

Cervical Cancer Screening in Canada Monitoring Program Performance 2006–2008

Acknowledgements

This report was prepared by the Monitoring Program Performance Working Group and the Monitoring Program Performance Data Group, whose members are identified in Appendix A. Provincial cervical cancer screening programs contributed data for this report and reviewed report drafts. Without the support of the Pan-Canadian Cervical Screening Initiative and the Canadian Partnership Against Cancer, this project would not have been possible.

The Canadian Partnership Against Cancer 1 University Avenue, Suite 300 Toronto, Ontario M5J 2P1 416-915-9222

www.partnershipagainstcancer.ca

Table of Contents

Executive Summary	4
Background	7
Introduction	8
Human Papillomavirus	8
Pre-cancerous Lesions	8
Cervical Cancer	8
History of Cervical Cancer Screening in Canada	9
Cervical Cancer Screening Process	9
Pap Test	9
Follow-up and Treatment	9
Methods1	1
Development of Program Performance Indicators1	2
Project Approach	3
Results 1	5
Participation Rate1	6
Retention Rate	8
Specimen Adequacy	9
Screening Test Results	0
Cytology Turnaround Time	3
Colposcopy Follow-up Rate	4
Biopsy Rate	5
Cytology-Histology Agreement	5
Pre-cancer Detection Rate	6
Cancer Incidence	8
Cancers Diagnosed at Stage I	8
Screening History in Cases of Invasive Cancer	9
Discussion	0
Challenges and Future Directions	1
References	2
Appendix A – Working Group Membership, 2010–11	3
Appendix B – Cervical cancer screening programs in Canada	4
Appendix C – Data definitions	6
Appendix D – Cytology codes	4
Appendix E – Supplementary tables	6

List of Tables

Table 1:	Program performance indicators for cervical cancer screening in Canada	12
Table 2:	Percentage of women 20–69 years of age by the most severe Pap test result by province, 2007 and 2008	20
Table 3:	Percentage of women by the most severe Pap test result and by age group, 2007 and 2008, provinces combined	22
Table 4:	Median number of days from performance of the Pap test to issuance of the Pap test report by the laboratory by province for women 20–69 years of age	23
Table 5:	Percentage of women 20–69 years of age with a high-grade (ASC-H and HSIL+) Pap test result who had a follow-up colposcopy examination within 12 months by province, 2007 and 2008	24

List of Figures

Figure 1:	The cervical cancer screening process	
Figure 2:	Cancer screening indicators	14
Figure 3:	Percentage of women 20–69 years of age who had at least one Pap test by province, 2006–2008	17
Figure 4:	Percentage of women who had at least one Pap test by age group, 2006–2008, provinces combined	17
Figure 5:	Percentage of women 20–69 years of age who had a Pap test within 3 years after a negative Pap test by province, 2004 and 2005	
Figure 6:	Percentage of women who had a Pap test within three years following a negative Pap result by age group, 2004 and 2005, provinces combined	
Figure 7:	Percentage of unsatisfactory Pap test results for women 20–69 years of age by province, 2007 and 2008	
Figure 8:	Percentage of women 20–69 years of age by the most severe abnormal Pap test result by province, 2007 and 2008	
Figure 9:	Percentage of women by most severe abnormal Pap test result and age group, 2007 and 2008, provinces combined	

Figure 10:	Percentage of women 20–69 years of age with a high-grade Pap test result (ASC-H and HSIL+) who had the follow-up colposcopy examination within 12 months by province, 2007 and 2008	. 24
Figure 11:	Percentage of high-grade Pap tests (ASC-H and HSIL+) for women 20–69 years of age who had biopsy results* within 12 months by province, 2007 and 2008	. 25
Figure 12:	Number of women 20–69 years of age diagnosed with a pre-cancerous lesion* per 1,000 women screened by province, 2007 and 2008	. 26
Figure 13:	Number of women diagnosed with a pre-cancerous lesion* per 1,000 women screened by age group, 2007 and 2008	. 26
Figure 14:	Number of women diagnosed with a pre-cancerous lesion* per 1,000 women screened by province, 2007 and 2008	. 27
Figure 15:	Invasive cervical cancer* incidence per 100,000 by age group, provinces combined, 2005–2008	. 27
Figure 16:	Percentage of invasive cervical cancers* detected at stage I by province and age group, 2005 to 2008	. 28
Figure 17:	Percentage of women 20–69 years of age diagnosed with invasive cervical cancer* since last screening Pap test by province, 2005–2008	. 29

EXECUTIVE SUMMARY

This report presents information on the performance of cervical screening programs from across Canada. The goal of cervical screening is to decrease cervical cancer incidence and mortality through the early detection and treatment of pre-cancerous lesions and early stage invasive cervical cancer. In 2007, the Screening Performance Indicators Working Group—under the guidance of the Public Health Agency of Canada's Steering Committee for the Cervical Cancer Prevention and Control Network—developed 12 cervical cancer screening program performance indicators in five areas to help monitor cervical cancer screening progress:

- Coverage participation rate and retention rate
- Cytology performance specimen adequacy and screening test results
- System capacity cytology turnaround time and colposcopy follow-up rate
- Follow up biopsy rate and cytology-histology agreement
- Outcomes pre-cancer detection rate, cancer incidence, cancers diagnosed at stage I, and screening history in cases of invasive cancer¹

The monitoring of cervical cancer screening performance is a priority of the Pan-Canadian Cervical Screening Initiative (PCCSI), a national cervical cancer screening forum supported by the Canadian Partnership Against Cancer (the Partnership). To address this priority, the PCCSI formed a working group to coordinate the submission and analysis of baseline cervical screening data and to develop an inaugural report. The working group collaborated closely with cervical cancer screening programs to develop standardized reporting definitions and to submit screening data.

The degree of cervical cancer screening program organization varies across the country; therefore, information in this report is limited to provinces with available data: Newfoundland and Labrador, Nova Scotia, Manitoba, Ontario, Saskatchewan, Alberta, British Columbia and New Brunswick. Each provincial cervical cancer screening program reviewed and approved the data and report and all provinces and territories were kept informed of the process even if they did not submit data. This report presents data for the 12 cervical screening program performance indicators for women 20–69 years of age and for the years 2006–2008. The results provide baseline information about cervical cancer screening outcomes from across Canada. Some provinces were unable to submit data due to multiple factors including data availability, data completeness, human resource issues, information system capacity and technical resources. These gaps must be addressed as reliable, valid and available screening information is essential for evaluating cervical cancer screening in Canada. The next step in the process of monitoring cervical cancer screening program performance is the review and revision of the indicators to reflect changes in cervical cancer control including human papillomavirus testing and vaccination. Through this project and other initiatives, the PCCSI and the Partnership will continue to support the development of provincial and territorial organized cervical cancer screening programs.

Key results by indicator include the following:

Participation Rate

Participation is the percentage of eligible women in the target population who had at least one Pap test in a three-year period. Participation uncorrected for hysterectomy ranged from 63.8% to 75.5%. Participation corrected for hysterectomy ranged from 72.4% to 79.6%.

Retention Rate

Retention is the percentage of eligible women who were re-screened within three years after a negative Pap test. Retention ranged from 74.6% to 87.1%.

Specimen Adequacy Rate

Specimen adequacy is the percentage of unsatisfactory Pap tests, which ranged from 0.6% to 2.3% for conventional cytology and 0.5% to 1.7% for conventional cytology mixed with liquid-based cytology (LBC). The percentage of unsatisfactory Pap tests was 0.5% for the province that used LBC only.

Screening Test Results

Screening test results is the percentage of women by their most severe cytology result in a 12-month period. In order of severity, 95.3% of Pap test results were normal; 2.2% of abnormal cytology results were atypical squamous cells of undetermined significance (ASC-US); 1.7% were low-grade squamous intraepithelial lesions (LSIL); 0.1% were atypical glandular cells (AGC); 0.2% were atypical squamous cells, high-grade (ASC-H); and 0.5% were high-grade squamous intraepithelial lesions (HSIL) or more severe (carcinoma in situ and invasive cancer).

Cytology Turnaround Time

Cytology turnaround time is the median number of days from the date of specimen collection to the date the Pap test report is issued by the laboratory over a 12-month period. The median cytology turnaround time ranged from 10 to 24 days.

Colposcopy Follow-up Rate

Colposcopy follow-up rate is the percentage of women with a high-grade Pap test result (ASC-H and HSIL+) who had a colposcopy within three, six, nine and 12 months. The follow-up rate within 12 months ranged from 76.8% to 96.8%.

Biopsy Rate

Biopsy rate is the percentage of women with a highgrade Pap test result (ASC-H and HSIL+) who had a histological investigation within 12 months of the Pap test. The biopsy rate was 89.8%.

Cytology-histology Agreement

Cytology-histology agreement is the percentage of high-grade Pap test results (ASC-H and HSIL+) that had a histological confirmation of CIN II+ (moderate dysplasia) and CIN III+ (severe dysplasia, carcinoma in situ and invasive cervical cancer) within 12 months of the high-grade Pap test. The percentage of biopsy results that agreed with the Pap test result ranged from 43.6% to 67.5%.

Pre-cancer Detection Rate

The pre-cancer detection rate is the number of pre-cancerous lesions detected per 1,000 women screened who had a Pap test in a 12-month period. This rate ranged from 4.2 to 5.5 per 1,000 women screened.

Cancer Incidence

Cancer incidence is the number of new cases of invasive cervical cancer per 100,000 women. The age-standardized invasive cervical cancer incidence for women 20–69 years of age was 10.7 per 100,000 and ranged from 9.0 per 100,000 to 12.5 per 100,000.

Cancers Diagnosed at Stage I

Cancers diagnosed at stage I is the percentage of invasive cervical cancer cases detected at stage I according to the International Federation of Gynecology and Obstetrics (FIGO) classification system. Cancers diagnosed at stage I ranged from 36.2% to 58.5%.

Screening History in Cases of Invasive Cancer

Screening history in cases of invasive cancer is a retrospective summary of screening prior to diagnosis, and is measured as the percentage of women diagnosed with invasive cervical cancer since the last Pap test. The percentage of women diagnosed with invasive cervical cancer who had a Pap test greater than five years before a diagnosis of invasive cervical cancer or who had never had a Pap test ranged from 35.1% to 57.6%.

Background



Introduction

Screening using the Papanicolaou test (Pap test or cervical cytology) has led to significant reductions in cervical cancer incidence and mortality in Canada.² Despite this success, 1,400 Canadian women are diagnosed with invasive cervical cancer annually.³ Many studies have found that women diagnosed with invasive cervical cancer were not screened in the five years before diagnosis, were not followed appropriately after an abnormal Pap test, or the Pap test failed to detect their cancer.⁴ It is critical to continuously monitor and evaluate cervical cancer screening to ensure that Canadian women receive high-quality cancer prevention services.

Cervical screening has occurred in much of Canada spontaneously or opportunistically; however, organized screening programs provide the vital components to effectively reduce the burden of cervical cancer and to permit the evaluation of screening effectiveness, which is a key priority for the Pan-Canadian Cervical Screening Initiative (PCCSI), a national cervical cancer screening forum supported by the Canadian Partnership Against Cancer (the Partnership). In 2010, the PCCSI formed a working group to coordinate the submission and analysis of baseline cervical screening data from across Canada using 12 program performance indicators previously developed by the Screening Performance Indicators Working Group and the Public Health Agency of Canada.¹ The working group collaborated with screening programs from across the country to develop standardized reporting definitions and to submit cervical cancer screening data.

This report presents information on the 12 program performance indicators for women 20–69 years of age for 2006–2008. The results differ across the country and are influenced by the level of screening program organization, the target population, service access and provision, reporting thresholds for test results, follow-up and treatment, and screening interval recommendations. Data availability and completeness also differed by province. Appendix B provides detailed information about cervical cancer screening programs in Canada.

Human Papillomavirus

Cervical cancer is caused by the human papillomavirus (HPV). Of the more than 100 types of identified HPV, 40 infect the genital tract; of these, approximately 15 are considered high risk, with types 16 and 18 causally linked to 70% of cervical cancer cases. HPV is a prevalent sexually transmitted virus; peak prevalence occurs during adolescence and the early twenties after the commencement of sexual activity. Most HPV infections are transient and are cleared by the immune system without signs or symptoms. However, a small percentage of women experience persistent infections. For these women, the average time between being infected with a high-risk HPV type and developing a pre-cancerous lesion is 24 months, with a further 8–12 years before the development of invasive cervical cancer. Because of this long natural history, screening is an effective strategy for the identification and treatment of pre-cancerous cervical lesions.

Pre-cancerous Lesions

The goal of cervical screening is to decrease cervical cancer incidence and mortality through the early detection and treatment of pre-cancerous lesions, which include moderate and severe cervical dysplasia (cervical intraepithelial neoplasia II and III) and cervical carcinoma in situ. If a pre-cancerous lesion is removed or destroyed, invasive cervical cancer can usually be prevented.

Cervical Cancer

Cervical cancer is a malignancy of the cells lining the surface of the cervix. Approximately 80% of cervical cancers are squamous cell carcinomas (cancers that arise from squamous cells), 15% are adenocarcinomas (cancers that arise from glandular or columnar cells) and 5% are mixed adenosquamous cell carcinomas and other rare histological types. Invasive cervical cancer is a relatively uncommon disease in Canada due to the widespread use of screening and the diagnosis and treatment of pre-cancerous lesions. In 2006, 1,400 Canadian women were diagnosed with invasive cervical cancer; 380 women died from the disease.² Invasive cervical cancer incidence has declined from 15.4 per 100,000 in 1977 to 8.0 per 100,000 in 2006,² while invasive cervical cancer mortality has declined from 4.8 per 100,000 in 1977 to 2.0 per 100,000 in 2006.²

HISTORY OF CERVICAL CANCER SCREENING IN CANADA

In Canada, cervical cancer screening policy and organization occurs at the provincial and territorial level. The delivery of cervical cancer screening has been largely opportunistic, depending on the initiative of the individual woman and/or her health care provider. However, cervical screening programs in Canada are becoming increasingly organized. As early as 1973, the Conference of Deputy Ministers of Health recognized that cervical cancer screening should be implemented as organized screening programs, a recommendation repeated by a variety of task forces and published reports.^{5, 6} The minimum essential elements of an organized cervical screening program include an explicit screening policy with specific age categories, methods, and intervals for screening; a defined target population; a management team responsible for program implementation; a health care team that can provide care; a quality assurance structure; and a method for identifying cancer occurrence in the target population.⁷

CERVICAL CANCER SCREENING PROCESS

Figure 1 illustrates the cervical cancer screening process. Eligible women are given a Pap test by their health care provider, which is then processed by the laboratory. Women who have a normal Pap test result are rescreened every one to three years depending on provincial or territorial guidelines, while those who have an abnormal Pap test are sent for a repeat Pap test or colposcopy and/or biopsy depending on the severity of the abnormality. In an organized screening program, eligible women are invited to be screened and re-called based on the Pap test result.

Pap Test

The Pap test (cervical cytology) screens for abnormal changes in cervical cells. A sample of cervical cells is smeared on a slide (conventional cytology) or placed in a liquid fixative (liquid-based cytology – LBC) and screened for squamous or glandular pre-cancerous changes. These changes are classified on a scale of increasing severity using standardized terminology. In Canada, the most common classification system used is the 2001 Bethesda System.⁸

Follow-up and Treatment

Although guidelines vary slightly, the Pap test is usually repeated in six months for low-grade abnormalities. For high-grade abnormalities, the woman is referred for colposcopy, during which a detailed examination of the cervix is performed. In some cases, a biopsy is conducted to confirm the nature of the changes, and the lesion is treated by local excision, cryotherapy, laser ablation or conization.

Figure 1

The cervical cancer screening process



Methods



Development of Program Performance Indicators

In 2007, a Screening Performance Indicators Working Group was formed under the guidance of the Public Health Agency of Canada's Steering Committee for the Cervical Cancer Prevention and Control Network. The Working Group identified 12 indicators to facilitate the comparison of cervical cancer screening performance across Canada (Figure 2):¹

- Participation rate
- Retention rate
- Specimen adequacy
- · Screening test results
- Cytology turnaround time
- Colposcopy follow-up rate

- Biopsy rate
- Cytology-histology agreement
- Pre-cancer detection rate
- Cancer incidence
- Cancers diagnosed at stage I
- Screening history in cases of invasive cancer

The definition for each indicator is summarized in Table 1; Appendix C provides more detailed definitions.

Table 1

Program performance indicators for cervical cancer screening in Canada

Indicator	Definition
1. Participation Rate	Percentage of eligible women in the target population with at least one Pap test in a three-year period.
2. Retention Rate	Percentage of eligible women re-screened within three years following a negative Pap test in a 12-month period.
3. Specimen Adequacy Rate	Percentage of test results that are reported as unsatisfactory in a 12-month period.
4. Screening Test Results	Percentage of women by their most severe Pap test result in a 12-month period.
5. Cytology Turnaround Time	The median number of calendar days from the date the Pap test is taken to the date the Pap test report is issued by the laboratory in a 12-month period.
6. Colposcopy Follow-up Rate	Percentage of women with a high-grade Pap test result (ASC-H/ HSIL+) who had a follow-up colposcopy examination within three, six, nine and 12 months of the Pap test.
7. Biopsy Rate	Percentage of women with a high-grade Pap test result (ASC-H and HSIL+) who had a biopsy within 12 months of the Pap test.
8. Cytology-Histology Agreement	The percentage of high-grade Pap test results (ASC-H/HSIL+) that had a CIN II + (moderate dysplasia) or CIN III+ (severe dysplasia, carcinoma in situ and invasive cervical cancer) biopsy result within 12 months of the Pap test.

9. Pre-cancer Number of pre-cancerous lesions (CIN II – moderate dysplasia, CIN III — **Detection Rate** severe dysplasia and cervical carcinoma in situ excluding adenocarcinoma in situ) detected per 1,000 women screened in a 12-month period. 10. Cancer Incidence Number of new cases of invasive cervical cancer per 100,000 women. 11. Cancers Diganosed Percentage of cases of invasive cervical cancer diagnosed at stage 1 at Stage I (FIGO stage) in a 12-month period. Percentage of women with invasive cervical cancer whose last Pap test was six 12. Screening History in Cases months to less than three years, three to five years, or greater than five years of Invasive Cancer before the date of cancer diagnosis.

Project Approach

In 2010, the PCCSI established a working group that included PCCSI representatives from east, west and central Canada as well as the Public Health Agency of Canada (PHAC) and the Partnership to develop a process for monitoring cervical cancer screening nationwide. A working group chair and a program manager were also assigned to the project. The responsibilities of the working group were to identify what data should be collected, develop a data collection process, produce an inaugural report and plan for future reports.

A data group comprised of data analysts from each of the screening programs was also formed with the responsibilities of providing expertise and advice on data definitions, analytical details and methodology, and coordinating the data submission from each province.

The project approach included completing an environmental scan, sending a formal request for aggregate data to the provinces and territories, and developing a data document with detailed definitions for each of the 12 indicators (Appendix C). This document was circulated and reviewed by the data group several times to ensure reporting consistency across the cervical screening programs.

Data Submission and Analyses

Aggregate, non-identifiable data were submitted to the Partnership from the following cervical cancer screening programs: Newfoundland and Labrador, New Brunswick, Nova Scotia, Manitoba, Saskatchewan, Alberta, Ontario and British Columbia. Information was not available from Quebec, Prince Edward Island, the Yukon, the Northwest Territories and Nunavut. Not every province was able to submit data for every indicator due to multiple factors including data availability, data completeness, human resource issues, information system capacity and technical resources.

The Partnership's analytics team created data submission templates—which were reviewed and tested by the data group—using Excel to standardize the approach to data submission. The analytics team also created summary tables and figures that were reviewed by both the working group and data group, and were approved by the provincial cervical cancer screening programs.

Figure 2

Cancer screening indicators



Results



Results

Results are presented for women 20–69 years of age for the years 2006–2008. These years represent the most recent data consistently available from the cervical cancer screening programs.

The degree of program organization varies across the country; therefore, the information in this report is limited to provinces with available data: Newfoundland and Labrador, Nova Scotia, Manitoba, Saskatchewan, Alberta, British Columbia, Ontario and New Brunswick. All provinces and territories were kept informed of the process regardless of whether they were able to submit data.

Indicator variability between provinces is due to a variety of factors including the degree of program organization, characteristics of the target population, service access and provision, reporting thresholds for test results, availability of follow-up and treatment information, and the number and availability of health care providers and diagnostic assessment and treatment facilities.

Participation Rate

Participation is the percentage of eligible women who had at least one Pap test in a three-year period. The participation rate should exclude women who have had a total hysterectomy as these women may not need routine screening. At this time, participation corrected for hysterectomy was available for two provinces.

Figure 3 shows the percentage of women 20–69 years of age who had at least one Pap test from 2006 to 2008 by province. Participation uncorrected for hysterectomy ranged from 63.8% to 75.5%, while participation corrected for hysterectomy ranged from 72.4% to 79.6%. To correct for hysterectomy, Ontario used both administrative data to identify women who had a prior hysterectomy and previously published hysterectomy rates. British Columbia excluded all non-cervical cytology tests (e.g., vaginal vault tests), and adjusted the denominator based on historical hysterectomy rates within the province.



Figure 3

Percentage of women 20–69 years of age who had at least one Pap test by province, 2006–2008



Notes: Ontario and British Columbia provided participation rates corrected for hysterectomy. To correct for hysterectomy, Ontario used both administrative data to identify women who had a prior hysterectomy and previously published hysterectomy rates. BC excluded all non-cervical cytology tests (e.g., vaginal vault tests) and adjusted the denominator based on historical hysterectomy rates within the province. NL provided historical data from 2005–2007. AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population). Figure 4 shows the percentage of women 20-69 years of age who had at least one Pap test by 10-year age groups from 2006 to 2008. The rates are presented first for the provinces that provided participation uncorrected for hysterectomy and second for provinces that provided participation corrected for hysterectomy. Participation was 70.2% uncorrected for hysterectomy and 74.1% corrected for hysterectomy. Participation (non-hysterectomy corrected) decreased from 80.7% among 20-29 year old women to 50.6% among 60–69 year old women. When corrected for hysterectomy, participation was more uniform across the age groups and decreased only for women 60–69 years of age (67.8%). This highlights the importance of correcting for hysterectomy to reduce any misconceptions about where efforts at increasing participation should be directed.

Figure 4

Percentage of women who had at least one Pap test by age group, 2006–2008, provinces combined



Notes: Includes SK, NL, NS, MB and AB (non-hysterectomy corrected); BC and ON (hysterectomy corrected). NL provided historical data from 2005–2007. AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population).

Canadian Partnership Against Cancer 17

Retention Rate

Retention is the percentage of eligible women who are re-screened within three years after a negative Pap test. Figure 5 shows the percentage of women 20–69 years of age who had a Pap test within three years after a negative Pap test by province for 2004 and 2005 (non-hysterectomy corrected). Retention was 79.6% and ranged from 74.6% to 87.1%.

Figure 5

Percentage of women 20–69 years of age who had a Pap test within 3 years after a negative Pap test by province, 2004 and 2005



Figure 6 shows the percentage of women—by age group for 2004 and 2005—who had a Pap test within three years following a negative Pap result for all provinces combined. Retention decreased slightly with age from 81.8% in the 20–29 age group to 72.2% in the 60–69 age group.

Figure 6

Percentage of women who had a Pap test within three years following a negative Pap result by age group, 2004 and 2005, provinces combined



Notes: Includes SK, BC, ON, MB, NL, NS and AB. NL provided data for 2004. ON provided data for 2003 and 2006 for approximately 85% of all Pap tests performed in the province. AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population).

Notes: NL provided data for 2004. ON provided data for 2003 and 2006 for approximately 85% of all Pap tests performed in the province. AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population).

Specimen Adequacy

Specimen adequacy is the percentage of Pap test results in a 12-month period that the laboratory reports as unsatisfactory for interpretation. Specimen adequacy is influenced by variability between health care providers, laboratory reporting protocols and cytology type. Conventional cytology was used in Saskatchewan, Nova Scotia, British Columbia and Manitoba, while liquidbased cytology (LBC) was used in Ontario. Both LBC and conventional cytology (mixed) were used in Newfoundland and Labrador and Alberta during 2007 and 2008.

Figure 7 shows the percentage of unsatisfactory Pap tests for women 20–69 years of age by province for 2007 and 2008. The percentage of unsatisfactory Pap tests for the provinces combined was 1.1%, and the percentage of unsatisfactory Pap tests using conventional cytology ranged from 0.6% to 2.3%. The percentage of unsatisfactory Pap tests using LBC was 0.5%, while the percentage of unsatisfactory Pap tests using both conventional cytology and LBC was 0.5% and 1.7%.

Figure 7

Percentage of unsatisfactory Pap test results for women 20–69 years of age by province, 2007 and 2008



Notes: NL and SK provided data for 2007. ON provided data for approximately 87% of all Pap tests performed in the province. AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population).

Screening Test Results

Screening test results are the percentage of women by the most severe satisfactory Pap test result in a 12-month period using the 2001 Bethesda System of classification (Appendix D). Screening test results are influenced by the rate of cervical abnormalities in the population, specimen collection and preparation (conventional or LBC), interpretation, and reporting criteria. The percentage of abnormal Pap test results impacts the volume of colposcopy and other required procedures. Table 2 shows the percentage of women 20–69 years of age by their most severe Pap test result by province for 2007 and 2008. The percentage of women who had a negative Pap test result was 95.3%. The percentage of women who had an abnormal cytology result was 4.7% and ranged from 3.6% to 6.3%. Overall, 2.2% of abnormal cytology results were ASC-US, 1.7% were LSIL, 0.1% were AGC, 0.2% were ASC-H, and 0.5% were HSIL or more severe. The percentage of women who had an HSIL or more severe result ranged from 0.3% to 0.9%.

Table 2

Percentage of women 20–69 years of age by the most severe Pap test result by province, 2007 and 2008

	Percentage							
Pap Test Result	Provinces Combined	BC	SK	ON	NL	NS	AB	МВ
Negative	95.3	96.4	96.0	95.2	94.7	94.6	94.4	93.6
ASC-US	2.2	2.0	NA	2.3	2.0	2.9	1.9	3.0
LSIL	1.7	0.8	NA	1.9	2.5	1.3	2.7	2.0
AGC	0.1	0.1	NA	0.1	0.2	0.3	0.1	0.1
ASC-H	0.2	0.2	NA	0.1	0.2	0.4	0.2	0.3
HSIL+	0.5	0.5	NA	0.3	0.4	0.5	0.7	0.9
Abnormal Low	-	_	3.2	_	-	-	_	_
Abnormal High	-	_	0.8	_	-	-	_	-
Total Abnormal	4.7	3.6	4.0	4.7	5.3	5.4	5.6	6.3

Notes: Provinces combined includes AB, BC, MB, NL, NS and ON. SK provided two cytology categories: abnormal low and abnormal high. Abnormal low includes AGC, AGCN, AGEC, AGECN, AGEM, ASA, ASCU, ASE and LSIL. Abnormal high includes ADC, AIS, ASHG, HSIL, PC2, PSCC and SCC. (Refer to Appendix D for the full name of the codes). NL provided data for 2007. AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population). ON provided data for approximately 87% of all Pap tests performed in the province. Approximately 0.01% of the Pap tests had an 'other abnormal cell' finding and were excluded from this calculation.

