



2016-17

Alberta Health Services
Q4 Year-to-Date Performance Measure Update

May 26, 2017

Prepared by AHS Planning & Performance and AHS Analytics

Executive Summary

Alberta Health Services (AHS) has 17 performance measures that were established in collaboration with Alberta Health (AH). The measures reflect a balance across the spectrum of healthcare and accurately reflect health system performance. They were developed to enable us to compare AHS performance nationally. The performance measures are aligned to the Alberta Quality Matrix for Health, developed by the Health Quality Council of Alberta (HQCA), which describes six dimensions of quality: acceptability, accessibility, appropriateness, effectiveness, efficiency and safety.

The measures play a key role in advising staff and physicians about our progress and where we may need to adjust actions to achieve the identified targets; they also help in communicating with Albertans about the value provided by health funding expenditures.

The 2016-17 targets were established in the AHS 2016-17 Health Plan and Business Plan. These performance targets help us measure our progress and improve the health system.

Measure definitions are located on AH's Performance Measures Information System (PMIS) website at www.health.alberta.ca/newsroom/PMIS-Definitions.html. Definitions have been developed by AH and AHS.

In many areas, AHS continues to see volume increases. The demand for services continues to increase within the province as shown within the volume tables below each measure. Initiatives within AHS are being put in place in an effort to not only move measures toward their targets, but also to compensate for these increases in demand.

The Q4 year-to-date performance report represents final year data (April 1, 2016 to March 31, 2017) and has been updated as of May 15 (where available) for the period ending March 31, 2017. There are 15 measures that are reported quarterly; of these, nine measures include the most current data available (Q4 year-to-date) and six measures which rely on patient followup after a patient's original discharge date for a period up to 90 days and therefore reflect an earlier time period (Q3 year-to-date).

Two measures: Early Detection of Cancer (source: Alberta Cancer Registry Data), and Satisfaction with Long-Term Care (source: HQCA) have reporting cycles which do not align with AHS' reporting cycle, as they are not reported every year.

Summary Results

Many of the measures are aligned to national benchmarks, so that Albertans can see how their health system is performing compared to the rest of Canada. Each measure has an associated target which represents our progression towards approaching the performance we see in other provinces or to a particular standard. The current set of measures is a strong reflection of health system performance.

National Comparison: When we compare nationally with the most recent available data, Alberta is ranked high for several measures:

- Acute Length of Stay/Expected Length of Stay (ALOS/ELOS) – 3rd best out of 9 provinces in 2015-16.
- Emergency Department (ED) length of stay for admitted patients – 2nd best out of 5 provinces in 2015-16.
- *Clostridium difficile* Infections (CDI) – better than national results (2015) based on Surveillance results.
- Mental Health Readmission – better than national rate; 2nd best out of 10 provinces in 2014-15.
- Surgical Readmission – same as national rate; 5th best out of 10 provinces in 2014-15 compared to 7th in 2013-14.
- Heart Attack (AMI) Mortality – same as national rate; 4th best out of 10 provinces in 2014-15.
- Stroke Mortality – same as national rate; 4th best out of 10 provinces in 2014-15.

The following interpretation is provided on the 17 measures. AHS recognizes achieving target as a positive accomplishment. *Variance explanation is only provided if current period performance (Q4 year-to-date) is worse than same period last year (Q4 year-to-date) by ≥3%.*

Results of the performance measures are grouped into four categories:

- ★ Target achieved (*regardless of performance comparison*).
- ✓ Performance improved from the same period last year but has not met target.
- ↔ Performance has remained stable from the same period as last year, i.e. result is ≤3% deterioration
- ✗ Performance deteriorated from the same period last year and has not met target.

Three performance measures *achieved the 2016-17 target* (★):

1. Acute Length of Stay Compared to Expected Length of Stay
2. Early Detection of Cancer (2015-16 target)
3. Heart Attack Mortality (Q3 YTD)

Five performance measures *are better than the same time period as last year* (✓):

1. Hand Hygiene
2. Radiation Therapy Access
3. Hospital-Acquired *Clostridium difficile* Infections (Q3 YTD)
4. Satisfaction with Hospital Care (Q3 YTD)
5. Stroke Mortality (Q3 YTD)

Six performance measures remains stable from the same time period as last year (↔):

1. Emergency Department (ED) Wait to see a Physician (median) in hours
2. ED Length of Stay for Admitted Patients (median) in hours
3. ED Length of Stay for Discharged Patients (median) in hours
4. Hospital Mortality
5. Mental Health Readmissions (Q3 YTD)
6. Surgical Readmissions (Q3 YTD)

Two measures *did not meet target or improve* from the same period as last year (✗). Examples of what AHS is doing to improve these areas are noted. Refer to the subsequent pages for more actions on each measure.

1. Continuing Care Placement
2. Children's Mental Health Access

Moving forward, we will determine what local initiatives will be required for individual sites where performance has deteriorated greater than 3%.

AHS remains committed to building on its performance through quality improvement and innovation, and to strive toward the goal of delivering the type of healthcare system expected by Albertans.

Table of Contents

Executive Summary	2
Provincial Performance	5
Acute Length of Stay (ALOS) Compared to Expected Length of Stay (ELOS).....	6
Continuing Care Placement.....	9
Emergency Department (ED) Wait to See a Physician	12
Emergency Department Length of Stay for Admitted Patients	15
Emergency Department Length of Stay for Discharged Patients.....	18
Hand Hygiene	21
Hospital Mortality	24
Children’s Mental Health Access.....	27
Access to Radiation Therapy	30
Hospital-Acquired <i>Clostridium difficile</i> Infections	33
Mental Health Readmissions.....	36
Surgical Readmissions	39
Satisfaction with Hospital Care	42
Heart Attack Mortality	45
Stroke Mortality	48
Satisfaction with Long-Term Care	51
Early Detection of Cancer.....	53

Provincial Performance

Performance Measures Dashboard	2015-16	2016-17	Trend	Target 2016-17	2015-16 National Comparison
Acute Length of Stay Compared to Expected Length of Stay	1.00	0.98	★	0.98	3 rd out of 9 provinces
<i>Total Discharges</i>	404,515	403,908			
Continuing Care Placement (% placed within 30 days)	60%	56%	✖	62%	Not available
<i>Total Placed</i>	7,879	7,963			
Emergency Department (ED) Wait to see a Physician (median) in hours	1.3	1.3	↔	1.2	4 th out of 5 provinces
<i>Eligible Cases</i>	894,908	1,000,793			
ED Length of Stay for Admitted Patients (median) in hours	9.4	9.5	↔	9.3	2 nd out of 5 provinces (busiest sites)
<i>ED Admissions</i>	140,357	141,774			
ED Length of Stay for Discharged Patients (median) in hours	3.2	3.2	↔	3.1	4 th out of 5 provinces
<i>ED Discharges</i>	872,422	861,557			
Hand Hygiene	79.8%	82.2%	✓	90%	Not available
<i>Total Observations</i>	397,386	382,993			
Hospital Mortality (HSMR standardized rate)	93	93	↔	90	5 th out of 9 provinces
<i>Eligible Cases</i>	103,537	104,284			
Mental Health Access – Children (% offered scheduled treatment within 30 days from referral)	85%	81%	✖	90%	Not available
<i>Number of New Enrollments</i>	8,870	9,312			
Radiation Therapy Access (90 th percentile) in weeks	2.9	2.7	✓	2.6	4 th out of 9 provinces (Q2 YTD 2016-17)
<i>Number of Patients starting Radiation Therapy</i>	7,855	8,122			
Satisfaction with Long-Term Care	2007 = 71% 2010 = 73% 2014 = 72%		Reported by HQCA		Not available
Early Detection of Cancer	66% (2011) 67% (2012) 68% (2013)	69% (2014) 70% (2015)	★	70% (2015-16)	2 nd for breast cancer and 8 th for colorectal cancer out of 9 provinces in 2010

Trend: ★ Achieved Target ✓ Improvement ↔ stable than prior period ≤3% ✖ Area requires additional focus

Performance Measures Dashboard – Reported a quarter later due to followup with patients after end of reporting quarter (Apr. 1, 2016 to Dec. 31, 2016).	Q3 Year-to-Date		Trend	Target 2016-17	2014-15 National Comparison
	2015-16	2016-17			
Hospital-Acquired <i>Clostridium difficile</i> Infections (rate per 10,000 patient days)	3.5	3.4	✓	3.3	Better than national results based on Surveillance data
<i>Number of Cases</i>	800	765			
Readmissions - Mental Health	8.6%	8.6%	↔	8.5%	2 nd out of 10 provinces
<i>Total Mental Health Discharges</i>	10,885	11,639			
Readmissions - Surgical	6.6%	6.7%	↔	6.3%	5 th out of 10 provinces
<i>Total Surgical Discharges</i>	69,559	70,329			
Satisfaction with Hospital Care	82.3%	82.6%	✓	85.0%	Not available
<i>Total Eligible Cases</i>	155,888	185,622			
Heart Attack Mortality	6.2%	5.8%	★	5.9%	4 th out of 10 provinces
<i>Number of Cases</i>	4,046	4,106			
Stroke Mortality	14.8%	13.5%	✓	13.2%	4 th out of 10 provinces
<i>Number of Cases</i>	2,733	2,793			

Trend: ★ Achieved Target ✓ Improvement ↔ stable than prior period ≤3% ✖ Area requires additional focus

- Quarterly Performance compares data from the current quarter to the same time period as last year for easy reference, and may or may not indicate statistical significance of the results. Additional performance insights can be obtained by reviewing the trending over time provided in this report.
- Parts of this material are based on data and information provided by the Canadian Institute for Health Information (CIHI). However, the analyses, conclusions, opinions and statements expressed herein are those of the author, and not necessarily those of the CIHI.

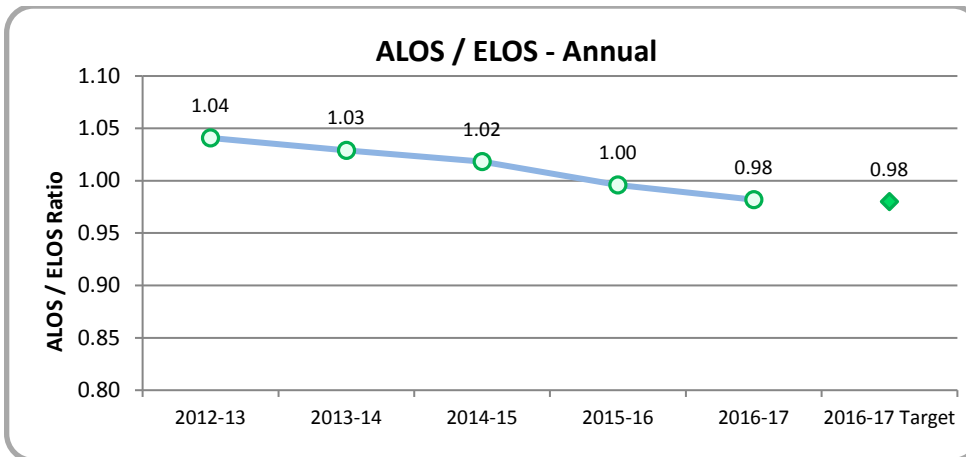
Acute Length of Stay (ALOS) Compared to Expected Length of Stay (ELOS)

Measure Definition

The number of acute days patients stay in acute care hospitals compared to the expected length of stay for a typical patient. This measure compares actual length of stay in hospital to expected length of stay after adjusting for factors that affect in-hospital mortality, such as patient age, sex, diagnosis and other conditions. The expected length of stay is based on comparison to similar patients in national databases.

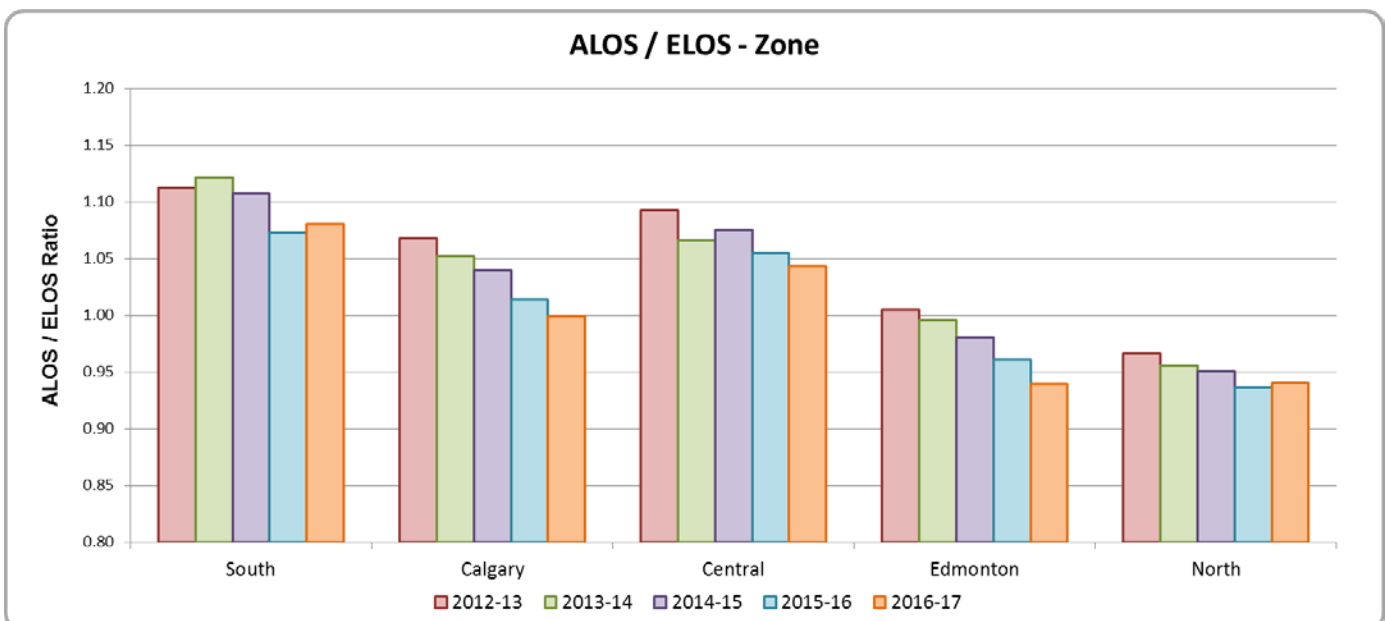
Understanding this Measure

This measure gauges how efficiently care is delivered in the hospital. A ratio of actual to expected length of stay which is below one, represents an overall greater than expected efficiency and indicates that more patients are able to be treated for a given inpatient bed. Monitoring this ratio can help health-care teams ensure care appropriateness and efficiency. Improvement in this measure enables the ability to treat more patients with the existing beds and other resources.



