
	Russia	172
	Germany	169
	Romania	139
	Poland	127
	Ukraine	84
	Netherlands	69
	France	67
	Scandinavian Countries	63
	Other European Countries	560
Asia and the Middle East	Total	9,555
	India	2,849
	China	2,185
	Philippines	1,306
	Vietnam	537
	Korea	469
	Japan	344
	Taiwan	277
	Iran	242
	Hong Kong	233
	Pakistan	231
	Afghanistan	109
	Other Asian and Middle Eastern Countries	773
Africa	Total	547
	South Africa	149
	Other African Countries	398
Oceania	Total	415
	Fiji	217
	Australia	133
	New Zealand	62
	Other Oceanic Countries	3
Unknown	Total	446
Total		44,156

Note: Births consist of live births only. Non-residents are excluded.

TABLE 7
BIRTHS BY AGE OF MOTHER AND LIVE BIRTHS BY BIRTH ORDER
 BRITISH COLUMBIA, 2008

Age of Mother	Birth Order										Total Live Births	Stillbirths	Total Births
	1	2	3	4	5	6	7	8	9+	N.S.			
13	1	-	-	-	-	-	-	-	-	-	1	-	1
14	13	-	-	-	-	-	-	-	-	-	13	1	14
15	42	1	-	-	-	-	-	-	-	-	43	3	46
16	96	2	-	-	-	-	-	-	-	-	98	1	99
17	237	20	2	-	-	-	-	-	-	-	259	6	265
18	362	53	4	-	-	-	-	-	-	-	419	5	424
19	526	112	7	1	1	-	-	-	-	-	647	3	650
20	661	177	41	1	1	-	-	-	-	-	881	14	895
21	725	280	40	6	2	-	-	-	-	-	1,053	8	1,061
22	789	348	68	25	7	-	-	-	-	-	1,237	7	1,244
23	898	486	118	25	3	-	1	-	-	-	1,531	4	1,535
24	1,023	532	166	34	6	3	-	-	-	-	1,764	11	1,775
25	1,064	610	203	66	12	9	-	-	-	-	1,964	19	1,983
26	1,159	768	243	81	13	3	1	-	-	-	2,268	20	2,288
27	1,271	842	294	86	24	8	3	-	1	-	2,529	21	2,550
28	1,369	908	292	100	33	13	2	-	-	-	2,717	32	2,749
29	1,333	969	335	92	24	12	4	1	-	-	2,770	20	2,790
30	1,342	1,068	401	114	30	11	3	3	2	-	2,974	24	2,998
31	1,259	1,180	371	113	42	20	8	3	1	-	2,997	27	3,024
32	1,169	1,114	361	111	42	11	1	3	1	-	2,813	20	2,833
33	1,019	1,148	392	103	25	13	5	2	3	-	2,710	30	2,740
34	892	1,043	372	118	32	21	11	1	4	-	2,494	22	2,516
35	754	955	400	113	26	13	2	1	1	-	2,265	24	2,289
36	622	857	312	102	22	13	3	3	3	-	1,937	20	1,957
37	519	717	307	97	29	17	6	-	3	-	1,695	21	1,716
38	378	575	230	80	27	10	6	-	3	1	1,310	10	1,320
39	291	421	179	72	14	10	9	6	5	-	1,007	19	1,026
40	195	279	110	46	17	8	4	2	5	-	666	9	675
41	127	180	72	24	10	4	1	-	1	-	419	6	425
42	81	121	55	16	11	9	3	2	4	-	302	9	311
43	45	61	33	13	6	2	-	2	2	-	164	5	169
44	32	40	9	7	3	4	1	2	1	-	99	1	100
45	21	13	11	4	-	1	-	-	1	-	51	2	53
45+	17	18	6	2	4	4	-	2	6	-	59	-	59
TOTAL	20,332	15,898	5,434	1,652	466	219	74	33	47	1	44,156	424	44,580
PERCENT	46.0	36.0	12.3	3.7	1.1	0.5	0.2	0.1	0.1	0.0	100.0		

Note: Birth order denotes the number of live births. Total includes unknown gender. Non-residents are excluded. N.S. – Not stated.

TABLE 8
**TOTAL LIVE BIRTHS BY AGE OF FATHER,
 AGE OF MOTHER AND OUT-OF-WEDLOCK**
 BRITISH COLUMBIA, 2008

Age of Father	Age of Mother (in Years)									Total	Percent
	<15	15-19	20-24	25-29	30-34	35-39	40-44	45+	N.S.		
< 15	-	2	1	1	-	1	-	-	-	5	-
15-19	7	325	72	13	4	-	1	-	-	422	1.0
20-24	1	578	1,995	529	95	18	3	-	-	3,219	7.3
25-29	1	159	2,450	4,915	1,187	196	30	1	-	8,939	20.2
30-34	-	37	826	4,235	6,509	1,297	104	5	-	13,013	29.5
35-39	-	17	275	1,414	4,250	3,802	369	10	-	10,137	23.0
40-44	-	11	87	390	1,127	1,834	641	29	-	4,119	9.3
45+	-	9	37	149	396	786	434	55	-	1,866	4.2
N.S.	5	328	723	602	420	280	68	10	-	2,436	5.5
TOTAL	14	1,466	6,466	12,248	13,988	8,214	1,650	110	-	44,156	
Percent	0.0	3.3	14.6	27.7	31.7	18.6	3.7	0.2			100.0
Out-of-Wedlock	11	1,217	3,648	3,323	2,386	1,433	360	27	-	12,405	

Note: Total percentage may not add up to 100 due to rounding.

Out-of-Wedlock - Indicates mother and father of child were not legally married to each other and excludes 1,792 cases where marital status was not stated.

Non-residents are excluded. N.S. - Not stated.

TABLE 9
LIVE BIRTHS BY AGE OF MOTHER AND KIND OF BIRTH
 BRITISH COLUMBIA, 2008

Age of Mother	Kind of Birth				Total
	Single	Twin	Triplets+	N.S.	
< 15	14	-	-	-	14
15-19	1,454	12	-	-	1,466
20-24	6,333	130	3	-	6,466
25-29	11,963	280	5	-	12,248
30-34	13,556	418	14	-	13,988
35-39	7,891	313	10	-	8,214
40-44	1,563	81	6	-	1,650
45 +	92	18	-	-	110
N.S.	-	-	-	-	-
TOTAL	42,866	1,252	38	-	44,156

Note: For the multiple births which include stillbirths, only live births are shown in this table. Triplets+ : included in this column are the live births from multiple births of three or more. Non-residents are excluded. N.S.- Not stated.

Local Health Area	2003–2007 Teenage Fertility Rate (15–19 yrs)			2008 ASFR ¹						TFR ²	
	Observed	ASFR ¹	(p)	15–19	20–24	25–29	30–34	35–39	40–44	Rate	(p)
001 Fernie	29	12.03		10.46	77.50	143.62	79.33	35.56	3.79	1,751.31	
002 Cranbrook	78	18.19	*	25.91	81.25	147.34	76.48	31.21	6.37	1,842.80	*
003 Kimberley	13	11.21		11.45	54.35	161.49	120.17	54.26	3.31	2,025.18	*
004 Windermere	17	12.01		8.70	78.18	77.84	81.87	40.25	5.39	1,461.13	
005 Creston	62	33.53	*	31.58	122.36	190.48	93.22	36.47	5.88	2,399.97	*
006 Kootenay Lake	5	9.80		-	38.46	35.09	93.46	46.73	-	1,068.68	
007 Nelson	29	7.29	*	9.56	48.71	97.44	107.23	64.40	6.71	1,670.27	
009 Castlegar	7	3.58	*	4.60	48.05	128.03	62.50	20.41	-	1,317.91	
010 Arrow Lakes	4	7.60		-	112.90	168.67	65.22	38.17	14.39	1,996.76	
011 Trail	36	10.91		10.56	84.15	147.58	121.41	27.08	8.63	1,997.06	*
012 Grand Forks	25	21.42	*	8.44	78.65	82.80	100.53	18.02	7.04	1,477.41	
013 Kettle Valley	5	12.53		11.49	119.05	133.33	48.19	97.83	-	2,049.47	
014 Southern Okanagan	34	14.58		15.18	95.08	193.33	77.67	30.43	10.64	2,111.69	*
015 Penticton	79	13.13		13.39	65.92	96.77	91.08	47.85	10.75	1,628.85	
016 Keremeos	12	18.87		5.35	119.66	161.62	50.00	13.33	5.46	1,777.10	
017 Princeton	15	23.96	*	27.97	67.57	150.00	76.92	18.02	7.35	1,739.17	
018 Golden	9	8.40		18.78	55.84	90.03	82.73	46.43	7.22	1,505.16	
019 Revelstoke	16	11.59		29.30	49.33	100.00	78.84	28.34	9.97	1,478.88	
020 Salmon Arm	56	10.71		14.36	97.37	139.85	75.50	40.30	8.54	1,879.58	*
021 Armstrong - Spallumcheen	10	6.20	*	22.92	86.36	154.59	170.21	16.13	3.11	2,266.62	*
022 Vernon	122	11.92		14.94	60.98	106.26	89.13	50.21	2.19	1,618.56	
023 Central Okanagan	259	9.85		11.66	48.05	84.82	93.05	48.20	7.02	1,464.04	
024 Kamloops	202	11.18		14.20	53.58	103.47	86.62	36.71	5.90	1,502.38	
025 100 Mile House	31	13.04		13.25	124.56	163.18	99.68	21.11	-	2,108.83	*
026 North Thompson	15	20.52		19.23	92.11	120.37	159.29	28.37	-	2,096.84	
027 Cariboo - Chilcotin	117	24.32	*	26.04	81.80	136.86	95.63	30.23	8.98	1,897.68	*
028 Quesnel	100	23.64	*	31.18	89.31	165.53	79.11	29.29	3.62	1,990.23	*
029 Lillooet	24	32.17	*	44.12	141.59	139.78	120.97	39.47	-	2,429.68	*
030 South Cariboo	38	34.30	*	11.63	124.26	85.11	65.48	32.89	-	1,596.83	
031 Merritt	47	23.61	*	33.41	104.82	124.06	64.72	30.64	2.38	1,800.15	
032 Hope	42	33.63	*	30.65	111.73	169.93	129.41	39.41	14.55	2,478.42	*
033 Chilliwack	286	21.24	*	15.99	82.49	135.68	103.49	42.70	6.06	1,932.01	*
034 Abbotsford	274	11.99		13.11	68.80	127.60	100.53	38.58	6.24	1,774.27	*
035 Langley	153	6.98	*	5.88	39.02	100.73	124.05	53.08	10.35	1,665.56	*
037 Delta	68	3.74	*	2.68	28.50	81.95	122.42	59.34	8.70	1,517.90	
038 Richmond	73	2.44	*	1.37	15.30	57.58	110.83	67.79	10.84	1,318.47	*
040 New Westminster	76	10.72		5.37	33.33	59.09	93.74	63.04	10.63	1,326.01	*
041 Burnaby	156	5.10	*	2.66	21.09	56.14	105.93	66.81	13.29	1,329.61	*
042 Maple Ridge	120	7.94	*	7.07	42.87	109.62	119.56	51.59	10.01	1,703.57	*
043 Coquitlam	156	4.26	*	2.90	22.88	74.84	116.64	59.99	12.79	1,450.24	
044 North Vancouver	59	2.66	*	3.32	14.44	50.86	116.21	71.56	16.14	1,362.67	*
045 West Vancouver-Bowen Is.	27	2.96	*	3.19	7.14	30.72	100.81	60.71	16.60	1,095.84	*
046 Sunshine Coast	37	8.37		16.65	72.58	126.67	120.92	63.39	12.31	2,062.56	*
047 Powell River	41	13.62		10.15	66.67	132.01	91.79	42.47	1.43	1,722.59	*
048 Howe Sound	54	11.39		13.71	58.13	72.77	112.55	67.04	13.99	1,690.97	*
049 Bella Coola Valley	41	69.85	*	66.67	186.67	149.25	86.96	105.26	-	2,974.03	*
050 Queen Charlotte	19	26.43	*	20.98	84.75	97.01	70.06	86.67	5.71	1,825.92	
051 Snow Country	2	28.17		-	333.33	133.33	133.33	43.48	-	3,217.39	
052 Prince Rupert	116	37.81	*	38.87	70.39	130.43	121.07	45.01	7.46	2,066.18	*
053 Upper Skeena	38	34.36	*	20.49	109.09	123.19	84.97	29.94	9.90	1,887.90	
054 Smithers	73	23.09	*	20.93	75.98	179.10	110.13	56.18	3.62	2,229.71	*
055 Burns Lake	33	23.54	*	23.18	73.47	151.79	62.83	37.74	-	1,744.98	
056 Nechako	87	31.67	*	60.98	140.55	146.99	82.04	23.71	9.63	2,319.51	*
057 Prince George	326	18.36	*	23.06	72.83	113.55	97.89	37.25	5.26	1,749.23	*
059 Peace River South	125	25.79	*	25.96	129.45	134.90	88.27	26.84	5.08	2,052.54	*
060 Peace River North	204	34.03	*	39.15	130.43	151.31	112.03	44.48	1.71	2,395.54	*
061 Greater Victoria	257	8.58	*	6.10	22.99	54.83	87.55	49.61	10.50	1,157.93	*
062 Sooke	95	9.34	*	9.80	55.50	136.34	118.00	44.24	7.26	1,855.69	*
063 Saanich	83	8.21	*	4.38	30.97	75.11	112.55	60.42	7.23	1,453.29	
064 Gulf Islands	12	6.76	*	12.11	55.56	102.77	95.56	44.44	9.48	1,599.58	
065 Cowichan	177	17.74	*	16.01	64.16	118.09	111.90	50.36	8.46	1,844.88	*
066 Lake Cowichan	13	13.82		18.69	104.90	77.52	119.05	11.63	-	1,658.91	
067 Ladysmith	54	20.60	*	15.87	83.97	86.39	97.11	31.89	6.49	1,608.66	
068 Nanaimo	232	14.41	*	14.21	52.69	98.97	96.54	42.88	6.62	1,559.60	
069 Qualicum	43	7.95	*	9.99	66.31	114.73	113.24	55.67	4.46	1,821.97	*
070 Alberni	156	30.28	*	32.85	114.75	101.24	93.08	36.71	7.87	1,932.49	*
071 Courtenay	137	13.79	*	6.24	65.26	125.36	90.68	33.42	5.44	1,632.00	
072 Campbell River	132	19.45	*	16.71	71.37	126.77	116.32	41.67	5.45	1,891.44	*
075 Mission	117	15.88	*	12.09	81.71	145.20	102.97	48.69	5.93	1,982.98	*
076 Agassiz - Harrison	44	35.63	*	39.01	96.45	122.27	93.46	43.64	21.28	2,080.48	*
077 Summerland	19	9.75		10.20	35.71	108.91	109.38	40.74	8.06	1,565.05	
078 Enderby	28	22.08	*	22.64	118.56	112.24	154.93	28.57	7.12	2,220.31	*
080 Kitimat	32	15.19		30.15	80.91	94.49	81.18	18.81	4.88	1,552.06	
081 Fort Nelson	49	45.08	*	45.66	148.31	93.98	82.09	29.52	12.93	2,062.47	*
083 Central Coast	20	60.98	*	46.15	161.29	140.00	208.33	44.44	-	3,001.11	*
084 Vancouver Island West	16	42.44	*	70.71	157.89	137.25	183.67	50.00	11.24	3,053.83	*
085 Vancouver Island North	87	38.60	*	47.52	111.82	144.26	72.95	47.90	10.92	2,176.85	*
087 Stikine	2	11.90		50.00	-	32.26	55.56	-	-	689.07	*
088 Terrace	114	29.75	*	35.39	127.09	144.25	91.22	25.17	4.99	2,140.52	*
092 Nisga'a	30	74.63	*	101.27	196.08	173.08	125.00	43.48	-	3,194.50	*
094 Telegraph Creek	3	17.54		50.00	151.52	250.00	45.45	71.43	-	2,841.99	
161 Vancouver - City Centre	23	3.88	*	1.76	8.77	20.76	50.38	41.76	15.43	694.27	*
162 Vancouver - Downtown E.side	80	16.45	*	9.67	23.23	28.06	51.25	46.41	14.51	865.64	*
163 Vancouver - North East	84	5.72	*	6.03	23.37	53.32	101.73	72.82	13.36	1,353.12	*
164 Vancouver - Westside	22	1.15	*	1.54	4.58	27.13	85.13	75.85	15.79	1,050.08	*
165 Vancouver - Midtown	63	6.43	*	4.64	23.11	51.95	96.03	70.87	17.86	1,322.27	*
166 Vancouver - South	100	4.64	*	6.01	24.43	60.16	104.17	68.99	11.37	1,375.63	*
201 Surrey	595	10.11		8.85	63.62	118.98	113.32	51.83	8.99	1,827.94	*
202 South Surrey/White Rock	27	2.31	*	2.76	17.19	56.29	116.33	62.47	9.34	1,321.89	*
PROVINCIAL TOTAL	7,137	10.61		10.58	44.23	82.37	99.28	53.29	9.84	1,497.95	