Figure 8 illustrates the percentage of women 20–69 years of age by their most severe abnormal Pap test result (ASC-US, LSIL, AGC, ASC-H and HSIL+) by province for 2007 and 2008. Saskatchewan provided two summary Pap test result categories: abnormal low and abnormal high.

Figure 8

Percentage of women 20–69 years of age by the most severe abnormal Pap test result by province, 2007 and 2008



Notes: Provinces combined includes AB, BC, MB, NL, NS and ON. SK provided two cytology categories: abnormal low and abnormal high. Abnormal low includes AGC, AGCN, AGEC, AGECN, AGEM, ASA, ASCU, ASE and LSIL. Abnormal high includes ADC, AIS, ASHG, HSIL, PC2, PSCC and SCC. (Refer to Appendix D for the full name of the codes). NL provided data for 2007. AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population). ON provided data for approximately 87% of all Pap tests performed in the province. Approximately 0.01% of the Pap tests had an 'other abnormal cell' finding and were excluded from this calculation. Table 3 and Figure 9 show the percentage of women by their most severe Pap test result and age group (excluding Saskatchewan). The percentage of women who had a negative Pap test result increased with age from 90.3% for women 20–29 years of age to 98.4% for women 60–69 years of age. The percentage of women who had an HSIL or more severe Pap test result decreased with age from 1.1% for women 20–29 years of age to 0.1% for women 60–69 years of age.

Figure 9

Percentage of women by most severe abnormal Pap test result and age group, 2007 and 2008, provinces combined



Notes: Includes AB, BC, MB, NL, NS and ON. NL provided data for 2007. AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population). ON provided data for approximately 87% of all Pap tests performed in the province. Approximately 0.01% of the Pap tests had an 'other abnormal cell' finding and were excluded from this calculation.

Table 3

Percentage of women by the most severe Pap test result and by age group, 2007 and 2008, provinces combined

	Percentage						
Pap Test Result	20–69	20–29	30–39	40-49	50–59	60–69	
Negative	95.3	90.3	95.5	96.5	97.6	98.4	
ASC-US	2.2	4.1	2.1	1.9	1.3	0.9	
LSIL	1.7	4.1	1.5	1.0	0.6	0.3	
AGC	0.1	0.1	0.1	0.2	0.2	0.2	
ASC-H	0.2	0.4	0.2	0.1	0.1	0.1	
HSIL+	0.5	1.1	0.6	0.3	0.2	0.1	
Total Abnormal	4.7	9.8	4.5	3.5	2.4	1.6	

Notes: Includes AB, BC, MB, NL, NS and ON. NL provided data for 2007. AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population). ON provided data for approximately 87% of all Pap tests performed in the province. Approximately 0.01% of the Pap tests had an 'other abnormal cell' finding and were excluded from this calculation.

Cytology Turnaround Time

Cytology turnaround time is the median number of days from performance of the Pap test to issuance of the Pap test report by the laboratory over a 12-month period. Cytology turnaround time is a measure of the system's capacity to process Pap tests in a timely manner and is influenced by human resources and information systems.

Table 4 shows the median cytology turnaround time for women 20–69 years of age by province for 2007 and 2008. The median cytology turnaround time ranged from 11–53 days in 2007 and 10–24 days in 2008.

Table 4

Median number of days from performance of the Pap test to issuance of the Pap test report by the laboratory by province for women 20–69 years of age

	Median Number of Days				
Province	2007	2008			
ВС	14	11			
MB	11	10			
NL	12	NA			
NS	53	24			
ON	21	16			
SK	12	14			

Notes: NL provided data for 2007. ON provided data for approximately 87% of all Pap tests performed in the province. The implementation of a new information system in NS during this time period led to an increased cytology turnaround time.

Colposcopy Follow-up Rate

The colposcopy follow-up rate is the percentage of women with a high-grade Pap test result (ASC-H and HSIL+) who had a follow-up colposcopy examination within three, six, nine and 12 months. A colposcopy is a visual examination of the cervix that is sometimes accompanied by a biopsy to confirm a cervical abnormality.

The colposcopy follow-up rate excludes colposcopies that were performed within seven days of the Pap test as the Pap test may have been taken at the time of colposcopy and is unlikely to be the reason for the colposcopy referral. The colposcopy follow-up rate is influenced by the cytology turnaround time and may differ by province because of the completeness and availability of colposcopy data.

Table 5 and Figure 10 show the percentage of women 20–69 years of age with a high-grade Pap test result (ASC-H and HSIL+) who had a colposcopy examination within three, six, nine and 12 months for 2007 and 2008. The 12-month colposcopy follow-up rate was 76.8%, 81.4% and 96.8%.

Table 5

Percentage of women 20–69 years of age with a high-grade (ASC-H and HSIL+) Pap test result who had a follow-up colposcopy examination within 12 months by province, 2007 and 2008

A4 a wala	Percentage					
Month	MB	ВС	AB			
0–3	35.8	60.0	31.1			
3–6	24.2	16.1	54.9			
6–9	12.5	3.6	7.2			
9–12	4.3	1.7	3.6			
Total within 12 months	76.8	81.4	96.8			

Notes: BC received 97% of all colposcopy reports. AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population).

Figure 10

Percentage of women 20–69 years of age with a high-grade Pap test result (ASC-H and HSIL+) who had the follow-up colposcopy examination within 12 months by province, 2007 and 2008



Notes: BC received 97% of all colposcopy reports. AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population).

Biopsy Rate

The biopsy rate is the percentage of women with a high-grade Pap test result (ASC-H and HSIL+) who had a biopsy (histological investigation) within the following 12 months. The biopsy rate is influenced by the colposcopy follow-up rate, the source of biopsy information and reasons for not performing a biopsy (i.e., pregnancy or the inability to identify the area of abnormality).

Information on the biopsy rate was available for British Columbia. The percentage of women 20–69 years of age with a high-grade (ASC-H and HSIL+) Pap test result who had a biopsy within 12 months for 2007 and 2008 was 89.8%.

Cytology-Histology Agreement

The cytology-histology agreement is the percentage of high-grade Pap test results (ASC-H and HSIL+) that had a histological confirmation of CIN II+ (moderate dysplasia) and CIN III+ (severe dysplasia, carcinoma in situ and invasive cervical cancer) within 12 months of the high-grade Pap test. A histological confirmation includes any cervical, vaginal or endo-cervical biopsy result. The agreement between cytology and histology is influenced by the colposcopy follow-up rate, the biopsy rate, and the completeness and availability of colposcopy and biopsy information. Over-calling cytology (i.e., a low cytology-histology agreement or unnecessarily sending women for a colposcopy) can create longer wait times for women who do need a colposcopy.

Figure 11 shows the cytology-histology agreement for women 20–69 years of age for 2007 and 2008. The percentage of biopsy results that agreed with the Pap test result (CIN II or CIN III+ biopsy result and an ASC-H or HSIL+ Pap test result) was 67.5%, 51.3% and 43.6%, while the percentage of biopsy results that did not agree with the Pap test result (negative or CIN I biopsy result and an ASC-H or HSIL+ Pap test result) was 32.5%, 48.7% and 56.5%.

Figure 11

Percentage of high-grade Pap tests (ASC-H and HSIL+) for women 20–69 years of age who had biopsy results* within 12 months by province, 2007 and 2008





Notes: AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population). AB provided data for CIN II and CIN III+ combined.

* Histological confirmation includes any cervical, vaginal or endo-cervical histology result.

Pre-cancer Detection Rate

The pre-cancer detection rate is the number of pre-cancerous lesions (CIN II and CIN III biopsy results—moderate and severe dysplasia and cervical carcinoma in situ excluding adenocarcinoma in situ) detected per 1,000 women screened in a 12-month period. Differences in the pre-cancer detection rate may be related to the availability of biopsy data.

Figure 12 shows the number of women 20–69 years of age diagnosed with a pre-cancerous lesion (CIN II or CIN III biopsy result) per 1,000 women screened for 2007 and 2008. The pre-cancerous detection rates were 4.2, 5.1 and 5.5 per 1,000 women screened.

Figure 12

Number of women 20–69 years of age diagnosed with a pre-cancerous lesion* per 1,000 women screened by province, 2007 and 2008



Notes: NL provided data for 2007 and includes approximately 95% of all cytology reports.

*Pre-cancerous lesions include CIN II (moderate dysplasia) and CIN III (severe dysplasia and cervical carcinoma in situ excluding adenocarcinoma in situ). Figure 13 shows the pre-cancer detection rate per 1,000 women screened by age group and province for 2007 and 2008. The pre-cancer detection rate was higher among women 20–29 years of age (10.1, 10.5 and 12.3 per 1,000 women screened) and decreased with age.

Figure 13

Number of women diagnosed with a pre-cancerous lesion* per 1,000 women screened by age group, 2007 and 2008



Notes: NL provided data for 2007 and includes approximately 95% of all cytology reports.

*Pre-cancerous lesions include CIN II (moderate dysplasia) and CIN III (severe dysplasia and cervical carcinoma in situ excluding adenocarcinoma in situ).

Cancer Incidence

Cervical cancer incidence is the number of new cases of invasive cervical cancer per 100,000 women 20–69 years of age. Invasive cervical cancer includes squamous cell cancers, adenocarcinomas, adenosquamous carcinomas and unclassified cervical cancers (i.e., all ICD-O C53 codes).

Figure 14 shows the age-standardized invasive cervical cancer incidence per 100,000 women by province from 2005 to 2008. The age-standardized invasive cervical cancer incidence for the provinces combined was 10.7 per 100,000 women; incidence ranged from 9.0 to 12.5 per 100,000 women. Because this rate is for women 20–69 years of age, it may not be comparable to the rates presented for all age groups in other reports.

Figure 14

Number of women diagnosed with a pre-cancerous lesion* per 1,000 women screened by province, 2007 and 2008



Note: ON included data for 2005-2007.

*Invasive cervical cancer includes squamous cell cancers, adenocarcinomas, adenosquamous carcinomas and unclassified cervical cancers (i.e., all ICD-O C53). Figure 15 shows invasive cervical cancer incidence per 100,000 women by age group for the provinces combined for 2005 to 2008. The incidence rate was lowest for the 20–29 age group (4.1 per 100,000), increased for the 30–39 and 40–49 age groups (14.0 and 13.9 per 100,000, respectively), then decreased for the older age groups (11.6 per 100,000 for the 50–59 age group and 10.9 per 100,000 for the 60–69 age group).

Figure 15

Invasive cervical cancer* incidence per 100,000 by age group, provinces combined, 2005–2008



Notes: Includes AB, BC, MB, NB, NL, NS, ON and SK.

*Invasive cervical cancer includes squamous cell cancers, adenocarcinomas, adenosquamous carcinomas and unclassified cervical cancers (i.e., all ICD-O C53).

Cancers Diagnosed at Stage I

Cancers diagnosed at stage I are the percentage of invasive cervical cancers that were diagnosed at stage I using the International Federation of Gynecology and Obstetrics (FIGO) stage classification system. In a stage I cervical cancer, the cancer cells have grown from the surface layer of the cervix into deeper cervical tissues, and while the cancer may also be growing into the body of the uterus, it has not grown outside of it.

Figure 16 shows the percentage of invasive cervical cancers detected at stage I by province and age group for 2005 to 2008. The percentage of stage I cancers for women 20–69 ranged from 36.2% to 58.5%. Women 20–49 years of age had a higher percentage of stage I cancers than women 50–69 years of age in every province.

Figure 16

Percentage of invasive cervical cancers* detected at stage I by province and age group, 2005 to 2008



Notes: NS provided data for 2007 and 2008 for the combined age group 20–69.

*Invasive cervical cancer includes squamous cell cancers, adenocarcinomas, adenosquamous carcinomas and unclassified cervical cancers (i.e., all ICD-O C53).

Screening History in Cases of Invasive Cancer

Screening history in cases of invasive cancer is a retrospective summary of screening prior to diagnosis. Screening history is measured by the percentage of women diagnosed with invasive cervical cancer whose last Pap test was six months to less than three years, three to five years, or greater than five years before the date of cancer diagnosis. Greater than five years includes women who had no record of a Pap test or who had a Pap test during the six months before diagnosis, as this Pap test was most likely performed for diagnostic not screening purposes.

Figure 17 shows the percentage of women 20–69 years of age diagnosed with invasive cervical cancer since the last screening Pap test by province for 2005 to 2008. Overall, 48.7% of women had a Pap test six months to three years before diagnosis; 9% had a Pap test three to five years before diagnosis; and 42.3% had a Pap test greater than five years before diagnosis.

Figure 17

Percentage of women 20–69 years of age diagnosed with invasive cervical cancer* since last screening Pap test by province, 2005–2008



Notes: ON provided data for 2008 only and >5 years included >5 to 10 years. Provinces combined include NS, BC, MB and NL.

*Invasive cervical cancer includes squamous cell cancers, adenocarcinomas, adenosquamous carcinomas and unclassified cervical cancers (i.e., all ICD-O C53).

** The greater than five or never category includes women whose Pap tests were greater than five years prior to diagnosis, who had no record of any Pap tests, or whose Pap tests occurred during the six months prior to diagnosis and were therefore considered diagnostic Pap tests.

DISCUSSION

This report presents outcomes for twelve cervical cancer screening program performance indicators. The results provide baseline data from across Canada as well as information about data completeness and availability. Data availability is related to many factors including the extent of program organization in each province, data accessibility, human resource issues, information technology availability and time constraints.

Across Canada, cervical cancer screening participation and retention is high. However, additional information is needed about women with lower rates of participation and retention and targeted initiatives to encourage screening may be required. The literature suggests that participation and retention are influenced by various factors including socio-economic status, perception of risk, screening acceptability, accessibility and the availability of invitation and recall systems.

Specimen adequacy and screening test results vary across the country and may be influenced by cytology preparation type (conventional or LBC) as well as variations in the cervical abnormality rate in the population, specimen collection, interpretation and reporting criteria. The cytology turnaround time provides information on how well screening is functioning as a part of the health care system. The time required to process a Pap test may be influenced by the availability of personnel or resources in each province, the volume of Pap tests and the capacity to address increased screening participation. Limited information was available on the colposcopy follow-up rate, biopsy rate, and cytology-histology agreement which relates to the availability and completeness of colposcopy and histology information.

The pre-cancer detection rate, invasive cervical cancer incidence and screening history for women diagnosed with invasive cervical cancer provide important feedback on screening outcomes. Unfortunately, limited data was available on the detection rate of pre-cancerous lesions. Finally, almost half of women diagnosed with invasive cervical cancer had either not had a Pap test in the previous five years or had never had a Pap test. Had these women been screened, many of these cancers could have been prevented.

CHALLENGES AND FUTURE DIRECTIONS

Several key challenges were identified throughout the process of compiling cervical screening information from across Canada. For example, data is incomplete from many provinces and territories. This issue must be addressed, as reliable, valid, available and accessible screening information is essential to monitor cervical cancer screening in Canada. In addition, there is wide variability in some indicators that may have been influenced by factors such as the extent of program organization, available data and adequate resources as well as other unknown factors.

Over the next few years, the use of HPV testing and the implementation of HPV vaccination programs across the country will have a significant impact on cervical cancer

screening. HPV vaccination and testing will influence screening guidelines and may indirectly alter Pap test performance, making it important to monitor performance indicators by HPV vaccination status and HPV testing outcomes. To do so, cervical cancer screening data will need to be linked to HPV immunization and HPV test data. The establishment of comprehensive and integrated information systems to optimize the benefits of screening and vaccination is desirable.

The next step in the process of monitoring cervical cancer screening program performance is the review and revision of the indicators to reflect changes in cervical cancer control and the development of a second report. Through this project and other initiatives, the PCCSI and the Partnership will continue to support the development of provincial- and territorial-organized cervical cancer screening programs.



REFERENCES

- Public Health Agency of Canada, Cervical Cancer Prevention & Control Network. Performance Monitoring for Cervical Cancer Screening Programs in Canada 2009. Ottawa, ON: PHAC; 2009.
- ² Canadian Cancer Society's Steering Committee on Cancer Statistics. Canadian Cancer Statistics 2008. Toronto, ON: Canadian Cancer Society; 2008.
- ³ Canadian Cancer Society's Steering Committee on Cancer Statistics. Canadian Cancer Statistics 2011. Toronto, ON: Canadian Cancer Society; 2011.
- ⁴ Spence A, Goggin P, Franco E. (2007). Process of care failures in invasive cervical cancer: Systematic review and meta-analysis. Preventive Medicine, 2007; 45: 93-106.

- ⁵ Walton R.J., Blanchet M, Boyes D.A., Carmichael J.A., Marshall K.G., Miller A.B. et al. Cervical cancer screening programs. CMAJ, 1976; 114:1003-33.
- ⁶ Miller A.B., Anderson J., Brisson J., Laidlaw N., Le Pitre P., Malcolmson P. et al. Report of a National Workshop on Screening for Cancer of the Cervix. CMAJ; 1991; 1301-25.
- ⁷ IARC Handbooks of Cancer Prevention. Volume 10. Cervix Cancer Screening. International Agency for Research on Cancer (IARC) Lyon, France: IARC Press; 2005.
- ⁸ Nayar R, Solomon D. National Cancer Institute Bethesda Web Atlas. Available from: http://nih.techriver.net; 2004.

APPENDIX A — Working Group Membership, 2010–11

The working group included the following members:

- Kathleen Decker (Canadian Partnership Against Cancer – Chair)
- Meg McLachlin (Pan-Canadian Cervical Screening Initiative)
- Lisa Kan (British Columbia Cancer Agency)
- Joanne Rose (Cervical Screening Initiatives Program, Newfoundland and Labrador)
- Jay Onysko (Public Health Agency of Canada)
- Rukshanda Ahmad (Public Health Agency of Canada)
- Karen Atkin (Cancer Care Ontario)
- Patricia Goggin (Institut national de santé publique du Québec)
- Verna Mai (Canadian Partnership Against Cancer)
- Susan Fekete (Canadian Partnership Against Cancer)
- Mary Anne Zupancic (Canadian Partnership Against Cancer)

The data group included the following members:

- Kathleen Decker (Canadian Partnership Against Cancer Chair)
- Jeremy Hamm (British Columbia Cancer Agency)
- Song Gao (Alberta Health Services)
- Riaz Alvi (Saskatchewan Cancer Agency)
- Tong Zhu (Saskatchewan Cancer Agency)
- Natalie Biswanger (CancerCare Manitoba)
- Raymond Przybysz (Cancer Care Ontario)
- Bin Zhang (New Brunswick Department of Health)
- Beth Halfyard (Centre for Health Information, Newfoundland and Labrador)
- Sarah MacDonald (Cancer Care Nova Scotia)
- Sharon Fung (Canadian Partnership Against Cancer)
- Jin Niu (Canadian Partnership Against Cancer)
- Gina Lockwood (Canadian Partnership Against Cancer)
- Mary Anne Zupancic (Canadian Partnership Against Cancer)

APPENDIX B -

	-
_	2
	2
	2
(4
	<u> </u>
ľ	-
	č
	2
	σ
	Ľ
	2
	2
	ō
	O
	Ē
	1
	v.
	ð
	e c
	scree
	er scree
	cer scree
	ncer scree
	ancer scree
	cancer scree
	al cancer scree
	cal cancer scree
-	/ical cancer scree
-	rvical cancer scree
•	ervical cancer scree

ž	64	2003	Following sexual activity	No recom- mendation	Annual/ changes pending 2011	No	N	Yes — Care providers						
ā	04		18 or within 3 years of onset of sexual activity	75, after 2 neg. tests in previous 10 years	Biennial	No	N	٩ ٧						
N	04	166 1	Within 3 years of first vaginal sexual activity or at age 21, whichever occurs first	75 with 3 or more neg. tests in previous 10 years	Biennial after 3 normal	No	Pap screen history by request	Yes — Care providers						
B	S		21 or 3 years after first intimate sexual activity, whichever occurs later	69 with 3 consecutive annual neg. tests in previous 10 years	Biennial after 3 consecutive annual neg. tests and every 3 years when recall system is in place	No	°N N	Not at this time						
S	S		Guidelines to be released in September 2011	Guidelines to be released in September 2011	Guidelines to be released in September 2011	No	No	No						
No	6	2000	Within 3 years of sexual activity	70 with adequate screening in last 10 years	Biennial or triennial after 3 neg. tests	Planning underway	No	No						
WB	0 (2010)	1999	3 years following sexual activity	70 with 3 consecutive neg. tests in previous 10 years with no change in partner	Biennial	Yes	By request from women only	Yes — Care providers and woman						
SK	0 (2009)	2003	8[69	Triennial after 2 normal	Yes	Yes	Yes — Care providers						
AB	PO	2000	21 or 3 years after becoming sexually active, whichever occurs later	69 with 3 consecutive neg. tests	Triennial after 3 annual neg. tests	Yes — for part of the province	Yes	Yes — Care providers and woman						
B	04	1960	Shorrly following sexual activity	69 with 3 consecutive neg. tests	Biennial after 3 normal	No	No — Results to provider	Yes — Care providers						
R	S					No	No	NA						
Ł	S		3 years post sexual debut or age 21	Age 69	Triennial, then biennial if normal	No	No	Yes — Care providers						
F	S		BCCA guidelines	BCCA guidelines		No	°N N	NA						
Snap Shot of Program Elements (As of June 2011)	Type of Program 5 – Spontaneous PO – Partially Organized 0 – Organized	Program Launched/ Announced	Start Screening	Stop Screening	Screening Interval	Population-based Recruitment	Result Letters to Women	Reminders for Follow up after Abnormal Pap						
R	LBC	ASC-US triage			>			>	>	>		Updating		>
--	--	--	----------------	---	--	---------------------	------------------	----------	-----------	------------	-------------------	---	-----------------------------------	---------------------------------------
ā	J	Neither		>	>							Revised 2010		
ß	U	Neither		>	>							>	>	>
۳	8	ASC-US triage										Approved (adapted from AB and ON)	>	
õ	U	Neither										Proposed plan to implement 2011		Developing nursing screening tools
NO	۵	ASC-US triage	_	Underway		-		>				Updating 2011		>
WB	J	Neither		>	>		>	>		>		Revising	>	>
SK	U	Neither		>	>		>	>	>	>		Revising		
AB	ß	Neither		>	>		>	>		>		>		
B	J	ASC-US triage and primary screening	-	>	>	-		>	>	>		>	>	>
Ę	LBC	Neither												
ž	LBC	ASC-US triage	_			_						Revised March 2010		
Þ	J	Neither												
Snap Shot of Program Elements (As of June 2011)	Conventional (C) Liquid-based Cytology (LBC) Both (B)	HPV Testing for ASC-US Triage or for Primary Screening	Administration	Tracking of Positive Screens and Appropriate Follow-up	Recall System to Health Care Providers for Overdue Pap Tests	Information Systems	Population-based	Cytology	Histology	Colposcopy	Quality Assurance	Screening Guidelines	Program Report with Indicators	Training Manuals

APPENDIX C -

Data definitions

Indicator (For women 20–69 years of age)	Calculation	Notes
1. Participation Rate – Percentage of eligible women in the target population with at least one Pap test in a three-year period.	Numerator – Number of women with at least one Pap test in a three-year period. By ten-year age groups (20–29, 30–39, 40–49, 50–59, 60–69) and for ages 15–19.	 Use the first Pap test that occurs in the three-year time period. Use the date the Pap test was performed.¹ Time periods – Jan. 1, 2004 to Dec. 31, 2006, Jan. 1, 2005 to Dec. 31, 2007 and Jan. 1, 2006 to Dec. 31, 2008. Do not exclude women who have had a cervical cancer diagnosis. Exclude women who have had a hysterectomy if possible and note methodology. Calculate age at Pap test date.
	Denominator – Number of women in the target population at year two.	 Define population using Statistics Canada population estimates at year two (Jan. 1, 2005, Jan. 1, 2006 and Jan. 1, 2007). Do not exclude women who have had a cervical cancer diagnosis. Exclude women who have had a hysterectomy if possible. Calculate 10-year age specific rates. Calculate an age standardized rate for the 20–69 age group standardized to the 1991 Canadian population.

¹ If the date that the Pap test was performed is not available, use the date the Pap test was processed by the lab.

2. Retention Rate – Percentage of eligible women re-screened within three years following a negative Pap test in a 12-month period.	Numerator – Number of women who had a subsequent Pap test within three years of the index Pap test with a negative result. By ten-year age groups (20–29, 30–39, 40–49, 50–59, 60–69).	 The index Pap test is the last Pap test in the 12-month period. Use the date the Pap test was performed.² Time periods - Include women who had a negative Pap test in 2004 and follow-up for three years from the date of the Pap test; women who had a negative Pap test in 2005 and follow-up for three years from the date of the Pap test. Calculate the woman's age when the index Pap test with a negative result was performed.
	Denominator – Number of women with a negative Pap test in a 12-month period.	• 12-month period is defined as Jan. 1, 2004 to Dec. 31, 2004 for the first time period and Jan. 1, 2005 to Dec. 31, 2005 for the second time period.
3. Specimen Adequacy – Percentage of test results that are reported as unsatisfactory in a 12-month period.	Numerator – Number of Pap tests with an unsatisfactory result. By ten-year age groups (20–29, 30–39, 40–49, 50–59, 60–69).	 Use calendar year – 2005, 2006, 2007 and 2008. Count each unsatisfactory Pap test because this indicator is Pap test not woman-based. Calculate age when the unsatisfactory Pap test was performed. If more than one Pap test was unsatisfactory, calculate age at the time of each Pap test. Use the date the Pap test was performed. Identify whether or not cytology is conventional or LBC. If both conventional and LBC are used, separate results by type of cytology. If type of cytology is unknown, complete unknown cytology category.
	Denominator – Total number of Pap tests.	• The total number of Pap tests for each year (some women will have more than one Pap test in each year).

 2 If the date that the Pap test was performed is not available, use the date the Pap test was processed by the lab.

4. Screening Test Results – Percentage of women by their most severe Pap test result in a 12-month period.	Numerator – Number of women with a negative, ASC- US, LSIL, AGC, ASC-H, HSIL or more severe Pap test result. By ten-year age groups (20–29, 30–39, 40–49, 50–59, 60–69).	 Count the number of women. For calendar years 2005, 2006, 2007 and 2008. Use the date the index Pap test was performed with the most severe result in that year. Define severity as Negative < ASC-US < LSIL<agc <="" asc-h="" hsil="" li="" more="" or="" severe.<=""> Use the cytology diagnostic category map. If there are two Pap tests of the same severity, choose the first. Calculate age using the date the Pap test was performed that had the most severe result. </agc>
	Denominator – Total number of women with a satisfactory Pap test result.	 Count the most severe satisfactory Pap test.
5. Cytology Turnaround Time – The median number of calendar days from the date the Pap test is taken to the date the Pap test report is issued by the lab over a 12-month period.	Numerator: The median number of calendar days from the date the Pap test is taken to the date the Pap test report is issued by the lab.	 For calendar years 2005, 2006, 2007 and 2008. Use the number of days between each Pap test (performed) in the calendar year and the subsequent Pap test lab report date. Include unsatisfactory Pap tests.
	Denominator: N/A.	