How Do We Compare?

Alberta ranked 3rd best nationally out of nine provinces in 2015-16.



ALOS/ELOS

HIGHLIGHTS

ALOS/ELOS has been continuously improving over the last five years. Monitoring this measure can help healthcare teams ensure care appropriateness and efficiency. Improvement in this measure enables the ability to treat more patients with the existing beds and other resources.

CoACT is an innovative model of care in which care providers collaborate with patients. Elements of CoACT include integrated plans of care, transition rounds, patient scheduling, standard transition process, right bed first time, home team, home unit and partnerships with support services. Overall implementation of the project is 73%. CoACT has been extended into 2017-18 to ensure the project is transitioned to zones in a seamless manner.

Zones continue to deploy Medworxx, a tool used for proactive discharge planning, to improve patient flow, enhance how acute care capacity is managed and improve patient experience. Reports are used to identify barriers, delays and interruptions to patient care and to achieve an optimal length of stay.

The Strategic Clinical Networks (SCNs) and the zones are working collaboratively to spread pathways as opportunities for cost avoidance, reductions in unwarranted variation and better cost per case in multiple procedures. SCNs develop standardized care planning tools, such as care clinical care pathways for specific patient groups to improve communication between care providers, patients and their families. This will ensure that every patient receives the best quality of care for their medical condition as well as their personal situation. The following clinical care pathways were developed in 2016-17:

- Diabetic Foot Care
- Inpatient Diabetes Management
- Repetitive Transcranial Magnetic Stimulation
- Breast Health
- Provincial Delirium Initiative
- Heart Failure
- Chronic Obstructive Pulmonary Disease (COPD)
- Conservative Kidney Management
- Provincial Perinatal

SUMMARY OF RESULTS

Provincial, Central and Edmonton Zones achieved target for Q4 YTD. Calgary Zone showed improvement from the same period as last year. South and North remained stable from the same period as last year.

We expect there to be fluctuations in “all other hospitals” due to smaller sites having low number of discharges and therefore more susceptible to variations. AHS monitors these fluctuations to see if deterioration in performance represents a trend over time or part of expected variation.

ALOS/ELOS

The number of acute days patients stay in acute care hospitals compared to the expected length of stay for a typical patient.

Acute (Actual) Length of Hospital Stay Compared to Expected Stay	2013-14	2014-15	2015-16	Q4 YTD		Trend	2016-17 Target
				2015-16 Last Year	2016-17 Current		
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable*; ✖ Performance not improving							
Provincial	1.03	1.02	1.00	1.00	0.98	★	0.98
South Zone Total	1.12	1.11	1.07	1.07	1.08	⇔	1.06
Chinook Regional Hospital	1.15	1.13	1.09	1.09	1.09	⇔	1.07
Medicine Hat Regional Hospital	1.15	1.11	1.09	1.09	1.09	★	1.09
All Other Hospitals	0.99	1.04	1.00	1.00	1.02	⇔	0.99
Calgary Zone Total	1.05	1.04	1.01	1.01	1.00	✓	0.98
Alberta Children's Hospital	0.98	0.96	0.95	0.95	0.93	★	0.96
Foothills Medical Centre	1.08	1.07	1.04	1.04	1.04	⇔	1.00
Peter Lougheed Centre	1.04	1.02	1.02	1.02	1.01	✓	0.98
Rockyview General Hospital	1.05	1.05	1.02	1.02	0.99	✓	0.97
South Health Campus	N/A	1.00	0.95	0.95	0.92	★	0.95
All Other Hospitals	1.00	1.01	0.96	0.96	1.02	✖	0.96
Central Zone Total	1.07	1.08	1.05	1.05	1.04	★	1.04
Red Deer Regional Hospital Centre	1.09	1.11	1.09	1.09	1.06	★	1.07
All Other Hospitals	1.04	1.04	1.02	1.02	1.02	⇔	1.01
Edmonton Zone Total	1.00	0.98	0.96	0.96	0.94	★	0.96
Grey Nuns Community Hospital	0.99	0.98	0.96	0.96	0.93	★	0.96
Misericordia Community Hospital	1.04	1.03	0.98	0.98	0.94	★	0.99
Royal Alexandra Hospital	0.99	0.97	0.96	0.96	0.93	★	0.95
Stollery Children's Hospital	1.00	1.01	0.98	0.98	0.97	★	0.98
Sturgeon Community Hospital	0.99	0.96	0.92	0.92	0.91	★	0.93
University of Alberta Hospital	0.97	0.97	0.95	0.95	0.94	★	0.95
All Other Hospitals	1.10	1.01	1.03	1.03	1.04	⇔	0.97
North Zone Total	0.96	0.95	0.94	0.94	0.94	⇔	0.93
Northern Lights Regional Health Centre	0.96	0.97	0.93	0.93	0.94	★	0.95
Queen Elizabeth II Hospital	0.97	0.94	0.93	0.93	0.94	⇔	0.92
All Other Hospitals	0.95	0.95	0.94	0.94	0.94	⇔	0.93

* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.

Total Discharges	2013-14	2014-15	2015-16	Q4 YTD	
				2015-16 Last Year	2016-17 Current
Provincial	393,765	401,331	404,515	404,515	403,908
South Zone	31,093	31,125	30,485	30,485	30,521
Calgary Zone	136,598	140,563	143,063	143,063	143,633
Central Zone	44,589	45,691	45,577	45,577	45,242
Edmonton Zone	135,970	139,052	141,279	141,279	142,582
North Zone	45,515	44,900	44,111	44,111	41,930

Continuing Care Placement

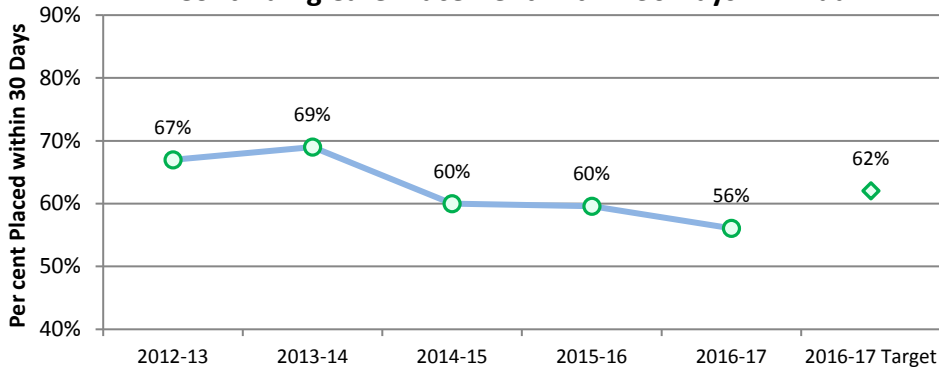
Measure Definition

The percentage of clients admitted to a continuing care space (designated supportive living or long-term care) within 30 days of the date they are assessed and approved for placement. This includes patients/clients assessed and approved and waiting in hospital or community.

Understanding this Measure

Providing appropriate care for our aging population is extremely important to Albertans. Timely access to continuing care (designated supportive living or long-term care) ensures higher quality of life for our seniors. In addition, by improving access to continuing care, AHS is able to improve flow throughout the system, provide more appropriate care, decrease wait times and deliver care in a more cost effective manner.

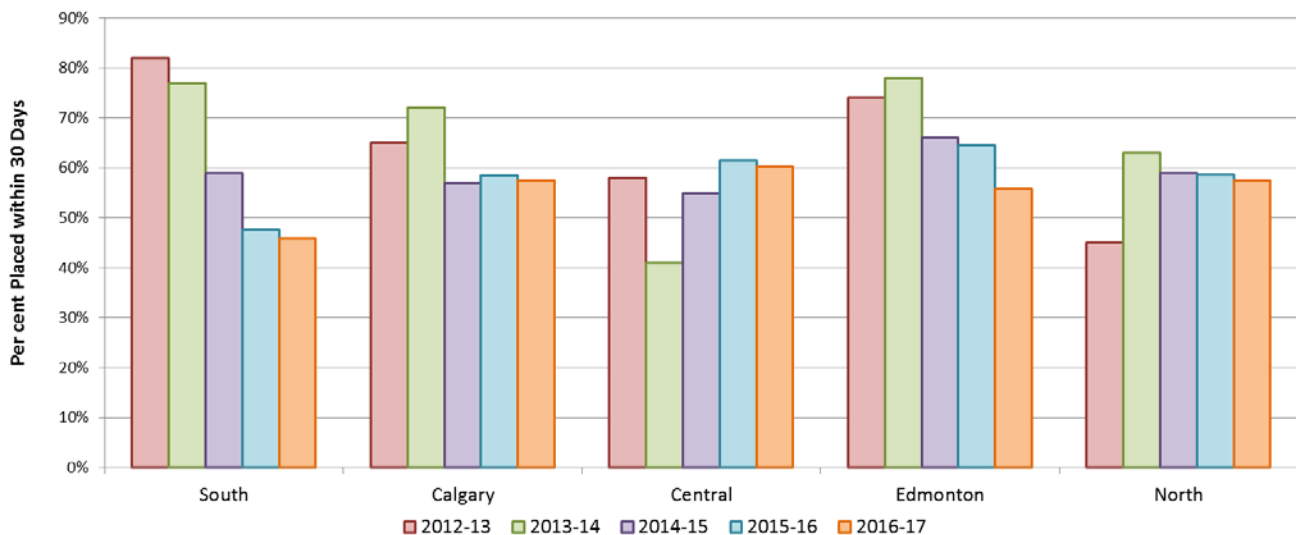
Continuing Care Placement within 30 Days - Annual



How Do We Compare?

Comparable national data is not available for this measure.

Continuing Care Placement within 30 Days - Zone



Continuing Care Placement

HIGHLIGHTS

Continuing Care includes home care, designated supportive living, long-term care, respite care, and palliative care and end of life care not in a hospital.

Work continues across the province to implement the Seniors Health Continuing Care Capacity Plan. In 2016-17, AHS opened 376 net new continuing care spaces including 245 for seniors with dementia for a total of 25,323 community-based beds/spaces (including palliative). Since April 2010, AHS has added 5,623 spaces in the continuing care system to support individuals who need community-based housing, care and supports.

Home care helps people remain well, safe and independent in their home for as long as possible. Home care promotes client independence, and supplements care and supports provided by families and community services. Nearly 118,834 clients with unique needs received home care in 2016-17, an increase of 2% from 2015-16.

AHS is working to ensure beds in acute care are used in the most efficient manner by improving communication between all healthcare team members, patients and families to facilitate discharges and by ensuring that patients are getting the best care for their personal situations.

SUMMARY OF RESULTS

The percentage of clients admitted to a continuing care space (designated supportive living or long-term care) within 30 days has deteriorated provincially and in two zones. Calgary and Central Zones have remained stable. South Zone performance deteriorated due to deferring 37 new continuing care beds to 2017-18; and lower than required growth in home and community care.

To address the rate of spending in 2016-17, a decision was made to defer the opening of some continuing care and addiction and mental health community care spaces and minimize growth of home care program spending. In addition, a planned project has been delayed into next fiscal year due to construction issues. These changes are driving longer waits and higher waitlists for placement into Continuing Care Living Options. All delayed/deferred care spaces are planned to open in the 2017-18 fiscal year. The average wait time for continuing care placement in acute /subacute care is 46 days (compared to 44 days for the same period last year). The number of people waiting in acute/sub-acute care has increased to 846 as of March 31, 2017 (compared with more than 628 people waiting at the same time the year previous). It is important to note that not all of these patients are waiting in an acute care hospital bed in a busy urban hospital. In 2016-17, there were 8,002 people placed into continuing care compared to 7,879 for the same period last year.