Notes for this table follow the map.

FIGURE 29
LIVE BIRTH TEENAGE FERTILITY RATES BY LOCAL HEALTH AREA
 BRITISH COLUMBIA, 2003-2007

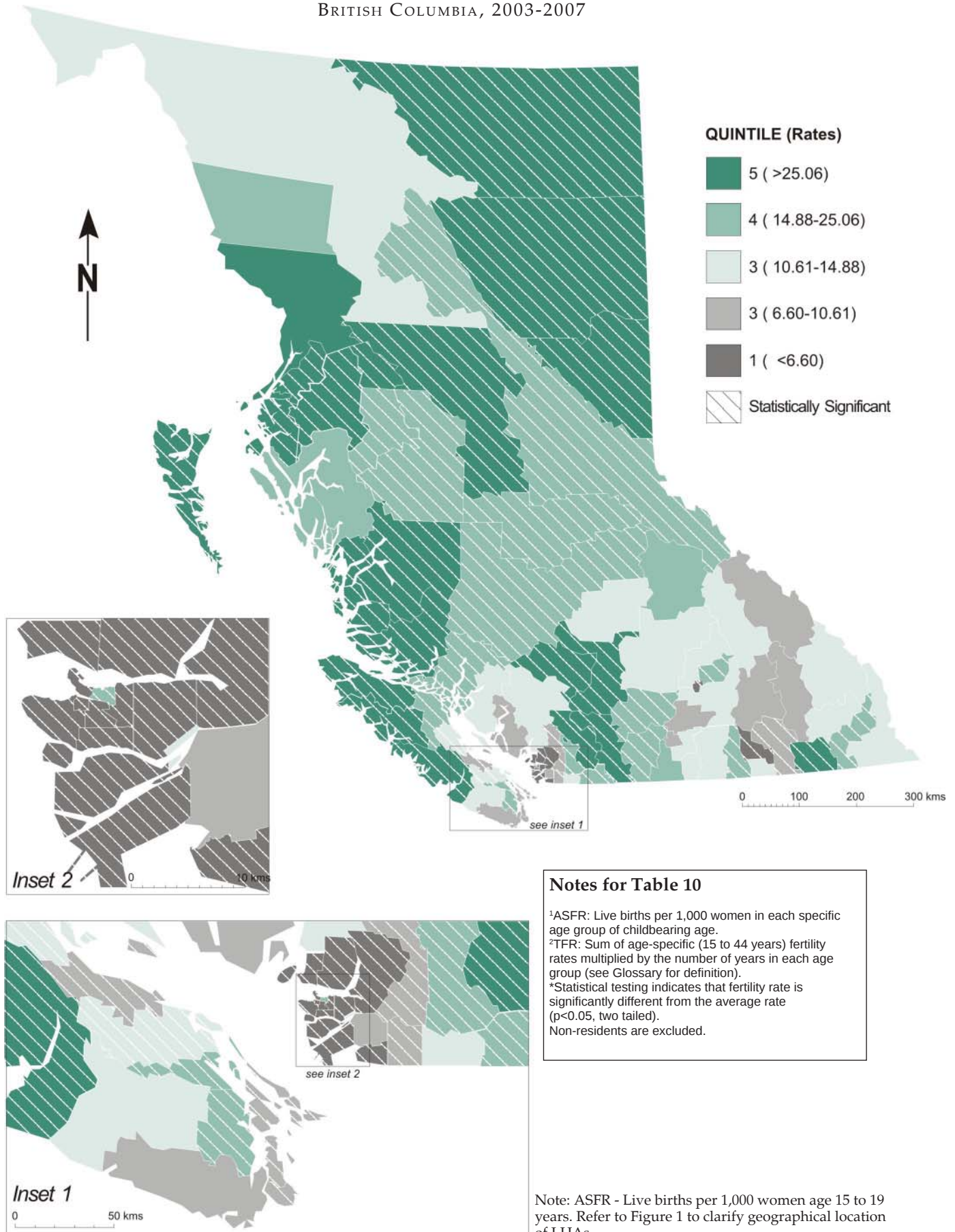


TABLE 11
LIVE BIRTHS BY MODE OF DELIVERY AND AGE OF MOTHER
 BRITISH COLUMBIA, 2008

Mode of Delivery	Age of Mother (in Years)									Total
	<15	15-19	20-24	25-29	30-34	35-39	40-44	45+	N.S.	
Spontaneous vertex	13	1,061	4,283	7,581	8,108	4,362	767	39	-	26,214
Percent	92.9	72.4	66.2	61.9	58.0	53.1	46.5	35.5	-	59.4
Spontaneous breech	-	1	17	32	40	33	6	-	-	129
Percent	0.0	0.1	0.3	0.3	0.3	0.4	0.4	0.0	-	0.3
Forceps	-	35	209	391	509	290	47	2	-	1,483
Percent	0.0	2.4	3.2	3.2	3.6	3.5	2.8	1.8	-	3.4
Vacuum	1	119	460	835	878	434	89	4	-	2,820
Percent	7.1	8.1	7.1	6.8	6.3	5.3	5.4	3.6	-	6.4
First cesarean	-	233	1,138	2,246	2,619	1,610	402	41	-	8,289
Percent	0.0	15.9	17.6	18.3	18.7	19.6	24.4	37.3	-	18.8
Repeat cesarean	-	17	358	1,162	1,834	1,484	339	24	-	5,218
Percent	0.0	1.2	5.5	9.5	13.1	18.1	20.5	21.8	-	11.8
N.S.	-	-	1	1	-	1	-	-	-	3
TOTAL	14	1,466	6,466	12,248	13,988	8,214	1,650	110	-	44,156
Percent	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	-	100.0

Note: Breech presentations may be coded to forceps, vacuum, first cesarean or repeat cesarean mode of delivery, as well as spontaneous breech. Total percentage may not add up to 100 due to rounding. Non-residents are excluded. N.S. - Not stated.



Vital Statistics Information Box

PLACE OF BIRTH FOR MIDWIFE ASSISTED BIRTHS

BRITISH COLUMBIA, 2004-2008

The College of Midwives of British Columbia was established in 1995 and the first midwives were registered to practice in 1998. The Vital Statistics Agency implemented procedures to identify births delivered by registered midwives in 1998, and, by 1999, could identify all midwife assisted births. The table below shows the place of birth for midwife assisted births in the province from 2004 to 2008.

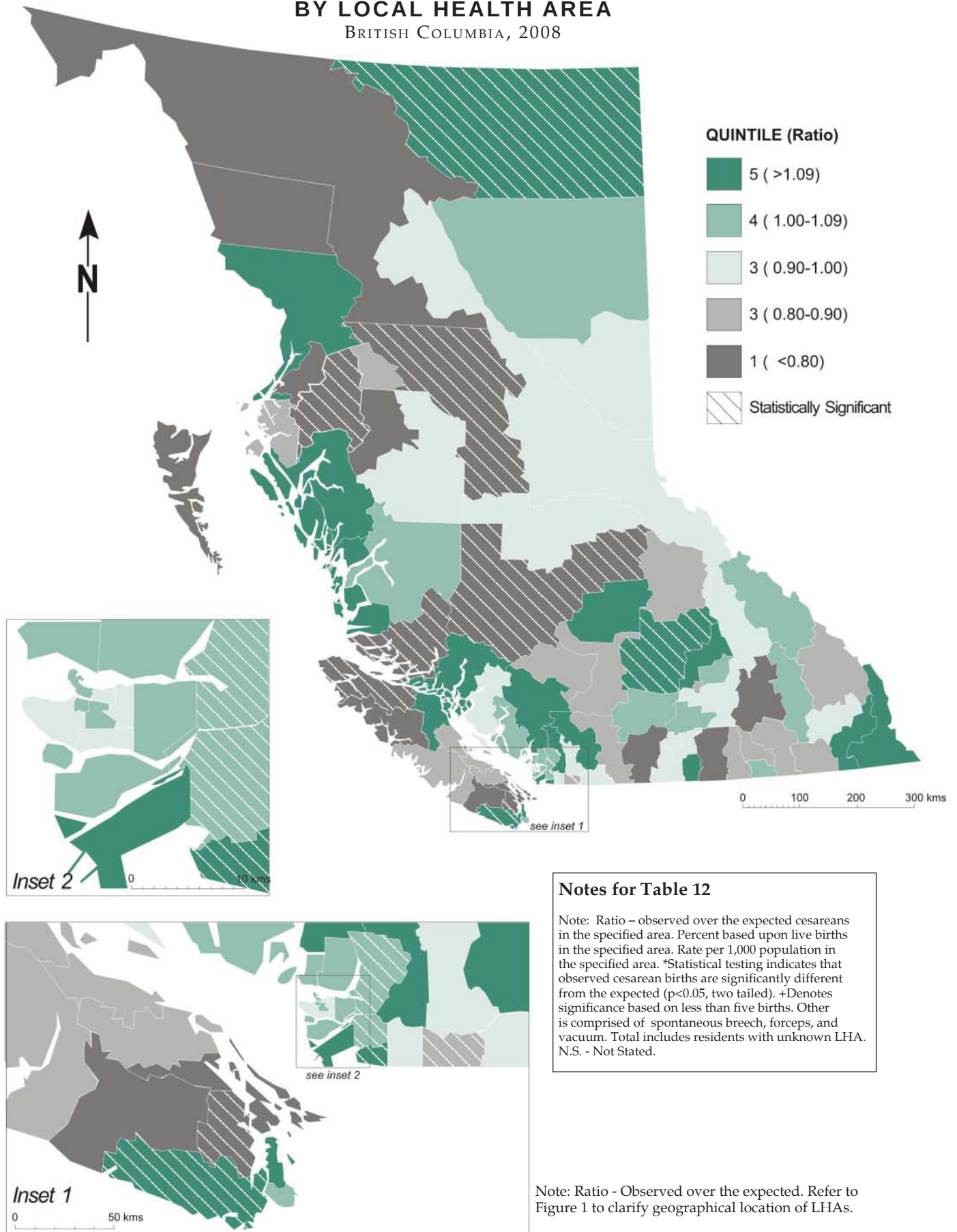
Place of Birth	2004		2005		2006		2007		2008	
	No.	%	No.	%	No.	%	No.	%	No.	%
Hospital	1,167	69.3	1,506	70.8	1,762	74.0	2,055	75.5	2,512	76.1
Home	462	27.5	475	22.3	223	9.4	651	23.9	722	21.9
Other & unknown*	54	3.2	146	6.9	395	16.6	15	0.6	67	2.0
Midwife Assisted Births	1,683	100.0	2,127	100.0	2,380	100.0	2,721	100.0	3,301	100.0
Percent of Total Births Delivered by Registered Midwives		4.2		5.2		5.7		6.3		7.5