6. Colposcopy Follow-up Rate – Percentage of women with a high-grade Pap test result (ASC-H/ HSIL+) who had follow-up colposcopy examina- tion within three, six, nine, 12 months subsequent to the index Pap test.	Numerator – Number of women who had a colposcopy within three, six, nine, 12 months of a Pap test with an ASC-H/ HSIL+ result. By ten-year age groups (20–29, 30–39, 40–49, 50–59, 60–69).	 Use calendar years 2005, 2006, 2007 and 2008. Use the date the Pap test with the ASC-H /HSIL+ result was performed. The Pap test should be performed in the calendar year of interest but the colposcopy can be performed in the next calendar year. The colposcopy date is the date the first colposcopy is performed after the date the Pap test was performed. Exclude all colposcopies that were performed within seven days of the Pap test. Calculate the woman's age at the date the Pap test with the ASC-H / HSIL+ result was performed. 0-3 months (1 to 90 days). 3-6 months (91 to 182 days). 9-12 months (275 to 365 days).
	Denominator – Total number of women with a high-grade Pap test result (ASC-H/ HSIL+) reported in a 12-month period.	• For calendar years 2005, 2006, 2007, 2008.

7. Biopsy Rate – Percentage of women with a high-grade Pap test (ASC-H/ HSIL+) who had a biopsy within the following 12 months.	Numerator – Number of women with a histological investigation within 12 months of the ASC-H/ HSIL+ cytologi- cal finding. By ten-year age groups (20–29, 30–39, 40–49, 50–59, 60–69).	 For calendar years 2005, 2006, 2007, 2008. Use the date the Pap test with an ASC-H /HSIL+ finding was performed. The Pap test should be performed in the calendar year of interest but the biopsy can be performed in the next calendar year. Calculate the woman's age at the date the Pap test with the ASC-H / HSIL+ result was performed. A histological investigation includes any cervical pathology report (including cervical, vaginal and endo-cervical). Include women who had a biopsy without histological result. If biopsy is performed within seven days of the Pap test, exclude.
	Denominator – Number of women with a cytological finding of ASC-H/ HSIL+ in a 12-month period.	• For calendar years 2005, 2006, 2007 and 2008.

8. Cytology-Histology Agreement – Percentage of high- grade Pap test results (ASC-H and HSIL+) that had a histological confirmation of CIN II+ and CIN III+.	Numerator – Number of Pap tests with an ASC-H/ HSIL+ result that had a histological confirmation of CIN III+ within 12 months of the ASC-H/HSIL+ Pap test. Number of Pap tests with an ASC-H/ HSIL+ result that had a histological confirmation of CIN II+ (CIN II or greater) within 12 months of the ASC-H/ HSIL+ Pap test.	 Use calendar years 2005, 2006, 2007 and 2008. Use the date the Pap test with the ASC-H/ HSIL+ result was performed. The Pap test should be performed in the calendar year of interest but the biopsy can be performed in the next calendar year. Use the cytology diagnostic category map. CIN II = moderate dysplasia. CIN III+ = severe dysplasia, carcinoma in situ and invasive cancer.
	Denominator – Number of Pap tests with an ASC-H/HSIL+ result that had a histological work-up within 12 months of the ASC-H/ HSIL+ Pap test.	 Use calendar years 2005, 2006, 2007 and 2008. A histology result includes any cervical, vaginal or endo-cervical histology result.
9. Pre-cancer Detection Rate – Number of pre-cancer- ous lesions detected per 1,000 women whohad a Pap test in a 12-month period.	Numerator – Number of women with histology CIN II or CIN III. By ten-year age groups (20–29, 30–39, 40–49, 50–59, 60–69).	 For calendar years 2005, 2006, 2007 and 2008. Use the most severe biopsy that was performed. Year is defined by the Pap test date. Use the age at the date the Pap test was performed. Histology must occur within 12 months of the Pap test. CIN II/III includes moderate and severe dysplasia and CIS (it does not include AIS).
	Denominator – Number of women who had at least one Pap test.	 Use calendar years 2005, 2006, 2007 and 2008. Use the date the Pap test was performed. Count each woman once. If the woman had more than one Pap test, use the first Pap test.

10. Cancer Incidence – Number of new cases of invasive cervical cancer per 100,000 women.	Numerator – Number of new cases of invasive cervical cancer. For 15–19, 20–69 and 70+ years of age. By 10 year age groups (15–19, 70+) for 2005–2008.	 Use calendar years 2005, 2006, 2007 and 2008. Invasive cervical cancers include squamous cell cancers, adenocarcinoma, adenosquamous and not classified; i.e., all cases with an ICD-O C53 topography code. Define age as the woman's age at diagnosis (pathology/biopsy).
	Denominator – Provincial population for each age group.	 Age-standardized incidence rates should be standardized to the 1991 Canadian population. Define population using Statistics Canada population estimates at the mid-year (July 1, 2005, July 1, 2006, July 1, 2007 and July 1, 2008).
 Percentage of Cancers Detected at Stage I – Percentage of invasive cervical cancers diagnosed at stage 1 in a 12-month period (FIGO stage). 	Numerator – Number of invasive cervical cancers diagnosed at stage 1. For two age groups: 20–49 and 50–69.	 Timeframe – Jan. 1, 2005 to Dec. 31, 2008. Map TNM to FIGO (T1=I, T1A=IA, T1a1=IA1, T1a2=IA2, T1b=IB, T1b1=IB1, T1b2=IB2) before submission. Define age as the woman's age at diagnosis (pathology/biopsy). Invasive cervical cancers include squamous cell cancers, adenocarci- noma, adenosquamous and not classified; i.e., all cases with an ICD-O C53 topography code.
	Denominator – Number of invasive cervical cancers.	• Timeframe – Jan. 1, 2005 to Dec. 31, 2008.

12. Screening History in Cases of Invasive Cancer – Percentage of women diagnosed with inva- sive cervical cancer since the time of the previous Pap test.	Numerator – Number of women diagnosed with invasive cervical cancer within 0.5–3 years of previous Pap test. Number of women diagnosed with invasive cervical cancer vithin >3–5 years of previous Pap test. Number of women diagnosed with invasive cervical cancer >5 years of previous Pap test (including women who have never had a Pap test). For women 20–69 years of age.	 Use the date the Pap test was performed as opposed to the date registered or analyzed. Calculate age based on the date of diagnosis of invasive cervical cancer. If a woman has multiple Pap tests prior to a diagnosis of cancer, use the most recent Pap test. Timeframe – Jan. 1, 2005 to Dec. 31, 2008. Use the following 6 categories: 0-0.5 years = 0 days to 182 days 0.5-3 years = 183 days to 1095 days >3-5 years = 1096 days to 1825 days >5 years = 1826 days plus Never = no Pap test recorded Insufficient historical data If a woman had a Pap test within 0-0.5 years and a Pap test 0.5-3 years or >3-5 years or >5 years, use the 0.5-3 or >5 Pap test— whichever comes firs—instead of the 0-0.5 yr Pap test because the Pap test in the 0-0.5 year category is likely for diagnostic purposes and this indicator focuses on screening history. Invasive cervical cancers include squamous cell cancers, adenocarcinoma, adenosquamous and not classified; i.e., all cases with an ICD-O C53 topography code.
	Denominator – Total number of women diagnosed with invasive cervical carcinoma.	

APPENDIX D -

Cytology codes

2001 Bethesda Cytology Codes

Code	Description
ASC-US	Atypical squamous cells of undetermined significance
LSIL	Low-grade squamous intraepithelial lesion
AGC	Atypical glandular cells
ASC-H	Atypical squamous cells – high grade
HSIL	High-grade squamous intraepithelial lesion

Saskatchewan Cytology Codes

Code	Description
ADC	Abnormal glandular cells representing adenocarcinoma are present.
AGC	Atypical glandular cells (AGC) not otherwise specified (NOS) are present.
AGCN	Atypical glandular cells not otherwise specified (NOS) favour neoplastic, are present.
AGEC	Atypical glandular cells (AGC) of endocervical origin are present.
AGECN	Atypical glandular cells of endocervical origin (AGC) favour neoplastic, are present.
AGEM	Atypical glandular cells (AGC) of endometrial origin are present.
AIS	Abnormal glandular cells representing endocervical adenocarcinoma in situ (AIS) are pres- ent.
ASA	Atypical squamous cells in a background of atrophy are present. A repeat specimen after hormonal therapy is recommended.
ASCU	Atypical squamous cells of undetermined significance (ASC-US) are present.

Code	Description
ASE	Atypical epithelial cells of undetermined significance are present—it is uncertain whether these cells are of squamous or glandular origin.
ASHG	Atypical squamous cells of undetermined significance (ASC-H) are present—cannot exclude a high-grade squamous intraepithelial lesion (HSIL).
HSIL	A high-grade squamous intraepithelial lesion (HSIL) is present.
LSIL	A low-grade squamous intraepithelial lesion (LSIL) is present.
NAC	Negative for intraepithelial lesion or malignancy
NSIL	Negative for squamous intraepithelial lesion
PC2	Abnormal cells are present representing a squamous intraepithelial lesion (ungraded), but probably high grade.
PHS	Glandular cells are present in a woman who is of post-hysterectomy status.
PSCC	Abnormal cells are present, suspicious for squamous cell carcinoma.
SCC	Abnormal cells representing squamous cell carcinoma are present.

APPENDIX E -

Supplementary tables

Participation Rates – Hysterectomy Corrected

Percentage of women who had at least one Pap test

			2004–2006			2005–2007			2006–2008	
Province	Age Group	Number of Women who had a Pap Test	Population	Percent (%)	Number of Women who had a Pap Test	Population	Percent (%)	Number of Women who had a Pap Test	Population	Percent (%)
Provinces	20-69	912,360	1,143,325	79.8	924,715	1,157,517	79.9	3,663,721	4,946,001	74.1
Combined	15–19	41,195	133,537	30.8	40,774	135,232	30.2	40,526	137,576	29.5
	20–29	194,944	277,072	70.4	197,927	281,509	70.3	837,048	1,147,809	72.9
	30–39	227,567	270,424	84.2	225,790	267,881	84.3	891,754	1,181,760	75.5
	40-49	239,018	278,924	85.7	237,924	278,356	85.5	938,211	1,240,511	75.6
	50-59	169,111	200,190	84.5	175,680	207,942	84.5	659,676	878,758	75.1
	60—69	81,720	116,715	70.0	87,394	121,829	71.7	337,032	497,163	67.8
BC	20–69	912,360	1,143,325	79.8	924,715	1,157,517	79.9	936,585	1,176,792	79.6
	15–19	41,195	133,537	30.8	40,774	135,232	30.2	40,526	137,576	29.5
	20–29	194,944	277,072	70.4	197,927	281,509	70.3	201,687	287,490	70.2
	30–39	227,567	270,424	84.2	225,790	267,881	84.3	225,165	269,567	83.5
	40-49	239,018	278,924	85.7	237,924	278,356	85.5	236,156	277,343	85.1
	50-59	169,111	200,190	84.5	175,680	207,942	84.5	180,462	212,813	84.8
	60—69	81,720	116,715	70.0	87,394	121,829	71.7	93,115	129,579	71.9
ON	20–69	-	-	-	-	-	-	2,727,136	3,769,209	72.4
	15–19	-	-	-	-	-	-	_	-	-
	20–29	-	-	-	_	-	-	635,361	860,319	73.9
	30—39	-	-	-	_	-	-	666,589	912,193	73.1
	40-49	-	-	-	_	-	-	702,055	963,168	72.9
	50-59	-	-	-	-	-	-	479,214	665,945	72.0
	60—69	-	-	-	_	-	-	243,917	367,584	66.4

Participation Rates - Non-hysterectomy Corrected

Percentage of women who had at least one Pap test

			2004–2006			2005–2007			2006–2008	
Province [†]	Age Group	Number of Women who had a Pap Test	Population	Percent (%)	Number of Women who had a Pap Test	Population	Percent (%)	Number of Women who had a Pap Test	Population	Percent (%)
Provinces	20–69	1,122,331	1,593,861	70.4	1,137,063	1,614,218	70.4	1,029,427	1,462,448	70.4
Combined	15–19	51,572	107,316	48.1	51,542	108,022	47.7	43,321	92,509	46.8
	20–29	268,248	330,461	81.2	270,954	333,540	81.2	248,992	309,724	80.4
	30–39	264,385	334,341	79.1	264,603	333,415	79.4	238,050	301,529	78.9
	40-49	284,457	401,866	70.8	283,535	399,873	70.9	250,226	353,083	70.9
	50–59	203,240	326,555	62.2	211,199	338,406	62.4	192,243	304,825	63.1
	60–69	102,001	200,638	50.8	106,772	208,984	51.1	99,916	193,287	51.7
AB	20–69	314,652	426,276	73.8	330,280	441,013	74.9	345,214	457,185	75.5
	15–19	11,137	17,005	65.5	11,607	17,283	67.2	12,087	17,998	67.2
	20–29	76,423	93,813	81.5	80,331	97,286	82.6	84,370	102,032	82.7
	30–39	80,727	99,614	81.0	84,387	102,640	82.2	88,053	106,587	82.6
	40-49	81,405	111,242	73.2	83,488	111,968	74.6	84,958	112,568	75.5
	50-59	52,177	79,011	66.0	56,462	84,296	67.0	60,425	87,897	68.7
	60—69	23,920	42,596	56.2	25,612	44,823	57.1	27,408	48,101	57.0
МВ	20–69	256,913	367,793	69.9	258,999	370,564	69.9	261,365	374,876	69.7
	15–19	20,191	41,864	48.2	20,295	42,683	47.5	20,590	43,268	47.6
	20-29	60.412	77,473	78.0	60,747	77.959	77.9	61.298	79.235	77.4
	30-39	58,239	75,863	76.8	57,684	74,995	76.9	57,685	75,269	76.6
	40-49	64,118	90,546	70.8	63,912	90,095	70.9	63,126	89,013	70.9
	50-59	48.263	76.075	63.4	49,911	78.011	64.0	51,120	79.258	64.5
	60—69	25,881	47,836	54.1	26,745	49,504	54.0	28,136	52,101	54.0
NI	20_69	120 760	177 728	67.0	120 805	177 393	68 7			_
	15-19	9 148	17,186	53.2	8 896	16 663	53.4	_	_	_
	20-29	26 581	31,756	83.7	26.016	30 863	84.3	_	_	_
	30-39	29,320	36.941	79.4	28,505	35.810	79.6	_	_	_
	40-49	30.455	44.018	69.2	30.324	43.656	69.5	_	_	_
	50-59	24,144	40.479	59.6	24,933	40.851	61.0	_	_	_
	60–69	10,260	24,534	41.8	11,117	26,143	42.5	-	-	_
NS	20-69	230,405	317,916	72.5	229,373	319,642	71.8	225,360	320,672	70.3
	15-19	11,096	31,261	35.5	10,744	31,393	34.2	10,644	31,243	34.1
	20–29	50,015	60,152	83.1	49,360	59,921	82.4	48,237	59,887	80.5
	30–39	53,136	63,318	83.9	51,962	62,047	83.7	50,461	60,898	82.9
	40-49	58,743	80,003	73.4	57,649	79,410	72.6	55,581	78,096	71.2
	5059	44,750	69,236	64.6	44,970	71,069	63.3	44,786	71,754	62.4
	60—69	23,761	45,207	52.6	25,432	47,195	53.9	26,295	50,037	52.6

			2004–2006			2005–2007			2006–2008	
Province [†]	Age Group	Number of Women who had a Pap Test	Population	Percent (%)	Number of Women who had a Pap Test	Population	Percent (%)	Number of Women who had a Pap Test	Population	Percent (%)
SK	20–69	199,601	304,148	65.6	197,516	305,676	64.6	197,488	309,715	63.8
	15—19	-	-	-	-	-	-	-	-	-
	20–29	54,817	67,267	81.5	54,500	67,511	80.7	55,087	68,570	80.3
	30—39	42,963	58,605	73.3	42,065	57,923	72.6	41,851	58,775	71.2
	40-49	49,736	76,057	65.4	48,162	74,744	64.4	46,561	73,406	63.4
	50-59	33,906	61,754	54.9	34,923	64,179	54.4	35,912	65,916	54.5
	60—69	18,179	40,465	44.9	17,866	41,319	43.2	18,077	43,048	42.0

[†]AB provided data for age 18–19 rather than 15–19. AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population).

Retention Rates

Percentage of women re-screened within three years following a negative Pap test

			2004			2005			2004–2005	
Province [†]	Age Group	Re-screen	Pap Test	Percent (%)	Re-screen	Pap Test	Percent (%)	Re-screen	Pap Test	Percent (%)
Provinces Combined	20–69 20–29 30–39	1,824,974 417,508 482,536	2,282,170 508,075 598,028	80.0 82.2 80.7	1,837,495 410,355 459,997	2,319,452 503,575 574,243	79.2 81.5 80.1	3,662,469 827,863 942,533	4,601,622 1,011,650 1,172,271	79.6 81.8 80.4
	4049	471,173	588,461	80.1	480,010	604,652	79.4	951,183	1,193,113	79.7
	5059	315,031	396,261	79.5	336,576	427,769	78.7	651,607	824,030	79.1
	6069	138,726	191,345	72.5	150,557	209,213	72.0	289,283	400,558	72.2
AB	20–69	124,001	142,826	86.8	134,512	153,855	87.4	258,513	296,681	87.1
	20–29	25,257	28,680	88.1	27,790	31,375	88.6	53,047	60,055	88.3
	30–39	33,701	38,320	87.9	35,904	40,682	88.3	69,605	79,002	88.1
	40–49	34,534	39,832	86.7	36,366	41,637	87.3	70,900	81,469	87.0
	50–59	21,392	24,790	86.3	24,075	27,542	87.4	45,467	52,332	86.9
	60–69	9,117	11,204	81.4	10,377	12,619	82.2	19,494	23,823	81.8
BC	20–69	358,640	452,080	79.3	349,948	448,191	78.1	708,588	900,271	78.7
	20–29	76,007	96,468	78.8	75,123	96,337	78.0	151,130	192,805	78.4
	30–39	96,291	120,467	79.9	89,689	114,189	78.5	185,980	234,656	79.3
	40–49	96,975	121,148	80.0	92,317	117,205	78.8	189,292	238,353	79.4
	50–59	63,671	78,616	81.0	65,628	82,557	79.5	129,299	161,173	80.2
	60–69	25,696	35,381	72.6	27,191	37,903	71.7	52,887	73,284	72.2

			2004			2005			2004–2005	
Province [†]	Age Group	Re-screen	Pap Test	Percent (%)	Re-screen	Pap Test	Percent (%)	Re-screen	Pap Test	Percent (%)
MB	20–69	116,242	143,676	80.9	115,613	142,453	81.2	231,855	286,129	81.0
	20–29	28,693	33,970	84.5	28,176	33,393	84.4	56,869	67,363	84.4
	30-39	27,135	33,636	80.7	26,571	32,566	81.6	53,706	66,202	81.1
	40-49	28,308	35,164	80.5	27,997	34,813	80.4	56,305	69,977	80.5
	50—59	21,369	26,611	80.3	21,932	27,395	80.1	43,301	54,006	80.2
	60—69	10,737	14,295	75.1	10,937	14,286	76.6	21,674	28,581	75.8
NL	20–69	57,738	70,605	81.8	-	_	-	57,738	70,605	81.8
	20–29	13,094	15,772	83.0	-	-	-	13,094	15,772	83.0
	30–39	14,963	17,781	84.2	-	-	-	14,963	17,781	84.2
	4049	14,635	17,779	82.3	-	-	-	14,635	17,779	82.3
	50-59	11,113	13,881	80.1	-	-	-	11,113	13,881	80.1
	60—69	3,933	5,392	72.9	-	-	-	3,933	5,392	72.9
NS	20-69	116,184	137,455	84.5	114,738	138,196	83.0	230.922	275.651	83.8
	20-29	26.805	31.077	86.3	26.428	30.974	85.3	53.233	62.051	85.8
	30-39	29,738	34,388	86.5	28,448	33,483	85.0	58,186	67,871	85.7
	40-49	29,388	34,807	84.4	29,342	35,302	83.1	58,730	70,109	83.8
	50-59	20,577	24,840	82.8	20,672	25,539	80.9	41,249	50,379	81.9
	60—69	9,676	12,343	78.4	9,848	12,898	76.4	19,524	25,241	77.4
ON	20-69	970 428	1 226 170	79 1	1 046 180	1 333 982	78.4	2 016 608	2 560 152	78.8
•	20-29	225.321	273.877	82.3	231.424	284.351	81.4	456.745	558.228	81.8
	30-39	262,125	328 914	79.7	262 460	330,703	79.4	524,585	659.617	79.5
	40-49	246.835	312.316	79.0	275.116	350.257	78.5	521,951	662,573	78.8
	50-59	162.887	208.667	78.1	190.619	246.460	77.3	353,506	455.127	77.7
	60—69	73,260	102,396	71.5	86,561	122,211	70.8	159,821	224,607	71.2
CK.	20_69	81 741	100 358	74 7	76 504	102 775	74.4	158 245	212 123	74.6
JR	20-07	22 331	28 231	79 1	21 414	27 145	78.9	43 745	55 376	79.0
	30-39	18 583	24 522	75.8	16 925	27,145	74.8	35 508	47 149	75.3
	40-49	20 498	27,322	74.8	18,725	25 438	74.9	39,370	52 853	74.5
	50-59	14 022	18 856	74.4	13 650	18 276	74.7	27 672	37 132	74 5
	60. 60	4 207	10 224	61.0	5 6/12	0 206	60.7	11 050	10 620	60.0
	00-07	0,307	10,334	01.0	J,043	7,270	00.7	11,750	17,030	00.7

¹ON provided data for 2003 and 2006 that were included as proxies for 2004 and 2005, respectively. ON provided data for approximately 85% of all Pap tests performed in the province.

AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population). Therefore, women may have had a Pap test in another area of the province under-estimating the retention rate.

Specimen Adequacy Rates Percentage of Pap test results reported as unsatisfactory

			2005			2006			2007			2008		200	7-2008	
Province	t Age Group	Unsatisfactory Tests	Total of Pap Tests	Percent (%)												
AB	2069	1,414	186,966	0.8	2,468	203,693	1.2	3,597	217,302	1.7	I	I	I	3,597	217,302	1.7
	20–29	359	43,803	0.8	558	47,001	1.2	604	50,321	1.2	I	ļ	I	604	50,321	1.2
	3039	371	50,428	0.7	622	54,433	1:1	875	57,600	1.5	I	I	I	875	57,600	1.5
	4049	249	48,628	0.5	414	51,957	0.8	688	53,568	1.3	I	I	I	688	53,568	1.3
	5059	270	31,781	0.8	554	36,040	1.5	924	39,139	2.4	I	I	I	924	39,139	2.4
	60—69	165	12,326	1.3	320	14,262	2.2	506	16,674	3.0	I	l	I	506	16,674	3.0
ß	20-69	5,688	515,372	1:1	8,300	526,907	1.6	10,017	522,806	1.9	11,694	521,322	2.2	21,711	1,044,128	2.1
	20-29	1,356	116,754	1.2	1,915	119,661	1.6	2,205	119,583	1.8	2,568	121,764	2.1	4,773	241,347	2.0
	3039	1,508	132,777	1:1	2,148	133,204	1.6	2,547	129,700	2.0	2,833	127,646	2.2	5,380	257,346	2.1
	4049	1,014	132,760	0.8	1,511	134,320	1:1	1,699	129,742	1.3	2,051	125,924	1.6	3,750	255,666	1.5
	5059	1,063	91,734	1.2	1,683	96,158	1.8	2,123	96,844	2.2	2,537	97,437	2.6	4,660	194,281	2.4
	69—09	747	41,347	1.8	1,043	43,564	2.4	1,443	46,937	3.1	1,705	48,551	3.5	3,148	95,488	3.3
MB	20-69	3,358	168,436	2.0	3,798	173,707	2.2	3,782	172,195	2.2	4,305	172,452	2.5	8,087	344,647	2.3
	2029	973	43,656	2.2	1,176	44,899	2.6	1,204	44,423	2.7	1,325	45,041	2.9	2,529	89,464	2.8
	3039	792	38,849	2.0	914	39,509	2.3	006	39,144	2.3	1,061	39,166	2.7	1,961	78,310	2.5
	40-49	670	39,587	1.7	690	40,209	1.7	767	39,104	2.0	844	38,073	2.2	1,611	<i>11</i> 1,17	2.1
	5059	538	30,571	1.8	604	32,094	1.9	554	31,685	1.7	663	32,080	2.1	1,217	63,765	1.9
	69—09	385	15,773	2.4	414	16,996	2.4	357	17,839	2.0	412	18,092	2.3	769	35,931	2.1
NL	2069	1,217	80,767	1.5	I	I	I	I	I	I	I	I	I	I	I	ı
	2029	351	19,300	1.8	I	I	I	I	I	I	I	I	I	I	I	I
	3039	299	19,913	1.5	I	I	I	I	Į	I	I	ļ	I	I	I	ı
	40-49	235	19,690	1.2	Į	I	I	I	ļ	I	I	ļ	I	I	I	ı
	5059	220	15,587	1.4	I	I	ı	I	I	ı	I	I	ı	I	I	ı

ı

I

I

I

ı

I

1.8

6,277

112

69-09

	Percent (%)	0.7	0.8	0.7	0.6	0.8	1.0	0.6	0.6	0.7	0.4	0.5	0.7
07-2008	Total of Pap Tests	286,247	70,164	66,886	69,015	52,200	27,982	111,200	32,285	24,499	24,841	19,809	9,766
20	Unsatisfactory Tests	2,113	534	470	416	415	278	635	205	160	66	106	65
	Percent (%)	0.7	0.7	0.6	0.6	0.8	1.0	I	I	I	I	I	ī
2008	Total of Pap Tests	140,234	34,460	32,379	33,453	25,766	14,176	I	I	I	I	I	I
	Unsatisfactory Tests	196	225	189	202	205	146	I	I	I	I	I	I
	Percent (%)	0.8	0.9	0.8	0.6	0.8	1.0	0.6	0.6	0.7	0.4	0.5	0.7
2007	Total of Pap Tests	146,013	35,704	34,507	35,562	26,434	13,806	111,200	32,285	24,499	24,841	19,809	9,766
	Unsatisfactory Tests	1,146	309	281	214	210	132	635	205	160	66	106	65
	Percent (%)	0.7	0.8	0.7	0.6	0.8	0.9	0.6	0.8	0.8	0.4	0.6	0.8
2006	Total of Pap Tests	157,979	38,236	37,802	39,059	28,539	14,343	113,144	32,267	25,022	26,448	19,737	9,670
	Unsatisfactory Tests	1,183	324	273	232	226	128	735	250	193	98	121	73
	Percent (%)	0.7	0.7	0.7	9.0	0.8	0.9	0.7	0.8	0.8	9.0	0.7	0.8
2005	Total of Pap Tests	158,576	38,947	38,736	39,356	27,789	13,748	114,505	32,741	25,347	27,369	19,318	9,730
	Unsatisfactory Tests	1,128	278	288	222	221	119	855	272	207	171	131	74
	Age Group	2069	2029	30–39	40-49	5059	6069	2069	20-29	30–39	4049	5059	69—09
	Province [†]	N						 SK					
	Type of Tests												

				2005			2006			2007			2008		20	07-2008	
Type of Tests	Province [†]	Age Group	Unsatisfactory Tests	Total of Pap Tests	Percent (%)												
LBC	NO	20-69	7,604	1,440,444	0.5	9,792	1,475,796	0.7	8,529	1,491,489	0.6	7,381	1,478,012	0.5	15,910	2,969,501	0.5
		2029	1,149	331,644	0.3	1,388	337,770	0.4	1,268	337,340	0.4	1,009	334,558	0.3	2,277	671,898	0.3
		30–39	1,328	366,746	0.4	1,585	367,621	0.4	1,456	363,846	0.4	1,166	355,032	0.3	2,622	718,878	0.4
		4049	1,153	368,085	0.3	1,374	377,830	0.4	1,249	378,902	0.3	1,115	370,330	0.3	2,364	749,232	0.3
		5059	2,208	250,576	0.9	2,990	262,894	11	2,470	270,917	0.9	2,233	272,346	0.8	4,703	543,263	0.9
		69—09	1,766	123,393	1.4	2,455	129,681	1:9	2,086	140,484	1.5	1,858	145,746	1.3	3,944	286,230	1.4
† 0N: from 20	05 onwards, a	large majorit)	y (more than 90%)) of Ontario lal	s employed l	liquid cytology.										-	

^tAB provided data for the areas in which the organized program operated during these years (approximately 40% of the population).