Calgary, Central and North Zones remained stable from the same period as last year. Edmonton Zone had major water incidents and restoration work that has resulted in displacement and repatriation of residents. Ongoing work with long term care providers to expedite repairs.

AHS is working hard to minimize the number of patients waiting for a continuing care bed. These people need and deserve to be cared for in a more appropriate, suitable environment, and we also know that this capacity issue affects other areas of health care, including emergency department visits and acute care. It is important to note that not all of these patients are waiting in an acute care hospital bed in a busy urban hospital. Many are staying in transition beds, sub-acute beds, restorative/rehabilitation care beds, and rural hospitals where system flow pressures and patient acuity are not as intense.

Continuing Care Placement

The percentage of clients admitted to a continuing care space (supportive living or long-term care) within 30 days of the date they are assessed and approved for placement. This includes patients assessed and approved and waiting in hospital or community.

Continuing Care Clients Placed within 30 Days	2013-14	2014-15	2015-16	Q4 YTD		Trend	2016-17 Target
				2015-16 Last Year	2016-17 Current		
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable; ✖ Performance not improving							
Provincial	69%	60%	60%	60%	56%	✖	62%
South Zone	77%	59%	48%	48%	46%	✖	60%
Calgary Zone	72%	57%	58%	58%	57%	⇔	60%
Central Zone	41%	55%	62%	62%	60%	⇔	61%
Edmonton Zone	78%	66%	65%	65%	56%	✖	65%
North Zone	63%	59%	59%	59%	58%	⇔	62%

Note: Patients placed within 30 days of being assessed and approved for continuing care space. Includes those waiting in hospital or community.

* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.

Total Clients Placed	2013-14	2014-15	2015-16	Q4 YTD	
				2015-16 Last Year	2016-17 Current
Provincial	7,693	7,810	7,879	7,879	7,963
South Zone	868	866	887	887	925
Calgary Zone	2,164	2,548	2,722	2,722	2,438
Central Zone	1,189	1,259	1,060	1,060	1,352
Edmonton Zone	2,742	2,443	2,506	2,506	2,575
North Zone	730	694	704	704	673

Emergency Department (ED) Wait to See a Physician

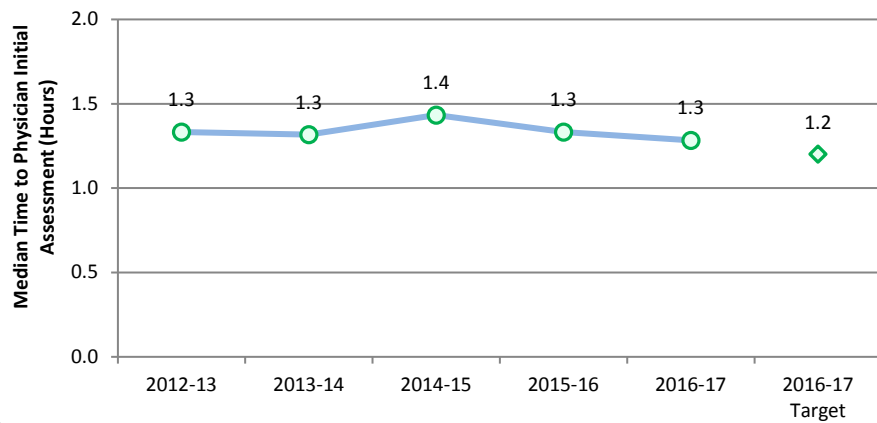
Measure Definition

The average patient's length of time (hours) that they wait to be seen by a physician at the busiest emergency departments. This is calculated as the median wait which means that 50 per cent of patients wait to be seen by a physician in the emergency department in this length of time or less. This measure is the time between when a patient is assessed by a nurse in the emergency department and when they are first seen by a physician.

Understanding this Measure

Patients coming to the emergency department need to be seen by a physician in a timely manner for diagnosis or treatment. It is important to keep this number low to ensure people do not leave without being seen.

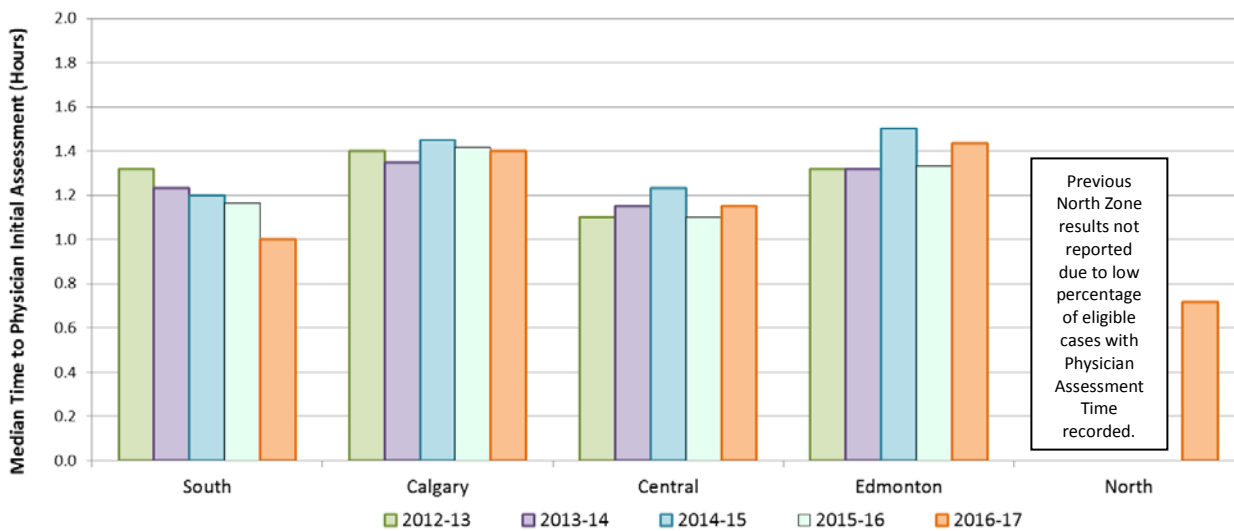
ED Time to Physician Initial Assessment - Annual



How Do We Compare?

Alberta ranked 4th nationally out of 5 provinces in 2015-16.

ED Time to Physician Initial Assessment - Zone



ED Wait to See a Physician

HIGHLIGHTS

Albertans can seek alternative ways to get treatment before going to the ED, such as visiting your family physician, going to a walk-in clinic and using other community services.

AHS has established community-based Urgent Care Centers to meet the urgent medical care needs of patients who do not require emergency hospital based care. Urgent Care services are for people who have unexpected but non-life-threatening health concerns that usually require same-day treatment (for example, broken bones, sprains, lacerations, asthma, dehydration, pain and infections).

The Know Your Options campaign provides information on when a visit to the ED is appropriate, and when someone should consider another treatment option when emergency care is not needed. Some of the services offered to support patients include:

- Health Link is a free service that provides health advice and information to Albertans 24 hours a day, seven days a week. Dementia Advice was launched in Calgary and Edmonton Zones in May 2016 and is now available in all five zones through Health Link and can be accessed by dialing 811. The Dementia Advice nurses help support anyone living with or caring for someone who has dementia, including those with Alzheimer's disease. Caregivers are often stressed and fatigued and need urgent support, to receive advice, resources and renewed hope in their journey with their loved one.
- AHS launched the Health, Education and Learning (HEAL) website in September 2016, a resource aimed at providing families across Alberta easily accessible, reliable information about common minor illness and injuries in children. The content was developed by Pediatric Emergency Medicine experts at the Alberta Children's Hospital and Stollery Children's Hospital.
- The Mental Health Helpline provides confidential, anonymous crisis intervention information about mental health programs and referrals to other agencies if needed (Dial 1-877-303-2642).
- The Addiction Helpline is a confidential service which provides alcohol, tobacco, other drugs and problem gambling support, information and referral to services (Dial 1-866-332-2322). These helplines operate 24-hours a day, seven days a week and is available to all Albertans.

A new Primary Health Care Integration Network was created to help Albertans access healthcare. The network focuses on improving transitions of care between primary care providers and acute care, emergency departments, specialized services and other community-based services. Functions of the network include brokering connections between Primary Care Networks, zones, provincial programs and SCNs related to care co-ordination and transitions in care as well as champion innovative solutions that will enhance co-ordination and improve transitions in care for Albertans at risk of avoidable hospital admissions and emergency department visits.

SUMMARY OF RESULTS

South and North Zones achieved target for Q4 YTD. Provincial and Calgary Zone remained stable from the same period as last year. Central and Edmonton zones deteriorated from the same period as last year. A deeper analysis of data (not shown) finds that Central Zone met the target in Q2 = 1.1 hours.

Central Zone experienced capacity challenges including increased occupancy. In early December, additional spaces for emergency department CT scans were created to help with patient flow.

Edmonton Zone hospitals have seen an increase in site occupancy and activity in ED and inpatient patient care units which leads to patients waiting longer in the ED for beds. Sites are implementing more proactive surge protocols, isolation co-horting and quality initiatives related to service processes and patient experience.

ED Wait to See a Physician

The average patient's length of time (hours) that they wait to be seen by a physician at the busiest emergency departments.

ED Time to Physician Initial Assessment - Busiest Sites	2013-14	2014-15	2015-16	Q4 YTD		Trend	2016-17 Target
				2015-16 Last Year	2016-17 Current		
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable; ✖ Performance not improving							
Provincial	1.3	1.4	1.3	1.3	1.3	⇔	1.2
South Zone Total	1.2	1.2	1.2	1.2	1.0	★	1.1
Chinook Regional Hospital	1.3	1.2	1.2	1.2	1.1	★	1.1
Medicine Hat Regional Hospital	1.1	1.2	1.1	1.1	0.9	★	1.1
Calgary Zone Total	1.4	1.5	1.4	1.4	1.4	⇔	1.2
Alberta Children's Hospital	1.1	1.2	1.1	1.1	1.1	★	1.1
Foothills Medical Centre	1.5	1.5	1.5	1.5	1.5	⇔	1.3
Peter Lougheed Centre	1.8	1.8	1.6	1.6	1.6	⇔	1.4
Rockyview General Hospital	1.3	1.4	1.4	1.4	1.4	⇔	1.2
South Health Campus	N/A	1.6	1.6	1.6	1.5	✓	1.0
Central Zone Total	1.2	1.2	1.1	1.1	1.2	✖	1.1
Red Deer Regional Hospital Centre	1.2	1.2	1.1	1.1	1.2	✖	1.1
Edmonton Zone Total	1.3	1.5	1.3	1.3	1.4	✖	1.2
Grey Nuns Community Hospital	1.1	1.2	1.1	1.1	1.1	⇔	1.0
Misericordia Community Hospital	1.4	1.4	1.3	1.3	1.6	✖	1.3
Northeast Community Health Centre	1.4	1.4	1.3	1.3	1.3	★	1.3
Royal Alexandra Hospital	1.9	2.2	1.9	1.9	1.9	★	2.0
Stollery Children's Hospital	0.8	1.1	1.0	1.0	1.1	✖	0.9
Sturgeon Community Hospital	1.3	1.5	1.3	1.3	1.5	✖	1.2
University of Alberta Hospital	1.5	2.1	1.7	1.7	2.0	✖	1.4
North Zone Total					0.7	★	1.1
Northern Lights Regional Health Centre	North Zone results prior to Q1 2016-17 are not reported due to low percentage of eligible cases with Physician Assessment Time recorded.				0.6	★	0.9
Queen Elizabeth II Hospital					1.0	★	1.3

N/A: No results available. South Health Campus opened February 2013.

* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.

ED Time to Physician Initial Assessment - Eligible Cases (Busiest Sites)	2013-14	2014-15	2015-16	Q4 YTD	
				2015-16 Last Year	2016-17 Current
Provincial	894,448	891,643	894,908	894,908	895,589
South Zone	85,567	86,187	86,208	86,208	85,927
Calgary Zone	363,570	367,775	365,513	365,513	364,410
Central Zone	54,730	55,861	55,893	55,893	55,053
Edmonton Zone	390,581	381,820	387,294	387,294	390,199
North Zone	North Zone results not reported due to low percentage of eligible cases with Physician Assessment Time recorded and not comparable historically.				

Emergency Department Length of Stay for Admitted Patients

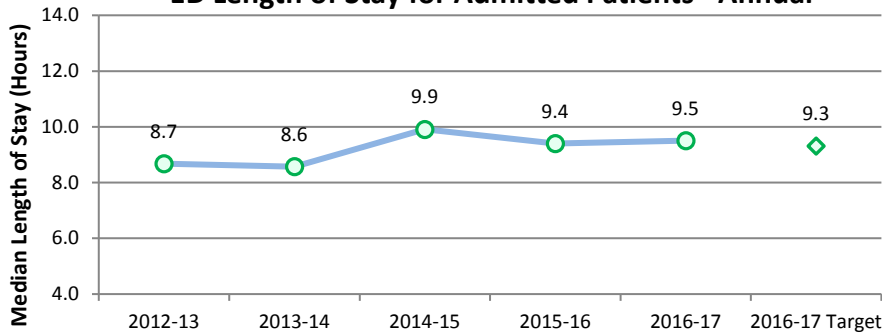
Measure Definition

The average patient's length of time (hours) in the emergency department before being admitted to a hospital bed at the busiest emergency departments. This is calculated as the median length of stay which means that 50 per cent of patients stay in the emergency department this length of time or less, before being admitted. This measure is the time between when a patient is assessed by a nurse in the emergency department until the time they are admitted.