Note: *Other and unknown includes birthing clinics.

44		Spontaneous	Cesarean						Other	N.S.	Total Live Births	
Local Health Area			Vertex	First	Repeat	Total	Expected	Ratio (p)			Percent	Number
001	Fernie	74	24	25	49	44.97	1.09	33.3	24	-	147	10.01
002	Cranbrook	168	59	32	91	81.67	1.11	34.1	8	-	267	10.50
003	Kimberley	55	17	6	23	25.08	0.92	28.0	4	-	82	9.85
004	Windermere	64	14	12	26	29.37	0.89	27.1	6	-	96	9.03
005	Creston	81	17	12	29	35.79	0.81	24.8	7	-	117	9.38
006	Kootenay Lake	12	1	5	6	5.81	1.03	31.6	1	-	19	5.22
007	Nelson	178	49	13	62	75.86	0.82	25.0	8	-	248	9.97
009	Castlegar	60	20	3	23	26.92	0.85	26.1	5	-	88	6.64
010	Arrow Lakes	26	3	3	6	10.40	0.58	17.6	2	-	34	7.17
011	Trail	107	33	26	59	56.28	1.05	32.1	18	-	184	9.48
012	Grand Forks	37	6	8	14	16.52	0.85	25.9	3	-	54	6.05
013	Kettle Valley	21	1	4	5	8.26	0.61	18.5	1	-	27	7.52
014	Southern Okanagan	73	28	22	50	44.97	1.11	34.0	24	-	147	7.53
015	Penticton	220	64	33	97	107.06	0.91	27.7	33	-	350	8.51
016	Keremeos	24	6	5	11	11.93	0.92	28.2	4	-	39	6.78
017	Princeton	21	2	2	4	8.26	0.48	14.8	2	-	27	5.65
018	Golden	43	15	11	26	24.78	1.05	32.1	12	-	81	10.77
019	Revelstoke	45	13	6	19	21.11	0.90	27.5	5	-	69	8.71
020	Salmon Arm	169	57	39	96	87.18	1.10	33.7	20	-	285	8.24
021	Armstrong - Spallumcheen	60	9	15	24	29.37	0.82	25.0	12	-	96	10.15
022	Vernon	350	106	61	167	170.99	0.98	29.9	42	-	559	8.64
023	Central Okanagan	952	292	207	499	492.18	1.01	31.0	158	-	1,609	8.94
024	Kamloops	607	230	140	370	319.05	1.16	35.5	66	-	1,043	9.55
025	100 Mile House	72	29	13	42	36.40	1.15	35.3	5	-	119	8.14
026	North Thompson	32	7	4	11	13.77	0.80	24.4	2	-	45	10.41
027	Cariboo - Chilcotin	202	31	35	66	92.38	0.71	21.9	34	-	302	11.35
028	Quesnel	158	43	35	78	79.53	0.98	30.0	24	-	260	11.14
029	Lillooet	39	10	4	14	17.13	0.82	25.0	3	-	56	12.85
030	South Cariboo	37	8	5	13	15.91	0.82	25.0	2	-	52	7.26
031	Merritt	74	16	21	37	35.48	1.04	31.9	5	-	116	10.03
032	Hope	62	16	8	24	27.22	0.88	27.0	3	-	89	11.04
033	Chilliwack	630	161	117	278	301.92	0.92	28.2	79	-	987	11.84
034	Abbotsford	1,024	262	196	458	524.30	0.87	26.7	232	-	1,714	12.77
035	Langley	862	238	178	416	428.86	0.97	29.7	124	-	1,402	11.02
037	Delta	472	159	132	291	261.23	1.11	34.1	91	-	854	8.52
038	Richmond	988	307	224	531	522.16	1.02	31.1	187	1	1,707	9.03
040	New Westminster	356	143	75	218	203.11	1.07	32.8	90	-	664	10.42
041	Burnaby	1,290	474	268	742	690.40	1.07	32.9	225	-	2,257	10.34
042	Maple Ridge	560	200	135	335	303.45	1.10	33.8	97	-	992	10.83
043	Coquitlam	1,155	440	254	694	637.48	1.09	33.3	235	-	2,084	9.86
044	North Vancouver	682	234	157	391	370.13	1.06	32.3	137	-	1,210	8.89
045	West Vancouver-Bowen Is.	141	46	30	76	73.11	1.04	31.8	22	-	239	4.71
046	Sunshine Coast	144	51	27	78	74.94	1.04	31.8	23	-	245	8.39
047	Powell River	82	22	19	41	42.21	0.97	29.7	14	1	138	6.99
048	Howe Sound	281	106	55	161	146.83	1.10	33.5	38	-	480	14.35
049	Bella Coola Valley	31	8	6	14	14.07	0.99	30.4	1	-	46	16.80
050	Queen Charlotte	33	4	7	11	15.60	0.71	21.6	6	1	51	10.63
051	Snow Country	4	2	1	3	2.14	1.40	42.9	-	-	7	13.41
052	Prince Rupert	114	29	19	48	54.45	0.88	27.0	16	-	178	12.46
053	Upper Skeena	43	12	4	16	18.35	0.87	26.7	1	-	60	11.17
054	Smithers	140	30	20	50	62.71	0.80	24.4	15	-	205	12.91
055	Burns Lake	46	16	7	23	24.17	0.95	29.1	10	-	79	10.28
056	Nechako	162	22	21	43	65.77	0.65	20.0	10	-	215	14.42
057	Prince George	756	215	109	324	350.86	0.92	28.2	67	-	1,147	11.91
059	Peace River South	223	56	39	95	105.23	0.90	27.6	26	-	344	12.73
060	Peace River North	381	116	79	195	184.15	1.06	32.4	26	-	602	18.08
061	Greater Victoria	1,118	364	209	573	552.44	1.04	31.7	115	-	1,806	8.20
062	Sooke	453	171	102	273	235.54	1.16	35.5	44	-	770	11.83
063	Saanich	232	89	50	139	118.38	1.17	35.9	16	-	387	6.09
064	Gulf Islands	66	16	5	21	29.06	0.72	22.1	8	-	95	6.19
065	Cowichan	409	65	51	116	169.77	0.68	20.9	30	-	555	9.84
066	Lake Cowichan	32	4	7	11	14.07	0.78	23.9	3	-	46	7.37
067	Ladysmith	96	18	11	29	40.99	0.71	21.6	9	-	134	7.33
068	Nanaimo	595	163	91	254	283.87	0.89	27.4	79	-	928	9.17
069	Qualicum	174	40	33	73	82.90	0.88	26.9	24	-	271	6.02
070	Alberni	201	56	28	84	103.09	0.81	24.9	52	-	337	10.77
071	Courtenay	330	87	43	130	153.25	0.85	25.9	41	-	501	7.92
072	Campbell River	229	90	60	150	127.86	1.17	35.9	39	-	418	10.15
075	Mission	318	79	66	145	156.01	0.93	28.4	47	-	510	12.30
076	Agassiz - Harrison	58	20	15	35	29.37	1.19	36.5	3	-	96	10.75
077	Summerland	43	11	10	21	21.72	0.97	29.6	7	-	71	6.14
078	Enderby	49	10	15	25	24.78	1.01	30.9	7	-	81	10.38
080	Kitimat	51	22	12	34	27.84	1.22	37.4	6	-	91	8.91
081	Fort Nelson	53	25	19	44	31.51	1.40	42.7	6	-	103	15.99
083	Central Coast	20	7	4	11	9.79	1.12	34.4	1	-	32	20.96
084	Vancouver Island West	23	4	4	8	11.01	0.73	22.2	5	-	36	15.26
085	Vancouver Island North	100	17	13	30	44.97	0.67	20.4	17	-	147	12.26
087	Stikine	3	-	-	-	1.22	-	-	1	-	4	3.93
088	Terrace	186	30	21	51	79.23	0.64	19.7	22	-	259	12.76
092	Nisga'a	28	5	2	7	11.32	0.62	18.9	2	-	37	19.90
094	Telegraph Creek	10	1	-	1	3.36	0.30	9.1	-	-	11	17.52
161	Vancouver - City Centre	512	229	79	308	297.33	1.04	31.7	152	-	972	8.36
162	Van. - Downtown Eastside	275	92	37	129	137.65	0.94	28.7	46	-	450	7.35
163	Vancouver - North East	661	196	110	306	340.46	0.90	27.5	146	-	1,113	10.76
164	Vancouver - Westside	651	214	123	337	348.41	0.97	29.6	151	-	1,139	8.69
165	Vancouver - Midtown	590	236	88	324	321.49	1.01	30.8	137	-	1,051	12.35
166	Vancouver - South	764	238	143	381	407.14	0.94	28.6	186	-	1,331	10.03
201	Surrey	2,848	995	693	1,688	1,593.40	1.06	32.4	673	-	5,209	14.04
202	South Surrey/White Rock	307	116	80	196	166.71	1.18	36.0	42	-	545	6.64
PROVINCIAL TOTAL		26,214	8,289	5,218	13,507	13,507.00	1.00	30.6	4,432	3	44,156	10.08

Notes for this table follow the map.

FIGURE 30
**CESAREAN DELIVERIES OF LIVE BORN INFANTS
 BY LOCAL HEALTH AREA**
 BRITISH COLUMBIA, 2008



Births – Birth Weight

Birth weight is recognized as a primary indicator of newborn health not only in BC and Canada but worldwide. It is also an important predictor of subsequent health and well being, as well as disability and death, among newborn infants. In BC a baby is weighed (in grams) immediately after birth, and that weight is used as one of the diagnostic indicators of fetal growth.

The following tables show birth weight categorized by other indicators related to birth weight, such as gender, gestational age, and maternal age.

Babies born at term (37 to 41 weeks) and between 2,500 and 4,499 grams have been shown to have the most favourable prospects for good health and Table 13 indicates that 38,987 births or 88.3 percent of all live births in 2008 were in that category. There were 3,385 pre-term births (less than 37 weeks) which accounted for 7.7 percent of all live births.

Table 14 shows the number of live births to residents of BC in 2008 according to maternal age group and infant birth weight category. By far, most of the babies in each age group had healthy weights (from 2,500 to 4,499 grams).

Table 14 shows that mothers in the mid-age categories had the largest proportions of healthy weight babies and the lowest proportions of LBW babies (weighing less than 2,500 grams).

Table 15 displays the number and percent of LBW babies by gender according to the mother's age group. Female babies have a higher rate of LBW (56.62 per 1,000 female live births) than males (52.27 per 1,000 male live births).

Figure 31 graphically shows the pattern of LBW by maternal age groups. Women in the middle age groups had the lowest rates of LBW babies in 2008 with increasing rates in subsequent age groups. Older mothers not only have increased rates of LBW babies but the rate among older mothers has shown an increasing trend since 1986 as indicated in Figure 10.

Table 16 shows the incidence of LBW babies in the period 2003 to 2007 and the year 2008, stratified by the LHA of maternal residence for the whole province. As well as the incidence of such births, the 2003 to 2007 portion of the table shows the LBW rate per 1,000 live births and the ratio of the observed and expected number of LBW births in the LHA.