	Percent (%)	1.7	1.3	1.5	1.3	2.3	3.3	0.5	0.5	0.5	0.5	9.0	0.8	
07-2008	Total of Pap Tests	226,547	53,287	60,137	54,024	40,616	18,483	616'22	17,542	18,284	19,003	15,743	7,347	
20	Unsatisfactory Tests	3,899	714	616	728	929	609	416	87	85	16	94	59	
	Percent (%)	1.7	1.3	1.5	1.3	2.3	3.3	ı	I	I	I	I	ı	
2008	Total of Pap Tests	226,547	53,287	60,137	54,024	40,616	18,483	I	I	I	I	I	I	
	Unsatisfactory Tests	3,899	714	616	728	929	609	I	I	I	I	I	I	
	Percent (%)	ı	I	ı	ı	I	ı	0.5	0.5	0.5	0.5	9.0	0.8	
2007	Total of Pap Tests	 ı	I	I	I	I	I	616'11	17,542	18,284	19,003	15,743	7,347	
	Unsatisfactory Tests	I	I	I	I	I	I	416	87	85	16	94	59	-
	Percent (%)	ı	I	ı	I	I	I	1.7	1.9	1.9	1.2	1.4	2.6	
2006	Total of Pap Tests	I	I	I	I	I	I	79,717	18,661	19,298	19,543	15,501	6,714	400/ -fat-
	Unsatisfactory Tests	I	I	I	I	I	I	1,361	362	363	242	221	173	
	Percent (%)	ı	I	I	I	I	I	ı	I	I	I	I	I	- on the second
2005	Total of Pap Tests	I	I	I	ļ	I	I	I	I	I	I	I	I	
	Unsatisfactory Tests	 I	I	I	I	I	I	I	I	I	I	I	I	
	Age Group	2069	2029	30—39	4049	5059	6069	2069	2029	3039	4049	5059	60—69	de daida ai ac
	Province [†]	AB						NL						to the are
	Type of Tests	Mixed												the provided de

NL used conventional gytology exclusively until 2006. In 2007, they used a combination of conventional and liquid-based cytology.

	Percent (%)	 I:I	1.0	1.0	0.7	1.3	1.9
07-2008	Total of Pap Tests	5,277,491	1,226,308	1,281,940	1,302,526	968,816	497,901
20	Unsatisfactory Tests	56,368	11,723	12,472	9,747	13,048	9,378
	Percent (%)	1:1	1.0	1.0	0.8	1.4	1.9
2008	Total of Pap Tests	2,538,567	589,110	614,360	621,804	468,245	245,048
	Unsatisfactory Tests	28,246	5,841	6,168	4,940	6,567	4,730
	Percent (%)	1.0	0.9	0.9	0.7	1.3	1.8
2007	Total of Pap Tests	2,738,924	637,198	667,580	680,722	500,571	252,853
	Unsatisfactory Tests	28,122	5,882	6,304	4,807	6,481	4,648
	Percent (%)	1.0	0.9	0.9	0.7	1.3	2.0
2006	Total of Pap Tests	2,730,943	638,495	676,889	689,366	490,963	235,230
	Unsatisfactory Tests	27,637	5,973	9,098	4,561	6,399	4,606
	Percent (%)	0.8	0.8	0.7	0.5	1.0	1.5
2005	Total of Pap Tests	2,665,066	626,845	672,796	675,475	467,356	222,594
	Unsatisfactory Tests	21,264	4,738	4,793	3,714	4,651	3,368
	Age Group	2069	20–29	30–39	4049	5059	69—09
	Province [†]	Provinces	Combined				
	Type of Tests	All Types					

[†]Provinces combined include AB, BC, MB, NL, NS, ON and SK.

NL and SK provided data for 2005, 2006 and 2007.

ON provided data for approximately 85% of all Pap tests performed in the province in 2005 and 87% between 2006 and 2008.

AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population).

Screening Test Results Percentage of women by their most severe Pap test result

HSIL+	Women Percent (%	11.355 0.5	4,814 0.9	3,296 0.6	1,896 0.3	733 0.2	350 0.2	756 0.4	363 0.9	220 0.5	130 0.3	32 0.1	11 0.1	3,483 0.7	1,578 1.5	988 0.8	612 0.5	211 0.2	94 0.2	1,694 1.1	900 2.5	373 1.1	237 0.7	100
ASC-H	Percent (%)	0.2	0.3	0.2	0.1	0.1	0.1	0.1	0.2	0.1	0.1	0.1	0.1	0.2	0.5	0.2	0.1	0.1	0.1	0.3	0.5	0.3	0.2	
	Women	4.000	1,548	1,106	678	361	150	212	94	56	38	18	9	1,018	500	273	147	69	29	419	168	93	17	
AGC	Percent (%)	0.2	0.1	0.2	0.2	0.3	0.2	0.2	0.1	0.1	0.2	0.4	0.3	0.4	0.1	0.3	9.0	9.0	0.4	0.1	0.1	0.1	0.2	
	Women	4.410	433	944	1,412	1,076	350	308	24	54	92	106	32	1,878	151	389	698	494	146	200	20	34	63	
ISIL	Percent (%)	<u>را</u>	3.6	1.3	1.0	9.0	0.4	2.1	5.0	1.8	1.3	0.7	0.4	1.2	1.8	1.1	1.2	0.8	0.4	1.9	4.2	1.7	1.3	
	Women	36,345	18,496	7,756	5,869	2,436	730	3,641	1,967	805	809	211	50	5,537	1,916	1,324	1,454	682	161	2,815	1,536	581	471	
c-US	Percent (%)	2.4	4.0	2.2	2.1	1.6	1:1	1.8	2.4	1.6	1.9	1.4	1.2	3.0	4.8	2.7	2.8	2.1	1.3	2.6	4.0	2.6	2.4	
AS	Women	56.076	20,837	12,620	12,414	6,598	2,168	3,136	096	740	870	421	145	14,180	5,061	3,272	3,507	1,830	510	3,877	1,446	875	863	
ative	Percent (%)	95.3	91.1	95.5	96.3	97.3	98.1	95.3	91.3	95.9	96.2	97.4	6.79	94.5	91.3	94.9	94.9	96.2	97.6	93.9	88.8	94.2	95.3	
Negi	Women	2.257.176	471,745	551,151	571,643	399,697	193,055	165,084	35,980	43,933	44,259	29,401	11,511	451,908	96,241	115,114	118,562	83,618	38,373	139,384	32,238	31,788	34,200	
	Satisfactory Pap Tests	2.369.362	517,873	576,873	593,912	410,901	196,803	173,137	39,388	45,808	45,997	30,189	11,755	478,004	105,447	121,360	124,980	86,904	39,313	148,389	36,308	33,744	35,905	
	Age Group	20-69	20–29	30–39	4049	5059	6069	2069	20–29	30–39	4049	5059	6069	 20-69	20–29	30–39	40-49	5059	69—09	2069	20–29	30–39	4049	
	Province [†]	Provinces	Combined					AB						BC						MB				
	Year	2005																						

Percent (%) 0.4 0.5 1.1 0.7 0.3 0.1 0.1 0.3 0.5 0.4 0.1 0.1 ī ı Т Т ı. HSIL+ Nomen 777 374 224 115 48 16 1,379 1,599 1,491 802 312 175 266 I. 1 1 I. Percent (%) 0.2 1 Т . Т ī. 0.4 0.7 0.4 0.3 0.1 0.1 0.2 0.2 0.1 0.1 ASC-H Women **516** 219 143 99 37 18 **1,678** 567 541 541 323 323 174 174 157 1 Т T 1 1 Percent (%) 0.3 0.2 0.1 0.2 0.3 0.1 <u>.</u> 0.1 5 0.1 1 Т Т 1 0.1 1 AGC Women 32 68 97 91 **,522** 206 399 462 329 126 195 I I. 307 1 I 1 Percent (%) 1.1 2.8 0.9 1.4 1 ı 0.6 0.4 0.2 1.6 4.0 1.4 0.9 0.5 1 ı **LSIL 1,562** 948 298 203 93 20 3,133 12,129 4,748 Women 21,732 1,286 436 1,058 T T I T 1 Percent (%) 2.9 4.9 2.7 2.5 1.8 1.1 2.2 3.9 2.0 1.8 1.4 2.0 ı 1 1 1 Т ASC-US Women 11,729 6,802 3,356 1,210 1,439 **1,087** 1,641 931 914 458 143 29,357 6,260 I Т I I. Percent (%) 97.2 98.3 95.7 90.4 95.2 96.1 98.3 95.7 91.4 95.9 9.96 97.7 Т ī Т ı 94.9 1 Negative 327,534 234,446 116,243 Women 69,885 30,139 32,782 34,759 25,223 12,779 1,295,233 277,147 339,863 135,682 I T T I. 1 341,515 350,843 Satisfactory Pap Tests 73,000 239,903 118,263 l 42,93 l 33,353 34,446 36,187 25,950 12,995 1,353,901 303,377 Т I I L I Age Group 20--69 20-69 20–29 30–39 50--59 40-49 20-29 50-59 69-09 40-49 20--69 20–29 30–39 50--59 30–39 40-49 69-09 69-09 Province[†] S S Z Year

[†]NL did not provide data by age group but were included in Provinces Combined 20–69.

ON follows a different severity order: negative < ASCUS < AGC < ASC-H < LSIL < HSIL and higher (includes CA).

ON provided data for approximately 35% of all Pap tests performed in the province in 2005. Approximately 0.01% of the Pap tests had an 'other abnormal cell' finding and were excluded from this calculation.

AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population).