Understanding this Measure

This measure reflects the performance of the entire system. It is influenced by our ability to manage complex patients in primary care, efficiencies in the emergency department, efficiencies and capacity in the acute care (when staying in hospital), better quality of care and integration with community services in reducing unplanned readmissions, timely placement of patients into continuing care (e.g., long-term care) and linking patients to the appropriate services in the community after a stay in hospital.

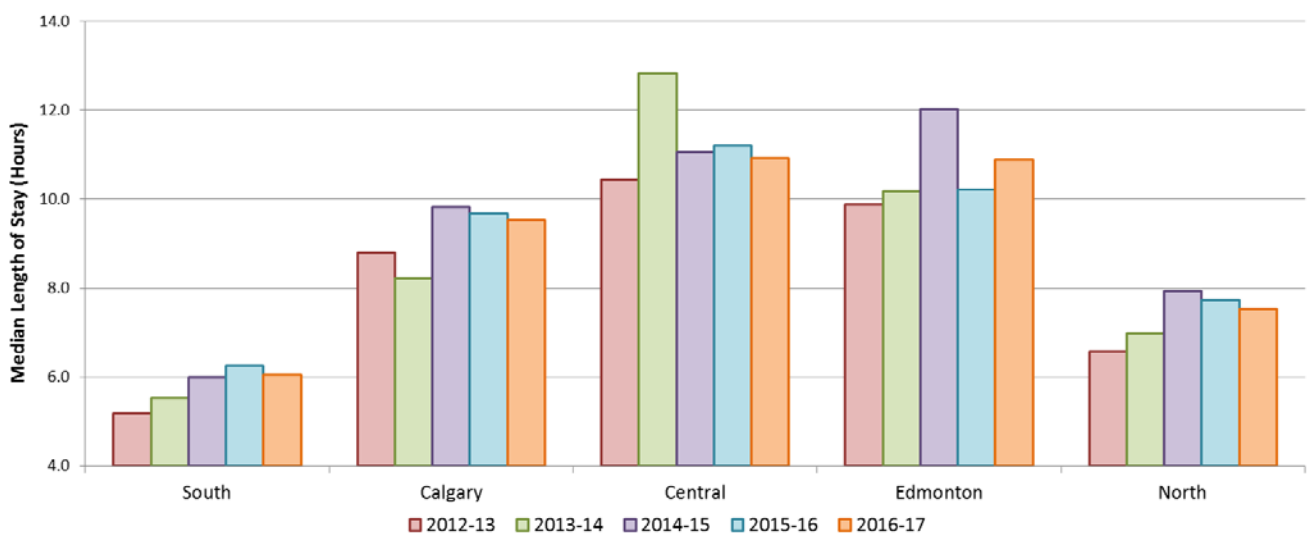
ED Length of Stay for Admitted Patients - Annual



How Do We Compare?

Alberta ranked 2nd best nationally out of five provinces in 2015-16.

ED Length of Stay for Admitted Patients - Zone



ED Length of Stay for Admitted Patients

HIGHLIGHTS

Increases in occupancy, average length of stay, demand in emergency and percentage of patients requiring alternate levels of care have all contributed to wait times for patients who are ultimately discharged from emergency departments. Combined, these factors reduce the ability to transfer patients who need to be admitted into the hospital from the emergency departments to inpatient units, and reduce the spaces available to treat patients quickly.

AHS has created care units in some of its urban hospitals – called the Rapid Transfer Unit in Edmonton and the Rapid Access Unit in Calgary. These units are located next to the emergency department (ED) and allow care providers to observe patients receiving treatments for a longer period of time, with the goal of being able to send them home rather than admit them to hospital.

Referral Access Advice Placement Information Destination (RAAPID) is a provincial program designed to provide a single point of contact for physicians and healthcare providers to access appropriate and timely advice, referral, admission, repatriation and consultation for patients. RAAPID provides facilitation and coordination of patient consultations, referrals and transfers throughout the province and assists clinicians in accessing critical or urgent consultation with a specialist, ensuring the appropriate destination of the patient based on clinical requirements and available resources.

The Provincial Patient Repatriation Policy and Procedure was revised to facilitate proactive planning and timely transfer of patients from hospitals to healthcare facilities closer to the patient's home community.

Zones continue to implement initiatives to improve ED flow. Real-time Emergency Department Patient Access & Coordination (REPAC) was implemented in the South Zone to provide information on patient volumes, incoming EMS volumes and information on capacity to improve ED workload balance between hospitals. Calgary Zone completed a rural ED satisfaction survey and created plans to improve care and flow. Central Zone's Red Deer Regional Hospital Centre developed daily RAPID discharge rounds on inpatient units, trialed use of recliner chairs for patients waiting to be discharged, and began work on improving bed turnaround. Edmonton Zone conducted process improvements in consult times for general surgery and mental health, implemented a Rapid Transfer Unit at the University of Alberta Hospital and provided new mental health space at the Royal Alexandra Hospital. Mental health teams are working to improve community services by opening a clinic to reduce usage of the Queen Elizabeth II ED in the North Zone.

SUMMARY OF RESULTS

North Zone achieved target for Q4 YTD. South, Calgary and Central Zones demonstrated improvement from the same period as last year. Provincially, we remained stable from last fiscal year. Edmonton Zone deteriorated from the same period as last year. A deeper analysis of data (not shown) finds that Edmonton Zone met the target in Q1.

Edmonton Zone hospitals have seen an increase in site occupancy and activity in ED and in-patient units. As a result, the sites are experiencing patients waiting longer in the ED for beds. Sites are implementing more proactive surge protocols, isolation co-horting and quality initiatives related to service processes and patient experience.

ED Length of Stay for Admitted Patients

The average patient's length of time (hours) in the emergency department before being admitted to a hospital bed at the busiest emergency departments.

ED LOS Admitted - Busiest Sites	2013-14	2014-15	2015-16	Q4 YTD		Trend	2016-17 Target
				2015-16 Last Year	2016-17 Current		
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable; ✖ Performance not improving							
Provincial	8.6	9.9	9.4	9.4	9.5	⇔	9.3
South Zone Total	5.5	6.0	6.3	6.3	6.1	✓	5.9
Chinook Regional Hospital	6.0	6.0	6.2	6.2	6.6	✖	5.9
Medicine Hat Regional Hospital	5.1	5.9	6.3	6.3	5.6	★	5.9
Calgary Zone Total	8.2	9.8	9.7	9.7	9.5	✓	8.9
Alberta Children's Hospital	6.3	6.8	6.5	6.5	6.2	★	6.4
Foothills Medical Centre	8.0	8.9	8.8	8.8	9.2	✖	8.5
Peter Lougheed Centre	9.1	11.5	11.5	11.5	11.3	✓	9.9
Rockyview General Hospital	8.6	11.1	10.5	10.5	9.6	★	10.1
South Health Campus	N/A	10.2	11.5	11.5	11.4	✓	8.0
Central Zone Total	12.8	11.1	11.2	11.2	10.9	✓	10.8
Red Deer Regional Hospital Centre	12.8	11.1	11.2	11.2	10.9	✓	10.8
Edmonton Zone Total	10.2	12.0	10.2	10.2	10.9	✖	10.2
Grey Nuns Community Hospital	16.8	23.5	20.7	20.7	22.4	✖	16.0
Misericordia Community Hospital	12.5	17.0	12.5	12.5	15.0	✖	12.0
Royal Alexandra Hospital	9.9	11.5	9.8	9.8	10.2	✖	9.8
Stollery Children's Hospital	7.4	8.6	7.4	7.4	7.3	★	7.6
Sturgeon Community Hospital	20.5	28.4	18.6	18.6	19.5	✖	15.0
University of Alberta Hospital	9.1	10.4	9.0	9.0	9.8	✖	8.6
North Zone Total	7.0	7.9	7.7	7.7	7.5	★	7.8
Northern Lights Regional Health Centre	5.9	6.3	6.3	6.3	5.7	★	6.0
Queen Elizabeth II Hospital	8.6	11.0	11.4	11.4	11.0	✓	10.6

N/A: No results available. South Health Campus opened February 2013.

* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.

ED Admissions from ED - Busiest Sites	2013-14	2014-15	2015-16	Q4 YTD	
				2015-16 Last Year	2016-17 Current
Provincial	133,310	137,390	140,357	140,357	141,774
South Zone	11,656	11,939	11,598	11,598	12,253
Calgary Zone	54,634	56,732	58,036	58,036	59,351
Central Zone	8,815	9,254	9,730	9,730	9,657
Edmonton Zone	50,644	51,858	53,521	53,521	53,612
North Zone	7,561	7,607	7,472	7,472	6,901

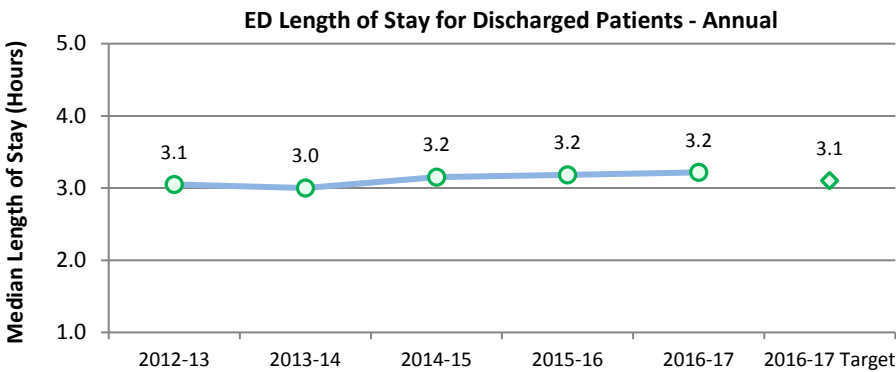
Emergency Department Length of Stay for Discharged Patients

Measure Definition

The average patient's length of time (hours) in the ED from the time a patient is assessed by a nurse until the time they are discharged at the busiest 17 EDs. This is calculated as the median length of stay which means that 50 per cent of patients stay in the ED this length of time or less.

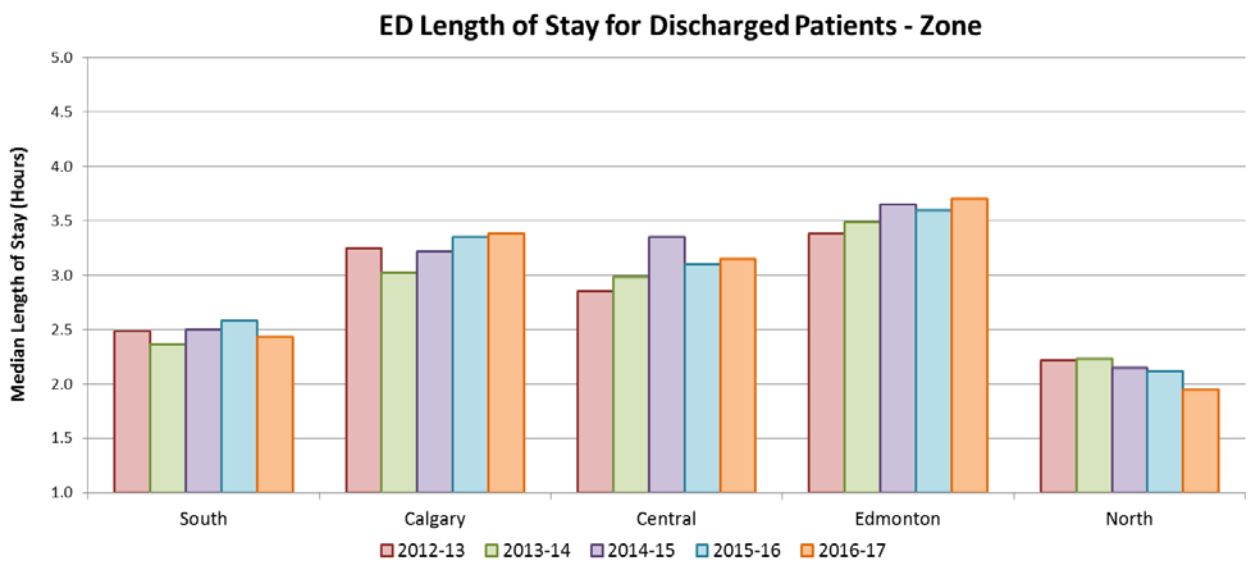
Understanding this Measure

Patients treated in an emergency department should be assessed and treated in a timely fashion. This measure focuses on the total time these patients are in the ED before being discharged home. Many patients seen in the emergency department do not require admission to hospital. The length of stay in an ED is used to assess the timeliness of care delivery, overall efficiency and accessibility of health services throughout the system.



How Do We Compare?

Alberta ranked 4th nationally out of five provinces in 2015-16.



ED Length of Stay for Discharged Patients

HIGHLIGHTS

AHS is taking steps to improve patient flow in its emergency departments by opening additional continuing care beds, which in turn reduces capacity pressures.