There were 16 LHAs with ratios that were statistically significant. Of these, 7 were high. The 2008 data show the incidence figures broken down by three categories of gestational age of the newborn, the total number of LBW births, and the rate. In some LHAs the number of LBW babies was quite low in 2008, so the rates should be viewed with caution.

Figure 32 shows BC LHAs displayed in five levels according to the 2003-2007 observed versus expected LBW ratio. High ratios, (Quintile 5, deep green colour) mean that an LHA had quite a high ratio in the years 2003-2007. At the other extreme, the areas shown as dark grey have a relatively low ratio.

TABLE 13
LIVE BIRTHS BY BIRTH WEIGHT, GENDER, AND GESTATIONAL AGE
 BRITISH COLUMBIA, 2008

Birth Weight (in Grams)	Gender		Gestational Age (in Weeks)						Total
	Male	Female	<20	20-27	28-36	37-41	42+	N.S.	
<500	13	13	2	23	-	1	-	-	26
500-749	28	33	-	56	5	-	-	-	61
750-999	28	30	-	39	19	-	-	-	58
1,000-1,249	44	44	-	27	61	-	-	-	88
1,250-1,499	60	67	-	3	122	2	-	-	127
1,500-1,749	96	85	-	-	174	7	-	-	181
1,750-1,999	148	160	-	-	286	22	-	-	308
2,000-2,249	259	227	-	1	372	113	-	-	486
2,250-2,499	514	552	-	-	580	485	1	-	1,066
2,500-2,749	925	1,201	-	1	596	1,529	-	-	2,126
2,750-2,999	1,881	2,362	-	-	460	3,774	9	-	4,243
3,000-3,249	3,326	3,794	-	-	302	6,801	17	-	7,120
3,250-3,499	4,249	4,537	-	-	156	8,599	31	-	8,786
3,500-3,749	4,388	3,691	-	1	54	7,984	40	-	8,079
3,750-3,999	3,280	2,440	-	-	32	5,635	53	-	5,720
4,000-4,249	1,927	1,307	-	-	9	3,189	36	-	3,234
4,250-4,499	965	539	-	-	2	1,476	26	-	1,504
4,500-4,749	394	201	-	-	1	580	14	-	595
4,750-4,999	156	62	-	-	1	210	7	-	218
5,000-5,249	46	16	-	-	-	61	1	-	62
5,250-5,499	13	3	-	-	-	16	-	-	16
5,500+	5	3	-	-	-	8	-	-	8
N.S.	23	21	-	-	-	-	-	44	44
TOTAL	22,768	21,388	2	151	3,232	40,492	235	44	44,156

Note: Non-residents are excluded. N.S. – Not stated.



TABLE 14
LIVE BIRTHS BY BIRTH WEIGHT AND AGE OF MOTHER
 BRITISH COLUMBIA, 2008

Birth Weight (in Grams)	Age of Mother (in Years)									Total
	<15	15-19	20-24	25-29	30-34	35-39	40-44	45+	N.S.	
<500	-	-	4	3	9	9	1	-	-	26
500-749	-	1	11	9	19	17	4	-	-	61
750-999	-	1	8	12	21	14	2	-	-	58
1,000-1,249	-	3	13	25	24	20	3	-	-	88
1,250-1,499	-	4	17	25	38	34	8	1	-	127
1,500-1,749	1	5	20	45	63	34	10	3	-	181
1,750-1,999	-	7	45	71	94	69	19	3	-	308
2,000-2,249	-	17	76	111	154	95	31	2	-	486
2,250-2,499	-	32	164	274	320	216	57	3	-	1,066
2,500-2,749	-	66	320	561	706	371	93	9	-	2,126
2,750-2,999	2	132	649	1,233	1,254	799	161	13	-	4,243
3,000-3,249	4	236	1,042	1,963	2,258	1,333	264	20	-	7,120
3,250-3,499	1	299	1,229	2,486	2,831	1,597	322	21	-	8,786
3,500-3,749	3	280	1,242	2,236	2,516	1,501	289	12	-	8,079
3,750-3,999	1	205	854	1,586	1,830	1,045	190	9	-	5,720
4,000-4,249	2	107	438	900	1,038	628	113	8	-	3,234
4,250-4,499	-	47	222	439	492	256	47	1	-	1,504
4,500-4,749	-	18	77	163	207	105	22	3	-	595
4,750-4,999	-	4	22	66	69	45	10	2	-	218
5,000-5,249	-	2	7	18	20	14	1	-	-	62
5,250-5,499	-	-	3	2	8	3	-	-	-	16
5,500+	-	-	1	3	2	2	-	-	-	8
N.S.	-	-	2	17	15	7	3	-	-	44
Low	1	70	358	575	742	508	135	12	-	2,401
Percent	7.1	4.8	5.5	4.7	5.3	6.2	8.2	10.9	-	5.4
Healthy	13	1,372	5,996	11,404	12,925	7,530	1,479	93	-	40,812
Percent	92.9	93.6	92.7	93.1	92.4	91.7	89.6	84.6	-	92.4
High	-	24	110	252	306	169	33	5	-	899
Percent	-	1.6	1.7	2.1	2.2	2.1	2.0	4.6	-	2.0
TOTAL	14	1,466	6,466	12,248	13,988	8,214	1,650	110	-	44,156

Note: Low birth weight <2,500 grams. Healthy birth weight 2,500 to 4,499 grams. High birth weight 4,500+ grams. Percent of age category in birth weight group. Non-residents are excluded. N.S. - Not stated.



TABLE 15
LOW BIRTH WEIGHT LIVE BIRTHS BY AGE OF MOTHER AND GENDER
 BRITISH COLUMBIA, 2008

Age of Mother	Male		Female		Total		
	Number	Percent	Number	Percent	Number	Percent	Rate
< 15	1	0.1	-	-	1	0.0	+
15-19	38	3.2	32	2.6	70	2.9	47.75
20-24	186	15.6	172	14.2	358	14.9	55.37
25-29	271	22.8	304	25.1	575	23.9	46.95
30-34	373	31.3	369	30.5	742	30.9	53.05
35-39	254	21.3	254	21.0	508	21.2	61.85
40-44	63	5.3	72	5.9	135	5.6	81.82
45 +	4	0.3	8	0.7	12	0.5	109.09
N.S.	-	-	-	-	-	-	-
TOTAL	1,190	100.0	1,211	100.0	2,401	100.0	54.38

Note: Rate per 1,000 live births for the specified age group.

Low birth weight: birth weight less than 2,500 grams.

Total percentage may not add up to 100 due to rounding. Total includes unknown gender.

+ Denotes the number of cases is less than five

Non-residents are excluded. N.S. – Not stated.