Image: constant state st	Prototoci App. Group Forp. App. Group Ap	Default Registery Replace Replace Replace Replace Replace Replace Record (6)				Satisfactory	Nega	ıtive	ASC	SI		<u>ا</u> کا —			AGC	AGC A	AGC ASC-H	AGC ASC-H
Image $2-0.9$ $106,328$ $955,97$ 62.2 $2,47$ $10,06$ $3-0.9$ $235,526$ $235,596$ $95,47$ $5,717$ 22 $3,19$ $3-9-9$ $235,5367$ $235,5367$ $235,5367$ $235,5367$ $235,5367$ $235,5367$ $224,518$ $95,747$ 222 $33,196$ $4-9$ $256,723$ $256,723$ $256,926$ $96,977$ $96,37$ 212 $27,19$ $27,19$ $6-90$ $96,224$ $19,0668$ $88,977$ $96,37$ $91,96$ $10,96$ $10,96$ $20-90$ $180,231$ $180,279$ $92,34$ $91,2$ $10,96$ 226 106 $20-90$ $190,266$ $97,323$ $96,17$ 7323 $96,17$ 7323 $10,16$ 736 $30-30$ $135,390$ $13,334$ $92,66$ $10,66$ $10,66$ $10,66$ $10,66$ $10,66$ $10,66$ $10,66$ $10,66$ $10,76$ $10,77$ $10,77$ $10,77$	Formines $20-69$ $106,236$ $953,97$ 95.2 $24/15$ 24 $10,06$ $3-9$ $26,26$ $215,064$ 90.9 9649 41 $7,16$ $3-9$ $265,36$ $215,064$ 95.44 $57,17$ 22 $31,96$ $9-9$ $96,263$ $244,58$ 95.44 $57,08$ 211 $244,16$ $9-9$ $96,26$ $94,96$ $96,17$ $96,19$ $96,1$ 200 $214,16$ $244,16$ $210,29$ $214,16$	6 Drotines, combined 26 $106,230$ $95,397$ $95,23$ $24,715$ $24,715$ $24,715$ $24,715$ $24,715$ $24,715$ $24,715$ $25,706$ $24,11$ $7,106$ 39 $26,537$ $24,418$ $95,41$ $57,17$ 22 $3,196$ 49 $26,537$ $24,418$ $95,41$ $57,10$ $21,4$ $7,16$ $6-9$ $96,623$ $25,5300$ $96,11$ $32,79$ $11,4$ $10,62$ $6-9$ $90,66$ $88,957$ $96,32$ $96,32$ $96,32$ $96,32$ $96,32$ $96,32$ $96,32$ $96,32$ $96,32$ $96,61$ $10,92$ $96,62$ $6-9$ $99,18$ $37,31$ $96,12$ $97,32$ $96,12$ $11,97$ $96,62$ $96,12$ $10,92$ $96,62$ $96,12$ $10,92$ $96,62$ $10,92$ $10,92$ $6-90$ $20,-90$ $21,233$ $13,837$ $96,23$ $96,23$ $10,92$ $10,92$ <	Year	Province [†]	Age Group	Pap Tests	Women	Percent (%)	Women	Percent (%)	Women		Percent (%)	Percent (%) Women	Percent (%) Women Percent (%)	Percent (%) Women Percent (%) Women	Percent (%) Women Percent (%) Women Percent (%)	Percent (%) Women Percent (%) Women Percent (%) Women
Combined 20-29 235,338 215,044 90.9 9,649 4.1 7,146 30-39 256,367 244,518 95.4 5,77 2.2 3,149 40-49 266,733 256,300 96.1 5,708 2.1 2,441 50-39 196,234 191,088 97.4 2,028 1.1 1062 50-39 99,466 88,957 98.3 97.4 2,028 1.1 1062 60-69 90,496 88,957 98.3 91.2 1,188 2.4 1062 20-29 42,067 38,354 91.2 1,188 2.8 1969 20-49 99,18 47,718 97.0 7.86 1.1 1157 20-29 24,918 47,718 97.0 7.86 1.1 1157 20-49 13,333 98.6 11,188 2.8 1.1 1157 20-59 13,333 98.6 1,138 2.2 4.306 1.1	Combined 29-29 236,567 215,614 90.9 9,449 4.1 7/16 80-39 256,567 246,718 95.41 57.08 2.1 2.441 80-39 256,507 246,718 95.41 5.708 2.1 2.441 80-39 256,507 246,718 95.41 5.708 2.1 2.441 90-30 196,224 191,088 97.41 2.803 1.41 1.022 90-30 20-30 49,12 180,279 95.3 91.2 1.138 2.46 1.41 90-30 49,08 47,718 97.0 7.86 1.1 1.97 90-30 13,333 98.61 97.0 7.86 1.1 1.97 90-30 13,333 98.61 97.0 7.86 1.1 1.97 90-30 13,333 98.61 1.1 9.97 1.1 1.97 90-30 13,333 98.61 1.1 1.1 1.1 90-30 <td>Combined 20-29 236,567 215,664 90.9 9,449 4.1 7/16 80-99 256,307 245,518 245,518 256,300 96.1 57.01 2.1 2,441 80-99 256,523 256,300 96.1 57.03 2.1 2,44 91-99 196,274 191,088 97.4 2.283 14 1022 91-99 196,291 190,292 95.3 91.2 119 102 2.66 21-99 196,204 191,088 97.3 91.3 119 102 2.66 31-99 91.8 110 2.83 91.3 119 129 2.66 91-99 91,89 7.13 94.1 102 2.66 110 129 91-99 91,89 7.13 94.1 94.1 103 119 119 91-99 13,343 94.6 13,343 94.6 104 0.9 109 119 91-99 10.9<</td> <th>2006</th> <th>Provinces</th> <td>20—69</td> <td>1,046,328</td> <td>995,947</td> <td>95.2</td> <td>24,715</td> <td>2.4</td> <td>14,065</td> <td></td> <td>1.3</td> <td>1.3 2,366</td> <td>1.3 2,366 0.2</td> <td>1.3 2,366 0.2 2,335</td> <td>1.3 2,366 0.2 2,335 0.2</td> <td>1.3 2,366 0.2 2,335 0.2 6,900</td>	Combined 20-29 236,567 215,664 90.9 9,449 4.1 7/16 80-99 256,307 245,518 245,518 256,300 96.1 57.01 2.1 2,441 80-99 256,523 256,300 96.1 57.03 2.1 2,44 91-99 196,274 191,088 97.4 2.283 14 1022 91-99 196,291 190,292 95.3 91.2 119 102 2.66 21-99 196,204 191,088 97.3 91.3 119 102 2.66 31-99 91.8 110 2.83 91.3 119 129 2.66 91-99 91,89 7.13 94.1 102 2.66 110 129 91-99 91,89 7.13 94.1 94.1 103 119 119 91-99 13,343 94.6 13,343 94.6 104 0.9 109 119 91-99 10.9<	2006	Provinces	20—69	1,046,328	995,947	95.2	24,715	2.4	14,065		1.3	1.3 2,366	1.3 2,366 0.2	1.3 2,366 0.2 2,335	1.3 2,366 0.2 2,335 0.2	1.3 2,366 0.2 2,335 0.2 6,900
30-39 $256,367$ $244,16$ $95,4$ 5777 22 $31,99$ 11 $60-49$ $266,723$ $256,300$ $96,1$ 5706 21 $244,1$ $60-49$ $266,723$ $256,300$ $91,4$ 2828 $11,4$ 1002 $60-49$ $90,466$ $88,957$ $98,3$ $91,2$ 813 $20,9$ $265,78$ $256,300$ $96,1$ 5708 $21,4$ 1002 $80-49$ $92,99$ $47,718$ $91,2$ $11,88$ 283 $11,996$ $265,5$ $11,969$ $266,78$ $33,541$ 981 782 $16,6$ 786 $11,7$ 3436 $80-49$ $97,20$ $13,343$ 984 104 028 $266,78$ $33,541$ 981 782 146 1167 786 1167 786 1167 786 1167 $266,78$ $216,96$ 1167 $216,96$ 1167 $216,96$ 1167 $216,96$ $116,78$ <td>39 $26,56/7$ $24,518$ $9,54$ $5,717$ 2.2 $3,49$ 1.4 1002 $2,441$ $2,647$ $2,6723$ $256,300$ $96,1$ $5,708$ 2.1 $2,441$ $2,647$ $2,672$ $3,647$ 1002 $2,6473$ $256,300$ $96,1$ $5,708$ 2.1 $2,441$ 1002 $2,6473$ $256,72$ $2,441$ 1002 $2,641$ $2,641$ $2,641$ $2,64$ $2,741$ $2,26$ $2,441$ 1002 $2,64$ $2,641$ $2,66$ $2,64$ $2,641$ $2,66$ $2,64$ $2,76$ $2,64$ $2,76$ $2,641$ $2,64$ $2,76$ $2,64$ $2,76$ $2,64$ $2,76$ $2,66$ $2,64$ $2,76$ $2,66$ $2,64$ $2,76$ $2,66$ $2,64$ $2,76$ $2,64$ $2,76$ $2,64$ $2,76$ $2,64$ $2,76$ $2,66$ $2,66$ $2,66$ $2,66$ $2,64$ $2,76$ $2,64$ $2,76$ $2,64$ $2,76$ $2,76$</td> <td>3-39 $25,3,37$ $24,518$ $95,4$ 5717 22 $31,96$ $31,46$ $6-40$ $26,572$ $26,500$ $96,1$ 5706 21 $2,441$ 002 $6-60$ $90,623$ $190,329$ $180,239$ $180,239$ $180,239$ $10,22$ $2,441$ 1022 $6-60$ $90,239$ $180,231$ $180,239$ $96,17$ 786 $1,44$ 1022 $2,441$ $8-53$ $91,29$ $91,23$ $91,23$ $91,29$ $11,36$ $11,6$ 406 $6-60$ $91,289$ $46,278$ $95,33$ $12,204$ $11,97$ $11,97$ $6-60$ $13,539$ $13,343$ $96,1$ 786 $11,6$ 406 $86,-20$ $33,541$ $98,1$ $98,1$ $98,1$ $98,1$ $11,97$ $11,97$ $6-69$ $13,239$ $11,333$ $12,364$ $11,34$ $12,36$ $11,47$ $11,97$ $86,-20$ $12,204$ $21,28$<</td> <th></th> <th>Combined</th> <td>20-29</td> <td>236,528</td> <td>215,084</td> <td>90.9</td> <td>9,649</td> <td>4.1</td> <td>7,148</td> <td></td> <td>0.1</td> <td>216</td> <td>.0 216 0.1</td> <td>.0 216 0.1 1,058</td> <td>.0 216 0.1 1,058 0.4</td> <td>1.0 216 0.1 1,058 0.4 3,373</td>	39 $26,56/7$ $24,518$ $9,54$ $5,717$ 2.2 $3,49$ 1.4 1002 $2,441$ $2,647$ $2,6723$ $256,300$ $96,1$ $5,708$ 2.1 $2,441$ $2,647$ $2,672$ $3,647$ 1002 $2,6473$ $256,300$ $96,1$ $5,708$ 2.1 $2,441$ 1002 $2,6473$ $256,72$ $2,441$ 1002 $2,641$ $2,641$ $2,641$ $2,64$ $2,741$ $2,26$ $2,441$ 1002 $2,64$ $2,641$ $2,66$ $2,64$ $2,641$ $2,66$ $2,64$ $2,76$ $2,64$ $2,76$ $2,641$ $2,64$ $2,76$ $2,64$ $2,76$ $2,64$ $2,76$ $2,66$ $2,64$ $2,76$ $2,66$ $2,64$ $2,76$ $2,66$ $2,64$ $2,76$ $2,64$ $2,76$ $2,64$ $2,76$ $2,64$ $2,76$ $2,66$ $2,66$ $2,66$ $2,66$ $2,64$ $2,76$ $2,64$ $2,76$ $2,64$ $2,76$ $2,76$	3-39 $25,3,37$ $24,518$ $95,4$ 5717 22 $31,96$ $31,46$ $6-40$ $26,572$ $26,500$ $96,1$ 5706 21 $2,441$ 002 $6-60$ $90,623$ $190,329$ $180,239$ $180,239$ $180,239$ $10,22$ $2,441$ 1022 $6-60$ $90,239$ $180,231$ $180,239$ $96,17$ 786 $1,44$ 1022 $2,441$ $8-53$ $91,29$ $91,23$ $91,23$ $91,29$ $11,36$ $11,6$ 406 $6-60$ $91,289$ $46,278$ $95,33$ $12,204$ $11,97$ $11,97$ $6-60$ $13,539$ $13,343$ $96,1$ 786 $11,6$ 406 $86,-20$ $33,541$ $98,1$ $98,1$ $98,1$ $98,1$ $11,97$ $11,97$ $6-69$ $13,239$ $11,333$ $12,364$ $11,34$ $12,36$ $11,47$ $11,97$ $86,-20$ $12,204$ $21,28$ <		Combined	20-29	236,528	215,084	90.9	9,649	4.1	7,148		0.1	216	.0 216 0.1	.0 216 0.1 1,058	.0 216 0.1 1,058 0.4	1.0 216 0.1 1,058 0.4 3,373
40-49 266,723 256,300 96.1 5,708 2.1 2.441 0.0 50-59 196,224 191,086 97.4 2.828 1.4 1.062 0.0 60-69 99,486 88,957 96.3 3.329 1.4 1.062 0.3 80-57 92.0 88,54 91.2 1.188 2.8 1.969 4.7 20-29 4,040 4,731 97.0 7.86 1.16 4.7 20-29 49,188 4,7718 97.0 7.86 1.16 4.7 20-29 34,188 33.541 96.1 7.86 1.16 4.7 20-29 34,188 33.541 96.1 7.86 1.16 0.3 20-29 13,333 13,333 96.1 6.4 0.8 6.1 6.6 6.9 20-29 13,333 13,333 96.1 3.29 1.1 1.1 1.1 0.3 20-20 20-20 13,333 113,333 <td>$q - q_0$ $2.65,20$ $2.65,30$ 9.61 5.708 2.1 2.441 0.0 $5 g_0$ $196,224$ $191,088$ 97.4 2.8236 1.4 1002 0.5 $5 g_0$ $196,224$ $191,088$ 98.5 98.3 91.3 0.9 2.55 0.3 $2 g_0$ $192,09$ 4.7738 96.1 72.2 1.14 1002 0.5 $2 g_0$ $0.92,99$ 4.7738 96.1 72.2 1.16 76.5 1.13 $2 g_0$ $0.92,99$ 4.7738 96.1 78.2 1.16 76.5 1.15 $2 g_0$ 135.39 13.334 98.6 1.04 0.29 2.55 0.24 1.17 $8 - 6 - 9$ 135.39 113.334 98.6 1.94 0.29 0.55 0.24 0.26 0.26 0.26 0.26 0.26 0.26 0.26 0.26 0.26 0.26</td> <td></td> <th></th> <th></th> <td>30–39</td> <td>256,367</td> <td>244,518</td> <td>95.4</td> <td>5,717</td> <td>2.2</td> <td>3,149</td> <td>1.2</td> <td></td> <td>464</td> <td>464 0.2</td> <td>464 0.2 634</td> <td>464 0.2 634 0.2</td> <td>464 0.2 634 0.2 1,885</td>	$q - q_0$ $2.65,20$ $2.65,30$ 9.61 5.708 2.1 2.441 0.0 $5 g_0$ $196,224$ $191,088$ 97.4 2.8236 1.4 1002 0.5 $5 g_0$ $196,224$ $191,088$ 98.5 98.3 91.3 0.9 2.55 0.3 $2 g_0$ $192,09$ 4.7738 96.1 72.2 1.14 1002 0.5 $2 g_0$ $0.92,99$ 4.7738 96.1 72.2 1.16 76.5 1.13 $2 g_0$ $0.92,99$ 4.7738 96.1 78.2 1.16 76.5 1.15 $2 g_0$ 135.39 13.334 98.6 1.04 0.29 2.55 0.24 1.17 $8 - 6 - 9$ 135.39 113.334 98.6 1.94 0.29 0.55 0.24 0.26 0.26 0.26 0.26 0.26 0.26 0.26 0.26 0.26 0.26				30–39	256,367	244,518	95.4	5,717	2.2	3,149	1.2		464	464 0.2	464 0.2 634	464 0.2 634 0.2	464 0.2 634 0.2 1,885
30-9 $196,224$ $191,008$ 97.4 $2,228$ 1.4 1002 0.3 AB $20-69$ $90,486$ $88,957$ 98.3 313 0.9 26.5 0.3 AB $20-69$ $90,486$ $88,957$ 98.3 313 0.9 26.5 0.3 $20-29$ $47,067$ $33,354$ 91.2 $1,188$ $2,379$ $1,28$ $1,66$ $1,66$ $40-49$ $49,188$ $47,718$ 97.0 786 $1,66$ $1,67$ 26.5 $60-69$ $13,359$ $13,343$ 98.6 $10,4$ 0.8 $10,62$ $10,62$ $60-69$ $13,539$ $13,343$ 98.6 $10,4$ 0.8 $10,62$ $10,62$ $60-69$ $13,539$ $13,343$ 98.6 $10,4$ 0.8 $10,62$ $60-69$ $12,530$ $12,330$ $12,198$ 95.3 $12,394$ $21,97$ $21,6$ $10,62$ $60-69$ <td>NB 20-90 196,244 191,068 97.4 2,828 1,4 1,022 0.5 AB $20-90$ $90,466$ $80,977$ 98.3 91.3 $10,9$ 24.6 0.4 $20-90$ $180,210$ $180,210$ $180,210$ $180,210$ 95.8 32.19 $1,7$ 34.6 1.6 $20-90$ $49,240$ $47,710$ 96.1 726 1.6 766 1.6 766 $40-90$ $33,341$ 98.1 98.1 98.1 766 1.16 706 $60-90$ $13,330$ $13,343$ 98.6 $10,4$ 0.8 1.77 $60-90$ $13,330$ $12,330$ 98.6 $10,4$ 0.8 1.77 $80-90$ $13,330$ $12,1307$ $12,1307$ $12,1307$ $12,1307$ $12,1307$ $12,1307$ $12,1307$ $80-90$ $12,2307$ $12,1307$ $12,1307$ $12,1307$ $12,1307$ $12,1307$ $12,1307$</td> <td>No. S090 N6/224 N1/108 97.4 2,028 1,4 1,022 0.5 AB 2090 90,486 88,957 98.3 91.3 1,99 24.9 AB 2090 188,231 180,279 95.8 3,219 1,77 3,436 1,8 2090 20-93 47,128 96.1 726 1,16 756 1,16 30-90 49,138 33,541 98.1 766 1,16 766 1,16 767 50-90 33,531 13,343 98.1 769 1,16 77 1,2 60-90 13,530 13,343 98.1 76 1,3 10 10 80-90 13,530 12,331 116657 95.2 2,87 2,93 1,3 10 10 80-90 122,313 116657 95.2 2,87 2,93 1,1 10 10 80-90 122,313 116657 95.2 2,86 <</td> <th></th> <th></th> <td>4049</td> <td>266,723</td> <td>256,300</td> <td>96.1</td> <td>5,708</td> <td>2.1</td> <td>2,441</td> <td>0.9</td> <td></td> <td>835</td> <td>835 0.3</td> <td>835 0.3 384</td> <td>835 0.3 384 0.1</td> <td>835 0.3 384 0.1 1,055</td>	NB 20-90 196,244 191,068 97.4 2,828 1,4 1,022 0.5 AB $20-90$ $90,466$ $80,977$ 98.3 91.3 $10,9$ 24.6 0.4 $20-90$ $180,210$ $180,210$ $180,210$ $180,210$ 95.8 32.19 $1,7$ 34.6 1.6 $20-90$ $49,240$ $47,710$ 96.1 726 1.6 766 1.6 766 $40-90$ $33,341$ 98.1 98.1 98.1 766 1.16 706 $60-90$ $13,330$ $13,343$ 98.6 $10,4$ 0.8 1.77 $60-90$ $13,330$ $12,330$ 98.6 $10,4$ 0.8 1.77 $80-90$ $13,330$ $12,1307$ $12,1307$ $12,1307$ $12,1307$ $12,1307$ $12,1307$ $12,1307$ $80-90$ $12,2307$ $12,1307$ $12,1307$ $12,1307$ $12,1307$ $12,1307$ $12,1307$	No. S090 N6/224 N1/108 97.4 2,028 1,4 1,022 0.5 AB 2090 90,486 88,957 98.3 91.3 1,99 24.9 AB 2090 188,231 180,279 95.8 3,219 1,77 3,436 1,8 2090 20-93 47,128 96.1 726 1,16 756 1,16 30-90 49,138 33,541 98.1 766 1,16 766 1,16 767 50-90 33,531 13,343 98.1 769 1,16 77 1,2 60-90 13,530 13,343 98.1 76 1,3 10 10 80-90 13,530 12,331 116657 95.2 2,87 2,93 1,3 10 10 80-90 122,313 116657 95.2 2,87 2,93 1,1 10 10 80-90 122,313 116657 95.2 2,86 <			4049	266,723	256,300	96.1	5,708	2.1	2,441	0.9		835	835 0.3	835 0.3 384	835 0.3 384 0.1	835 0.3 384 0.1 1,055
AB 50-69 90,466 88,957 98.3 813 0.0 256 0.3 AB 20-29 42,067 38,354 91.2 1,188 2.8 1,969 47 20-29 42,067 38,354 91.2 1,188 2.8 1,969 47 30-39 49,249 47,718 97.0 786 1.6 785 1.6 30-39 49,188 33,541 98.1 359 1.1 157 3,436 1.6 50-39 34,188 33,541 98.1 10,4 0.8 4,7 96.1 1.7 3,436 1.6 60-69 13,539 13,541 98.1 96.1 1.6 480 1.0 60-69 13,539 13,543 98.6 1.6 48.7 1.4 1.87 95.5 2.87 1.1 1.1 1.1 30-39 121,391 116,87 95.5 2.876 2.4 1.1 1.1 1.1	AB 00 $90,466$ $88,957$ 98.3 813 0.9 26.6 0.3 AB 200 $180,279$ 95.8 32.19 1.7 34.36 1.2 209 42.067 38.354 91.2 1.188 2.8 1.969 4.7 209 49.249 4.7732 96.1 782 1.6 785 1.2 309 49.128 4.7718 97.2 96.1 782 1.6 785 1.2 $50-9$ 34.198 33.541 98.1 97.2 1.96 1.6 1.6 $50-9$ 34.189 33.541 98.1 1.279 1.2730 1.3333 98.6 1.147 1.96 1.6 $80-9$ $106-69$ 113.2331 116.8326 95.3 2.86 2.4 1.147 1.27 $80-9$ 112.331 116.8320 95.3 2.46 1.177 1.127	AB 20-60 90,466 88,557 98.3 913 0.9 266 1 20-79 20-49 180,231 180,232 94.1 732 1,99 4.7 20-49 49,249 47,733 94.1 732 1,16 736 1,6 30-39 49,249 47,733 96.1 736 1,16 766 1,6 50-39 39,341 98.1 736 1,16 766 1,16 60-49 13,339 13,341 98.1 736 1,11 1,57 0,3 60-49 13,359 13,341 98.1 736 1,16 1,07 0,3 60-49 13,359 13,343 98.1 1,254 2,4 1,17 0,9 60-49 110,557 95.3 12,516 1,23 1,1657 9,2 2,4 1,17 0,9 60-49 110,557 95.3 1,21 9,2 2,4 1,17 1,2 1,2 <			5059	196,224	191,088	97.4	2,828	1.4	1,062	0.5		634	634 0.3	634 0.3 188	634 0.3 188 0.1	634 0.3 188 0.1 424
AB 21-60 188,231 180,279 55.8 3,319 1.7 3,436 1.8 20-29 42,067 38,354 91.2 1,188 2.48 1,999 4.7 30-39 49,249 47,323 96.1 782 1,6 785 1,6 30-39 99,349 47,733 96.1 785 1,6 785 1,6 40-49 9,188 47,733 96.1 785 1,6 785 1,7 50-59 34,188 33,541 98.1 33,541 98.1 359 1,1 1,7 1,7 0.5 50-59 34,188 33,541 98.1 95.3 1,234 98.1 1,7 1,7 0.5 0.5 30-39 105,657 95.3 16,697 95.3 12,504 1,4 1,9 0.5 0.5 30-39 112,307 122,313 116,657 95.3 2,87 2,44 1,1 1,1 0.5 0.5	AB $20-69$ $180,231$ $100,279$ 55.8 $3,219$ 1.7 $3,436$ 1.8 $20-29$ $4,060$ $38,354$ 91.2 $1,188$ 2.8 1996 4.7 $30-39$ $9,926$ $4,7333$ 96.1 786 1.6 786 1.6 $60-69$ $9,138$ $3,7341$ 98.1 329 1.1 157 0.6 $60-69$ $13,339$ $13,334$ 98.6 104 0.8 10 10 $60-69$ $13,339$ $13,334$ 98.6 104 0.8 104 0.8 101 107 0.9 86.0 $13,334$ 98.8 95.3 $12,394$ $12,394$ $13,394$ 108 104 108 100 100 100 100 100 100 100 100 100 100 100 100 100 100 100 100 100 100 <t< td=""><td>AB 20-69 180,231 180,279 55.8 3,219 1,7 3,456 1,8 20-79 20-70 38,354 91.2 1,188 24 16 765 16 30-39 47,949 47,233 96,13 33,541 92,12 1,16 765 16 40-49 73,539 33,541 92,12 736 11 17 95 10 50-99 34,188 33,541 92,64 13 39 13,343 92,64 10 93 13 60-69 13,539 13,343 92,64 13</td><th></th><th></th><td>60—69</td><td>90,486</td><td>88,957</td><td>98.3</td><td>813</td><td>0.9</td><td>265</td><td>0.3</td><td></td><td>217</td><td>217 0.2</td><td>217 0.2 71</td><td>217 0.2 71 0.1</td><td>217 0.2 71 0.1 163</td></t<>	AB 20-69 180,231 180,279 55.8 3,219 1,7 3,456 1,8 20-79 20-70 38,354 91.2 1,188 24 16 765 16 30-39 47,949 47,233 96,13 33,541 92,12 1,16 765 16 40-49 73,539 33,541 92,12 736 11 17 95 10 50-99 34,188 33,541 92,64 13 39 13,343 92,64 10 93 13 60-69 13,539 13,343 92,64 13			60—69	90,486	88,957	98.3	813	0.9	265	0.3		217	217 0.2	217 0.2 71	217 0.2 71 0.1	217 0.2 71 0.1 163
	No $20-29$ 42067 38354 91.2 $11/88$ 2.8 19.96 4.7 $30-39$ 49249 $47/73$ 96.1 782 1.6 786 1.6 766 1.6 766 1.6	20-29 2.067 38.34 91.2 $1,188$ 2.8 19.96 4.7 $0-49$ 9.918 4.7718 97.0 786 1.6 706 1.6 $0-49$ 9.918 4.7718 97.0 786 1.6 706 1.6 $0-49$ 91.86 33.341 96.1 359 1.1 177 0.6 $0-69$ 13.339 13.343 96.6 10.4 0.8 10.7 0.6 10.7 0.6 10.7 0.6 10.7 10.6 10.7 0.6 10.7 0.6 10.7 10.7 0.6 10.7 0.6 10.7 0.6 0.6 0.6 0.6 0.6 0.6 0.6 0.78 0.78 0.6 0.6 0.6 0.6 0.78 0.6 0.6 0.6 0.6 0.6 0.6 0.6 0.6 0.6 0.6 0.6 0.6 0.6		AB	20—69	188,231	180,279	95.8	3,219	1.7	3,436	1.8		241	241 0.1	241 0.1 234	241 0.1 234 0.1	241 0.1 234 0.1 822
309 99,249 47,323 96,1 782 1.6 785 1.6 40-49 9,188 47/18 97.0 786 1.6 786 1.0 50-59 34,188 33,541 98.1 359 1.1 157 0.3 60-69 13,539 13,333 98.6 104 0.8 46 0.3 60-69 13,539 13,333 98.6 104 0.8 45 0.3 60-69 13,539 13,333 98.6 104 0.8 45 0.3 80 20-29 105,58 99,795 91.9 47799 4.4 1,852 1,7 30-39 122,307 116,657 95.3 2,876 2,94 1,1 47 40-49 127,307 171,966 95.3 2,876 2,33 1,1 47 0.9 50-59 41,519 96,69 91,51 88,810 97.0 1,51 2,39 1,1 2,3 <td>$30-30$ $9/249$ $4/323$ $6\mathbf{k}$1 722 1.6 765 1.6 765 1.6 765 1.6 765 1.6 766 1.0 700 756 1.0 700 100 $60-69$ $33,541$ $9\mathbf{k}$1 359 $11,1$ 951 359 $11,1$ 157 0.5 $60-69$ $13,539$ $13,539$ $93,343$ $9\mathbf{k}$6 104 0.8 100 105 $20-29$ $113,539$ $13,534$ $116,857$ 95.3 $12,544$ $11,47$ 0.9 $30-39$ $122,313$ $116,857$ 95.3 $12,544$ 95.3 $11,47$ 0.9 $30-39$ $122,307$ $122,307$ $122,307$ $122,397$ $11,47$ 0.9 $30-39$ $122,307$ $122,307$ $122,397$ $122,397$ $11,47$ 0.9 $60-69$ $1123,307$ $122,397$ $122,397$ $123,397$ $123,47$ $11,47$<td>30-99 $97,209$ $47,323$ 96.1 782 1.6 785 1.6 $40-9$ $97,188$ $37,341$ 98.1 359 1.1 157 0.5 $50-99$ $34,188$ $33,341$ 98.1 359 1.1 157 0.5 $50-99$ $31,359$ $13,343$ 98.6 104 0.8 45 0.3 $60-69$ $13,539$ $13,343$ 98.6 104 0.8 45 0.3 $20-29$ $106,687$ $95,33$ $12,504$ 2.5 4.44 1.827 0.3 $30-39$ $112,307$ $112,996$ $95,33$ 2.976 2.3 1.147 0.9 $40-9$ $127,307$ $1121,996$ $95,3$ 2.376 0.6 0.6 0.6 $40-9$ $127,307$ $121,996$ $95,3$ 2.376 0.9 0.6 $50-9$ 1120 $02,9$ 2.44 120 0</td><th></th><th></th><td>20–29</td><td>42,067</td><td>38,354</td><td>91.2</td><td>1,188</td><td>2.8</td><td>1,969</td><td>4.7</td><td></td><td>22</td><td>22 0.1</td><td>22 0.1 106</td><td>22 0.1 106 0.3</td><td>22 0.1 106 0.3 428</td></td>	$30-30$ $9/249$ $4/323$ $6\mathbf{k}$ 1 722 1.6 765 1.6 765 1.6 765 1.6 765 1.6 766 1.0 700 756 1.0 700 100 $60-69$ $33,541$ $9\mathbf{k}$ 1 359 $11,1$ 951 359 $11,1$ 157 0.5 $60-69$ $13,539$ $13,539$ $93,343$ $9\mathbf{k}$ 6 104 0.8 100 105 $20-29$ $113,539$ $13,534$ $116,857$ 95.3 $12,544$ $11,47$ 0.9 $30-39$ $122,313$ $116,857$ 95.3 $12,544$ 95.3 $11,47$ 0.9 $30-39$ $122,307$ $122,307$ $122,307$ $122,397$ $11,47$ 0.9 $30-39$ $122,307$ $122,307$ $122,397$ $122,397$ $11,47$ 0.9 $60-69$ $1123,307$ $122,397$ $122,397$ $123,397$ $123,47$ $11,47$ <td>30-99 $97,209$ $47,323$ 96.1 782 1.6 785 1.6 $40-9$ $97,188$ $37,341$ 98.1 359 1.1 157 0.5 $50-99$ $34,188$ $33,341$ 98.1 359 1.1 157 0.5 $50-99$ $31,359$ $13,343$ 98.6 104 0.8 45 0.3 $60-69$ $13,539$ $13,343$ 98.6 104 0.8 45 0.3 $20-29$ $106,687$ $95,33$ $12,504$ 2.5 4.44 1.827 0.3 $30-39$ $112,307$ $112,996$ $95,33$ 2.976 2.3 1.147 0.9 $40-9$ $127,307$ $1121,996$ $95,3$ 2.376 0.6 0.6 0.6 $40-9$ $127,307$ $121,996$ $95,3$ 2.376 0.9 0.6 $50-9$ 1120 $02,9$ 2.44 120 0</td> <th></th> <th></th> <td>20–29</td> <td>42,067</td> <td>38,354</td> <td>91.2</td> <td>1,188</td> <td>2.8</td> <td>1,969</td> <td>4.7</td> <td></td> <td>22</td> <td>22 0.1</td> <td>22 0.1 106</td> <td>22 0.1 106 0.3</td> <td>22 0.1 106 0.3 428</td>	30-99 $97,209$ $47,323$ 96.1 782 1.6 785 1.6 $40-9$ $97,188$ $37,341$ 98.1 359 1.1 157 0.5 $50-99$ $34,188$ $33,341$ 98.1 359 1.1 157 0.5 $50-99$ $31,359$ $13,343$ 98.6 104 0.8 45 0.3 $60-69$ $13,539$ $13,343$ 98.6 104 0.8 45 0.3 $20-29$ $106,687$ $95,33$ $12,504$ 2.5 4.44 1.827 0.3 $30-39$ $112,307$ $112,996$ $95,33$ 2.976 2.3 1.147 0.9 $40-9$ $127,307$ $1121,996$ $95,3$ 2.376 0.6 0.6 0.6 $40-9$ $127,307$ $121,996$ $95,3$ 2.376 0.9 0.6 $50-9$ 1120 $02,9$ 2.44 120 0			20–29	42,067	38,354	91.2	1,188	2.8	1,969	4.7		22	22 0.1	22 0.1 106	22 0.1 106 0.3	22 0.1 106 0.3 428
40-49 99,18 47,718 97,0 786 1.6 400 1.0 50-59 34,18 33,541 98,1 33,9 11 157 0.5 60-69 13,539 13,343 98,6 104 0.8 45 0.3 60-69 13,539 13,343 98,6 104 0.8 45 0.3 80 20-69 491,238 99,795 91,9 4,799 4,4 1,852 1,7 30-39 122,313 116,857 95,5 2,876 2,4 1,147 0.9 30-39 122,313 116,857 95,5 2,876 2,4 1,147 0.9 30-39 122,310 116,857 95,5 2,876 2,4 1,147 0.9 30-59 91,11 83,810 95,6 2,397 2,3 1,147 0.9 60-69 132,307 122,313 14,826 92,3 2,4 1,147 0.9 80-69					30–39	49,249	47,323	96.1	782	1.6	785	1.6		37	37 0.1	37 0.1 75	<i>37</i> 0.1 <i>7</i> 5 0.2	37 0.1 75 0.2 247
50-59 34,186 33,541 98,1 35,9 1,1 157 0.5 60-69 13,539 13,343 98,6 104 0.8 45 0.3 86 20-69 491,238 468,278 95,3 12,504 2.5 4806 1.0 20-29 106,588 99,795 91,9 4,799 4,44 1,822 1.7 30-39 122,307 121,906 95,5 2,876 2,4 1,147 0.9 30-39 127,307 121,906 95,5 2,876 2,3 1,147 0.9 30-39 91,511 88,810 97,0 1,516 1,7 540 0.9 60-69 41,519 40,820 98,3 376 0,9 120 0,3 80 20-69 122,297 142,599 98,3 376 0,9 120 0,3 80 20-69 122,397 32,352 88,1 1,579 2,4 1,4	50-50 $34,188$ $33,341$ $98,1$ 359 1.1 157 0.5 BC $60-60$ $13,339$ $13,343$ $98,6$ 104 0.8 45 0.3 BC $20-29$ $106,588$ $99,735$ 91.9 $4,799$ $4,4$ 1922 104 102 1033 103	50-50 $34,188$ $33,341$ 981 359 1.1 177 0.5 BC $20-60$ $13,539$ $13,343$ 98.6 104 0.8 45 0.3 BC $20-90$ $491,238$ 460278 95.33 $12,504$ 2.5 $4,006$ 110 $30-39$ $12,330$ $113,687$ 95.5 2876 2.4 1147 0.3 $30-39$ $123,307$ $121,966$ 95.8 2.977 2.3 1147 0.9 $30-39$ $127,307$ $121,966$ 95.8 2.977 2.4 1147 0.9 $60-69$ $41,519$ $80,810$ 97.0 $1,516$ 1.7 2.90 0.6 $60-69$ $41,519$ $80,810$ 97.0 $1,516$ 1.7 2.90 0.6 $10-69$ $32,524$ $91,616$ 2.33 2.4 1.44 2.7 0.6 0.6 $10-9$ 3			4049	49,188	47,718	97.0	786	1.6	480	1.0		64	64 0.1	64 0.1 29	64 0.1 29 0.1	64 0.1 29 0.1 111
60-69 13,539 13,343 98.6 104 0.8 45 0.3 BC 20-69 491,238 99,975 91.9 4,799 44 1,862 17 20-29 108,588 99,975 91.9 4,799 4.4 1,862 17 30-39 127,307 121,996 95.5 2,876 2.4 1,147 0.9 40-49 127,307 121,996 95.8 2,937 2.3 1,147 0.9 60-69 91,511 88,810 97.0 1,516 1.7 540 0.9 MB 20-69 91,519 88,81 1,516 1.7 540 0.9 MB 20-69 152,297 142,599 98.3 376 0.9 120 0.3 108 20-29 36,942 32,532 88.1 1,579 1,97 0.9 0.3 108 20-29 28.61 1,579 2.4 1,147 0.9 1.6 <t< td=""><td>60-69 13,539 13,343 92.6 104 0.8 45 0.3 BC 20-29 491/238 468,778 95.33 12,504 2.5 4,806 110 1 BC 20-29 106,588 9795 91.9 4,799 4.4 1,822 1,17 30-39 122,313 11,6857 95.5 2,876 2.4 1,377 0.9 40-49 127,307 12,1966 95.5 2,876 2.3 1,147 0.9 60-69 41,519 16,870 95.5 2,876 1,77 540 0.9 60-69 41,519 40,820 95.3 3,76 0.9 122 0.9 80 20-29 36,92 32,375 88.1 1,579 4.4 16.6 0.0 80 20-29 36,92 32,375 93.1 1,417 0.9 0.9 80 20-29 36,92 32,375 88.1 1,579 2.4</td><td>60-69 13,539 13,343 98,6 104 0.8 45 0.3 BC 20-99 49,238 468,278 95,33 12,504 2.5 4,806 10 30-39 122,313 116,857 95,53 12,504 2.5 4,806 10 30-39 122,313 116,857 95,53 2.876 2.4 1,47 0.9 30-39 122,313 116,857 95,5 2.876 2.4 1,47 0.9 30-39 123,307 173,906 95,8 2.937 2.3 1,147 0.9 60-69 41,519 88,810 97,05 1,516 1,17 540 0.9 MB 20-69 34,013 31,872 93,4 1,347 0.9 0.3 MB 20-39 34,013 31,872 93,4 1,347 0.9 0.3 MB 20-9 0,53 2,43 1,34 2.7 3,027 2.4 MB</td><th></th><th></th><td>5059</td><td>34,188</td><td>33,541</td><td>98.1</td><td>359</td><td>1:1</td><td>157</td><td>0.5</td><td></td><td>86</td><td>86 0.3</td><td>86 0.3 17</td><td>86 0.3 17 0.0</td><td>86 0.3 17 0.0 28</td></t<>	60-69 13,539 13,343 92.6 104 0.8 45 0.3 BC 20-29 491/238 468,778 95.33 12,504 2.5 4,806 110 1 BC 20-29 106,588 9795 91.9 4,799 4.4 1,822 1,17 30-39 122,313 11,6857 95.5 2,876 2.4 1,377 0.9 40-49 127,307 12,1966 95.5 2,876 2.3 1,147 0.9 60-69 41,519 16,870 95.5 2,876 1,77 540 0.9 60-69 41,519 40,820 95.3 3,76 0.9 122 0.9 80 20-29 36,92 32,375 88.1 1,579 4.4 16.6 0.0 80 20-29 36,92 32,375 93.1 1,417 0.9 0.9 80 20-29 36,92 32,375 88.1 1,579 2.4	60-69 13,539 13,343 98,6 104 0.8 45 0.3 BC 20-99 49,238 468,278 95,33 12,504 2.5 4,806 10 30-39 122,313 116,857 95,53 12,504 2.5 4,806 10 30-39 122,313 116,857 95,53 2.876 2.4 1,47 0.9 30-39 122,313 116,857 95,5 2.876 2.4 1,47 0.9 30-39 123,307 173,906 95,8 2.937 2.3 1,147 0.9 60-69 41,519 88,810 97,05 1,516 1,17 540 0.9 MB 20-69 34,013 31,872 93,4 1,347 0.9 0.3 MB 20-39 34,013 31,872 93,4 1,347 0.9 0.3 MB 20-9 0,53 2,43 1,34 2.7 3,027 2.4 MB			5059	34,188	33,541	98.1	359	1:1	157	0.5		86	86 0.3	86 0.3 17	86 0.3 17 0.0	86 0.3 17 0.0 28
BC 20-69 491,238 468,278 95.3 12,504 2.5 4,806 1.0 1 20-29 108,588 99,795 91.9 4,799 4.4 1,852 1,7 30-39 122,313 116,857 95.5 2,876 2.4 1,147 0.9 40-49 127,307 121,996 95.5 2,876 2.3 1,147 0.9 50-59 91,511 88,810 97.0 1,516 1.7 540 0.9 50-69 41,519 40,820 98.3 376 0.9 120 0.9 60-69 41,519 40,820 98.3 376 0.9 120 0.3 MB 20-69 152,297 142,599 93.6 4,134 2.7 3027 2.0 30-39 34,913 31,872 93.6 4,134 2.7 3027 2.0 10 10 36,381 34,519 94.9 94.9 1.6 1.4	BC 20-69 491/288 468,278 95.3 12,504 2.5 4,806 1.0 1.0 20-29 106,588 99,795 91.9 4,799 4.4 1,852 1.7 30-39 12,2313 11,6857 95.5 2,876 2.4 1,147 0.9 30-39 12,2313 11,6857 95.5 2,876 2.4 1,147 0.9 30-39 127,307 171,966 95.8 2,397 2,3 1,147 0.9 50-59 91,511 88,810 97.0 1,516 1,7 540 0.6 60-69 41519 40820 93.6 93.3 376 0.9 120 0.3 88 20-59 36,942 32,323 88.1 1,579 4.3 1,637 4.4 88 30-33 34,519 94.9 95.6 2.8 1.4 1,637 4.4 80-39 36,913 31,872 93.7 2.0 0.6	BC 20-69 491,288 468,278 95.3 12,504 2.5 4,806 1.0 20-29 108,588 99,795 91.9 4,799 4.4 1,852 1.7 30-39 123,30 11,6857 95.5 2,876 2.4 1,147 0.9 40-49 127,307 11,1966 95.8 2,997 2.3 1,147 0.9 50-59 91,511 88,810 95.8 2,997 2.3 1,147 0.9 60-69 41,519 40,820 95.8 1,516 1.7 540 0.6 86 192,297 142,599 98.8 1,516 1.7 540 0.6 80-69 152,297 142,599 93.6 93.7 2.7 3027 2.3 80 20-69 152,297 142,599 93.6 0.9 1.6 1.4 80 20-69 35,318 93.6 93.6 2.8 1.4 1.6 2.4			6069	13,539	13,343	98.6	104	0.8	45	0.3		32	32 0.2	32 0.2 7	32 0.2 7 0.1	32 0.2 7 0.1 8
20-29 108,58 99,795 91.9 4,799 4.4 1,852 1,7 30-39 122,313 116,857 95.5 2,876 2,4 1,147 0.9 40-49 127,307 121,996 95.5 2,876 2,3 1,147 0.9 50-59 91,511 88,810 97.0 1,516 1,7 540 0.9 50-59 91,511 88,810 97.0 1,516 1,7 540 0.9 60-69 41,519 40,820 98.3 376 0.9 120 0.9 80 20-69 152,297 142,599 93.3 376 0.9 120 0.9 80 20-69 152,297 142,599 93.4 1,579 4,134 2.7 30.7 0.9 80 20-69 152,297 142,599 93.4 93.2 2.8 1,579 4,9 0.9 80 20-69 36,922 33,512 93.4 1,579 4.3 1,637 4.4 80-9 30.3 34,519 94.9<	20-29 108,588 99,795 91.9 4,799 4,4 1,852 1,7 30-39 127,307 11,6857 95.5 2,876 2.4 1,147 0.9 40-49 127,307 11,6857 95.5 2,975 2,975 2,97 0.9 50-59 17,11 88,810 97.0 1,516 1,7 540 0.9 50-59 91,511 88,810 97.0 1,516 1,7 540 0.9 50-59 91,519 40,820 93.6 93.6 93.6 93.6 93.6 1,579 1,59 1,59 1,59 1,59 1,59 1,69 1,6 1,6 1,6 1,6 1,6 1,6 1,6 1,6 2,6 1,6 1,6 2,6 1,6 1,6 2,6 1,6 1,6 2,6 1,6 1,6 2,6 2,6 1,6 1,6 2,6 2,6 1,6 1,6 2,6 2,6 2,6 2,6 2,6	20-29 10858 99795 91.9 4799 4.4 1822 1.7 30-39 122,313 116,857 95.5 2.876 2.4 1,147 0.9 40-49 127,307 116,857 95.5 2.876 2.33 1,147 0.9 50-39 91511 88,810 97.0 1,516 1.7 540 0.9 60-69 41519 40,820 98.3 376 0.9 120 0.9 80 20-69 122,297 142,599 98.3 376 0.9 120 0.3 80 20-69 122,297 142,599 93.4 1376 2.4 147 0.9 80 20-69 36,942 32,532 88.1 1,579 4.3 1,637 4.4 80-39 34,013 31,872 94.9 2.7 3027 2.0 80-39 36,942 36,37 94.9 2.4 1,87 4.4 80-3		BC	2069	491,238	468,278	95.3	12,504	2.5	4,806	1.0	_	,421	,421 0.3	,421 0.3 981	,421 0.3 981 0.2	,421 0.3 981 0.2 3,248
30-39 123,33 116,857 95.5 2,876 2.4 1,147 0.9 40-49 127,307 121,996 95.8 2,937 2.3 1,147 0.9 50-59 91,511 88,810 97.0 1,516 1.7 540 0.6 50-59 91,511 88,810 97.0 1,516 1.7 540 0.6 60-69 41,519 40,820 98.3 376 0.9 120 0.3 MB 20-69 152,297 142,599 93.6 4,134 2.7 3027 0.3 10 20-29 36,942 32,532 88.1 1,579 4.3 1,637 4.4 20-29 36,942 33,532 88.1 1,579 4.3 1,637 4.4 20-39 34,013 31,872 93.4 95.6 2.8 6.03 1.8 20-59 29,34 34,519 94.9 95.6 2.8 6.03 1.4	30-39 122313 116,657 95.5 2.876 2.4 1,147 0.9 40-49 12/307 12/307 12/196 95.8 2,937 2.3 1,147 0.9 50-59 91511 86,810 97.0 1,516 1.7 540 0.6 60-69 41,519 40,820 98.3 376 0.9 122 0.9 60-69 152.297 142,599 93.6 4,134 2.7 540 0.6 86 1 1,579 4,134 2.7 3027 2.0 100-49 36,942 32,532 88.1 1,579 4.3 1,637 4.4 20-29 34,913 94.9 94.9 95.6 2.6 501 1.4 80-49 36,331 34,519 94.9 95.6 2.6 501 1.4 90-49 36,341 94.9 1,579 2.4 1.4 1.4 1.4 10-49 36,341 94	30-39 12,313 11,687 95.5 2,876 2,4 1,147 0.9 40-49 127,307 121,906 95.8 2,937 2.3 1,147 0.9 50-59 91,511 88,810 97.0 1,516 1,7 540 0.9 50-59 91,511 88,810 97.0 1,516 1,7 540 0.9 60-69 41,519 40,820 95.3 376 0.9 120 0.3 8 20-69 132,297 142,599 93.6 4,134 2.7 3027 2.0 8 20-69 35,942 32,532 88.1 1,579 4.3 1,637 4.4 8 30,33 31,872 93.4 94.9 95.6 2.0 1,63 1.4 8 30-39 34,519 94.9 95.6 2.8 0.3 1.4 0.9 9 40-49 36,313 31,872 95.6 2.8 0.9 0.1			20-29	108,588	99,795	91.9	4,799	4.4	1,852	1.7		611	119 0.1	119 0.1 476	119 0.1 476 0.4	119 0.1 476 0.4 1,547
40 127,307 121,936 95.8 2,937 2.3 1,147 0.9 50-59 91,511 88,810 97.0 1,516 1.7 540 0.6 50-59 91,511 88,810 97.0 1,516 1.7 540 0.6 60-69 41,519 40,820 98.3 376 0.9 120 0.3 NB 20-69 152,297 142,599 93.6 4,134 2.7 3,027 0.3 20-29 36,942 37,532 88.1 1,579 4.3 1,637 4.4 30-39 34,013 31,872 93.7 956 2.8 603 1.8 30-39 34,013 31,872 93.7 956 2.8 603 1.8 40-49 36,381 34,519 94.9 953 2.6 501 1.4 50-59 29,544 28,431 96.8 1.6 1.6 2.4 0.8 60-69 15,	40-49 127,307 121,956 95.8 2.937 2.3 1,147 0.9 50-59 91,511 88,810 97.0 1,516 1.7 540 0.6 60-69 41,519 88,810 97.0 1,516 1.7 540 0.6 60-69 41,519 88,810 98.3 376 0.9 120 0.3 80 20-69 152,297 142,599 98.3 376 2.7 3027 0.3 80 20-29 36,942 32,532 88.1 1,579 4.3 1,637 4.4 80-39 34,013 31,872 93.4 95.6 501 1.4 60-49 36,381 94.9 95.6 2.8 6.03 1.8 60-69 15,597 15,245 94.4 1.17 1.1 62 0.4 60-69 15,597 15,245 94.9 1.6 2.24 0.8 60-9 15,597 15,245 <t< td=""><td>40-49 127,307 121,906 95.8 2.937 2.3 1,147 09 50-59 91,511 88,810 97.0 1,516 1.7 540 0.6 60-69 41,519 40,820 98.3 376 0.9 120 0.3 60-69 152,297 142,599 98.3 376 0.9 120 0.3 NB 20-69 152,297 142,599 98.3 1,579 2.7 3027 2.0 30-39 36,942 32,532 88.1 1,579 4.3 1,637 4.4 40-49 36,361 34,519 94.9 95.6 2.8 1.8 1.6 1.8 60-69 15,597 15,745 94.9 95.6 2.6 0.4 1.6 1.8 60-69 15,597 15,745 94.9 1.6 2.6 0.4 80-50 20-59 29,364 2.8 1.6 1.6 0.8 10 60-69</td><th></th><th></th><td>30–39</td><td>122,313</td><td>116,857</td><td>95.5</td><td>2,876</td><td>2.4</td><td>1,147</td><td>0.9</td><td></td><td>273</td><td>273 0.2</td><td>273 0.2 270</td><td>273 0.2 270 0.2</td><td>273 0.2 270 0.2 890</td></t<>	40-49 127,307 121,906 95.8 2.937 2.3 1,147 09 50-59 91,511 88,810 97.0 1,516 1.7 540 0.6 60-69 41,519 40,820 98.3 376 0.9 120 0.3 60-69 152,297 142,599 98.3 376 0.9 120 0.3 NB 20-69 152,297 142,599 98.3 1,579 2.7 3027 2.0 30-39 36,942 32,532 88.1 1,579 4.3 1,637 4.4 40-49 36,361 34,519 94.9 95.6 2.8 1.8 1.6 1.8 60-69 15,597 15,745 94.9 95.6 2.6 0.4 1.6 1.8 60-69 15,597 15,745 94.9 1.6 2.6 0.4 80-50 20-59 29,364 2.8 1.6 1.6 0.8 10 60-69			30–39	122,313	116,857	95.5	2,876	2.4	1,147	0.9		273	273 0.2	273 0.2 270	273 0.2 270 0.2	273 0.2 270 0.2 890
50-59 91511 88,810 97.0 1,516 1,7 540 0.6 60-69 41,519 40,820 98.3 376 0.9 120 0.3 60-69 152,297 142,599 98.6 4,134 2.7 3,027 2.0 8 20-29 36,942 32,532 88.1 1,579 4.3 1,637 4,4 30-39 34,013 31,872 93.7 956 2.8 603 1.8 40-49 36,381 34,519 94.9 953 2.6 501 1.4 50-59 29,364 28,431 96.8 469 1.6 224 0.8 60-69 15,597 15,245 97.7 177 1.1 62 0.4	50-59 91511 88,810 97.0 1,516 1.7 540 0.6 60-69 41,519 40,820 98.3 376 0.9 120 0.3 60-69 152,297 142,599 98.3 376 0.9 120 0.3 NB 20-69 152,297 142,599 93.6 4,134 2.7 3,027 2.0 30-93 36,942 32,532 88.1 1,579 4.3 1,637 4.4 20-99 36,913 31,872 93.7 95.6 2.8 1,637 4.4 40-49 36,381 34,519 94.9 95.6 2.8 6.03 1.8 50-59 29,341 94.9 1,77 1,17 1,1 6.2 0.4 50-59 29,343 94.8 1,77 1,1 6.2 0.8 60-69 15,597 15,245 94.9 1.6 2.4 0.8 80 20-59 21,8 97.9<	50-59 91,511 88,810 97.0 1,516 1,7 540 0.6 60-69 41,519 40,820 98.3 376 0.9 120 0.3 60-69 112,299 40,820 98.3 376 0.9 120 0.3 80 20-99 122,297 142,599 93.6 4,134 2.7 3,027 2.0 20-39 36,942 32,532 88.1 1,579 4.3 1,637 4.4 30-39 34,013 31,872 93.4 95.6 2.8 1.6 1.6 40-49 36,381 34,519 94.9 95.6 2.8 6.03 1.8 50-59 29,361 28,431 96.8 1,579 2.6 2.0 1.4 60-69 15,597 15,245 97.7 1.17 1.1 62 0.4 10 20-69 15,597 15,245 97.7 1.17 1.2 0.4 10 20-69			4049	127,307	121,996	95.8	2,937	2.3	1,147	0.9		532	532 0.4	532 0.4 149	5 32 0.4 149 0.1	532 0.4 149 0.1 546
60-69 41,519 40,820 98.3 376 0.9 120 0.3 MB 20-69 152,297 142,599 93.6 4,134 2.7 3,027 2.0 20-29 36,942 32,532 88.1 1,579 4.3 1,637 4.4 20-39 34,013 31,872 93.7 956 2.8 6.03 1.8 30-39 34,013 31,872 93.7 956 2.8 6.03 1.8 40-49 36,381 34,519 94.9 953 2.6 501 1.4 50-59 29,64 28,431 96.8 469 1.6 224 0.8 60-69 15,597 15,245 97.7 177 1.1 62 0.4	60-69 41,519 40,820 98.3 376 0.9 120 0.3 MB 20-69 152,297 142,599 93.6 4,134 2.7 3,027 2.0 20-29 36,942 32,532 88.1 1,579 4.3 1,637 4.4 20-39 34,013 31,872 93.7 956 2.8 603 1.8 30-39 34,013 31,872 93.7 956 2.8 603 1.8 30-39 34,519 94.9 95.8 1,579 4.3 1,637 4.4 40-49 36,381 34,519 94.9 95.8 1.6 2.6 1.4 0.8 50-59 29,364 28,431 96.8 46.9 1.6 2.2 0.9 1.4 60-69 15,597 15,245 97.7 177 1.1 62 0.4 NL 20-69 73.8 1.4 1.2 1.1 62 0.4	60-69 41,519 40,820 98.3 376 0.9 120 0.3 MB 20-69 132,297 142,599 93.6 4,134 2.7 3,027 2.0 20-29 36,942 32,532 88.1 1,579 4.3 1,637 4.4 20-29 36,942 32,532 88.1 1,579 4.3 1,637 4.4 20-39 34,013 31,872 93.7 956 2.8 6.03 1.8 30-39 36,381 34,519 94.9 95.3 2.6 501 1.4 40-49 36,381 34,519 94.9 95.8 1.77 1.7 1.6 0.8 ML 20-69 15,597 15,245 97.7 1.77 1.1 62 0.4 ML 20-69 15,597 15,245 97.7 1.77 1.7 1.2 0.3 ML 20-69 72,108 69,103 95.8 1.73 1.7			5059	112'16	88,810	97.0	1,516	1.7	540	0.6		385	385 0.4	385 0.4 61	385 0.4 61 0.1	385 0.4 61 0.1 199
MB 20-69 152,297 142,599 93.6 4,134 2.7 3,027 2.0 20-29 36,942 32,532 88.1 1,579 4.3 1,637 4.4 20-39 36,942 32,532 88.1 1,579 4.3 1,637 4.4 30-39 34,013 31,872 93.7 956 2.8 603 1.8 40-49 36,381 34,519 94.9 953 2.6 501 1.4 50-59 29,364 28,431 96.8 469 1.6 224 0.8 60-69 15,597 15,245 97.7 177 1.1 62 0.4	MB 20-69 152,297 142,599 93.6 4,134 2.7 3,027 2.0 20-29 36,942 32,532 88.1 1,579 4.3 1,637 4.4 20-29 36,942 32,532 88.1 1,579 4.3 1,637 4.4 30-39 34,013 31,872 93.7 956 2.8 6.03 1.8 30-39 34,013 31,872 94.9 95.6 2.8 6.03 1.8 40-49 36,381 34,519 94.9 95.3 2.6 501 1.4 50-59 29,364 28,431 96.8 46.9 1.6 2.24 0.8 60-69 15,597 15,245 97.7 177 1.1 62 0.4 NL 20-69 72,108 69,103 95.8 1,243 1.7 1.2 2.04 20-29 16,112 14,663 91.0 528 3.3 740 4.6 2	MB 20-69 122,297 142,599 93.6 4,134 2.7 3,027 2.0 20-29 36,942 32,532 88.1 1,579 4.3 1,637 4.4 20-39 36,942 32,532 88.1 1,579 4.3 1,637 4.4 30-39 34,013 31,872 93.7 956 2.8 603 1.8 40-49 36,381 34,519 94.9 953 2.6 501 1.4 50-59 29,364 28,431 96.8 469 1.6 224 0.8 50-59 29,364 28,431 96.8 469 1.6 224 0.8 60-69 15,597 15,245 97.7 177 1.1 62 0.4 NL 20-69 15,597 15,245 97.8 1.6 23 0.4 S0-39 15,312 14,63 95.8 1.24 1.1 62 0.4 S0-29 15,312 <th></th> <th></th> <td>6069</td> <td>41,519</td> <td>40,820</td> <td>98.3</td> <td>376</td> <td>0.9</td> <td>120</td> <td>0.3</td> <td></td> <td>112</td> <td>112 0.3</td> <td>112 0.3 25</td> <td>112 0.3 25 0.1</td> <td>112 0.3 25 0.1 66</td>			6069	41,519	40,820	98.3	376	0.9	120	0.3		112	112 0.3	112 0.3 25	112 0.3 25 0.1	112 0.3 25 0.1 66
20-29 36,942 32,532 88.1 1,579 4.3 1,637 4.4 30-39 34,013 31,872 93.7 956 2.8 603 1.8 40-49 36,381 34,519 94.9 953 2.6 501 1.4 50-59 29,364 28,431 96.8 469 1.6 224 0.8 60-69 15,597 15,745 97.7 177 1.1 62 0.4	20-29 36,942 32,532 88.1 1,579 4.3 1,637 4.4 30-39 34,013 31,872 93.7 95.6 2.8 1,537 4.4 30-39 34,013 31,872 93.7 95.6 2.8 6.03 1.8 40-49 36,381 34,519 94.9 95.8 4.69 1.6 224 0.8 50-59 29,364 28,431 96.8 469 1.6 224 0.8 60-69 15,597 15,245 97.7 177 1.1 62 0.4 ML 20-69 72,108 63,103 95.8 1,243 1.7 1203 1.7 20-29 16,112 14,663 95.8 1,243 1.7 1203 9.4 30-39 17214 16,463 95.6 281 1.6 281 1.6	20-29 36,942 32,532 88.1 1,579 4.3 1,637 4.4 30-39 34,013 31,872 93.7 956 2.8 663 1.8 30-39 34,013 31,872 93.7 955 2.8 663 1.8 40-49 36,381 34,519 94.9 953 2.6 501 1.4 50-59 29,364 28,431 96.8 469 1.6 224 0.8 60-69 15,597 15,245 97.7 1/77 1.1 62 0.4 NL 20-69 72,108 69,103 95.8 1,243 1.7 1203 1.7 NL 20-69 72,108 69,103 95.6 3.3 740 4.6 30-39 17,214 16,463 95.6 283 3.3 740 4.6 30-39 17,499 97.2 282 1.6 1.6 1.6 1.6 1.6 30-39		MB	2069	152,297	142,599	93.6	4,134	2.7	3,027	2.0		195	195 0.1	195 0.1 469	195 0.1 469 0.3	195 0.1 469 0.3 1,873
30-39 34,013 31,872 93.7 956 2.8 603 1.8 40-49 36,381 34,519 94.9 953 2.6 501 1.4 50-59 29,364 28,431 96.8 469 1.6 224 0.8 60-69 15,597 15,245 97.7 177 1.1 62 0.4	30-39 34,013 31,872 93.7 956 2.8 603 1.8 40-49 36,381 34,519 94.9 953 2.6 501 1.4 50-59 29,364 28,431 96.8 469 1.6 224 0.8 50-59 29,364 28,431 96.8 469 1.6 224 0.8 60-69 15,597 15,245 97.7 177 1.1 62 0.4 NL 20-69 72,108 69,103 95.8 1,243 1.7 1203 1.7 20-29 16,112 14,663 91.0 528 3.3 740 46 20-39 17/214 16,463 95.6 281 1.6 281 1.6	30-39 34,013 31,872 93.7 956 2.8 603 1.8 40-49 36,381 34,519 94.9 953 2.6 501 1.4 50-59 29,364 28,431 96.8 469 1.6 224 0.8 50-59 29,364 28,431 96.8 469 1.6 224 0.8 60-69 15,597 15,245 97.7 177 1.1 62 0.4 NL 20-69 72,108 69,103 95.8 1,243 1.7 1,203 1.7 NL 20-69 15,112 14,663 95.6 233 740 46 30-39 17,714 16,463 95.6 281 1.6 281 1.6 30-39 17,749 95.6 282 283 1.6 1.6 1.6 30-39 17,749 95.6 95.2 282 1.6 1.6 1.6			20-29	36,942	32,532	88.1	1,579	4.3	1,637	4.4		15	15 0.0	15 0.0 192	15 0.0 192 0.5	15 0.0 192 0.5 987
40-49 36,381 34,519 94,9 953 2.6 501 1.4 50-59 29,364 28,431 96.8 469 1.6 224 0.8 60-69 15,597 15,245 97.7 177 1.1 62 0.4	40-49 36,381 34,519 94,9 953 2.6 501 1.4 50-59 29,364 28,431 96.8 469 1.6 224 0.8 50-59 29,364 28,431 96.8 469 1.6 224 0.8 60-69 15,597 15,245 97.7 177 1.1 62 0.4 NL 20-69 72,108 69,103 95.8 1,243 1.7 1203 1.7 20-29 16,112 14,663 91.0 528 3.3 740 46 30-39 17/214 16,463 95.6 281 1.6 281 1.6	$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$			30–39	34,013	31,872	93.7	956	2.8	603	1.8		43	43 0.1	43 0.1 105	43 0.1 105 0.3	43 0.1 105 0.3 434
50-59 29,364 28,431 96.8 469 1.6 224 0.8 60-69 15,597 15,245 97.7 177 1.1 62 0.4	50-59 29,364 28,431 96.8 469 1.6 224 0.8 60-69 15,597 15,245 97.7 177 1.1 62 0.4 NL 20-69 72,108 69,103 95.8 1,243 1.7 1,203 1.7 NL 20-29 16,112 14,663 91.0 528 3.3 740 4.6 30-39 17/214 16,463 95.6 281 1.6 281 1.6	50-59 29,364 28,431 96.8 469 1.6 224 0.8 60-69 15,597 15,245 97.7 177 1.1 62 0.4 NL 20-69 72,108 69,103 95.8 1,243 1.7 1.03 1.7 NL 20-69 72,108 69,103 95.8 1,243 1.7 1203 1.7 30-39 17,214 16,463 95.6 281 1.6 281 1.6 30-39 17,214 16,463 95.6 281 1.6 281 1.6 1.6 40-49 18,010 17,499 97.2 282 1.6 1.1 0.06			4049	36,381	34,519	94.9	953	2.6	501	1.4		23	53 0.1	53 0.1 91	53 0.1 91 0.3	53 0.1 91 0.3 264
60-69 15,597 15,245 97.7 177 1.1 62 0.4	60-69 15,597 15,245 97.7 177 1.1 62 0.4 NL 20-69 72,108 69,103 95.8 1,243 1.7 1,203 1.7 20-29 16,112 14,663 91.0 528 3.3 740 4.6 30-39 17214 16,463 95.6 281 1.6 281 1.6	60-69 15,597 15,245 97.7 177 1.1 62 0.4 NL 20-69 72,108 69,103 95.8 1,243 1.7 1,203 1.7 20-29 16,112 14,663 91.0 528 3.3 740 4.6 30-39 17,214 16,463 95.6 281 1.6 281 1.6 40-49 18,010 17,499 97.2 282 1.6 111 0.6			5059	29,364	28,431	96.8	469	1.6	224	0.8		56	56 0.2	56 0.2 55	56 0.2 55 0.2	56 0.2 55 0.2 129
	NL 20-69 72,108 69,103 95.8 1,243 1.7 1,203 1.7 20-29 16,112 14,663 91.0 528 3.3 740 4.6 30-39 17,214 16,463 95.6 281 1.6 281 1.6	NL 20-69 72,108 69,103 95.8 1,243 1.7 1,203 1.7 20-29 16,112 14,663 91.0 528 3.3 740 4.6 30-39 17,214 16,463 95.6 281 1.6 1.6 40-49 18,010 17,499 97.2 282 1.6 111 0.6			60—69	15,597	15,245	97.7	171	1.1	62	0.4		28	28 0.2	28 0.2 26	28 0.2 26 0.2	28 0.2 26 0.2 59
	30–39 17,214 16,463 95.6 281 1.6 281 1.6	30-39 17,214 16,463 95.6 281 1.6 281 1.6 40-49 18,010 17,499 97.2 282 1.6 111 0.6			20-29	16,112	14,663	91.0	528	3.3	740	4.6		20	20 0.1	20 0.1 60	20 0.1 60 0.4	20 0.1 60 0.4 101
20-29 16,112 14,663 91.0 528 3.3 740 4.6		40-49 18,010 17,499 97.2 282 1.6 111 0.6			30–39	17,214	16,463	95.6	281	1.6	281	1.6		37	37 0.2	37 0.2 41	37 0.2 41 0.2	37 0.2 41 0.2 111
20-29 16,112 14,663 91.0 528 3.3 740 4.6 30-39 17,214 16,463 95.6 281 1.6 281 1.6 40-49 18,010 17,499 97.2 2822 1.6 111 0.6 50-59 14,504 14,288 98.5 112 0.8 57 0.4	50–59 14,504 14,288 98.5 112 0.8 57 0.4				60—69	6,268	6,190	98.8	40	0.6	14	0.2		Ξ	11 0.2	11 0.2 6	11 0.2 6 0.1	11 0.2 6 0.1 7