Work is underway to expedite the transfer of patients who no longer requiring acute care services. AHS Transition Services is matching all acute care patients currently waiting for a continuing care space in the community to an available and appropriate temporary vacant space in the community. The intent is to have patients/residents in their facility of choice as soon as that space is available.

Referral Access Advice Placement Information Destination (RAAPID) is a provincial program designed to provide a single point of contact for physicians and healthcare providers to access appropriate and timely advice, referral, admission, repatriation and consultation for patients. RAAPID provides facilitation and coordination of patient consultations, referrals and transfers throughout the province and assists clinicians in accessing critical or urgent consultation with a specialist, ensuring the appropriate destination of the patient based on clinical requirements and available resources.

The Provincial Patient Repatriation Policy and Procedure was revised to facilitate proactive planning and timely transfer of patients from hospitals to healthcare facilities closer to the patient's home community.

Zones continue to implement initiatives to improve emergency department (ED) flow. Real-time Emergency Department Patient Access & Co-ordination (REPAC) was implemented in the South Zone to provide information on patient volumes, incoming EMS volumes and information on capacity to improve ED workload balance between hospitals. Calgary Zone completed a rural ED satisfaction survey and created plans to improve care and flow. Central Zone's Red Deer Regional Hospital Centre developed daily RAPID discharge rounds on inpatient units, trialed use of recliner chairs for patients waiting to be discharged, and began work on improving bed turnaround. Edmonton Zone conducted process improvements in consult times for general surgery and mental health, implemented a Rapid Transfer Unit at the University of Alberta Hospital and provided new mental health space at the Royal Alexandra Hospital. Mental health teams are working to improve community services by opening a clinic to reduce usage of the Queen Elizabeth II ED in the North Zone.

The Chinook Regional Hospital Redevelopment and Edson Health Care Centre (November 2016) are completed. Medicine Hat Regional Hospital Redevelopment was delayed due to occupancy permits for the new wing in Phase 1.

SUMMARY OF RESULTS

North and South Zones achieved 2016-17 target. Provincial, Calgary Zone and Edmonton Zone remained stable from the same period as last year. Central Zone deteriorated when compared to the same period as last year. A deeper analysis of data (not shown) finds that Central Zone improved from Q4 last year (3.3 hours) in Q1 and Q2 were 3.1 hours as well as Q3 and Q4 were 3.2 hours. Central Zone experienced capacity challenges including increased occupancy. In early December, additional spaces for emergency CT scans were created to help with patient flow.

Edmonton Zone hospitals have seen an increase in site occupancy and activity in ED and in-patient units. As a result, the sites are experiencing patients waiting longer in the ED for beds. Sites are implementing more proactive surge protocols, isolation co-horting and quality initiatives related to service processes and patient experience.

ED Length of Stay for Discharged Patients

The average patient's length of time (hours) in the ED from the time a patient is assessed by a nurse until the time they are discharged at the busiest 17 EDs. This is calculated as the median length of stay which means that 50 per cent of patients stay in the ED this length of time or less.

ED LOS Discharged - Busiest Sites	2013-14	2014-15	2015-16	Q4 YTD		Trend	2016-17 Target
				2015-16 Last Year	2016-17 Current		
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable; ✖ Performance not improving							
Provincial	3.0	3.2	3.2	3.2	3.2	⇔	3.1
South Zone Total	2.4	2.5	2.6	2.6	2.4	★	2.4
Chinook Regional Hospital	2.4	2.4	2.5	2.5	2.4	✓	2.3
Medicine Hat Regional Hospital	2.3	2.7	2.8	2.8	2.5	★	2.6
Calgary Zone Total	3.0	3.2	3.4	3.4	3.4	⇔	3.1
Alberta Children's Hospital	2.2	2.4	2.4	2.4	2.5	✖	2.3
Foothills Medical Centre	3.7	3.8	4.1	4.1	4.0	✓	3.5
Peter Lougheed Centre	3.6	3.7	3.7	3.7	3.7	⇔	3.4
Rockyview General Hospital	3.1	3.4	3.6	3.6	3.7	⇔	3.2
South Health Campus	N/A	3.3	3.6	3.6	3.4	✓	3.0
Central Zone Total	3.0	3.4	3.1	3.1	3.2	✖	3.0
Red Deer Regional Hospital Centre	3.0	3.4	3.1	3.1	3.2	✖	3.0
Edmonton Zone Total	3.5	3.7	3.6	3.6	3.7	⇔	3.6
Grey Nuns Community Hospital	3.3	3.3	3.3	3.3	3.3	⇔	3.1
Misericordia Community Hospital	3.2	3.2	3.1	3.1	3.6	✖	3.0
Northeast Community Health Centre	3.2	3.2	3.0	3.0	3.0	★	3.0
Royal Alexandra Hospital	5.1	5.5	5.1	5.1	5.1	⇔	5.0
Stollery Children's Hospital	2.3	2.7	2.7	2.7	2.7	⇔	2.6
Sturgeon Community Hospital	2.9	3.3	3.3	3.3	3.6	✖	3.0
University of Alberta Hospital	4.9	5.7	5.5	5.5	5.7	✖	5.2
North Zone Total	2.2	2.2	2.1	2.1	2.0	★	2.0
Northern Lights Regional Health Centre	2.1	1.8	1.9	1.9	1.6	★	1.7
Queen Elizabeth II Hospital	2.4	2.7	2.5	2.5	2.4	★	2.5

* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.

ED Discharges from ED - Busiest Sites	2013-14	2014-15	2015-16	Q4 YTD	
				2015-16 Last Year	2016-17 Current
Provincial	892,057	878,560	872,422	872,422	861,557
South Zone	76,902	75,132	75,144	75,144	74,068
Calgary Zone	307,564	308,414	305,991	305,991	304,410
Central Zone	45,682	46,311	45,711	45,711	44,955
Edmonton Zone	338,229	328,131	331,564	331,564	334,875
North Zone	123,680	120,572	114,012	114,012	103,249

Hand Hygiene

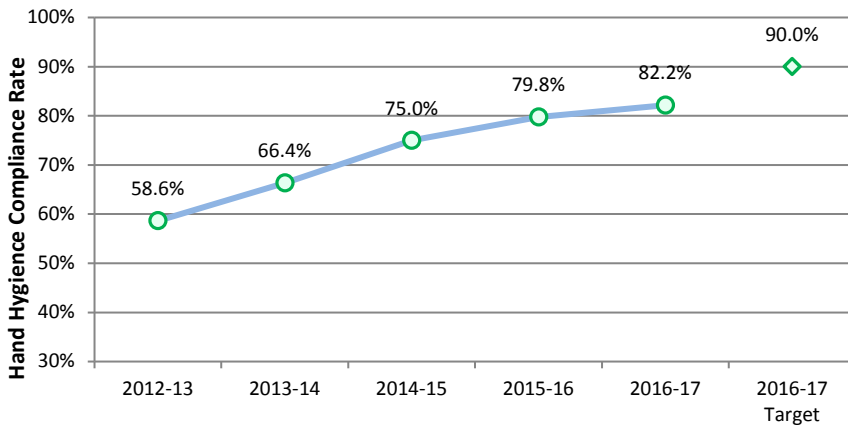
Measure Definition

The percentage of opportunities for which healthcare workers clean their hands during the course of patient care. For this measure, healthcare workers are directly observed by trained personnel to see if they are compliant with routine hand hygiene practices according to the Canadian Patient Safety Institute "4 Moments of Hand Hygiene." Included in the AHS Quarterly HH reviews are observations from across the continuum of care including AHS operated acute care facilities, combined acute care and continuing care facilities, ambulatory, urgent care, cancer care centres, standalone rehabilitation facilities, addictions and mental health facilities, emergency medical services (EMS) and Corrections Health. Excluded are the non-AHS contracted continuing care facilities.

Understanding this Measure

Hand hygiene is the single most effective strategy to reduce transmission of infection in the health-care setting. The World Health Organization and Canadian Patient Safety Institute have identified four opportunities during care when hand hygiene should be performed, most commonly before and after contact with a patient or the patient's environment. Direct observation is recommended to assess hand hygiene compliance rates for healthcare workers. Hand hygiene performance is a challenge for all healthcare organizations. In AHS, compliance has improved overall for the last three years and has improved for each type of healthcare worker. We must continue to improve our healthcare worker hand hygiene compliance and are working hard to achieve our targets.

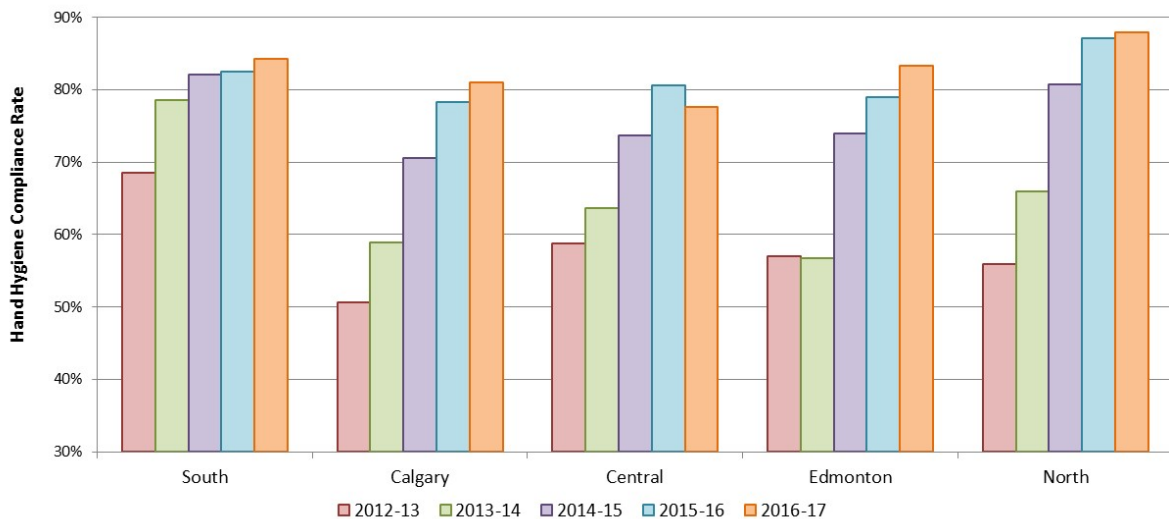
Hand Hygiene - Annual



How Do We Compare?

Direct comparison to other jurisdictions is not possible given different approaches to measuring hand washing compliance.

Hand Hygiene - Zone



Hand Hygiene

HIGHLIGHTS

Hand hygiene (HH) is the number one way to prevent the spread of communicable disease and infection and AHS will continue to build on these successes. Through education and awareness, increased monitoring and timely feedback, more healthcare workers are cleaning their hands consistently and properly, protecting patients by reducing the risk of infection.

Ongoing surveillance provides timely data to clinicians, frontline staff, and leaders to monitor, understand, and use hand hygiene compliance data to improve hand hygiene practices. Work continues to implement the Clean Hands Platform which has real-time hand hygiene data available to support hand hygiene improvement. A policy/procedure refresh is underway, led by a multidisciplinary working group and extensive stakeholder engagement occurred via surveys and through consultation.

There are several initiatives throughout AHS to improve the hand hygiene compliance of healthcare providers and thereby improve patient safety. Zone-embedded HH teams continue to support local initiatives and foster ownership and accountability for hand hygiene improvements. Provincial Hand Hygiene Steering Committee and Zone Hand Hygiene Committees co-ordinate improvement initiatives at the provincial and zone level such as the Hand Hygiene Hero campaign.

SUMMARY OF RESULTS

Hand hygiene compliance increased provincially and in four zones compared to the same period as last year. Central Zone “other sites” deteriorated due to increased observations in a new clinical service area and a downturn in results was expected and is expected to improve going forward.

Provincially hand hygiene compliance was 82.2% an improvement of 3% from last year. At the zone level, hand hygiene compliance varied from 77.6% (Central Zone) to 88.0% (North Zone) and a total of 382,993 observations were collected.

Quarterly hand hygiene reports are available at the provincial and zone levels to address areas requiring further attention.

Hand Hygiene

Percentage of opportunities for which healthcare workers clean their hands during the course of patient care.