FIGURE 31
LOW BIRTH WEIGHT LIVE BIRTHS BY AGE OF MOTHER
 BRITISH COLUMBIA, 2008

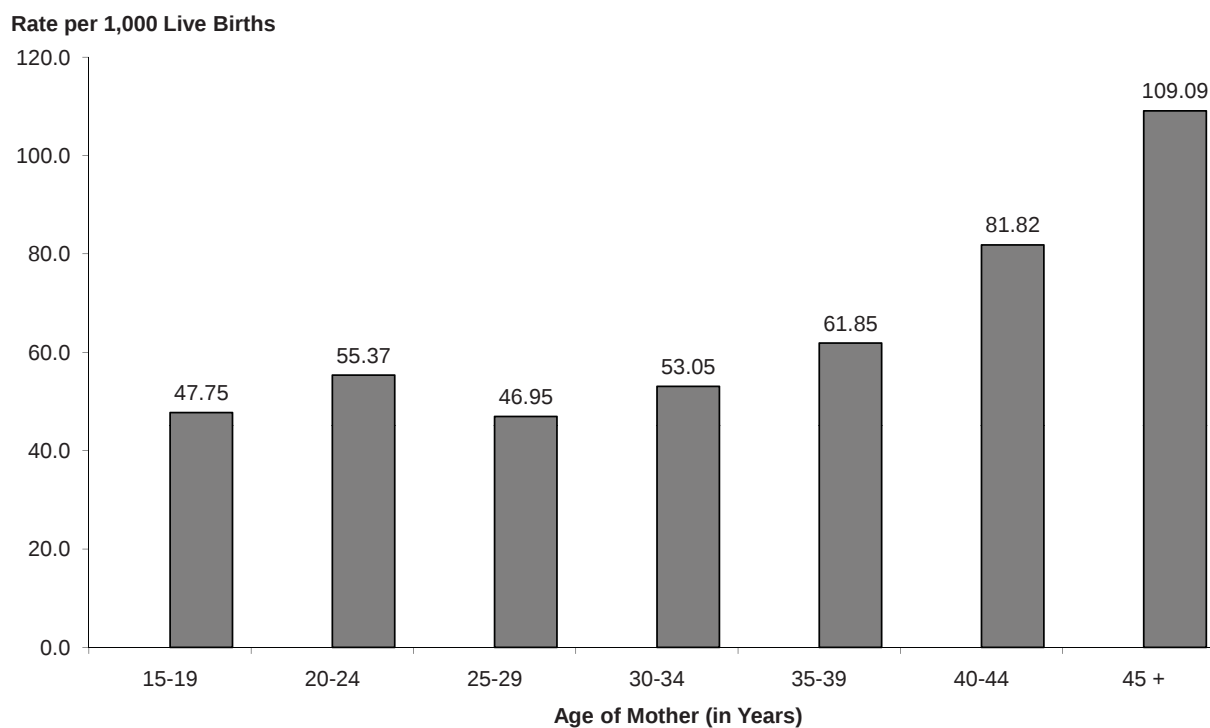


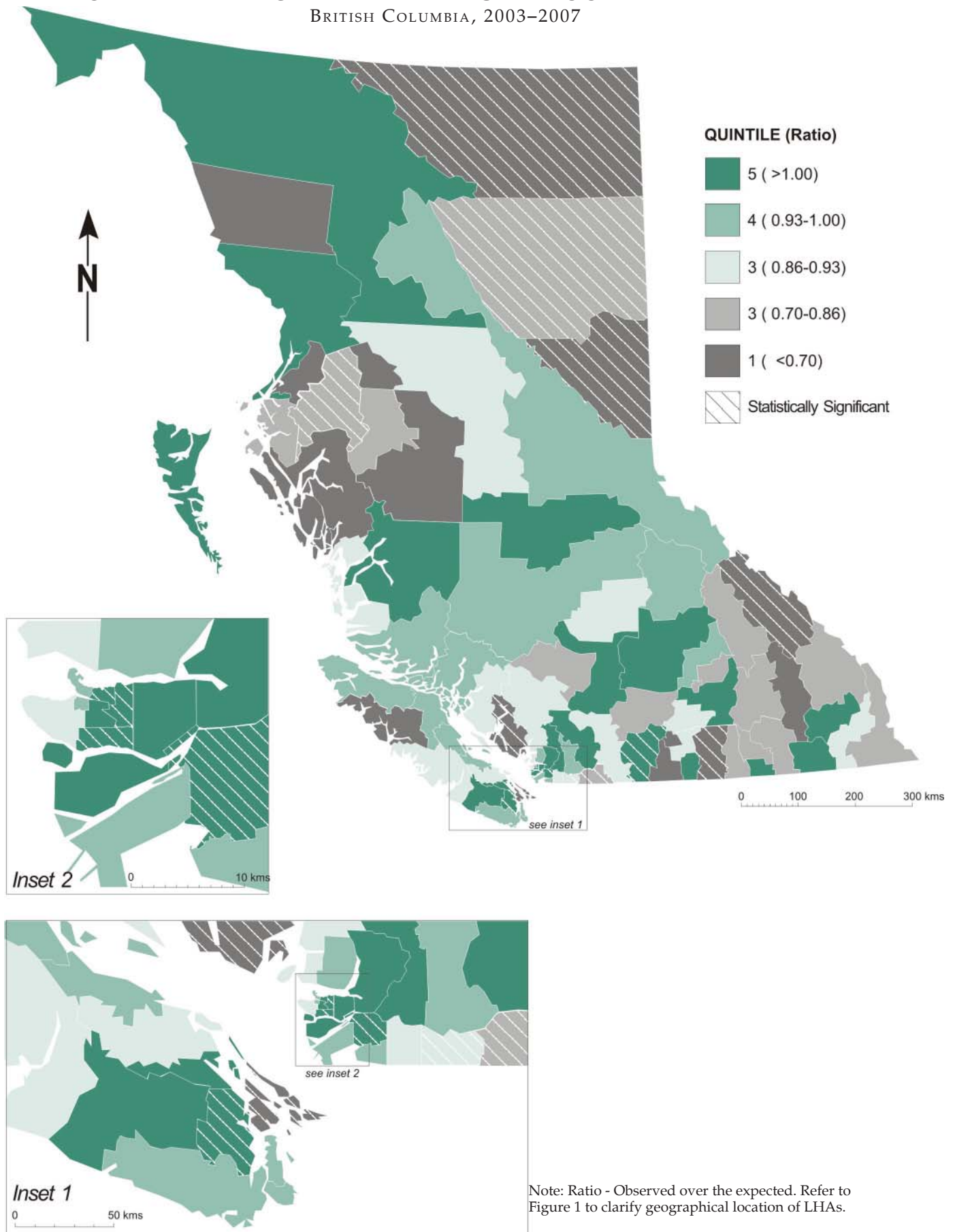
Table 16

LOW BIRTH WEIGHT LIVE BIRTHS BY LOCAL HEALTH AREA AND GESTATIONAL AGE,
BRITISH COLUMBIA, 2003-2007 AND 2008

50	Local Health Area	2003-2007				2008					
		Low Birth Weight Live Births				Gestational Age (in Weeks)				Total	Rate
		Observed	Ratio	(p)	Rate	<37	37-41	42+	N.S.		
001	Fernie	25	0.71		39.25	3	2	-	-	5	34.01
002	Cranbrook	56	0.88		49.21	7	8	-	-	15	56.18
003	Kimberley	20	1.15		63.90	3	4	-	-	7	85.37
004	Windermere	17	0.82		45.58	2	-	-	-	2	20.83
005	Creston	34	1.07		59.44	8	-	-	-	8	68.38
006	Kootenay Lake	6	0.65		35.93	-	-	-	-	-	-
007	Nelson	52	0.84		46.68	13	4	-	-	17	68.55
009	Castlegar	18	0.71		39.65	4	-	-	-	4	45.45
010	Arrow Lakes	8	0.85		47.34	1	-	-	-	1	29.41
011	Trail	48	1.22		68.09	8	4	-	-	12	65.22
012	Grand Forks	16	0.86		47.62	2	-	-	-	2	37.04
013	Kettle Valley	1	0.14	+	7.75	1	-	-	-	1	37.04
014	Southern Okanagan	37	1.09		60.66	8	7	-	-	15	102.04
015	Penticton	72	0.87		48.32	9	6	-	-	15	42.86
016	Keremeos	6	0.58		32.09	1	1	-	-	2	51.28
017	Princeton	14	2.01	*	112.00	1	-	-	-	1	37.04
018	Golden	9	0.50	*	27.78	5	2	-	-	7	86.42
019	Revelstoke	17	0.82		45.58	2	3	-	-	5	72.46
020	Salmon Arm	63	0.93		51.77	8	3	-	-	11	38.60
021	Armstrong - Spallumcheen	18	0.81		44.78	5	-	-	-	5	52.08
022	Vernon	160	1.11		61.63	12	7	-	-	19	33.99
023	Central Okanagan	363	0.92		51.13	68	18	-	-	86	53.45
024	Kamloops	288	1.12		62.03	36	9	-	-	45	43.14
025	100 Mile House	24	0.88		49.08	11	2	-	-	13	109.24
026	North Thompson	12	0.98		54.55	1	2	-	-	3	66.67
027	Cariboo - Chilcotin	79	0.99		55.01	14	4	-	-	18	59.60
028	Quesnel	68	1.03		57.53	11	2	-	-	13	50.00
029	Lillooet	12	0.85		47.24	5	-	-	-	5	89.29
030	South Cariboo	21	1.26		70.23	1	1	-	-	2	38.46
031	Merritt	26	0.81		45.30	3	2	-	-	5	43.10
032	Hope	18	0.90		49.86	2	2	-	-	4	44.94
033	Chilliwack	215	0.82	*	45.87	38	15	-	-	53	53.70
034	Abbotsford	408	0.89	*	49.31	68	29	-	-	97	56.59
035	Langley	324	0.93		51.45	51	20	-	-	71	50.64
037	Delta	247	0.95		52.90	42	15	-	-	57	66.74
038	Richmond	441	1.00		55.64	67	38	-	-	105	61.51
040	New Westminster	215	1.19	*	66.15	20	14	-	-	34	51.20
041	Burnaby	632	1.07		59.25	84	30	-	-	114	50.51
042	Maple Ridge	272	1.07		59.74	44	11	-	-	55	55.44
043	Coquitlam	605	1.06		58.92	86	36	-	-	122	58.54
044	North Vancouver	324	0.94		52.02	49	15	-	-	64	52.89
045	West Vancouver-Bowen Is.	74	0.88		49.07	8	4	-	-	12	50.21
046	Sunshine Coast	33	0.64	*	35.56	8	-	-	-	8	32.65
047	Powell River	32	0.86		48.05	3	1	-	-	4	28.99
048	Howe Sound	106	0.93		51.51	13	3	-	-	16	33.33
049	Bella Coola Valley	16	1.18		65.84	4	-	-	-	4	86.96
050	Queen Charlotte	16	1.09		60.38	2	-	-	-	2	39.22
051	Snow Country	2	1.24		68.97	-	1	-	-	1	142.86
052	Prince Rupert	36	0.73		40.45	6	-	-	-	6	33.71
053	Upper Skeena	12	0.64		35.61	-	1	-	-	1	16.67
054	Smithers	51	0.83		46.15	6	1	-	-	7	34.15
055	Burns Lake	16	0.65		36.12	5	2	-	-	7	88.61
056	Nechako	52	0.86		47.93	6	5	-	-	11	51.16
057	Prince George	294	1.00		55.35	41	11	-	-	52	45.34
059	Peace River South	53	0.65	*	36.05	11	4	-	-	15	43.60
060	Peace River North	115	0.77	*	42.67	12	7	-	-	19	31.56
061	Greater Victoria	474	0.96		53.43	60	21	-	-	81	44.85
062	Sooke	165	0.98		54.53	33	11	-	-	44	57.14
063	Saanich	105	0.95		52.55	24	5	-	-	29	74.94
064	Gulf Islands	14	0.60	*	33.10	2	4	-	-	6	63.16
065	Cowichan	165	1.18	*	65.48	18	4	-	-	22	39.64
066	Lake Cowichan	14	1.21		67.31	1	2	-	-	3	65.22
067	Ladysmith	47	1.13		62.83	6	1	-	-	7	52.24
068	Nanaimo	213	0.91		50.56	28	8	-	-	36	38.79
069	Qualicum	65	0.98		54.35	10	3	-	-	13	47.97
070	Alberni	77	0.89		49.39	16	3	-	-	19	56.38
071	Courtenay	124	0.95		52.68	19	8	1	-	28	55.89
072	Campbell River	97	0.97		53.71	20	5	-	-	25	59.81
075	Mission	118	0.97		54.10	19	5	-	-	24	47.06
076	Agassiz - Harrison	31	1.17		65.26	3	2	-	-	5	52.08
077	Summerland	14	0.69		38.46	2	1	-	-	3	42.25
078	Enderby	13	0.71		39.39	3	-	-	-	3	37.04
080	Kitimat	16	0.66		36.45	6	-	-	-	6	65.93
081	Fort Nelson	15	0.53	*	29.24	6	3	-	-	9	87.38
083	Central Coast	7	0.87		48.28	2	-	-	-	2	62.50
084	Vancouver Island West	4	0.65		36.04	-	2	-	-	2	55.56
085	Vancouver Island North	42	0.98		54.55	8	1	-	-	9	61.22
087	Stikine	2	1.44		80.00	1	-	-	-	1	250.00
088	Terrace	50	0.74	*	40.92	12	6	-	-	18	69.50
092	Nisga'a	5	0.60		33.56	2	-	-	-	2	54.05
094	Telegraph Creek	1	0.40		22.22	-	-	-	-	-	-
161	Vancouver - City Centre	220	0.93		51.91	29	13	-	-	42	43.21
162	Vancouver - Downtown E.side	157	1.22	*	67.85	20	5	-	-	25	55.56
163	Vancouver - North East	360	1.18	*	65.57	49	17	-	-	66	59.30
164	Vancouver - Westside	282	0.90		50.03	45	10	-	-	55	48.29
165	Vancouver - Midtown	310	1.11		61.88	49	17	-	-	66	62.80
166	Vancouver - South	450	1.24	*	68.98	76	23	-	-	99	74.38
201	Surrey	1,467	1.15	*	63.96	242	90	-	-	332	63.74
202	South Surrey/White Rock	144	0.98		54.50	28	4	-	-	32	58.72
PROVINCIAL TOTAL		11,479	1.00		55.61	1,770	630	1	-	2,401	54.38

Note: Low Birth Weight – birth weight less than 2,500 grams. Ratio – observed over the expected low birth weight live births. * Statistical testing indicates that observed low birth weight live births are significantly different from the expected (p<0.05, two tailed). Rate per 1,000 live births in the specified area. Total includes residents with unknown LHA. N.S. - Not Stated.

FIGURE 32
LOW BIRTH WEIGHT LIVE BIRTHS BY LOCAL HEALTH AREA
 BRITISH COLUMBIA, 2003–2007



Births – Maternal Complications and Perinatal Conditions

Both maternal complications and perinatal complications can be used as health status indicators. Only diagnoses affecting pregnancy, labour, or delivery were selected for the maternal complications part of this report. Perinatal conditions consist of diagnoses affecting the baby shortly before, during, or after birth.

The maternal complications shown in Table 17 are limited to those diagnoses that affected pregnancy, labour, or delivery. Note that an unlimited number of complications can be noted for each birth, so the total number of maternal complications can be greater than the number of live births with maternal complications.

Assisted or Surgical Delivery and *Maternal Abnormalities of the Pelvic Organs* were the two most frequent diagnostic categories of maternal complications in 2008 and the previous five years. The proportions of age group births that had pelvic organ abnormalities (including conditions such as cervical incompetence as well as scarring from surgeries such as previous cesarean sections) were observed more frequently in older mothers. Births complicated by *Maternal Abnormality of Pelvic Organs* made up 1.3 percent of births to mothers aged under 20 years compared to 21.6 percent of births for mothers 40 years and over. The proportions of age group births that had at least one complication are shown along the bottom of the table.

Elderly primigravida (ICD-10 code Z35.5) refers to women aged 35 or older who are experiencing their first pregnancy. This condition has always been recorded; however, the ICD-9 code (659.5) was included with other complications of labour and delivery, while ICD-10 puts elderly primigravida in the chapter with factors influencing health status and contact with health services. Elderly primigravida comprised 5.4 percent of all maternal complications in 2003-2007 and 5.3 percent in 2008 as shown in Table 17.

Table 18 shows the incidence of live births with maternal complications by LHA for the period 2003-2007 and for the year 2008. The observed births columns show the number of live births with complications stratified by maternal LHA of residence. The ratios indicate the number of observed births divided by the number that would be expected if the LHA had the provincial rates and (p) indicates those LHAs where the observed number was significantly different from the expected.

In 2008, there were statistically significant low ratios in 8 LHAs, whereas 5 LHAs had high ratios that were statistically significant. In the 2003 to 2007 period, 20 LHAs had low ratios that were statistically significant and 15 LHAs had high ratios that were statistically significant.

The map in Figure 33 shows the LHAs identified in their quintile ranks by their 2003-2007 ratios of observed births with maternal complications versus the expected number of births with such conditions. LHAs with the highest ratios are coloured deep green, and those with the lowest ratios are dark grey.

The conditions listed in Table 19 consist of diagnoses affecting the baby shortly before, during, or after birth. The table shows the number and percent of all perinatal conditions in each category for 2003-2007 and 2008. The 2008 portion of the table also shows the conditions by maternal age group. Again, an unlimited number of conditions can be noted for each birth, so the total number of perinatal conditions at the bottom of the table may exceed the number of live births with at least one perinatal condition.

Intrauterine hypoxia and birth asphyxia accounted for most of the perinatal conditions in both time periods (44.0 percent in 2003-2007 and 39.5 percent in 2008). Conditions related to short gestation and those related to long gestation or high birth weight together accounted for 43.6 percent of the conditions in 2008 and 34.6 percent in the 2003-2007 period.

Table 20 shows the incidence of live births with perinatal conditions, by the mother's LHA of residence for the period 2003-2007 and for the year 2008. In 2008, there were 23 LHAs where the observed number of perinatal conditions was significantly different from the expected number, and in 16 of these, the observed number was significantly higher.

Figure 34 map shows the LHAs identified in their quintile ranks by their 2003-2007 ratios of observed births with perinatal conditions to the expected number of births with such conditions. LHAs with the highest ratios are coloured deep green, and those with the lowest ratios are dark grey.