sil+	Percent (%)	0.5	0.9	0.6	0.3	0.2	0.2
Ŧ	Women	689	310	203	102	51	23
Kc-H	Percent (%)	0.4	0.7	0.4	0.2	0.2	0.1
AS	Women	504	224	143	86	44	7
ec .	Percent (%)	0.3	0.1	0.2	0.4	0.3	0.3
A	Women	365	40	74	129	88	34
3H	Percent (%)	1:1	2.9	1.0	0.6	0.3	0.2
3	Women	1,593	950	333	202	84	24
-us	Percent (%)	2.5	4.7	2.4	2.1	1.4	0.9
ASC	Women	3,615	1,555	822	750	372	116
ative	Percent (%)	95.3	90.6	95.3	96.5	97.6	98.5
Neg	Women	135,688	29,740	32,003	34,568	26,018	13,359
	Satisfactory Pap Tests	142,454	32,819	33,578	35,837	26,657	13,563
	Age Group	 2069	20-29	30–39	4049	5059	60—69
	Province [†]	NS					
	Year						

11+ 11-	Percent (%)	07	1	2	0.8	0.4	0.2	0.2	0.8	2.0	0.9	0.4	0.2	0.1	0.6	1.3	0.7	0.4	0.2	0.2
H	Women	7 186	9 699	r7r'r	1,974	1,062	444	183	1,652	606	455	198	68	22	3,102	1,451	869	507	192	83
E.	Percent (%)	50	9 6	3	0.3	0.2	0.1	0.1	0.3	0.6	0.2	0.2	0.1	0.1	0.2	0.4	0.2	0.1	0.1	0.1
AS	Women	7 675	1 999	707'1	662	435	206	06	521	273	123	80	35	10	886	444	224	128	61	29
ec	Percent (%)	0.3			0.2	0.3	0.2	0.2	0.1	0.0	0.1	0.1	0.2	0.1	0.2	0.1	0.2	0.3	0.3	0.2
A	Women	1 801	64L	7/1	399	650	494	176	206	13	45	62	69	17	934	72	194	338	247	83
SIL	Percent (%)	15			1.4	1:0	0.5	0.3	2.7	7.0	2.4	1.5	0.8	0.4	0.9	1.7	0.8	0.7	0.4	0.2
	Women	16 079	177 0	140'0	3,534	2,547	1,069	281	5,470	3,115	1,259	732	307	57	4,188	1,804	955	914	404	Ξ
-us	Percent (%)	9 4		7.4	2.3	2.1	1.4	0.8	2.2	3.4	2.2	2.0	1.3	0.9	2.2	4.1	2.0	1.9	1.2	0.7
ASC	Women	24 674	270 0	/nn'/	5,698	5,524	2,717	818	4,318	1,521	1,160	110'1	481	145	10,740	4,480	2,438	2,387	1,133	302
ative	Percent (%)	95 U			95.1	96.1	97.5	98.4	93.9	87.0	94.1	95.9	97.4	98.4	95.9	92.4	96.1	96.5	97.8	98.6
Negr	Women	988 443	106 6 16	1 4 4 4 7 1	239,273	248,890	192,679	95,310	187,310	38,854	48,737	48,354	35,896	15,469	467,874	100,376	114,346	118,933	90,208	44,011
	Satisfactory Pap Tests	1 040 841	702 366	07 / 107	251,540	259,108	197,609	96,858	199,477	44,685	51 <i>,77</i> 9	50,437	36,856	15,720	487,724	108,627	119,026	123,207	92,245	44,619
	Age Group	09-06	06 06	40—71	30–39	4049	5059	69—09	2069	20–29	30–39	4049	5059	69—09	2069	2029	30–39	4049	5059	69—69
	Province [†]	Province	Combined						AB						BC					
	Year	2007																		

[†]AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population).