Hand Hygiene	2013-14	2014-15	2015-16	Q4 YTD		Trend	2016-17 Target
				2015-16 Last Year	2016-17 Current		
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable; ✖ Performance not improving							
Provincial	66.4%	75.0%	79.8%	79.8%	82.2%	✓	90.0%
South Zone Total	78.5%	82.0%	82.5%	82.5%	84.2%	✓	90.0%
Chinook Regional Hospital	80.6%	85.0%	82.1%	82.1%	83.2%	✓	90.0%
Medicine Hat Regional Hospital	76.1%	77.5%	81.9%	81.9%	86.9%	✓	90.0%
All Other Sites	78.6%	85.0%	83.1%	83.1%	82.9%	⇔	90.0%
Calgary Zone Total	59.0%	70.6%	78.2%	78.2%	81.1%	✓	90.0%
Alberta Children's Hospital	57.2%	74.4%	76.8%	76.8%	79.7%	✓	90.0%
Foothills Medical Centre	51.8%	66.2%	76.3%	76.3%	82.9%	✓	90.0%
Peter Lougheed Centre	62.2%	77.1%	84.8%	84.8%	79.4%	✖	90.0%
Rockyview General Hospital	61.7%	68.3%	74.2%	74.2%	84.1%	✓	90.0%
South Health Campus	58.7%	59.3%	68.6%	68.6%	76.4%	✓	90.0%
All Other Sites	63.2%	76.6%	80.0%	80.0%	78.6%	⇔	90.0%
Central Zone Total	63.7%	73.7%	80.6%	80.6%	77.6%	✖	90.0%
Red Deer Regional Hospital Centre	75.4%	69.4%	78.0%	78.0%	77.7%	⇔	90.0%
All Other Sites	57.2%	76.8%	82.1%	82.1%	77.6%	✖	90.0%
Edmonton Zone Total	56.8%	73.9%	78.9%	78.9%	83.3%	✓	90.0%
Grey Nuns Community Hospital**	64.2%	75.2%	73.5%	73.5%	83.3%	✓	90.0%
Misericordia Community Hospital**	71.4%	76.9%	75.2%	75.2%	79.6%	✓	90.0%
Royal Alexandra Hospital	61.6%	75.3%	80.9%	80.9%	83.9%	✓	90.0%
Stollery Children's Hospital	58.1%	75.3%	78.7%	78.7%	80.1%	✓	90.0%
Sturgeon Community Hospital	58.9%	81.1%	84.2%	84.2%	86.1%	✓	90.0%
University of Alberta Hospital	42.9%	70.0%	74.4%	74.4%	84.7%	✓	90.0%
All Other Sites	57.5%	72.9%	78.7%	78.7%	82.3%	✓	90.0%
North Zone Total	66.0%	80.7%	87.2%	87.2%	88.0%	✓	90.0%
Northern Lights Regional Health Centre	56.2%	63.6%	87.9%	87.9%	87.4%	⇔	90.0%
Queen Elizabeth II Hospital	68.4%	91.4%	95.8%	95.8%	90.8%	★	90.0%
All Other Sites	66.2%	73.5%	85.0%	85.0%	87.7%	✓	90.0%

* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.

** Covenant sites (including Misericordia Community Hospital and Grey Nuns Hospital) use different methodologies for capturing and computing Hand Hygiene compliance rates. These are available twice a year in spring and fall. Grouped results (All Other Hospitals, Zone and Provincial totals) reflect AHS sites only.

Total Observations	2013-14	2014-15	2015-16	Q4 YTD	
				2015-16 Last Year	2016-17 Current
Provincial	85,687	269,345	397,386	397,386	382,993
South Zone	23,688	40,936	39,185	39,185	38,147
Calgary Zone	17,458	99,233	183,149	183,149	161,583
Central Zone	20,500	42,502	45,103	45,103	35,838
Edmonton Zone	10,277	42,904	100,910	100,910	125,583
North Zone	13,764	43,770	29,039	29,039	21,842

Note: Total observations from 2015-16 on are not comparable to previous fiscal year as previous years were only measured annually (over a 4 month period) versus quarterly.

Hospital Mortality

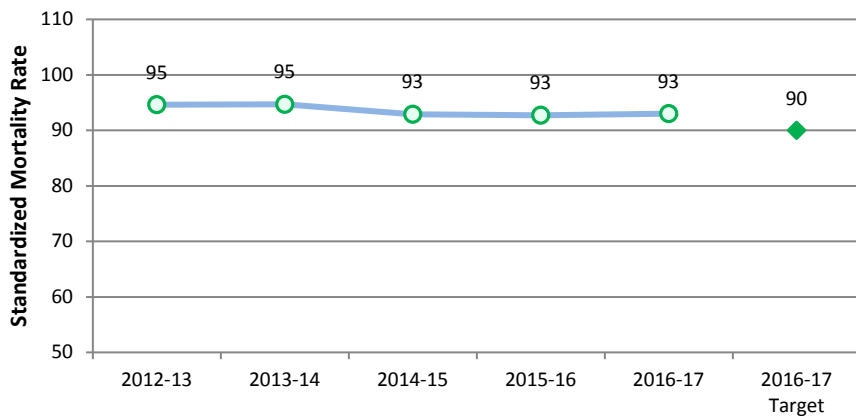
Measure Definition

The ratio of actual number of deaths compared to the expected number of deaths based upon the type of patients admitted to hospitals. This ratio is multiplied by 100 for reporting purposes. The ratio compares actual deaths to expected deaths after adjusting for factors that affect in-hospital mortality, such as patient age, sex, diagnosis and other conditions. The expected deaths are based on comparison to similar patients in national databases.

Understanding this Measure

This measure of quality care shows how successful hospitals have been in reducing patient deaths and improving patient care. A mortality ratio equal to 100 suggests that there is no difference between the hospital's mortality rate and the overall average rate. A mortality ratio greater than 100 suggests that the local mortality rate is higher than the overall average. A mortality ratio less than 100 suggests that the local mortality rate is lower than the overall average.

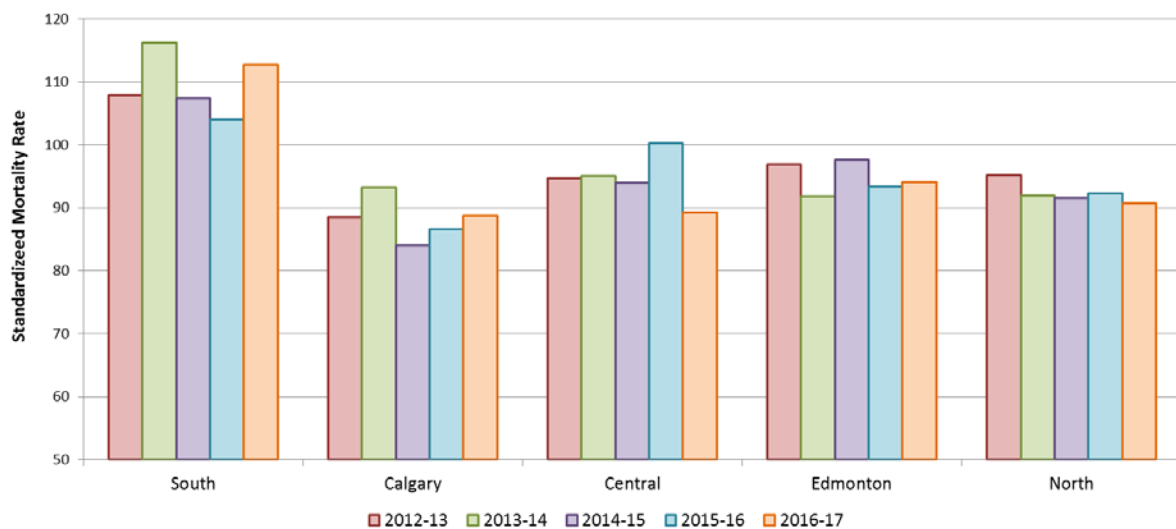
Hospital Standardized Mortality Rate - Annual



How Do We Compare?

Alberta ranked 5th nationally out of 9 provinces. Alberta is performing the same as the national rate in 2015-16.

Hospital Standardized Mortality Rate - Zone



Hospital Mortality

HIGHLIGHTS

Being one provincewide healthcare system care requires everyone involved in the patient's care to work as a team. Using an integrated approach with every patient, will improve the overall health of the community, one person at a time.

Our Strategic Clinical Networks (SCNs) allow us to standardize care through the development of clinical care pathways to ensure all Albertans receive the best care regardless where they live. For example, in the Fragility and Stability Program, the Bone and Joint Health SCN developed the hip fracture acute care pathway which helps reduce hospital mortality in orthopedics – e.g., getting patients to the operating room within 48 hours significantly reduces postoperative mortality. The Surgery SCN worked with the zones to implement the Enhanced Recovery After Surgery (ERAS) program, which standardizes care before, during and after surgery to get patients back on their feet quicker while shortening hospital stays and reducing complications after surgery. This began with one pathway (colon/rectal cancer) at two sites, then 10 pathways at 16 sites and now spreading to over 50 sites.

Zones have implemented several strategies proven to reduce mortality, including, but not limited to, multidisciplinary rounds, Rapid Response Teams, and the Ventilator Bundle (a group of interventions designed to improve care of patients on ventilators). Use of these strategies reduces the number of “code calls” — that is, “code blue,” cardiopulmonary arrest — per thousand discharges and the incidence of ventilator-associated pneumonia. Mortality can be consistently reduced through the use of a combination of evidence-based interventions.

Zones continue to implement infection, prevention and control and hand hygiene initiatives to reduce *Clostridium difficile* infections (CDI) and other infection rates.

SUMMARY OF RESULTS

Central Zone met target again for Q4 YTD, and North Zone is performing better than the same period as last year. Provincial and two zones remain stable. South Zone deteriorated from the same period as last year.

Trending hospital mortality results for several years has proven very useful: stable reporting year after year helps show how our hospital mortality has changed in relation to our quality improvement efforts — where we've made progress and where we can continue to improve.

This measure shows high sensitivity to variation in number of deaths from quarter to quarter. Working on understanding root cause if present with cases.

In monitoring these measures at a site level, it is important to examine trends over time. We expect there to be fluctuations in hospitals due to smaller sites having low number of discharges and therefore more susceptible to variations. AHS monitors these fluctuations to see if deterioration in performance represents a trend over time or part of expected variation. The fluctuation is within normal range.

Hospital Mortality

The ratio of actual number of deaths compared to the expected number of deaths based upon the type of patients admitted to hospitals. This ratio is multiplied by 100 for reporting purposes.

Hospital Standardized Mortality Rate	2013-14	2014-15	2015-16	Q4 YTD		Trend	2016-17 Target
				2015-16 Last Year	2016-17 Current		
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable; ✖ Performance not improving							
Provincial	95	93	93	93	93	⇔	90
South Zone Total	116	107	104	104	113	✖	102
Chinook Regional Hospital	123	106	106	106	116	✖	97
Medicine Hat Regional Hospital	118	109	111	111	122	✖	105
All Other Hospitals	104	110	94	94	98	★	105
Calgary Zone Total	93	84	87	87	89	⇔	78
Foothills Medical Centre	97	92	94	94	92	✓	80
Peter Lougheed Centre	86	83	84	84	97	✖	80
Rockyview General Hospital	91	74	78	78	86	✖	74
South Health Campus	N/A	74	75	75	65	★	74
All Other Hospitals	102	93	91	91	102	✖	85
Central Zone Total	95	94	100	100	89	★	90
Red Deer Regional Hospital Centre	100	96	99	99	81	★	93
All Other Hospitals	92	93	101	101	94	✓	89
Edmonton Zone Total	92	98	93	93	94	⇔	91
Grey Nuns Community Hospital	90	94	87	87	89	⇔	88
Misericordia Community Hospital	89	108	90	90	99	✖	95
Royal Alexandra Hospital	92	98	92	92	95	✖	92
Sturgeon Community Hospital	94	81	91	91	92	⇔	79
University of Alberta Hospital	94	101	102	102	98	✓	94
All Other Hospitals	82	86	76	76	69	★	87
North Zone Total	92	92	92	92	91	✓	88
Northern Lights Regional Health Centre	72	40	88	88	48	★	85
Queen Elizabeth II Hospital	83	93	98	98	99	⇔	93
All Other Hospitals	96	96	91	91	92	⇔	88

N/A: No results available - South Health Campus opened February 2013.

* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.

Eligible Cases	2013-14	2014-15	2015-16	Q4 YTD	
				2015-16 Last Year	2016-17 Current
Provincial	99,583	102,378	103,537	103,537	104,284
South Zone	8,154	8,321	8,148	8,148	8,538
Calgary Zone	32,933	34,027	34,624	34,624	34,718
Central Zone	12,400	12,945	12,848	12,848	13,069
Edmonton Zone	35,407	36,086	37,250	37,250	37,405
North Zone	10,689	10,999	10,667	10,667	10,554

Children's Mental Health Access

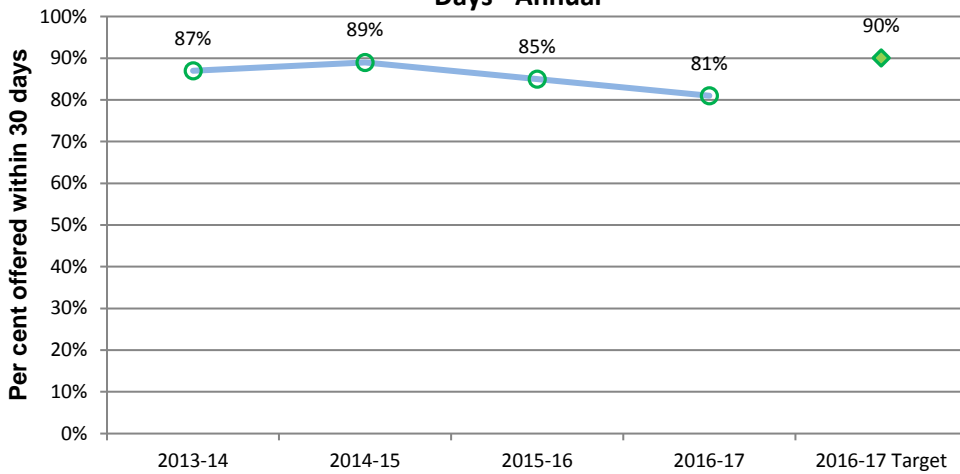
Measure Definition

Percentage of children aged 0 to 17 years offered scheduled community mental health treatment within 30 days from referral.