TABLE 17
**MATERNAL COMPLICATIONS OF PREGNANCY AND
 DELIVERY IN LIVE BIRTHS BY AGE OF MOTHER**
 BRITISH COLUMBIA, 2003–2007 AND 2008

Maternal Complications	ICD-10 Code(s)	2003–2007		2008					Total	Percent
		Total	Percent	Age of Mother (in Years)				N.S.		
Hypertension/hypertensive disorders in pregnancy	O10-O11, O13, O16	2,540	1.8	18	217	247	27	-	509	1.6
Edema and proteinuria without hypertension	O12	36	-	-	3	-	-	-	3	0.0
Pre-eclampsia/eclampsia	O14-O15	889	0.6	10	80	99	16	-	205	0.6
Hemorrhage in early pregnancy	O20	3	-	-	-	1	-	-	1	0.0
Hyperemesis gravidarum	O21	58	-	-	11	7	-	-	18	0.1
Other maternal disorders predominantly related to pregnancy	O22-O23, O25-O29	1,723	1.2	16	185	236	13	-	450	1.4
Diabetes in pregnancy	O24	2,276	1.6	4	151	306	51	-	512	1.6
Multiple gestation and related complications	O30-O31	6,133	4.3	11	405	730	103	-	1,249	3.8
Fetal malpresentation	O32	6,648	4.6	33	577	795	74	-	1,479	4.5
Disproportion	O33	455	0.3	2	32	37	2	-	73	0.2
Maternal abnormality of pelvic organs	O34	24,069	16.7	19	1,577	3,444	380	-	5,420	16.6
Disorders of amniotic fluid and membranes	O40-O42	4,149	2.9	33	351	436	34	-	854	2.6
Placental disorders	O43-O45, O73	2,130	1.5	9	173	265	30	-	477	1.5
Antepartum hemorrhage	O46	358	0.2	-	51	43	13	-	107	0.3
Prolonged pregnancy	O48	1,376	1.0	9	91	112	8	-	220	0.7
Preterm labour and delivery	O60	8,563	5.9	82	907	983	95	-	2,067	6.3
Abnormalities of forces of labour	O62-O63	5,911	4.1	51	638	740	51	-	1,480	4.5
Obstructed labour	O64-O66	11,437	7.9	112	1166	1197	84	-	2,559	7.8
Intrapartum hemorrhage	O67	-	-	-	-	-	-	-	-	-
Evidence of fetal distress	O68	8,242	5.7	69	785	1031	98	-	1,983	6.1
Cord complications	O69	2,352	1.6	23	248	285	28	-	584	1.8
Obstetrical trauma	O70-O71	1,452	1.0	12	180	189	6	-	387	1.2
Postpartum hemorrhage	O72	1,923	1.3	22	203	217	17	-	459	1.4
Assisted or surgical delivery - no cause given ¹	O81-O82	30,761	21.3	166	2,541	3,016	290	-	6,013	18.4
Maternal and puerperal infections	O85-O86, O98, A34	234	0.2	6	33	33	2	-	74	0.2
Other puerperal complications	O87-O92	61	-	-	6	5	1	-	12	0.0
Maternal noninfectious diseases complicating the pregnant state	O99	2,065	1.4	14	205	266	30	-	515	1.6
Elderly primigravida	Z355	7,717	5.4	-	-	1,483	236	-	1,719	5.3
Maternal drug use	O355	448	0.3	6	57	30	-	-	93	0.3
Other maternal complications	O00-O08, O350-O353, O356-O36, O47, O61, O74-O75, O95-O97	10,122	7.0	95	1,275	1,690	149	-	3,209	9.8
Total maternal complications		144,131	100.0	822	12,148	17,923	1,838		32,731	100.0
Live births with the above	- Number	107,257		605	9,038	12,512	1,160	-	23,315	
maternal complications	- Percent(*)	52.0		40.9	48.3	56.4	65.9		52.8	

Note: Percent based upon maternal complications. Percent (*) based upon live births for the specified maternal age group.

¹Where no other complication code is found. Total percentage may not add up to 100 due to rounding.

N.S. - Not Stated. Non-residents are excluded.

Vital Statistics Information Box

TOP 25 BABY NAMES IN 2008

Each year the British Columbia Vital Statistics Agency produces a list of the most chosen baby names. The table below provides the top 25 names. Alternate spellings of names that sound alike (such as Catherine, Katherine, and Katharine) are not combined. The complete 2008 list, as well as lists for several previous years can be found at <http://www.vs.gov.bc.ca/babynames/index.html>. In 2008, 643 boys' names and 722 girls' names were chosen for five or more newborns.

Baby Boys			Baby Girls	
Rank	Name	Number	Name	Number
1	Ethan	283	Ava	233
2	Nathan	224	Emma	228
3	Jacob	210	Emily	224
4	Lucas	208	Olivia	210
5	Logan	207	Sophia	195
6	Matthew	198	Chloe	160
7	Benjamin	194	Isabella	158
8	Joshua	193	Hannah	150
9	Liam	193	Abigail	145
10	James	191	Madison	140
11	Noah	189	Ella	139
12	Ryan	182	Sophie	136
13	Owen	179	Sarah	124
14	Alexander	159	Lily	122
15	Jack	158	Brooklyn	120
16	William	153	Taylor	118
17	Daniel	150	Maya	111
18	Evan	148	Grace	105
19	Jayden	144	Hailey	103
20	Samuel	139	Elizabeth	102
21	Aiden	131	Samantha	99
22	Tristan	127	Avery	90
23	Mason	126	Alexis	89
24	Oliver	118	Lauren	85
25	Dylan	113	Mia	84

56		2003-2007					2008					
		Observed				Total	Observed	Expected			Total	
Local Health Area		Births	Ratio	(p)	Percent	Live Births	Births	Births	Ratio	(p)	Percent	Live Births
001	Fernie	369	1.11	*	57.9	637	90	77.6	1.16		61.2	147
002	Cranbrook	506	0.86	*	44.5	1,138	120	141.0	0.85		44.9	267
003	Kimberley	141	0.87		45.0	313	39	43.3	0.90		47.6	82
004	Windermere	195	1.01		52.3	373	45	50.7	0.89		46.9	96
005	Creston	220	0.74	*	38.5	572	52	61.8	0.84		44.4	117
006	Kootenay Lake	49	0.56	*	29.3	167	9	10.0	0.90		47.4	19
007	Nelson	400	0.69	*	35.9	1,114	103	130.9	0.79	*	41.5	248
009	Castlegar	198	0.84	*	43.6	454	36	46.5	0.77		40.9	88
010	Arrow Lakes	76	0.87		45.0	169	8	18.0	0.45	*	23.5	34
011	Trail	329	0.90		46.7	705	105	97.2	1.08		57.1	184
012	Grand Forks	143	0.82	*	42.6	336	26	28.5	0.91		48.1	54
013	Kettle Valley	41	0.61	*	31.8	129	8	14.3	0.56		29.6	27
014	Southern Okanagan	305	0.96		50.0	610	90	77.6	1.16		61.2	147
015	Penticton	791	1.02		53.1	1,490	181	184.8	0.98		51.7	350
016	Keremeos	98	1.01		52.4	187	23	20.6	1.12		59.0	39
017	Princeton	58	0.89		46.4	125	11	14.3	0.77		40.7	27
018	Golden	180	1.07		55.6	324	52	42.8	1.22		64.2	81
019	Revelstoke	191	0.99		51.2	373	30	36.4	0.82		43.5	69
020	Salmon Arm	748	1.18	*	61.5	1,217	164	150.5	1.09		57.5	285
021	Armstrong - Spallumcheen	226	1.08		56.2	402	50	50.7	0.99		52.1	96
022	Vernon	1,462	1.08	*	56.3	2,596	300	295.2	1.02		53.7	559
023	Central Okanagan	3,518	0.95	*	49.6	7,099	860	849.6	1.01		53.4	1,609
024	Kamloops	2,345	0.97		50.5	4,643	530	550.7	0.96		50.8	1,043
025	100 Mile House	217	0.85	*	44.4	489	67	62.8	1.07		56.3	119
026	North Thompson	98	0.86		44.5	220	19	23.8	0.80		42.2	45
027	Cariboo - Chilcotin	772	1.03		53.8	1,436	143	159.5	0.90		47.4	302
028	Quesnel	574	0.93		48.6	1,182	142	137.3	1.03		54.6	260
029	Lillooet	139	1.05		54.7	254	25	29.6	0.85		44.6	56
030	South Cariboo	132	0.85		44.1	299	20	27.5	0.73		38.5	52
031	Merritt	251	0.84	*	43.7	574	50	61.2	0.82		43.1	116
032	Hope	180	0.96		49.9	361	42	47.0	0.89		47.2	89
033	Chilliwack	2,301	0.94	*	49.1	4,687	491	521.2	0.94		49.7	987
034	Abbotsford	3,839	0.89	*	46.4	8,274	834	905.0	0.92	*	48.7	1,714
035	Langley	3,102	0.95	*	49.3	6,297	725	740.3	0.98		51.7	1,402
037	Delta	2,549	1.05	*	54.6	4,669	452	450.9	1.00		52.9	854
038	Richmond	4,090	0.99		51.6	7,926	899	901.3	1.00		52.7	1,707
040	New Westminster	1,830	1.08	*	56.3	3,250	411	350.6	1.17	*	61.9	664
041	Burnaby	5,490	0.99		51.5	10,667	1,177	1,191.7	0.99		52.1	2,257
042	Maple Ridge	2,458	1.04		54.0	4,553	542	523.8	1.03		54.6	992
043	Coquitlam	5,971	1.12	*	58.2	10,268	1,200	1,100.4	1.09	*	57.6	2,084
044	North Vancouver	3,244	1.00		52.1	6,228	670	638.9	1.05		55.4	1,210
045	West Vancouver-Bowen Is.	780	1.00		51.7	1,508	124	126.2	0.98		51.9	239
046	Sunshine Coast	447	0.93		48.2	928	137	129.4	1.06		55.9	245
047	Powell River	351	1.01		52.7	666	63	72.9	0.86		45.7	138
048	Howe Sound	1,161	1.09	*	56.4	2,058	271	253.4	1.07		56.5	480
049	Bella Coola Valley	117	0.93		48.1	243	23	24.3	0.95		50.0	46
050	Queen Charlotte	144	1.05		54.3	265	30	26.9	1.11		58.8	51
051	Snow Country	18	1.19		62.1	29	4	3.7	1.08		57.1	7
052	Prince Rupert	428	0.93		48.1	890	86	94.0	0.92		48.3	178
053	Upper Skeena	209	1.19	*	62.0	337	32	31.7	1.01		53.3	60
054	Smithers	533	0.93		48.2	1,105	89	108.2	0.82		43.4	205
055	Burns Lake	214	0.93		48.3	443	45	41.7	1.08		57.0	79
056	Nechako	552	0.98		50.9	1,085	90	113.5	0.79	*	41.9	215
057	Prince George	2,477	0.90	*	46.6	5,312	522	605.6	0.86	*	45.5	1,147
059	Peace River South	575	0.75	*	39.1	1,470	154	181.6	0.85	*	44.8	344
060	Peace River North	1,089	0.78	*	40.4	2,695	263	317.9	0.83	*	43.7	602
061	Greater Victoria	4,646	1.01		52.4	8,871	938	953.6	0.98		51.9	1,806
062	Sooke	1,648	1.05		54.5	3,026	409	406.6	1.01		53.1	770
063	Saanich	967	0.93	*	48.4	1,998	216	204.3	1.06		55.8	387
064	Gulf Islands	162	0.74	*	38.3	423	44	50.2	0.88		46.3	95
065	Cowichan	1,145	0.87	*	45.4	2,520	248	293.0	0.85	*	44.7	555
066	Lake Cowichan	100	0.93		48.1	208	18	24.3	0.74		39.1	46
067	Ladysmith	408	1.05		54.5	748	64	70.8	0.90		47.8	134
068	Nanaimo	2,595	1.19	*	61.6	4,213	564	490.0	1.15	*	60.8	928
069	Qualicum	707	1.14	*	59.1	1,196	153	143.1	1.07		56.5	271
070	Alberni	937	1.16	*	60.1	1,559	219	177.9	1.23	*	65.0	337
071	Courtenay	1,156	0.95		49.1	2,354	270	264.5	1.02		53.9	501
072	Campbell River	1,089	1.16	*	60.3	1,806	249	220.7	1.13		59.6	418
075	Mission	1,013	0.89	*	46.4	2,181	257	269.3	0.95		50.4	510
076	Agassiz - Harrison	222	0.90		46.7	475	53	50.7	1.05		55.2	96
077	Summerland	196	1.04		53.8	364	42	37.5	1.12		59.2	71
078	Enderby	169	0.99		51.2	330	49	42.8	1.15		60.5	81
080	Kitimat	240	1.05		54.7	439	47	48.0	0.98		51.6	91
081	Fort Nelson	258	0.97		50.3	513	53	54.4	0.97		51.5	103
083	Central Coast	75	1.00		51.7	145	20	16.9	1.18		62.5	32
084	Vancouver Island West	66	1.14		59.5	111	19	19.0	1.00		52.8	36
085	Vancouver Island North	373	0.93		48.4	770	74	77.6	0.95		50.3	147
087	Stikine	13	1.00		52.0	25	2	2.1	0.95		50.0	4
088	Terrace	604	0.95		49.4	1,222	124	136.8	0.91		47.9	259
092	Nisga'a	81	1.05		54.4	149	18	19.5	0.92		48.6	37
094	Telegraph Creek	20	0.86		44.4	45	2	5.8	0.34		18.2	11
161	Vancouver - City Centre	2,541	1.15	*	60.0	4,238	586	513.2	1.14	*	60.3	972
162	Vancouver - Downtown E.side	1,191	0.99		51.5	2,314	240	237.6	1.01		53.3	450
163	Vancouver - North East	2,782	0.98		50.7	5,490	596	587.7	1.01		53.5	1,113
164	Vancouver - Westside	3,074	1.05	*	54.5	5,637	624	601.4	1.04		54.8	1,139
165	Vancouver - Midtown	2,599	1.00		51.9	5,010	587	554.9	1.06		55.9	1,051
166	Vancouver - South	3,353	0.99		51.4	6,524	705	702.8	1.00		53.0	1,331
201	Surrey	12,436	1.04	*	54.2	22,937	2,759	2,750.4	1.00		53.0	5,209
202	South Surrey/White Rock	1,426	1.04		54.0	2,642	288	287.8	1.00		52.8	545
PROVINCIAL TOTAL		107,257	1.00		52.0	206,418	23,315	23,315.0	1.00		52.8	44,156

Note: *Statistical testing indicates that the observed number of births with maternal complications is significantly different from the expected ($p < 0.05$, two tailed). Ratio - observed over expected. Percent of observed births is based on total live births. Total includes residents with unknown LHA. Non-residents are excluded.