				Nega	ıtive	ASC-	SU	SI	SIL.	A	ç	AS	ĊH	H	ll+
Year	Province [†]	Age Group	Satisfactory Pap Tests	Women	Percent (%)	Women	Percent (%)	Women	Percent (%)	Women	Percent (%)	Women	Percent (%)	Women	Percent (%)
	MB	2069	151,023	141,333	93.6	4,444	2.9	3,075	2.0	165	0.1	525	0.3	1,481	1.0
		2029	36,616	32,317	88.3	1,689	4.6	1,669	4.6	21	0.1	161	0.5	729	2.0
		30–39	33,729	31,563	93.6	166	2.9	636	1.9	29	0.1	137	0.4	373	1:1
		4049	35,187	33,290	94.6	1,042	3.0	496	1.4	47	0.1	100	0.3	212	0.6
		5059	29,041	28,069	96.7	535	1.8	209	0.7	47	0.2	67	0.2	114	0.4
		6069	16,450	16,094	97.8	187	1:1	65	0.4	21	0.1	30	0.2	53	0.3
	NL	2069	71,133	67,393	94.7	1,457	2.0	1,745	2.5	142	0.2	136	0.2	260	0.4
		20–29	15,163	13,292	87.7	604	4.0	1,075	1.7	15	0.1	73	0.5	104	0.7
		30–39	16,579	15,737	94.9	315	1.9	370	2.2	28	0.2	34	0.2	95	0.6
		4049	17,606	17,012	96.6	301	1.7	199	1:1	49	0.3	13	0.1	32	0.2
		5059	14,804	14,481	97.8	177	1.2	11	0.5	38	0.3	8	0.1	23	0.2
		60—69	6,981	6,871	98.4	09	0.9	24	0.3	12	0.2	8	0.1	9	0.1
	NS	2069	131,484	124,533	94.7	3,665	2.8	1,594	1.2	444	0.3	557	0.4	169	0.5
		2029	30,635	27,452	89.6	1,573	5.1	978	3.2	51	0.2	251	0.8	330	1.1
		30–39	30,427	28,890	94.9	794	2.6	314	1.0	103	0.3	144	0.5	182	0.6
		4049	32,671	31,301	95.8	783	2.4	206	0.6	154	0.5	114	0.3	113	0.3
		5059	24,663	24,025	97.4	391	1.6	72	0.3	93	0.4	35	0.1	47	0.2
		69—69	13,088	12,865	98.3	124	0.9	24	0.2	43	0.3	13	0.1	19	0.1
[†] AB provided	data for the are	as in which the org	tanized program ope	stated during these	e years (approximat	tely 40% of the p	opulation).								

HSIL+	ent (%) Women Percent (%)	0.2 9,984 0.4	0.3 4,579 0.9	0.2 2,904 0.5	0.1 1,550 0.3	0.1 664 0.1	0.1 287 0.1
ASC-H	Women Perce	3,932	1,638	1,078	636	401	179
AGC	Percent (%)	0.1	0.1	0.1	0.1	0.2	0.1
	Women	2,642	284	538	807	878	335
LSIL	Percent (%)	1.7	4.2	1.5	1.0	0.6	0.3
	Women	40,163	22,510	8,507	5,768	2,567	811
sc-US	Percent (%)	2.2	4.1	2.1	1.8	1.3	0.9
4	Women	51,855	21,649	11,636	10,689	5,887	1,994
gative	Percent (%)	95.4	90.4	95.6	96.7	97.7	98.5
Neg	Women	2,255,131	479,440	540,262	569,807	435,342	230,280
	Satisfactory Pap Tests	2,363,707	530,100	564,925	589,257	445,539	233,886
	Age Group	2069	20–29	30–39	4049	5059	69—09
	Province [†]	Provinces	Combined				
	Year	2008					

¹ON follows a different severity order: negative < ASCUS < AGC < ASC-H < LSIL < HSLL and higher (includes CA). ON provided data for approximately 87% of all Pap tests performed in the province in 2008. Approximately 0.01% of the Pap tests had an 'other abnormal cell' Percent (%) <u>.</u> 0.6 0.3 0.1 0.9 2.0 1.0 0.4 0.2 0.2 0.5 0.3 0.4 0.2 0.6 0.5 2 0.6 0.3 0.5 Ξ 0.3 0.2 0.1 1.0 0.1 HSIL+ 331 148 56 19 **1,337** 751 338 338 154 154 33 Women 1,079 682 335 116 39 615 313 150 89 44 19 I,530 1,739 1,403 824 385 179 697 2,251 ,251 Percent (%) 0.5 0.2 0.0 0.0 0.3 0.0 0.3 0.4 0.3 0.2 0.2 0.1 0.8 0.5 0.3 0.1 0.1 0.1 0.2 0.1 0.1 0.1 0.2 6 0.1 0.1 0.4 ASC-H **2,046** 727 573 358 273 115 Women **395** 164 99 63 48 21 50 35 218 112 6 9 577 286 156 82 34 19 519 243 138 83 37 18 Percent (%) 0.1 0.0 0.1 0.0 6.1 0.1 0.2 0.1 0.1 0.1 0.1 0.2 0.3 0.1 0.3 0.4 0.3 0.3 0.1 0.1 0.1 0.1 6 0.1 6.1 6 0.1 AGC Women 65 14 54 22 23 **512** 38 111 153 145 65 34 S 23 43 23 28 28 30 90 83 35 282 445 372 185 22 197 ,481 Percent (%) 6.9 2.2 1.4 0.8 0.5 0.7 1.4 0.6 0.5 0.3 2.0 4.5 1.9 1.4 0.7 0.3 1.3 3.4 1.2 0.7 0.5 1.9 1.7 1.1 0.7 0.4 2.7 LSIL 15,025 Women 3,251 698 296 92 3,179 716 600 249 63 654 486 206 28 ,703 966 339 226 113 29 26,646 5,591 3,758 1,703 569 ,544 ,207 ,551 ,687 3,091 Percent (%) 1.4 0.8 0.6 1.7 3.0 1.7 1.7 3.6 1.6 ... 0.7 0.4 3.1 3.0 3.0 2.0 1.0 3.1 5.9 2.8 2.4 1.8 1.1 2.3 4.1 2.1 1.9 1.5 ASC-US 1,044 583 174 6,616 1,914 1,738 816 12,681 6,975 3,859 1,396 Women 3,469 ,433 920 694 321 101 3,982 ,593 688 179 l,627 1,815 1,011 3,876 742 436 144 31,527 ,356 Percent (%) 95.9 97.0 9.96 97.5 98.3 95.5 94.8 88.1 95.2 96.8 98.1 98.6 96.9 93.7 97.0 97.7 98.7 99.2 93.7 88.1 93.7 94.8 96.8 98.1 94.4 88.8 94.7 98.2 95.2 90.1 Negative 113,915 117,060 31,422 119,270 27,163 29,444 1,325,038 275,345 316,226 341,323 137,750 197,554 41,693 51,536 49,398 37,707 17,220 471,567 103,476 91,428 32,582 28,559 16,438 26,225 254,394 45,688 141,702 32,701 23,254 13,184 Women Satisfactory Pap Tests 208,378 47,306 54,138 51,042 38,432 17,460 486,442 110,412 117,494 119,823 37,123 33,547 16,750 126,333 29,545 23,967 1,391,268 305,714 331,050 353,324 260,986 140,194 92,660 46,053 151,286 34,372 29,494 28,696 30,696 13,429 Age Group 50-59 69--09 20–29 30–39 40--49 50--59 20–29 30–39 50--59 20–29 30–39 50-59 20–29 50-59 20–29 40-49 69-09 20--69 40-49 20--69 40--49 69-09 20-69 30–39 40--49 20-69 30–39 20--69 69-09 69--09 Province[†] No AB ĸ MB S Year

AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population).

finding and were excluded from this calculation.

SIL+	Percent (%)	0.5	1:1	9.0	0.3	0.2	0.1	0.7	1.7	0.7	0.3	0.2	0.1	0.5	1.2	0.7	0.3	0.2	0.1	0.9	2.0		0.5	0.3	0.3	0.4	0.7	9.0	0.2	0.2	0.1
Ŧ	Women	17,170	8,102	4,878	2,612	1,108	470	2,903	1,606	786	346	124	41	5,353	2,530	1,551	842	308	122	2,818	1,480	11/	366	177	84	260	104	95	32	23	9
÷	Percent (%)	0.2	0.4	0.2	0.1	0.1	0.1	0.2	0.5	0.2	0.1	0.1	0.0	0.2	0.3	0.2	0.1	0.1	0.1	0.3	0.5	0.4	0.2	0.2	0.2	0.2	0.5	0.2	0.1	0.1	0.1
AS	Women	6,557	2,870	1,740	1/0/1	607	269	916	491	235	130	44	16	1,463	730	380	210	95	48	920	355	236	163	115	51	136	73	34	13	8	8
9 C	Percent (%)	0.1	0.1	0.1	0.2	0.2	0.2	0.1	0.0	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.2	0.2	0.2	0.1	0.0	0.1	0.1	0.1	0.1	0.2	0.1	0.2	0.3	0.3	0.2
A	Women	4,533	456	937	1,457	1,172	511	371	27	11	116	112	39	1,446	110	305	491	392	148	299	26	52	90	82	49	142	15	28	49	38	12
sıt	Percent (%)	1.7	4.1	1.5	1.0	9.0	0.3	2.7	6.9	2.3	1.4	0.8	0.4	0.8	1.5	0.7	9.0	0.4	0.2	2.0	4.6	1.9	1.4	0.7	0.4	2.5	7.1	2.2	1:1	0.5	0.3
	Women	56,235	31,151	12,041	8,315	3,636	1,092	11,014	6,366	2,466	1,430	603	149	7,367	3,355	1/9/1	1,514	653	174	6,166	3,356	1,290	982	415	123	1,745	1,075	370	199	11	24
SU-	Percent (%)	2.2	4.1	2.1	1.9	1.3	0.9	1.9	3.2	2.0	1.7	1:1	0.7	2.0	3.9	1.8	1.6	1.0	0.5	3.0	4.8	3.0	3.0	1.9	1:1	2.0	4.0	1.9	1.7	1.2	0.9
ASC	Women	76,479	31,516	17,334	16,213	8,604	2,812	7,787	2,954	2,080	1,705	802	246	19,096	8,462	4,352	3,980	1,821	481	1/0/6	3,504	2,002	2,086	1,118	361	1,457	604	315	301	171	99
ative	Percent (%)	95.3	90.3	95.5	96.5	97.6	98.4	94.4	87.6	94.7	96.3	97.8	98.5	96.4	93.1	96.5	97.1	98.2	98.9	93.6	88.2	93.6	94.7	96.7	98.0	94.7	87.7	94.9	9.96	97.8	98.4
Neg	Women	3,243,574	691,731	779,535	818,697	628,021	325,590	384,864	80,547	100,273	97,752	73,603	32,689	939,441	203,852	228,261	235,993	181,636	89,699	283,035	65,018	62,985	65,872	56,628	32,532	67,393	13,292	15,737	17,012	14,481	6,871
	Satisfactory Pap Tests	3,404,548	765,826	816,465	848,365	643,148	330,744	407,855	166'16	105,917	101,479	75,288	33,180	974,166	219,039	236,520	243,030	184,905	90,672	302,309	73,739	67,276	69,559	58,535	33,200	71,133	15,163	16,579	17,606	14,804	6,981
	Age Group	2069	20–29	30–39	4049	5059	6069	 2069	20–29	30–39	40-49	5059	6069	2069	20–29	30–39	4049	5059	60—69	 2069	20–29	30–39	40-49	5059	60—69	 2069	20–29	30–39	4049	5059	6069
	Province [†]	Provinces	Combined					AB						ğ						MB						NL					
	Year	2007-	2008																												

11+	Percent (%)	0.5	1:1	0.6	0.3	0.2	0.1	0.3	0.6	0.4	0.2	0.1	0.1
H	Women	1,306	643	332	202	16	38	4,530	1,739	1,403	824	385	179
E.H	Percent (%)	0.4	0.8	0.5	0.3	0.1	0.1	0.1	0.2	0.2	0.1	0.1	0.1
AS	Women	1,076	494	282	197	72	31	2,046	727	573	358	273	115
sc	Percent (%)	0.3	0.1	0.3	0.4	0.4	0.3	0.1	0.1	0.1	0.1	0.1	0.1
AC	Women	794	81	193	266	176	78	1,481	197	282	445	372	185
Ħ	Percent (%)	1.3	3.3	11	0.7	0.4	0.2	1.9	4.9	1.7	1:1	0.7	0.4
21	Women	3,297	1,974	653	432	185	53	26,646	15,025	5,591	3,758	1,703	569
SÙ	Percent (%)	2.9	5.5	2.7	2.4	1.7	1.0	2.3	4.1	2.1	1.9	1.5	1.0
ASC	Women	7,541	3,311	1,610	1,525	827	268	31,527	12,681	6,975	6,616	3,859	1,396
ative	Percent (%)	94.6	89.2	94.8	95.9	97.2	98.2	95.2	90.1	95.5	9.96	97.5	98.3
Nego	Women	243,803	53,677	56,053	60,745	47,279	26,049	1,325,038	275,345	316,226	341,323	254,394	137,750
	Satisfactory Pap Tests	257,817	60,180	59,123	63,367	48,630	26,517	1,391,268	305,714	331,050	353,324	260,986	140,194
	Age Group	2069	2029	30–39	4049	5059	69—69	2069	2029	30–39	4049	5059	6909
	Province [†]	NS						NO					
	Year												

 † NL provided data for 2007.

ON follows a different severity order: negative < ASCUS < AGC < ASC-H < LSL <HSLL and higher (includes CA).

ON provided data for 2008 for approximately 87% of all Pap tests performed in the province. Approximately 0.01% of the Pap tests had an 'other abnormal cell' finding and were excluded from this calculation.

AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population).

Screening Test Results - SK

Percentage of women by their most severe Pap test result

			Custal and any	Nega	ıtive	Abnorm	ial Low	Abnorn	nal High
Year	Province [†]	Age Group	Pap Tests	Women	Percent (%)	Women	Percent (%)	Women	Percent (%)
2005	SK	20-69	105,399	101,605	96.4	3,102	2.9	692	0.7
		20-29	28,801	26,629	92.5	1,801	6.3	371	1.3
		30–39	23,041	22,305	96.8	554	2.4	182	0.8
		40-49	25,797	25,251	97.9	452	1.8	94	0.4
		50–59	18,405	18,157	98.7	223	1.2	25	0.1
		60—69	9,355	9,263	99.0	72	0.8	20	0.2
2006	SK	20–69	104,540	100,660	96.3	3,164	3.0	716	0.7
		20–29	28,531	26,323	92.3	1,810	6.3	398	1.4
		30—39	22,845	22,089	96.7	580	2.5	176	0.8
		4049	25,026	24,463	97.8	475	1.9	88	0.4
		50—59	18,854	18,586	98.6	236	1.3	32	0.2
		60—69	9,284	9,199	99.1	63	0.7	22	0.2
2007	SK	20–69	102,873	98,989	96.2	3,117	3.0	767	0.7
		20–29	28,483	26,254	92.2	1,827	6.4	402	1.4
		30–39	22,450	21,666	96.5	562	2.5	222	1.0
		40-49	23,539	22,996	97.7	453	1.9	90	0.4
		50—59	18,975	18,737	98.7	207	1.1	31	0.2
		60—69	9,426	9,336	99.0	68	0.7	22	0.2
2008	sk	20-69	101.767	97,434	95.7	3,496	3.4	837	0.8
		20-29	28.860	26.385	91.4	2.022	7.0	453	1.6
		30-39	22,259	21,411	96.2	615	2.8	233	1.0
		40-49	22,308	21,712	97.3	501	2.2	95	0.4
		50-59	18,951	18,655	98.4	264	1.4	32	0.2
		60—69	9,389	9,271	98.7	94	1.0	24	0.3
2007-2008	SK	20–69	204,640	196,423	96.0	6,613	3.2	1,604	0.8
		20–29	57,343	52,639	91.8	3,849	6.7	855	1.5
		30–39	44,709	43,077	96.3	1,177	2.6	455	1.0
		4049	45,847	44,708	97.5	954	2.1	185	0.4
		5059	37,926	37,392	98.6	471	1.2	63	0.2
		60—69	18,815	18,607	98.9	162	0.9	46	0.2

[†] SK provided three cytology categories (normal, abnormal low and abnormal high); abnormal low included AGC, AGCN, AGEC, AGECN, AGEM, ASA, ASCU, ASE and LSIL. Abnormal high included ADC, AIS, ASHG, HSIL, PC2, PSCC and SCC. Refer to Appendix D for a complete description of the codes.

Cytology Turnaround Times (Median Days)

Median number of days from the date the Pap test is performed to the date the Pap test is processed by the laboratory

Province [†]	2005	2006	2007	2008
BC	16	19	14	11
MB	11	8	11	10
NL	9	7	12	_
NS	29	41	53	24
ON	-	-	21	16
SK	7	14	12	14

† ON provided data for approximately 87% of all Pap tests performed in the province in 2007 and 2008.

Colposcopy Follow-up Rate

Percentage of women with a high-grade (ASC-H and HSIL+) Pap test result who had a follow-up colposcopy examination within 12 months

			03 M	lonths	3-6 N	Nonths	W 6−9	lonths	9-121	Months	ę	tal
Province	t Age Group	HSIL+ HSIL+	Number of Women	Percent (%)								
	:			1	i	1		1	:	1	1	
	20-69	1,000	835	83.5	70	7.0	27	2.7	13	1.3	945	94.5
	20–29	458	377	82.3	30	6.6	13	2.8	6	2.0	429	93.7
	30–39	280	238	85.0	19	6.8	5	1.8	2	0.7	264	94.3
	4049	172	147	85.5	14	8.1	4	2.3	-	0.6	166	96.5
	5059	70	55	78.6	9	8.6	5	1.7	-	1.4	67	95.7
	6069	20	18	90.0	-	5.0	0	0.0	0	0.0	19	95.0
	2069	4,501	2,722	60.5	599	13.3	132	2.9	09	1.3	3,513	78.0
	2029	2,078	1,235	59.4	314	15.1	63	3.0	34	1.6	1,646	79.2
	30–39	1,261	820	65.0	137	10.9	40	3.2	14	1:1	110,1	80.2
	4049	759	460	60.6	103	13.6	18	2.4	8	1:1	589	77.6
	5059	280	147	52.5	32	11.4	8	2.9	2	0.7	189	67.5
	60—69	123	60	48.8	13	10.6	3	2.4	2	1.6	78	63.4
	2069	2,113	705	33.4	594	28.1	298	14.1	64	3.0	1,661	78.6
	20–29	1,068	351	32.9	300	28.1	141	13.2	34	3.2	826	77.3
	30–39	466	160	34.3	138	29.6	69	14.8	16	3.4	383	82.2
	4049	308	108	35.1	90	29.2	45	14.6	10	3.2	253	82.1
	5059	193	65	33.7	53	27.5	30	15.5	2	1.0	150	1.17
	6069	78	21	26.9	13	16.7	13	16.7	2	2.6	49	62.8
	_											

t BC received 97% of all colposcopy reports.

AB provided data for the areas in which the organized program operated during these years (approximately 40% of population). The denominator numbers for ASC-H/HSIL are different from the screening results since the lab data covered two regions, but colposcopy data covered the entire province (with some missing forms).

Percent (%) 95.6 94.3 96.8 97.6 95.6 95.0 78.6 77.6 81.0 80.4 73.8 73.5 77.6 75.6 82.0 80.3 80.4 61.2 Tota Number of Women ,075 337 162 65 19 1,569 940 559 192 66 **,818** 891 442 285 148 52 492 3,326 Percent (%) 2.8 2.5 4.0 1.8 1.5 1.4 1.2 2.2 0.9 1.5 0.0 4.5 3.4 6.0 2.4 3.9 9–12 Months Number of Women **31** 13 ŝ 0 42 24 11 11 -24 26 9 4 C 3 16 Percent (%) 13.5 16.3 4.2 5.0 3.4 4.8 0.0 5.0 4.0 4.1 3.2 3.8 3.3 13.7 12.0 22.8 5.9 6-9 Months Number of Women 86 86 48 22 10 3 26 12 œ 0 -**320** 142 73 58 42 42 5 8 47 Percent (%) 10.8 12.1 8.9 12.0 8.8 5.0 29.0 28.2 31.0 27.9 31.0 28.2 17.3 18.4 15.6 15.5 18.8 22.0 3-6 Months Number of Women **121** 63 31 20 9 **730** 372 181 108 49 20 679 332 167 99 57 24 Percent (%) 77.9 74.7 80.5 78.9 85.3 85.0 56.0 53.7 59.1 60.9 49.6 47.3 31.1 31.8 33.0 32.7 20.7 24.7 0–3 Months Number of Women 876 390 280 131 131 17 **728** 375 178 116 38 38 21 2,367 1,087 685 423 129 43 **1,124** 522 348 166 68 20 **2,342** 1,179 539 355 184 85 2,023 1,160 695 260 91 ASC-H HSIL+ 4,229 Age Group 20--69 20–29 30–39 40--49 50--59 20–29 30–39 40--49 50-59 20–29 30–39 40--49 50--59 69-09 20--69 69-09 20--69 69-09 Province[†] MB AB M 2006 Year

[†] BC received 97% of all colposcopy reports.

AB provided data for the areas in which the organized program operated during these years (approximately 40% of population). The denominator numbers for ASC-H/HSLL are different from the screening results since the lab data covered two regions, but coloscopy data covered the entire province (with some missing forms).

				03 M	onths	3—6 M	lonths	W 6−9	onths	9–127	Aonths	P	tel
Year	Province [†]	Age Group	ASC-H HSIL+	Number of Women	Percent (%)								
1000	Q	07 00	071 0	100	0 00	1 064	7 07	196	67	17	Ċ	100 0	7 70
1002	AD	40-07	2,100	1+0	20.0	+cn'i	40.0	<u></u>	7.0	5 3	0.0	4-10-1	0.07
		20–29	1,131	419	37.0	569	50.3	69	6.1	33	2.9	1,090	96.4
		30—39	580	227	39.1	267	46.0	39	6.7	24	4.1	557	96.0
		4049	303	135	44.6	140	46.2	18	5.9	ŝ	1.0	296	1.79
		5059	117	45	38.5	09	51.3	7	6.0	°	2.6	115	98.3
		69—09	37	15	40.5	18	48.6	2	5.4	-	2.7	36	97.3
	BC	2069	3,988	2,374	59.5	638	16.0	130	3.3	55	1.4	3,197	80.2
		20–29	1,895	1,077	56.8	328	17.3	76	4.0	27	1.4	1,508	79.6
		30–39	1,093	674	61.7	168	15.4	25	2.3	20	1.8	887	81.2
		4049	635	391	61.6	98	15.4	14	2.2	5	0.8	508	80.0
		5059	253	155	61.3	34	13.4	8	3.2	3	1.2	200	79.1
		60—69	112	11	68.8	10	8.9	7	6.3	0	0.0	94	83.9
	MB	2069	2,006	623	31.1	546	27.2	249	12.4	95	4.7	1,513	75.4
		20-29	920	283	30.8	241	26.2	103	11.2	44	4.8	1/9	72.9
		30–39	510	169	33.1	137	26.9	09	11.8	19	3.7	385	75.5
		40—49	312	26	31.1	103	33.0	35	11.2	14	4.5	249	79.8
		5059	181	43	23.8	41	22.7	42	23.2	14	7.7	140	77.3
		6069	83	31	37.3	24	28.9	6	10.8	4	4.8	68	81.9
† BC received 97	% of all colposcopy	reports.							_		_		

AB provided data for the areas in which the organized program operated during these years (approximately 40% of population). The denominator numbers for ASC-H/HSLL are different from the screening results since the lab data covered two regions, but colposcopy data covered the entire province (with some missing forms).

Percent (%) 96.9 97.4 98.8 96.7 83.0 82.1 83.5 85.9 82.0 77.6 78.3 76.2 79.2 82.5 83.8 80.8 97.0 95.8 Total Number of Women **1,357** 697 346 179 93 42 79 29 1,120 806 418 206 2,346 700 358 123 45 ,538 Percent (%) 4.5 3.7 6.5 3.3 5.0 3.3 2.1 2.3 1.2 3.1 1.3 5.2 3.8 4.5 3.0 3.2 4.5 0.0 9-12 Months Number of Women 28 4 9 32 10 13 2 ŝ 41 13 5 0 31 5 _ 9 Π Percent (%) 7.0 7.4 10.0 4.6 3.7 2.6 3.3 10.8 17.5 22.5 13.5 8.4 9.6 4.1 10.9 12.5 6–9 Months Number of Women 0 **217** 100 47 38 38 25 7 34 8 30 œ **115** 63 31 11 S S Percent (%) 62.9 20.7 18.7 23.1 19.8 28.8 23.1 53.4 64.7 65.6 48.8 50.0 l6.2 17.3 15.2 16.5 12.0 **3-6 Months** Number of Women 538 270 141 39 18 **457** 236 127 69 18 2 359 171 101 101 43 43 32 32 12),006 Percent (%) 41.3 42.1 42.3 41.9 21.0 57.8 27.9 44.2 18.9 19.5 35.0 33.3 63.5 63.5 65.3 51.7 20.6 60.6 0-3 Months Number of Women 1,**714** 789 532 265 **715** 385 385 385 91 31 31 23 157 90 28 10 98 30 327 1,365 **1,732** 915 ASC-H HSIL+ l,586 832 429 215 30 30 2,828 838 417 150 58 437 217 111 52 Age Group 20-29 20-69 20–29 30–39 40--49 50--59 20–29 30–39 40-49 50--59 50-59 69—09 20--69 69—09 20-69 30–39 40--49 69—09 Province[†] MB AB ĸ 2008 Year

[†] BC received 97% of all colposcopy reports.

AB provided data for the areas in which the organized program operated during these years (approximately 40% of population). The denominator numbers for ASC-H/HSIL are different from the screening results since the lab data covered two regions, but colossopy data covered the entire province (with some missing forms).

				0-3 M	onths	3—6 A	Months	W 6-9	onths	9–121	Months	2	Þ
Year	Province [†]	Age Group	ASC-H HSIL+	Number of Women	Percent (%)								
2007-2008	Provinces	20-69	14,308	6,594	46.1	4,060	28.4	980	6.8	411	2.9	12,045	84.2
	Combined	20–29	7,058	3,110	44.1	2,083	29.5	491	7.0	208	2.9	5,892	83.5
		30–39	3,887	1,877	48.3	1,070	27.5	232	6.0	114	2.9	3,293	84.7
		40-49	2,099	1,021	48.6	594	28.3	132	6.3	49	2.3	1,796	85.6
		5059	892	400	44.8	224	25.1	95	10.7	31	3.5	750	84.1
		60–69	372	186	50.0	89	23.9	30	8.1	6	2.4	314	84.4
	AB	2069	3,754	1,168	31.1	2,060	54.9	269	7.2	135	3.6	3,632	96.8
		20–29	1,963	576	29.3	1,107	56.4	149	7.6	64	3.3	1,896	9.96
		30–39	1,009	317	31.4	537	53.2	69	6.8	52	5.2	975	96.6
		40-49	518	177	34.2	281	54.2	34	6.6	10	1.9	502	96.9
		5059	197	73	37.1	66	50.3	15	7.6	7	3.6	194	98.5
		69—09	67	25	37.3	36	53.7	2	3.0	2	3.0	65	97.0
	BC	20-69	6,816	4,088	0.0à	1,095	16.1	245	3.6	115	1.7	5,543	81.3
		20–29	3,260	1,866	57.2	564	17.3	139	4.3	59	1.8	2,628	80.6
		30–39	1,931	1,206	62.5	295	15.3	56	2.9	30	1.6	1,587	82.2
		40-49	1,052	656	62.4	167	15.9	25	2.4	18	1.7	866	82.3
		5059	403	253	62.8	52	12.9	13	3.2	5	1.2	323	80.1
		60–69	170	107	62.9	11	10.0	12	1.7	33	1.8	139	81.8
	MB	2069	3,738	1,338	35.8	905	24.2	466	12.5	191	4.3	2,870	76.8
		20–29	1,835	668	36.4	412	22.5	203	1.11	85	4.6	1,368	74.6
		30–39	947	354	37.4	238	25.1	107	11.3	32	3.4	731	77.2
		4049	529	188	35.5	146	27.6	73	13.8	21	4.0	428	80.9
		5059	292	74	25.3	73	25.0	67	22.9	19	6.5	233	79.8
		60—69	135	54	40.0	36	26.7	16	11.9	4	3.0	110	81.5
† BC received 97°	% of all colposcopy rep	oorts.											