Understanding this Measure

Delays in treating mental illness can have negative consequences, including exacerbation of the client's condition. Research has shown that the longer children wait for service, the more likely they are to not attend their first appointment. Monitoring the percentage of children who have symptoms or problems that require attention but are not considered urgent or emergent can help in identifying system delays and assessing service capacity, while ensuring that children most in need of treatment receive it immediately.

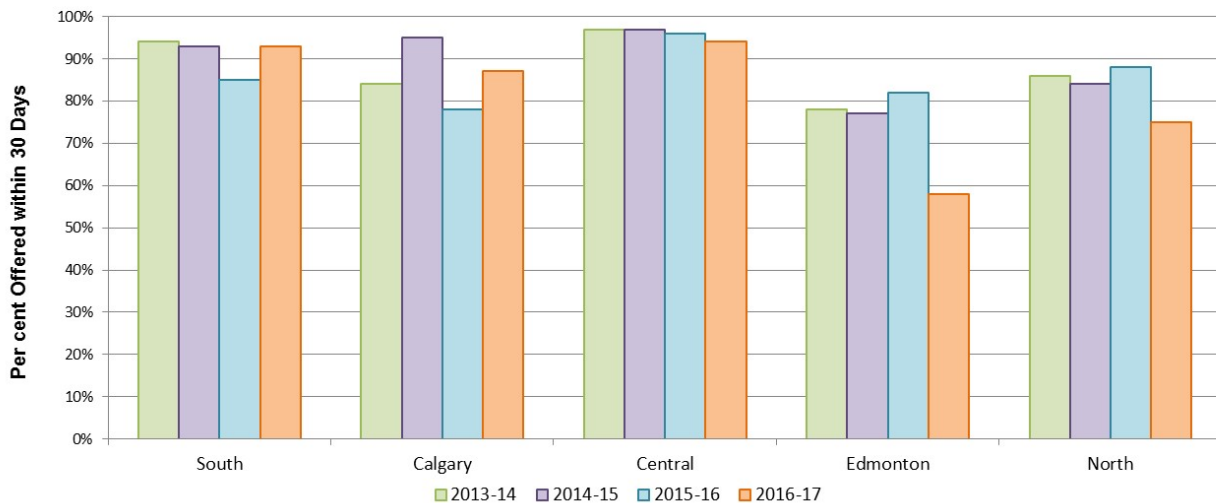
Children Offered Scheduled Mental Health Services within 30 Days - Annual



How Do We Compare?

Comparable national data is not available for this measure.

Children Offered Scheduled Mental Health Services within 30 Days - Zone



Children's Mental Health Access

HIGHLIGHTS

Wait times for access to community mental health treatment services are used as an indicator of client access to the healthcare system and reflect the efficient use of resources. Currently, Alberta is the only province with access standards for children's mental health. There is no comparable information from other provinces regarding the wait times for children to receive community mental health treatment.

Protection of Children Abusing Drugs Act (PChAD) is an Alberta law that helps children under 18 whose use of alcohol or drugs is likely to cause significant psychological or physical harm. AHS provides the PChAD program and currently has four safe houses in Calgary, Edmonton, Red Deer and Grande Prairie. The safe houses provide secure and supportive home-like setting for these children and give them direct access to addiction counselors and other health professionals to help them address their alcohol, substance abuse or concurrent disorders. As of March 31, 2017, AHS opened 13 addiction spaces (including three new PChAD beds) and 111 community mental health spaces. With a provincial total of 25 PChAD beds, approximately 600 youth were admitted to PChAD in 2016-17.

AHS is employing several improvement strategies to improve efficiency include: service delivery redesign, parenting programs and walk-in sessions, successful recruitment into long-standing vacancies, continuing with AIM work, deployment of a temporary navigator in the North Zone, implementation of regional collaborative school delivery projects, and opening of the Rutherford Clinic and Access Open Minds clinic (April 2017) in Edmonton. The Access Open Minds clinic will offer a centralized option for addiction and mental health services and supports for local and area residents ages 11 to 25.

Online training modules were developed to support community-based agencies and Primary Care Networks to expand the InRoads Drug Treatment Funding Program. The program's goal is to develop capacity to increase access to sustainable, evidence-informed, early intervention treatment services for children and youth in Alberta with addiction and mental health concerns.

SUMMARY OF RESULTS

South Zone met target for Q4 YTD, Calgary Zone performed better and Central Zone remained stable compared to the same period as last year. Edmonton and North zones deteriorated from last fiscal year.

Overall, there has been an improvement in Edmonton and North Zones in quarter over quarter in the time to access children's mental health services; however, year-to-date results have been impacted by increased demand for children's mental health services combined with staff vacancies/leaves that impact the availability of services and wait-times.

Strategies to improve efficiency include: process improvement and service innovation, parenting programs and walk-in sessions, successful recruitment into long-standing vacancies, implementation of regional collaborative school delivery projects as well as children and youth mental health projects via child and family services and primary care networks, expanded in-reach into high schools and improved access to care for families in south Edmonton through the newly opened Rutherford Clinic.

North Zone results have been impacted by the temporary closure of Northern Lights Regional Hospital and the Fort McMurray Mental Health Clinic; as well as displacement of the population in Fort McMurray due to the wildfires in Q1. North Zone working closely with Edmonton Zone to redesign the delivery of child and adolescent psychiatry services through Telehealth to partially address the zone's child psychiatry recruitment challenges.

Children's Mental Health Access

Percentage of children aged 0 to 17 years offered scheduled community mental health treatment within 30 days from referral.

Children Offered Scheduled Mental Health Services within 30 Days	2013-14	2014-15	2015-16	Q4 YTD		Trend	2016- 17 Target
				2015-16 Last Year	2016-17 Current		
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable; ✖ Performance not improving							
Provincial	87%	89%	85%	85%	81%	✖	90%
South Zone	94%	93%	85%	85%	93%	★	93%
Calgary Zone	84%	95%	78%	78%	87%	✓	90%
Central Zone	97%	97%	96%	96%	94%	⇔	96%
Edmonton Zone	78%	77%	82%	82%	58%	✖	80%
North Zone	86%	84%	88%	88%	75%	✖	90%

* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.

Number of New Enrollments	2013-14	2014-15	2015-16	Q4 YTD	
				2015-16 Last Year	2016-17 Current
Provincial	7,456	7,947	8,870	8,870	9,312
South Zone	1,450	1,697	1,749	1,749	1,575
Calgary Zone	1,465	1,815	2,038	2,038	2,298
Central Zone	1,170	1,257	1,458	1,458	1,754
Edmonton Zone	1,852	1,562	1,703	1,703	1,962
North Zone	1,519	1,616	1,922	1,922	1,723

Access to Radiation Therapy

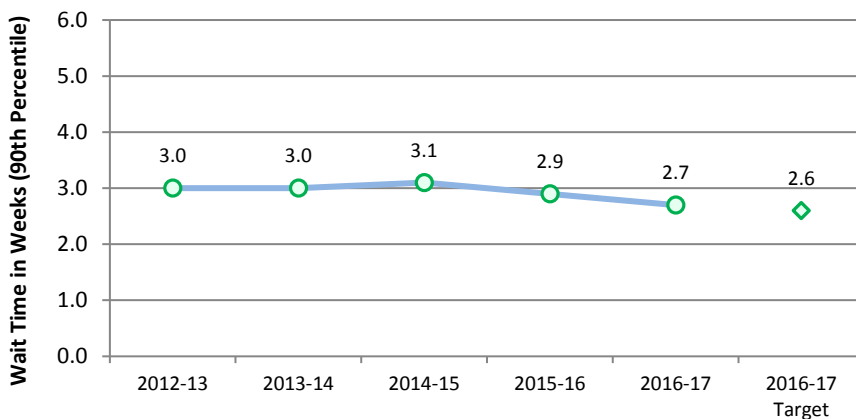
Measure Definition

Ninety per cent of patients wait for radiation therapy this length of time or less (measured from when they are ready to treat). This measure is the time from the date the patient was physically ready to commence treatment, to the date that the patient received his/her first radiation therapy.

Understanding this Measure

Timely access to radiation therapy for cancer can impact treatment effectiveness and outcomes. Currently, this data is reported on patients who receive radiation therapy at the Cross Cancer Institute in Edmonton, the Tom Baker Cancer Centre in Calgary, the Jack Ady Cancer Centre in Lethbridge and the Central Alberta Cancer Centre in Red Deer. The data applies only to patients receiving external beam radiation therapy.

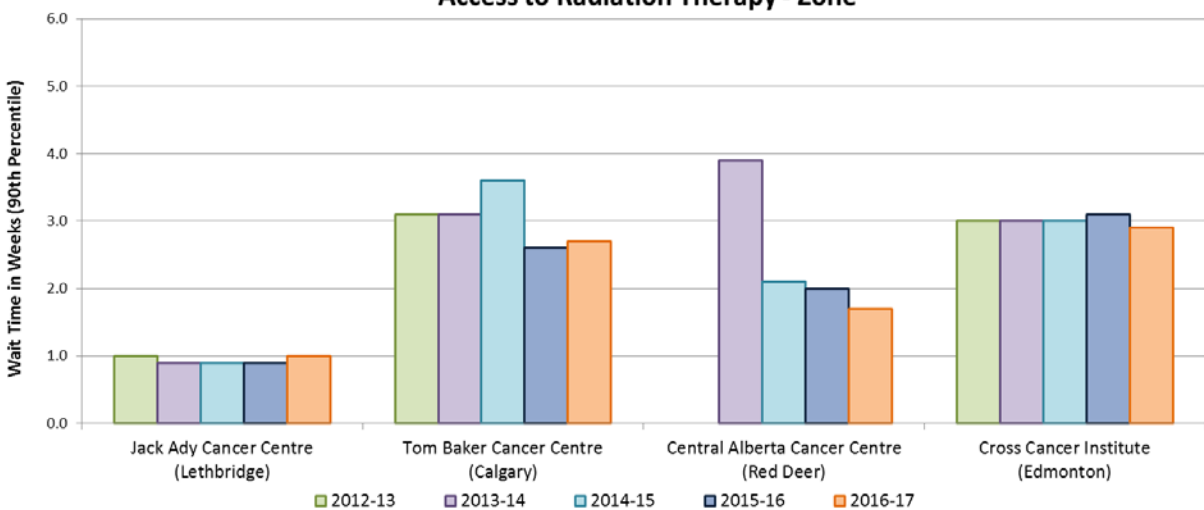
Access to Radiation Therapy - Annual



How Do We Compare?

Alberta ranks 4th best nationally among nine provinces in Q2 YTD 2016-17.

Access to Radiation Therapy - Zone



Note: Central Zone Cancer Center opened in November 2013. Grande Prairie Cancer Centre is planned to open in the North Zone in 2019.

Access to Radiation Therapy

HIGHLIGHTS

CancerControl Alberta is responsible for treating patients with cancer. This provincial network of cancer professionals and facilities provide most cancer treatment except for surgery.

Radiation therapy is available at the Cross Cancer Institute in Edmonton; Tom Baker Cancer Centre in Calgary; Jack Ady Cancer Centre in Lethbridge and Central Alberta Cancer Centre in Red Deer. Radiation therapy will become available in the North Zone at the Grande Prairie Cancer Centre which is planned to open in 2019.

Several initiatives were undertaken across the province to improve access to radiation therapy.

- The Community Paramedic program and Tom Baker Cancer Centre (TBCC) partnered to deliver supportive care interventions such as hydration, electrolyte replacement and transfusions to cancer patients outside of acute care. This partnership resulted in over 1,500 patients receiving care at home rather than going to the hospital. This program has enhanced the patient experience, supported better symptom management, decreased TBCC and emergency department visits, and increased emergency medical services job satisfaction.
- An electronic Putting Patient First form was completed to support how providers respond to priority issues identified by patients. It includes a newly developed dashboard to help identify patients who have significant symptoms.
- Investments were made in community and regional cancer centres to enhance patient access to care closer to home. This included expanding clinic hours and opening the newly renovated High River, Hinton, and Barrhead Community Cancer Centres.

SUMMARY OF RESULTS

Jack Ady Cancer Centre (JACC) and Cross Cancer Institute Cancer Centre (CCI) achieved target for Q4 YTD. Provincial and Central Alberta Cancer Centre (CACC) demonstrated improvement from the same period as last year. A deeper analysis of data (not shown) finds that Calgary's Tom Baker Cancer Centre (TBCC) deteriorated from the same period as last year but improved quarter over quarter (Q1 = 2.7 weeks, Q2 = 2.9 weeks and met the target in Q3 and Q4 = 2.6 weeks).

The number of cancer care patient visits increased by 4%, from over 616,200 in 2015-16 to over 640,500 visits in 2016-17, while wait times for radiation therapy and chemotherapy remained steady.