FIGURE 33
**MATERNAL COMPLICATIONS OF PREGNANCY AND
 DELIVERY IN LIVE BIRTHS BY LOCAL HEALTH AREA**
 BRITISH COLUMBIA, 2003–2007

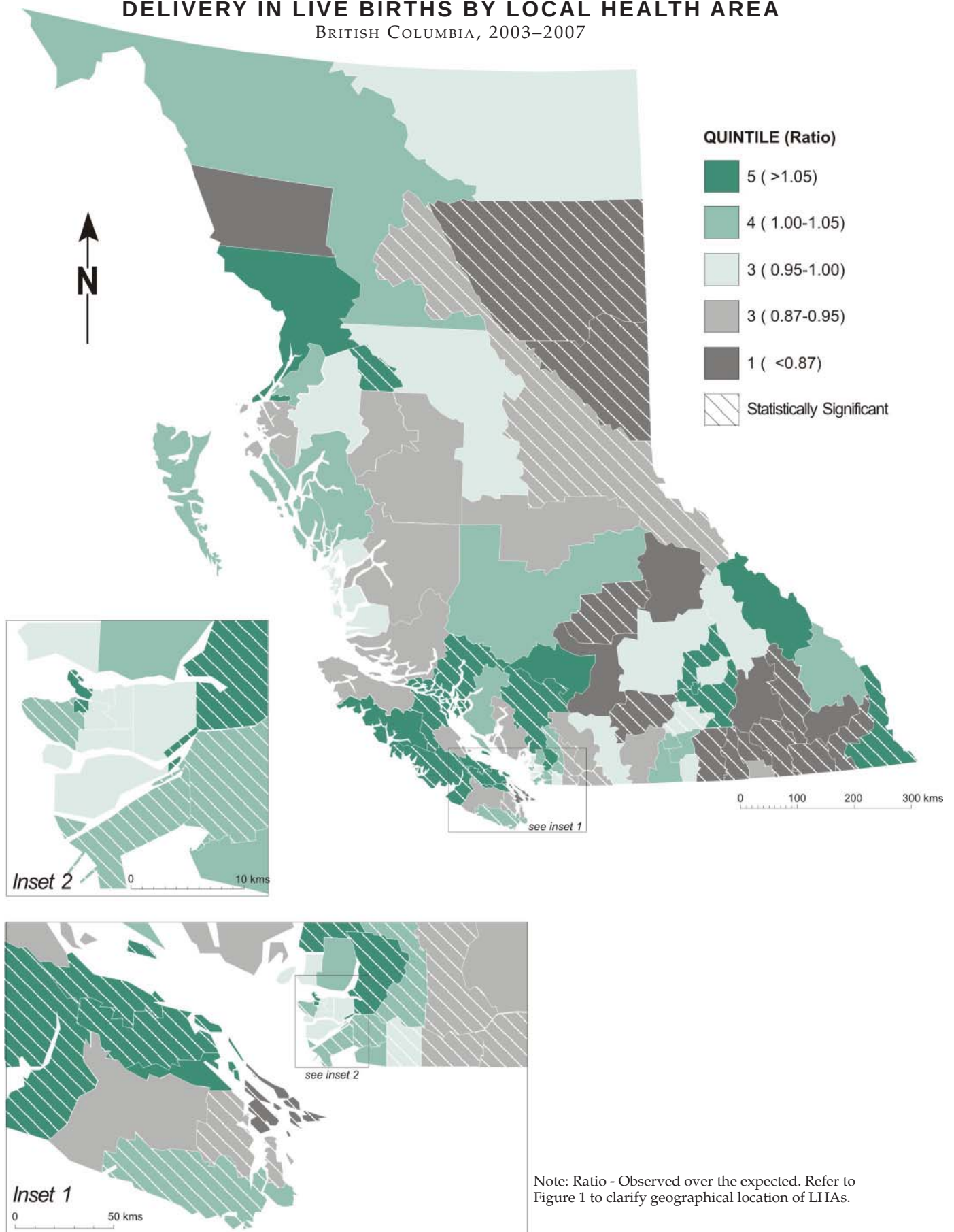


TABLE 19
PERINATAL CONDITIONS IN LIVE BIRTHS BY AGE OF MOTHER
 BRITISH COLUMBIA, 2003–2007 AND 2008

Perinatal Conditions	ICD-10 Code	2003–2007		2008						
				Age of Mother (in Years)					Total	Percent
		Total	Percent	<20	20–29	30–39	40+	N.S.		
Fetus/newborn affected by maternal conditions that may be unrelated to present pregnancy	P00	29	-	-	8	5	1	-	14	0.1
Complications of pregnancy, labour and delivery	P01, P03	11,821	13.2	48	844	1,213	148	-	2,253	11.4
Fetus/newborn affected by complications of placenta, cord and membranes	P02	3,201	3.6	17	214	234	29	-	494	2.5
Fetus affected by noxious influences transmitted via placenta (or breast milk)	P04	22	-	2	8	6	-	-	16	-
Slow fetal growth and malnutrition	P05	2,708	3.0	12	91	131	8	-	242	1.2
Perinatal disorders related to short gestation	P072, P073	15,024	16.7	111	1,323	1,684	196	-	3,314	16.8
Disorders related to long gestation or high birth weight	P08	16,056	17.9	165	2,193	2,742	196	-	5,296	26.8
Perinatal birth trauma	P10-P15	270	0.3	3	38	50	2	-	93	0.5
Intrauterine hypoxia and birth asphyxia	P20-P21	39,525	44.0	349	3,423	3,716	308	-	7,796	39.5
Respiratory conditions of fetus and newborn	P22-P28	581	0.6	6	39	37	2	-	84	0.4
Cardiovascular disorders originating in the perinatal period	P29	-	-	-	-	-	-	-	-	0.0
Infections specific to the perinatal period	P35-P39	32	-	-	2	4	-	-	6	0.0
Fetal and neonatal hemorrhage	P50-P52, P54	108	0.1	-	2	5	-	-	7	0.0
Perinatal jaundice/other hematological disorders	P53, P55-P61	46	0.1	-	2	9	-	-	11	0.1
Perinatal endocrine and metabolic disorders	P70-P74	32	-	-	5	2	-	-	7	0.0
Digestive system disorders of fetus and newborn	P76-P78	3	-	-	-	2	-	-	2	0.0
Perinatal conditions of the integument and of temperature regulation	P80-P83	129	0.1	-	21	21	-	-	42	0.2
Other disorders originating in the perinatal period	P90-P96	229	0.3	4	32	30	2	-	68	0.3
All Perinatal Conditions		89,816	100.0	717	8,245	9,891	892	-	19,745	100.0
Live births with the above perinatal conditions	- Number	68,869		557	6,450	7,701	659	-	15,367	
	- Percent(*)	33.4		37.6	34.5	34.7	37.4		34.8	

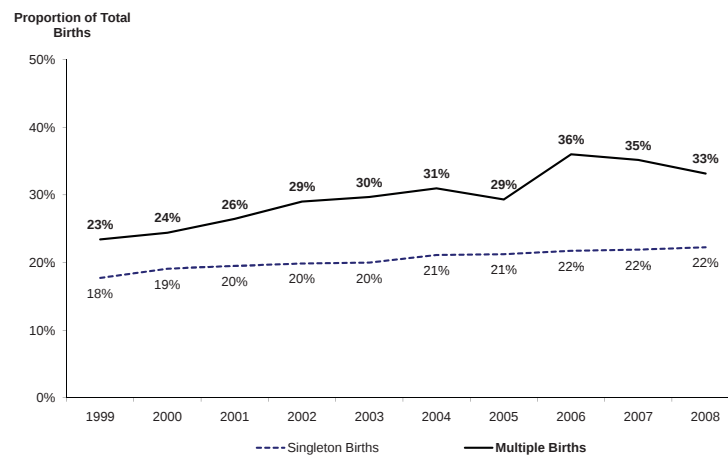
Note: Percent based upon perinatal conditions. Percent (*) based upon live births for the maternal age group. Total percentage may not add up to 100 due to rounding. N.S. - Not stated. Non-residents are excluded.

Vital Statistics Information Box

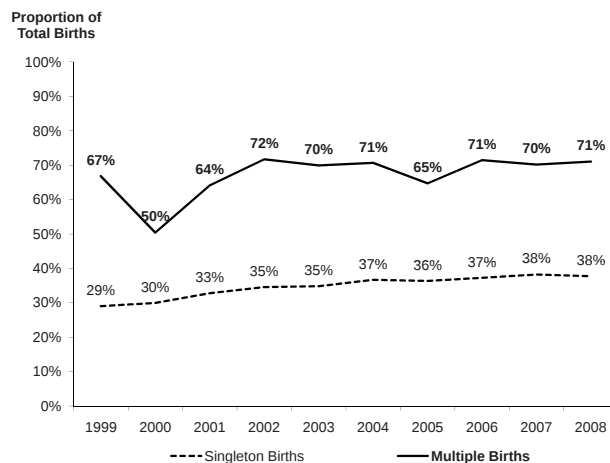
BIRTH AND OLDER MOTHERS IN BRITISH COLUMBIA 1999 - 2008

Older mothers, those aged 35 and over have increased their share of the total births to women in British Columbia. Since 1999, the share of singleton births attributable to older mothers has increased by nearly 34 percent and the share of multiple births attributable to older mothers has almost doubled. More of these births are via Cesarean section, however, the proportion of these births considered to be Low Birth Weight has remained relatively stable.

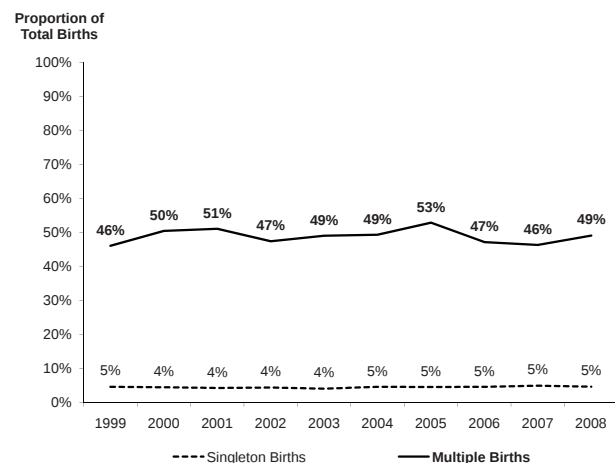
PROPORTION OF SINGLETON AND MULTIPLE BIRTHS
TO MOTHERS AGED 35 AND OLDER
BRITISH COLUMBIA, 1999 - 2008



PROPORTION OF SINGLETON AND MULTIPLE BIRTHS
TO MOTHERS AGED 35 AND OLDER BIRTHED
VIA CESAREAN SECTION
BRITISH COLUMBIA, 1999 - 2008



PROPORTION OF SINGLETON AND MULTIPLE BIRTHS
TO MOTHERS AGED 35 AND OLDER WITH
LOW BIRTH WEIGHT (<2500 GRAMS)
BRITISH COLUMBIA, 1999 - 2008