AB provided data for the areas in which the organized program operated during these years (approximately 40% of population). The denominator numbers for ASC-H/HSIL are different from the screening results since the lab data covered two regions, but colposcopy data avered the entities province (with some missing forms).

Biopsy Rates

nonths
2
Ē
within
biopsy
had
who
result
test
Pap
$\widehat{+}$
I HSIL
anc
Ŧ
Q
X
-grade
hgh
ō
with
women
of
Percentage

	Percent (%)	89.8	87.6	9.06	92.2	94.8	93.5
2007–2008	HSIL+ HSIL+	6,816	3,260	1,931	1,052	403	170
	Number of Women	6,118	2,857	1,750	970	382	159
	Percent (%)	90.5	88.0	92.4	92.1	95.3	98.3
2008	ASC-H HSIL +	2,828	1,365	838	417	150	58
	Number of Women	2,559	1,201	774	384	143	57
	Percent (%)	89.2	87.4	89.3	92.3	94.5	91.1
2007	ASC-H HSIL +	3,988	1,895	1,093	635	253	112
	Number of Women	3,559	1,656	976	586	239	102
	Percent (%)	87.2	84.7	88.9	92.7	86.9	81.3
2006	ASC-H HSIL+	4,229	2,023	1,160	695	260	16
	Number of Women	3,688	1,713	1,031	644	226	74
	Percent (%)	87.1	85.2	89.5	89.6	85.4	82.9
2005	ASC-H HSIL+	4,501	2,078	1,261	759	280	123
	Histologic Investigation (Women)	3,920	1/1/1	1,128	680	239	102
	Age Group	2069	20–29	30–39	4049	5059	6069
	Province [†]	BC					

Cytology-Histology Agreement

Percentage of high-grade Pap tests (ASC-H and HSIL+) that had a histological confirmation* within 12 months

	Percent (%)	48.7	51.3	32.5 22.0	45.5	56.5 18.2 25.4
007-2008	High-grade Cytology	2,906	2,906	5,734 5,734	5,734	1,794 1,794 1,794
2	Histology Results	1,414	1,492	1,261	2,607	1,013 326 455
	Percent (%)	48.7	51.3	28.3 21.7	50.0	55.6 18.8 25.7
2008	High-grade Cytology	1,252	1,252	2,391 2,391	2,391	880 880 880
	Histology Results	610	642	<i>677</i> 519	1,195	489 165 226
	Percent (%)	48.6	51.4	35.6 22.2	42.2	57.3 17.6 25.1
2007	High-grade Cytology	1,654	1,654	3,343 3,343	3,343	914 914 914
	Histology Results	804	850	1,189 742	1,412	524 161 229
	Percent (%)	45.9	54.1	38.2 23.6	38.2	53.6 20.2 26.1
2006	High-grade Cytology	864	864	3,416 3,416	3,416	121,1 121,1 121,1
	Histology Results	397	467	1,305 807	1,304	601 227 293
	Percent (%)	44.8	55.2	37.8 23.8	38.4	52.1 22.0 26.0
2005	High-grade Cytology	762	762	3,666 3,666	3,666	1,075 1,075 1,075
	Histology Results	341	421	1,387 872	1,407	560 236 279
	Type of Results	< CIN II(Neg,CIN I, Other)	CIN II/CIN III +	< CIN II (Neg, CIN I, Other) CIN II	CIN III +	<cin i,="" ii(neg,cin="" other)<br="">CIN II CIN III +</cin>
	Province [†]	AB		BC		MB

* Histologial confirmation includes any cervical, vaginal or endo-cervical histology result.

¹MB: if a Pap test was followed by a biopsy with CIN II and biopsy with CIN III + , the first biopsy was reported.

AB provided data for the areas in which the organized program operated during these years (approximately 40% of the population).

Pre-cancer Detection Rates

Number of women diagnosed with a pre-cancerous lesion* per 1,000

	Rate per 1,000	5.1	10.5	6.4	3.3	1.5	1.4	5.5	12.3	6.6	2.7	1.6	0.8	4.2	10.1	5.7	1.9	0.7	0.9
2007-2008	Women	1,016,129	222,454	241,227	251,548	198,755	102,145	305.888	74,869	68,113	70,241	59,055	33,610	71,208	15,115	16,604	17,644	14,839	7,006
	CIN II/CIN III	5,149	2,342	1,550	818	296	143	1.682	923	449	190	92	28	296	153	94	33	10	9
	Rate per 1,000	4.6	9.8	5.9	2.9	1.2	1:1	5.4	12.6	6.2	2.7	1.4	0.6	I	I	I	ı	I	ı
2008	Women	507,120	112,241	119,984	123,917	99,359	51,619	153.193	37,761	33,987	34,715	29,773	16,957	I	I	I	I	I	I
	CIN II/CIN III	2,356	1,102	713	360	123	58	832	476	212	92	42	10	I	I	I	I	I	I
	Rate per 1,000	5.5	11.3	6.9	3.6	1.7	1.7	5.6	12.0	6.9	2.8	1.7	1.1	4.2	10.1	5.7	1.9	0.7	0.9
2007	Women	509,009	110,213	121,243	127,631	96,396	50,526	152.695	37,108	34,126	35,526	29,282	16,653	71,208	15,115	16,604	17,644	14,839	7,006
	CIN II/CIN III	2,793	1,240	837	458	173	85	850	447	237	98	50	18	296	153	94	33	10	9
	Rate per 1,000	5.5	11.6	6.6	3.7	1.6	1.4	6.6	14.3	7.9	3.6	1.6	1.6	4.0	I	I	I	I	I
2006	Women	513,766	010'011	124,512	132,105	99,461	47,678	154.051	37,469	34,411	36,695	29,632	15,844	72,684	I	I	I	I	I
	CIN II/CIN III	2,808	1,278	821	483	157	69	110,1	534	1/2	133	47	26	291	I	I	I	I	I
	Rate per 1,000	5.8	12.6	7.2	3.9	0.9	1.8	6.3	14.1	6.6	3.1	2.2	1.4	3.1	I	I	I	I	I
2005	Women	500,448	106,481	123,241	130,009	95,134	45,583	149.967	36,760	34,105	36,209	28,196	14,697	73,498	I	I	I	I	I
	CIN II/CIN III	2,906	1,339	889	510	84	84	939	517	226	113	62	21	229	I	I	I	I	I
	Age Group	20-69	20–29	3039	4049	5059	69—09	2069	20-29	30–39	40-49	5059	69—09	2069	2029	30–39	4049	5059	69—09
	Provincet	BC						WB						NL					

*Pre-cancerous lesions include CIN II and CIN III outromes (moderate and severe dysplasia and cervical carcinoma in situ) and exdude adenocarcinoma in situ.

[†]NL included approximately 95% of all cytology reports.

Age-standardized Invasive Cervical Cancer⁺ Incidence Rate per 100,000, age 20–69

Age-standardized Level for per 100,000 Age-standardized Level Rate (reidence Rate per 100,000 Age-standardized Level Rate (reidence Rate (reidence Rate (reidence Rate Age-standardized Level Rate (reidence Rate Age-standardized Level Rate (reidence Rate Age-standardized Level Rate Age-standated Level Rate Age-standardized Lever				200	5		200	9		200	7		200	8		2007-:	008
69 756 6967462 10.4 784 7,103,991 10.7 807 7,29,583 10.9 320 3,056,339 10.2 3,158 28,594,36 69 124 1,072,464 11.6 142 1,107,498 13.0 140 1,397,94 12.2 136 1,168,071 11.1 542 4,487,83 69 146 1,410,968 9.9 124 1,431,990 8.3 139 1,458,381 9.4 141 1,469,033 8.9 550 5,79027 69 51 337,733 13.5 41 370,546 10.2 4,31 9 1,458,381 9.4 1,1 542 4,48783 69 51 337,733 13.5 41 370,546 10.2 23 550 5,79023 69 232,346 10.2 23 23,34876 10.8 337,4375 121 178 1,9294 69 317,916 12 233 243 27		roup	Cases	Population	Age-standardized Incidence Rate (per 100,000												
0-69 124 1,02,464 11.6 142 1,07,498 13.0 140 1,139,794 12.2 136 1,166,071 11.1 542 4,487,82 0-69 146 1,410,968 9,9 124 1,431,990 8.3 139 1,458,381 9,4 141 1,489,033 8,9 550 5,79027 0-69 51 367,793 13.5 41 370,564 10.2 43 37,355 12.1 178 1,492,96 0-69 23 367,793 13.5 41 370,564 10.2 43 377,355 12.1 178 1,492,96 0-69 23 253,469 - 23 233,249 - 27 22 100 10,105,66 0-69 38 317,718 - 44 319,647 - 430 - 26 4,306,76 0-69 38 317,718 - 44 319,647 - 23 27,136 -	0	-69	756	6,987,462	10.4	784	7,103,991	10.7	807	7,229,583	10.9	320	3,036,839	10.2	3,158	28,594,360	10.7
0-69 146 1,410,66 9.9 124 1,431,890 8.3 139 1,458,381 9.4 141 1,489,033 8.9 5790/27 0-69 51 36/793 13.5 41 370,564 10.2 43 379,735 12.1 178 1,492,962 0-69 51 36/793 - 21 257,338 - 28 233,499 - 27 254,295 - 100 1,012,65 0-69 11 177/28 - 29 177,332 - 27 254,295 - 100 1,012,65 0-69 11 177/28 - 29 177,332 - 20 37,657 - 100 1,012,65 0-69 38 317,916 - 29 177,338 - 20 32,666 1 1,012,65 0-69 33 317,916 - 23 10,671 23 322,181 - 160 1,20,47 <td>S.</td> <td>-69</td> <td>124</td> <td>1,072,464</td> <td>11.6</td> <td>142</td> <td>1,107,498</td> <td>13.0</td> <td>140</td> <td>1,139,794</td> <td>12.2</td> <td>136</td> <td>1,168,071</td> <td>1.11</td> <td>542</td> <td>4,487,827</td> <td>12.0</td>	S.	-69	124	1,072,464	11.6	142	1,107,498	13.0	140	1,139,794	12.2	136	1,168,071	1.11	542	4,487,827	12.0
0-69 51 367/73 13.5 41 370564 10.2 43 374,876 10.8 43 377,35 12.1 178 1,42,96 0-69 23 223,346 - 21 222,346 - 21 252,345 - 100 1,01263 0-69 33 373 12 14 319,42 - 23 176,718 - 27 254,295 - 100 1,01263 0-69 38 317,916 - 23 176,718 - 22 177,138 - 85 708,97 0-69 38 317,916 - 44 319,642 - 40 320,672 - 85 708,97 0-69 32 4,356,532 11.1 - 4,326,320 - 1,397 1,2366,81 0-69 32 304,148 - 30 305,676 - 43 309,715 - 47 315,000 -	Ô	-69	146	1,410,968	9.9	124	1,431,890	8.3	139	1,458,381	9.4	141	1,489,033	8.9	550	5,790,272	9.2
20-69 23 232,346 - 21 252,738 - 28 233,249 - 27 234,295 - 100 1,012,63 20-69 11 177,728 - 29 177,323 - 23 176,718 - 22 177,138 - 85 708,90 20-69 38 317,916 - 44 319,642 - 40 320,672 - 32 321,81 - 85 708,90 20-69 435 4,136,237 10.0 477 4,194,039 10.9 485 4,256,532 11.1 - 4,320,320 - 1,397 12,566,81 20-69 32 304,148 - 30,9715 - 47 315,000 - 133 12,345; 12,345;	20	-69	51	367,793	13.5	41	370,564	10.2	43	374,876	10.8	43	379,735	12.1	178	1,492,968	11.6
20-69 11 177,728 - 29 177,333 - 23 176,718 - 22 177,138 - 85 708,90 20-69 38 317,916 - 44 319,642 - 40 320,672 - 32 322,181 - 154 1,280,41 20-69 435 4,136,532 10.0 477 4,194,039 10.9 485 4,256,532 11.11 - 4,320,320 - 1,397 12,586,81 20-69 32 304,148 - 30 305,676 - 43 30,715 - 47 315,000 - 152 1,234,55	20	-69	23	252,346	I	21	252,738	I	28	253,249	I	27	254,295	Ι	100	1,012,628	0.6
20-69 38 317,916 - 44 319,642 - 40 320,672 - 32 321,81 - 154 1,280,41 20-69 435 4,136,237 10.0 477 4,194,039 10.9 485 4,256,532 11.1 - 4,320,320 - 1397 12,586,86 20-69 32 304,148 - 309,715 - 47 315,000 - 1234,55	20	-69	=	177,728	I	29	177,323	I	23	176,718	I	22	177,138	I	85	708,907	12.2
20-69 435 4,136,237 10.0 477 4,194,039 10.9 485 4,256,532 11.1 - 4,320,320 - 1,397 12,566,86 20-69 32 304,148 - 30 305,676 - 43 309,715 - 47 315,000 - 122 1,2345;	20	-69	38	317,916	I	44	319,642	I	40	320,672	I	32	322,181	Ι	154	1,280,411	12.2
20-69 32 304,148 - 30 305,676 - 43 309,715 - 47 315,000 - 152 1,234,55	20	-69	435	4,136,237	10.0	477	4,194,039	10.9	485	4,256,532	1.11	I	4,320,320	I	1,397	12,586,808	10.7
	20	-69	32	304,148	I	30	305,676	I	43	309,715	I	47	315,000	I	152	1,234,539	12.5

*Invasive cervical cancer includes squamous cell cancers, adenocarcinomas, adenosquamous carcinomas and unclassified cervical cancers (i.e., all ICD-0 C33). *Age-standardized incidence rates for Provinces Combined only include provinces with complete age-breakdown data
Year	Province [†]	Age Group	Cases	Population	Crude Rate (per 100,000)
2005	AR	20_69	124	1 072 464	11.6
2005	AD	20-07	14	245 420	5.7
		30_39	40	237,110	16.9
		40 49	40	273 284	14.6
		50-59	19	201 362	9.4
		60-69	11	115 279	9.5
				,	
	ВС	20-69	146	1,410,968	10.3
		20–29	8	277,072	2.9
		30–39	41	293,939	13.9
		40-49	42	352,917	11.9
		50-59	37	298,790	12.4
		60–69	18	188,250	9.6
	MB	20-69	51	367,793	13.9
		20–29	7	77,473	9.0
		30–39	11	75,863	14.5
		40-49	14	90,546	15.5
		50–59	12	76,075	15.8
		60—69	7	47,836	14.6
	NB	20–69	23	252,346	9.1
		20–29	_	_	-
		30–39	_	_	-
		40-49	-	-	-
		50–59	-	-	-
		60—69	-	-	-
	NL	20–69	11	177,728	6.2
		20–29	-	-	-
		30–39	_	-	-
		4049	_	_	-
		50–59	_	_	-
		60—69	-	-	-
	NS	20–69	38	317,916	12.0
		20–29	-	-	-
		30—39	-	-	-
		40—49	-	-	-
		50—59	-	-	-
		60–69	-	-	-

Age-specific Invasive Cervical Cancer* Incidence Rate per 100,000

Year	Province [†]	Age Group	Cases	Population	Crude Rate (per 100,000)
	ON	20–69	435	4,136,237	10.5
		20–29	26	833,651	3.1
		30–39	114	914,033	12.5
		40-49	143	1,040,616	13.7
		50-59	100	819,150	12.2
		60–69	52	528,787	9.8
	SK	20-69	32	304,148	10.5
		20–29	-	-	-
		30—39	-	-	-
		4049	-	-	-
		50—59	-	-	-
		60—69	-	-	-

^{*}Invasive cervical cancer includes squamous cell cancers, adenocarcinomas, adenosquamous carcinomas and unclassified cervical cancers (i.e., all ICD-0 C53).

Year	Province [†]	Age Group	Cases	Population	Crude Rate (per 100,000)
2006	AB	20–69	142	1,107,498	12.8
		20–29	21	255,958	8.2
		30—39	42	243,228	17.3
		4049	40	274,790	14.6
		50–59	22	212,820	10.3
		60—69	17	120,702	14.1
	ВС	20–69	124	1,431,890	8.7
		20–29	7	281,509	2.5
		30—39	32	291,175	11.0
		4049	41	352,349	11.6
		50—59	28	310,360	9.0
		60—69	16	196,497	8.1
	МВ	20-69	41	370,564	11.1
		20–29	4	77,959	5.1
		30—39	5	74,995	6.7
		40-49	19	90,095	21.1
		50-59	9	78,011	11.5
		60—69	4	49,504	8.1

Year	Province [†]	Age Group	Cases	Population	Crude Rate (per 100,000)
	NB	20-69	21	252,738	8.3
		20–29	-	-	_
		30–39	-	-	_
		4049	-	-	_
		50–59	-	-	_
		60—69	-	-	-
	NL	20–69	29	177,323	16.4
		20–29	-	-	-
		30—39	-	-	-
		40-49	-	-	-
		50–59	-	-	-
		60—69	-	-	-
	NS	20–69	44	319,642	13.8
		20–29	-	-	-
		30—39	-	-	-
		40-49	-	-	-
		50–59	-	-	-
		60—69	-	-	-
	ON	20–69	477	4,194,039	11.4
		20–29	27	845,350	3.2
		30–39	129	906,249	14.2
		40-49	139	1,048,288	13.3
		50–59	117	846,638	13.8
		60—69	65	547,514	11.9
	SK	20-69	30	305,676	9.8
		20–29	_	-	_
		30–39	-	-	_
		40-49	-	-	_
		50-59	-	_	_
		60—69	-	_	_

*Invasive cervical cancer includes squamous cell cancers, adenocarcinomas, adenosquamous carcinomas and unclassified cervical cancers (i.e., all ICD-0 C53).

Year	Province [†]	Age Group	Cases	Population	Crude Rate (per 100,000)
2007	AB	20-69	140	1,139,794	12.3
		20-29	15	265,994	5.6
		30-39	34	249,030	13.0
		40-49	47	2/4,/5/	17.1
		50-59	23	221,042	10.4
		60—69	21	128,365	10.4
	ВС	20-69	139	1.458.381	9.5
		20-29	6	287.585	2.1
		30-39	45	292,994	15.4
		4049	39	351.070	11.1
		50-59	34	317,665	10.7
		60—69	15	209,067	7.2
	MB	20–69	43	374,876	11.5
		20–29	2	79,235	2.5
		30–39	9	75,269	12.0
		40-49	13	89,013	14.6
		50-59	12	79,258	15.1
		60—69	7	52,101	13.4
	NB	20-69	28	253,249	11.1
		20–29	_	_	_
		30–39	_	_	_
		4049	-	-	_
		50—59	-	-	_
		60—69	-	-	_
	NL	20–69	23	176,718	13.0
		20–29	-	-	-
		30–39	-	-	-
		4049	-	-	-
		50-59	_	-	_
		60—69	-	-	-
	NS	20–69	40	320,672	12.5
		20–29	-	-	-
		30—39	-	-	-
		4049	-	-	-
		50–59	-	-	-
		60–69	-	-	-

Year	Province [†]	Age Group	Cases	Population	Crude Rate (per 100,000)
	ON	20–69	485	4,256,532	11.4
		20–29	32	861,302	3.7
		30–39	135	903,788	14.9
		4049	156	1,048,978	14.9
		50–59	95	864,031	11.0
		60—69	67	578,433	11.6
	SK	20-69	43	309,715	13.9
		20–29	-	_	-
		30—39	-	-	-
		40-49	-	_	-
		50–59	-	_	-
		60–69	-	_	-

*Invasive cervical cancer includes squamous cell cancers, adenocarcinomas, adenosquamous carcinomas and unclassified cervical cancers (i.e., all ICD-0 C53).

Year	Province [†]	Age Group	Cases	Population	Crude Rate (per 100,000)
2008	AB	20–69	136	1,168,071	11.6
		20–29	15	273,790	5.5
		30–39	28	256,321	10.9
		4049	46	273,624	16.8
		50–59	36	228,606	15.7
		60—69	11	135,730	8.1
	ВС	20-69	141	1,489,033	9.5
		20-29	10	295,989	3.4
		30-39	28	295,661	9.5
		40-49	48	350,545	13.7
		50—59	35	325,962	10.7
		60—69	20	220,876	9.1
	МВ	20-69	43	379,735	11.3
		20-29	4	80,662	5.0
		30-39	17	76,085	22.3
		40-49	12	87,707	13.7
		50-59	6	80.667	7.4
		60—69	4	54,614	7.3

APPENDIX E

					Crudo Pato
Year	Province [†]	Age Group	Cases	Population	(per 100,000)
	NB	20–69	27	254,295	10.6
		20–29	-	-	-
		30—39	-	-	-
		4049	-	-	-
		50–59	-	-	-
		60—69	-	-	-
	NL	20–69	22	177,138	12.4
		20–29	-	-	-
		30—39	-	-	-
		4049	-	-	-
		50—59	-	-	-
		60—69	-	-	-
	NS	20–69	32	322,181	9.9
		20–29	-	-	-
		30—39	-	-	-
		4049	-	-	-
		50—59	-	-	-
		60—69	-	-	-
	SK	20–69	47	315,000	14.9
		20–29	-	_	_
		30—39	-	_	_
		4049	-	_	_
		50–59	-	_	_
		60—69	-	_	_

*Invasive cervical cancer includes squamous cell cancers, adenocarcinomas, adenosquamous carcinomas and unclassified cervical cancers (i.e., all ICD-0 C53).

Year	Province [†]	Age Group	Cases	Population	Crude Rate (per 100,000)
2005–2008	Provinces	20–69	3,158	28,594,360	11.0
	Combined	20–29	239	5,860,045	4.1
		30–39	842	6,007,975	14.0
		40-49	979	7,028,686	13.9
		50–59	686	5,900,577	11.6
		60–69	412	3,797,077	10.9

Year	Provincet	Age Group	Cases	Population	Crude Rate (per 100.000)
					(1
	AB	20-69	542	4,487,827	12.1
		20-29	65	1,041,162	6.2
		30–39	144	986,304	14.6
		40-49	173	1,096,455	15.8
		50-59	100	863,830	11.6
		60—69	60	500,076	12.0
	ВС	20–69	550	5,790,272	9.5
		20–29	31	1,142,155	2.7
		30–39	146	1,173,769	12.4
		40-49	170	1,406,881	12.1
		50–59	134	1,252,777	10.7
		60—69	69	814,690	8.5
	МВ	20–69	178	1,492,968	11.9
		20–29	17	315,329	5.4
		30–39	42	302,212	13.9
		40-49	58	357,361	16.2
		50—59	39	314,011	12.4
		60—69	22	204,055	10.8
	NB	20–69	100	1,012,628	9.9
		20–29	6	185,006	3.2
		30—39	20	198,855	10.1
		40-49	24	246,406	9.7
		50—59	33	231,036	14.3
		60—69	17	151,325	11.2
	NL	20–69	85	708,907	12.0
		20–29	7	122,693	5.7
		30–39	28	140,943	19.9
		40-49	22	173,213	12.7
		50-59	18	164,608	10.9
		60—69	10	107,450	9.3
	NC	00 (0	154	1 000 411	10.0
	N5	20-69	154	1,280,411	12.0
		20-29	14	239,960	5.8
		30-39	44	246,448	17.9
		40-49	4/	314,045	15.0
		40_02	20	204,713	7.1
		60-69	23	195,243	11.8

Year	Province [†]	Age Group	Cases	Population	Crude Rate (per 100,000)
	ON	20–69	1,397	12,586,808	11.1
		20–29	85	2,540,303	3.3
		30–39	378	2,724,070	13.9
		4049	438	3,137,882	14.0
		50–59	312	2,529,819	12.3
		60—69	184	1,654,734	11.1
	SK	20-69	152	1,234,539	12.3
		20–29	14	273,437	5.1
		30–39	40	235,374	17.0
		4049	47	296,443	15.9
		50–59	24	259,781	9.2
		60—69	27	169,504	15.9

*Invasive cervical cancer includes squamous cell cancers, adenocarcinomas, adenosquamous carcinomas and unclassified cervical cancers (i.e., all ICD-0 C53).

¹NB: Due to small numbers, 15–19 and 20–29 were not reported separately, therefore 20–29 may be a slight overestimate. ON included data for 2005–2007.

BC data may include some patients who were clinically diagnosed (no pathology report).

No data was provided for age group 15–19; category was not shown.

Stage I

Percentage of Invasive Cervical Cancers* Detected at Stage I, 2005–2008

Province [†]	Age Group	Stage 1	Number of Cervical Cancers	Percent (%)
AB	20-69	317	542	58.5
	20—49	264	382	69.1
	50—69	53	160	33.1
МВ	20–69	97	178	54.5
	20–49	76	117	65.0
	50–69	21	61	34.4

Province [†]	Age Group	Stage 1	Number of Cervical Cancers	Percent (%)
NL	20-69	48	85	56.5
	20–49	38	57	66.7
	50—69	10	28	35.7
NS	20–69	30	72	41.7
	20–49	_	_	_
	50—69	_	_	_
SK	20-69	55	152	36.2
	20-49	42	101	41.6
	50—69	13	51	25.5

*Invasive cervical cancer includes squamous cell cancers, adenocarcinomas, adenosquamous carcinomas and unclassified cervical cancers (i.e., all ICD-0 C53).

 † NS provided staging information for 2007 and 2008 for the 20–69 year age group.

BC was not included because the stage data included only referred patients.

Screening History in cases of Invasive Cervical Cancer

Percentage of women diagnosed with invasive cervical cancer* by time since last screening Pap test, age 20–69, years 2005–2008

		0.5–3 Years		3—5 years		>5 years or never**	
Province [†]	Cases	Invasive Cases	Percent (%)	Invasive Cases	Percent (%)	Invasive Cases	Percent (%)
Provinces Combined	853	415	48.7	77	9.0	361	42.3
BC	459	254	55.3	44	9.6	161	35.1
MB	155	69	44.5	17	11.0	69	44.5
NL	85	31	36.5	5	5.9	49	57.6
NS	154	61	39.6	11	7.1	82	53.2
ON	454	187	41.2	46	10.1	221	48.7

*Invasive cervical cancer includes squamous cell cancers, adenocarcinomas, adenosquamous carcinomas and unclassified cervical cancers (i.e., all ICD-0 C53).

** The >5 or never category includes women whose Pap tests were >5 years prior to diagnosis, who had no record of any Pap tests, or whose Pap tests occurred during the six months prior to diagnosis and were therefore considered a diagnostic Pap test.

[†] BC includes staging data for referred patients.

ON provided data for 2008 only and >5 years included >5-10 years. ON was excluded from Provinces Combined.





www.partnershipagainstcancer.ca