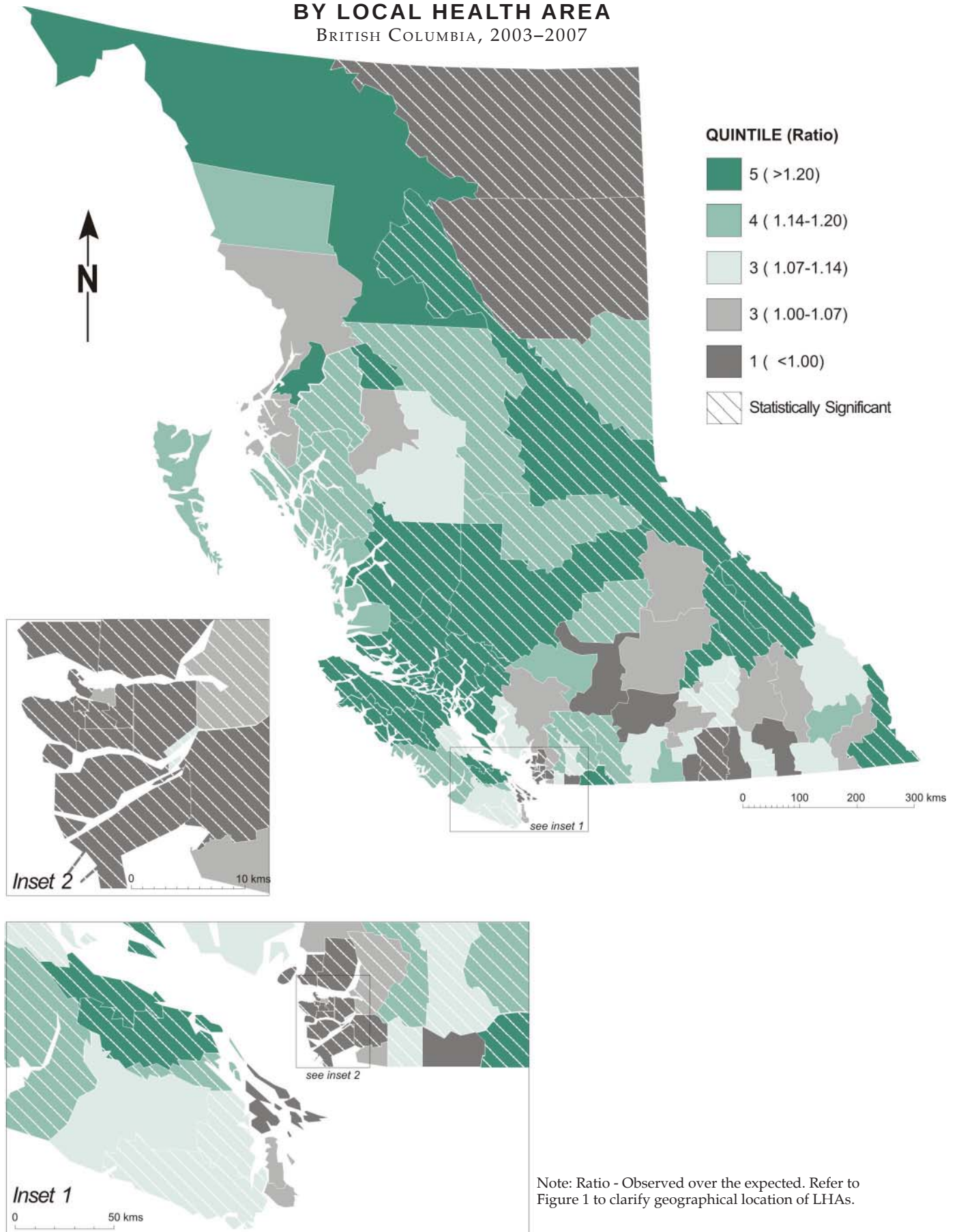


**PERINATAL CONDITIONS IN LIVE BIRTHS BY LOCAL HEALTH AREA,
BRITISH COLUMBIA, 2003–2007 AND 2008**

60		2003–2007					2008					
		Observed	Ratio	(p)	Percent	Total Live Births	Observed	Expected	Ratio	(p)	Percent	Total Live Births
Local Health Area		Births					Births	Births				
001	Fernie	260	1.22	*	40.8	637	47	51.2	0.92		32.0	147
002	Cranbrook	392	1.03		34.4	1,138	95	92.9	1.02		35.6	267
003	Kimberley	123	1.18		39.3	313	35	28.5	1.23		42.7	82
004	Windermere	141	1.13		37.8	373	31	33.4	0.93		32.3	96
005	Creston	203	1.06		35.5	572	44	40.7	1.08		37.6	117
006	Kootenay Lake	58	1.04		34.7	167	6	6.6	0.91		31.6	19
007	Nelson	370	1.00		33.2	1,114	76	86.3	0.88		30.6	248
009	Castlegar	169	1.12		37.2	454	27	30.6	0.88		30.7	88
010	Arrow Lakes	58	1.03		34.3	169	12	11.8	1.01		35.3	34
011	Trail	267	1.14	*	37.9	705	67	64.0	1.05		36.4	184
012	Grand Forks	101	0.90		30.1	336	14	18.8	0.74		25.9	54
013	Kettle Valley	27	0.63	*	20.9	129	8	9.4	0.85		29.6	27
014	Southern Okanagan	187	0.92		30.7	610	50	51.2	0.98		34.0	147
015	Penticton	519	1.04		34.8	1,490	124	121.8	1.02		35.4	350
016	Keremeos	72	1.15		38.5	187	12	13.6	0.88		30.8	39
017	Princeton	47	1.13		37.6	125	7	9.4	0.74		25.9	27
018	Golden	136	1.26	*	42.0	324	36	28.2	1.28		44.4	81
019	Revelstoke	165	1.33	*	44.2	373	33	24.0	1.37		47.8	69
020	Salmon Arm	492	1.21	*	40.4	1,217	110	99.2	1.11		38.6	285
021	Armstrong - Spallumcheen	138	1.03		34.3	402	37	33.4	1.11		38.5	96
022	Vernon	904	1.04		34.8	2,596	209	194.5	1.07		37.4	559
023	Central Okanagan	2,369	1.00		33.4	7,099	590	560.0	1.05		36.7	1,609
024	Kamloops	1,616	1.04		34.8	4,643	360	363.0	0.99		34.5	1,043
025	100 Mile House	189	1.16	*	38.7	489	58	41.4	1.40	*	48.7	119
026	North Thompson	75	1.02		34.1	220	14	15.7	0.89		31.1	45
027	Cariboo - Chilcotin	666	1.39	*	46.4	1,436	132	105.1	1.26	*	43.7	302
028	Quesnel	459	1.16	*	38.8	1,182	107	90.5	1.18		41.2	260
029	Lillooet	102	1.20		40.2	254	15	19.5	0.77		26.8	56
030	South Cariboo	97	0.97		32.4	299	14	18.1	0.77		26.9	52
031	Merritt	187	0.98		32.6	574	46	40.4	1.14		39.7	116
032	Hope	141	1.17		39.1	361	38	31.0	1.23		42.7	89
033	Chilliwack	1,890	1.21	*	40.3	4,687	389	343.5	1.13	*	39.4	987
034	Abbotsford	2,735	0.99		33.1	8,274	622	596.5	1.04		36.3	1,714
035	Langley	2,359	1.12	*	37.5	6,297	520	487.9	1.07		37.1	1,402
037	Delta	1,416	0.91	*	30.3	4,669	292	297.2	0.98		34.2	854
038	Richmond	2,157	0.82	*	27.2	7,926	480	594.1	0.81	*	28.1	1,707
040	New Westminster	1,179	1.09	*	36.3	3,250	255	231.1	1.10		38.4	664
041	Burnaby	2,947	0.83	*	27.6	10,667	623	785.5	0.79	*	27.6	2,257
042	Maple Ridge	1,773	1.17	*	38.9	4,553	394	345.2	1.14	*	39.7	992
043	Coquitlam	3,647	1.06	*	35.5	10,268	726	725.3	1.00		34.8	2,084
044	North Vancouver	1,792	0.86	*	28.8	6,228	403	421.1	0.96		33.3	1,210
045	West Vancouver-Bowen Is.	417	0.83	*	27.7	1,508	64	83.2	0.77	*	26.8	239
046	Sunshine Coast	332	1.07		35.8	928	91	85.3	1.07		37.1	245
047	Powell River	274	1.23	*	41.1	666	53	48.0	1.10		38.4	138
048	Howe Sound	680	0.99		33.0	2,058	157	167.0	0.94		32.7	480
049	Bella Coola Valley	116	1.43	*	47.7	243	20	16.0	1.25		43.5	46
050	Queen Charlotte	105	1.19		39.6	265	23	17.7	1.30		45.1	51
051	Snow Country	9	0.93		31.0	29	3	2.4	1.23		42.9	7
052	Prince Rupert	312	1.05		35.1	890	77	61.9	1.24		43.3	178
053	Upper Skeena	165	1.47	*	49.0	337	22	20.9	1.05		36.7	60
054	Smithers	391	1.06		35.4	1,105	79	71.3	1.11		38.5	205
055	Burns Lake	160	1.08		36.1	443	25	27.5	0.91		31.6	79
056	Nechako	422	1.17	*	38.9	1,085	92	74.8	1.23	*	42.8	215
057	Prince George	2,187	1.23	*	41.2	5,312	471	399.2	1.18	*	41.1	1,147
059	Peace River South	574	1.17	*	39.0	1,470	157	119.7	1.31	*	45.6	344
060	Peace River North	763	0.85	*	28.3	2,695	196	209.5	0.94		32.6	602
061	Greater Victoria	3,025	1.02		34.1	8,871	653	628.5	1.04		36.2	1,806
062	Sooke	1,099	1.09	*	36.3	3,026	311	268.0	1.16	*	40.4	770
063	Saanich	716	1.07		35.8	1,998	162	134.7	1.20	*	41.9	387
064	Gulf Islands	129	0.91		30.5	423	39	33.1	1.18		41.1	95
065	Cowichan	952	1.13	*	37.8	2,520	206	193.1	1.07		37.1	555
066	Lake Cowichan	78	1.12		37.5	208	15	16.0	0.94		32.6	46
067	Ladysmith	283	1.13	*	37.8	748	56	46.6	1.20		41.8	134
068	Nanaimo	1,845	1.31	*	43.8	4,213	388	323.0	1.20	*	41.8	928
069	Qualicum	485	1.22	*	40.6	1,196	109	94.3	1.16		40.2	271
070	Alberni	602	1.16	*	38.6	1,559	148	117.3	1.26	*	43.9	337
071	Courtenay	848	1.08	*	36.0	2,354	202	174.4	1.16	*	40.3	501
072	Campbell River	741	1.23	*	41.0	1,806	189	145.5	1.30	*	45.2	418
075	Mission	791	1.09	*	36.3	2,181	196	177.5	1.10		38.4	510
076	Agassiz - Harrison	193	1.22	*	40.6	475	41	33.4	1.23		42.7	96
077	Summerland	127	1.05		34.9	364	27	24.7	1.09		38.0	71
078	Enderby	119	1.08		36.1	330	35	28.2	1.24		43.2	81
080	Kitimat	174	1.19	*	39.6	439	42	31.7	1.33		46.2	91
081	Fort Nelson	147	0.86		28.7	513	28	35.8	0.78		27.2	103
083	Central Coast	56	1.16		38.6	145	22	11.1	1.98	*	68.8	32
084	Vancouver Island West	55	1.49	*	49.5	111	15	12.5	1.20		41.7	36
085	Vancouver Island North	323	1.26	*	41.9	770	64	51.2	1.25		43.5	147
087	Stikine	12	1.44		48.0	25	1	1.4	0.72		25.0	4
088	Terrace	462	1.13	*	37.8	1,222	114	90.1	1.26	*	44.0	259
092	Nisga'a	63	1.27		42.3	149	21	12.9	1.63	*	56.8	37
094	Telegraph Creek	18	1.20		40.0	45	1	3.8	0.26		9.1	11
161	Vancouver - City Centre	1,307	0.92	*	30.8	4,238	319	338.3	0.94		32.8	972
162	Vancouver - Downtown E.side	788	1.02		34.1	2,314	152	156.6	0.97		33.8	450
163	Vancouver - North East	1,443	0.79	*	26.3	5,490	312	387.3	0.81	*	28.0	1,113
164	Vancouver - Westside	1,616	0.86	*	28.7	5,637	353	396.4	0.89	*	31.0	1,139
165	Vancouver - Midtown	1,469	0.88	*	29.3	5,010	333	365.8	0.91		31.7	1,051
166	Vancouver - South	1,725	0.79	*	26.4	6,524	386	463.2	0.83	*	29.0	1,331
201	Surrey	6,704	0.88	*	29.2	22,937	1,543	1,812.8	0.85	*	29.6	5,209
202	South Surrey/White Rock	910	1.03		34.4	2,642	194	189.7	1.02		35.6	545
PROVINCIAL TOTAL		68,869	1.00		33.4	206,418	15,367	15,367.0	1.00		34.8	44,156

Note: *Statistical testing indicates that observed number of births with perinatal conditions is significantly different from the expected (p<0.05, two tailed). Ratio-observed over the expected. Percent of births is based on total live births and includes residents with unknown LHA and excludes non-residents.

FIGURE 34
**PERINATAL CONDITIONS IN LIVE BIRTHS
 BY LOCAL HEALTH AREA**
 BRITISH COLUMBIA, 2003–2007



Note: Ratio - Observed over the expected. Refer to Figure 1 to clarify geographical location of LHAs.