The national wait time target is 28 days. This has been achieved by all facilities for the past 12 months. In addition, 90% of the provincial wait time target (18 days for first radiation treatment) was achieved for several referral tumor groups over the last 12 month including lung, lymphoma, genito-urinary, skin, hematology and bladder; and 85% of the target was achieved for breast, prostate, gastro-intestinal, central nervous system, musculoskeletal and endocrine.

The number of curative radiation therapy techniques and palliative radiation oncology clinics that improve treatment quality, efficiency and patient experience increased by 9.4% to over 124,200 treatments in 2016-17 compared to 113,500 in 2015-16.

Access to Radiation Therapy

Ninety per cent of patients wait for radiation therapy this length of time or less (measured from when they are ready to treat). This measure is the time from the date the patient was physically ready to commence treatment, to the date that the patient received his/her first radiation therapy.

Access to Radiation Therapy (Weeks)	2013-14	2014-15	2015-16	Q4 YTD		Trend	2016-17 Target
				2015-16 Last Year	2016-17 Current		
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable; ✖ Performance not improving							
Provincial	3.0	3.1	2.9	2.9	2.7	✓	2.6
Jack Ady Cancer Centre (Lethbridge)	0.9	0.9	0.9	0.9	1.0	★	1.0
Tom Baker Cancer Centre (Calgary)	3.1	3.6	2.6	2.6	2.7	✖	2.6
Central Alberta Cancer Centre (Red Deer)	N/A	2.1	2.0	2.0	1.7	✓	1.4
Cross Cancer Institute (Edmonton)	3.0	3.0	3.1	3.1	2.9	★	2.9

N/A: No results available. Central Alberta Cancer Centre opened November 2013. Grande Prairie Cancer Centre is tentatively planned to open in the North Zone in 2019.
* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.

Number of Patients who Started Radiation Therapy	2013-14	2014-15	2015-16	Q4 YTD	
				2015-16 Last Year	2016-17 Current
Provincial	7,182	7,438	7,855	7,855	8,122
Jack Ady Cancer Centre (Lethbridge)	431	415	421	421	438
Tom Baker Cancer Centre (Calgary)	2,803	2,910	3,270	3,270	3,292
Central Alberta Cancer Centre (Red Deer) *	145	425	485	485	483
Cross Cancer Institute (Edmonton)	3,803	3,688	3,679	3,679	3,909

* 2013-14 Values for Central Alberta Cancer Centre are only for a partial year as it opened November 2013.

Hospital-Acquired *Clostridium difficile* Infections

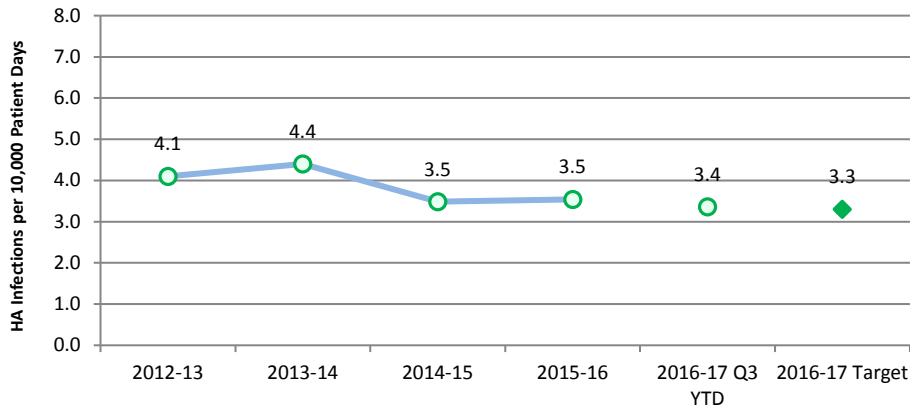
Measure Definition

The number of *Clostridium difficile* infections (CDI) acquired in hospital for every 10,000 patient days. A rate of 4.0 means approximately 100 patients per month acquire CDI infections in Alberta. CDI infection cases include patients with a new infection or re-infection while in hospital. Patients are considered to have a CDI if they exhibit symptoms and confirmation by a laboratory test or colonoscopy.

Understanding this Measure

Some individuals carry CDI in their intestines while others may acquire it while in hospital. CDI is the most frequently identified cause of hospital-acquired diarrhea. This infection complicates and prolongs hospital stays and impacts resources and costs in the healthcare system. Monitoring CDI trends provides important information about effectiveness of infection prevention and control strategies. Note: This measure is reported a quarter later due to the requirement to followup with patients after the end of the reporting quarter.

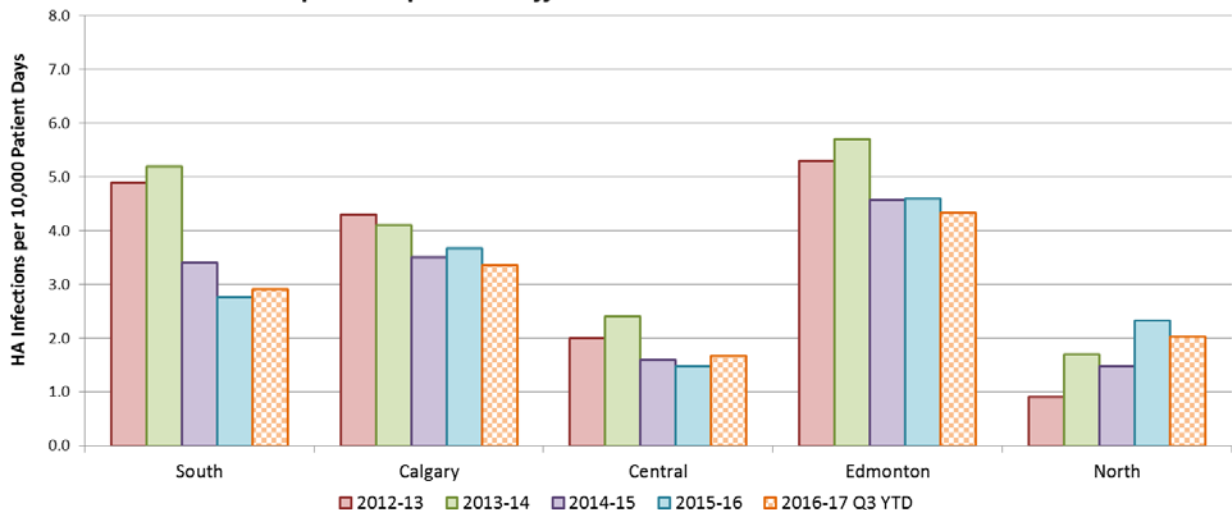
Hospital-Acquired *C-Difficile* Rate - Annual



How Do We Compare?

Alberta is performing better than the national average of 4.48 in 2015 based on surveillance data.

Hospital-Acquired *C-Difficile* Rate - Zone



Hospital-Acquired Infections

HIGHLIGHTS

AHS Infection Prevention and Control works collaboratively with physicians, staff and public health by providing *C. difficile* rates and assisting with intervention and control strategies.

Antimicrobial stewardship is the practice of minimizing the emergence of antimicrobial resistance by using antibiotics only when necessary and, if needed, by selecting the appropriate antibiotic at the right dose, frequency and duration to optimize outcomes while minimizing adverse effects. All zones continue to implement the antimicrobial stewardship strategy. Antimicrobial Stewardship committees continue to implement *Clostridium Difficile* Infection (CDI) toolkits. These include pre-printed care orders, environmental cleaning protocols, nursing checklist and a management flow map. Cases of CDI are reviewed by Infection, Prevention and Control and Pharmacy for proper treatment, order set use, precautions, cleaning, and appropriate antibiotic and proton pump inhibitor de-escalation to evaluate the use of the CDI toolkit components.

Overall, antimicrobial usage of the 16 sites for the 14 antimicrobials highly associated with CDI decreased in the last two years. This is due in part to AHS implementing targeted initiatives, such as education and awareness campaigns, aimed at reducing the use of antimicrobials highly associated with CDI.

With the incorporation of the Pharmacy Good Catch program into AHS' Reporting and Learning System, the process for entering and reviewing parenteral nutrition-related events has become more intuitive and accessible for both frontlines and administrators. These changes improve patient safety and meet Health Quality Council of Alberta recommendations.

In AHS, there are established protocols for the cleaning of patient care areas which include increased cleaning for isolation rooms and focused attention on cleaning of shared patient equipment. Current initiatives in environmental services include: cleanliness audits with real-time reporting to support best practice in cleaning, introduction of designated equipment cleaners with accountability for cleaning of shared patient equipment such as wheelchairs, stretchers, IV poles, vital sign monitors, etc., and a pilot project using room disinfection technology. AHS implemented the standardized clinical equipment cleaning program at four Edmonton Zone sites: Royal Alexandra Hospital, Glenrose Rehabilitation Hospital, University of Alberta Hospital, and Sturgeon Community Hospital; remaining AHS sites will be completed in 2017-18.

SUMMARY OF RESULTS

The most recent data for this measure is a quarter behind. This analysis is based on Q3 YTD 2016-17.

Calgary and Edmonton Zones, as well as several sites achieved target for Q3 YTD. Provincial and North Zone showed improvement from the same period as last year. South and Central Zones, as well as a few sites deteriorated from the same period as last year. Variation in rural hospitals is due to lower patient days that may result in one or two cases causing an increase in rates.

A deeper analysis of data (not shown) finds that South Zone has noted improvement quarter over quarter (Q1 = 3.5, Q2 = 3.1 and met the target in Q3 = 2.1). Central Zone has noted improvement quarter over quarter (Q1 = 2.2, Q2 = 1.5 and met the target in Q3 = 1.3).

The AHS Antimicrobial Stewardship Working Group supported the roll-out of the standardized toolkit across the province, given the impact of CDI on patient outcomes; the availability of evidence-based guidelines for CDI and the evidence that a standardized approach to CDI treatment reduces mortality and infection recurrences.

Hospital-Acquired Infections

The number of *Clostridium difficile* infections (C-diff) acquired in hospital for every 10,000 patient days. A rate of 4.0 means approximately 100 patients per month acquire C-diff infections in Alberta.

Hospital Acquired <i>C-Difficile</i> Infections	2013-14	2014-15	2015-16	Q3 YTD		Trend	2016-17 Target
				2015-16 Last Year	2016-17 Current		
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable; ✖ Performance not improving							
Provincial	4.4	3.5	3.5	3.5	3.4	✓	3.3
South Zone Total	5.2	3.4	2.8	2.5	2.9	✖	2.8
Chinook Regional Hospital	7.5	5.4	4.4	4.4	4.7	✖	4.4
Medicine Hat Regional Hospital	2.8	1.7	1.3	0.8	0.9	★	1.3
All Other Hospitals	4.3	2.0	1.9	1.3	2.6	✖	1.9
Calgary Zone Total	4.1	3.5	3.7	3.5	3.4	★	3.4
Alberta Children's Hospital	3.5	1.4	4.1	3.4	0.9	★	3.5
Foothills Medical Centre	5.4	5.2	4.6	4.6	5.2	✖	4.8
Peter Lougheed Centre	3.4	2.8	3.7	3.6	2.3	★	2.7
Rockyview General Hospital	4.0	3.2	3.4	3.4	3.1	✓	3.0
South Health Campus	N/A	2.3	2.6	2.2	2.4	✖	2.2
All Other Hospitals	1.5	0.9	1.2	0.9	0.9	★	1.8
Central Zone Total	2.4	1.6	1.5	1.5	1.7	✖	1.5
Red Deer Regional Hospital Centre	3.3	3.1	2.5	2.6	2.4	★	2.8
All Other Hospitals	2.0	1.0	1.0	1.0	1.3	✖	1.0
Edmonton Zone Total	5.7	4.6	4.6	4.7	4.3	★	4.3
Grey Nuns Community Hospital	5.9	3.5	3.5	3.6	2.9	★	3.4
Misericordia Community Hospital	6.3	3.9	4.1	3.5	8.4	✖	3.5
Royal Alexandra Hospital	7.3	6.7	6.8	6.6	5.2	★	6.1
Stollery Children's Hospital	3.1	4.0	5.9	6.2	4.1	✓	4.0
Sturgeon Community Hospital	9.3	6.0	7.4	8.1	4.5	★	5.3
University of Alberta Hospital	8.6	7.1	5.9	6.5	6.2	★	6.9
All Other Hospitals	1.9	1.4	1.8	1.9	1.5	✓	1.3
North Zone Total	1.7	1.5	2.3	2.5	2.0	✓	1.4
Northern Lights Regional Health Centre	0.7	2.0	0.7	0.9	1.1	✖	1.0
Queen Elizabeth II Hospital	3.0	1.2	2.6	3.0	0.5	★	1.7
All Other Hospitals	1.5	1.5	2.5	2.6	2.7	✖	1.4

N/A: No results available. South Health Campus opened February 2013.

North Zone results have been impacted by the temporary closure of Northern Lights Regional Hospital and displacement in Fort McMurray due to the wildfires in Q1.

* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.

Number of Cases	2013-14	2014-15	2015-16	Q3 YTD	
				2015-16 Last Year	2016-17 Current
Provincial	1,265	1,065	1,082	800	765
South Zone	101	69	59	39	45
Calgary Zone	374	353	368	265	252
Central Zone	100	68	63	47	53
Edmonton Zone	650	539	535	404	379
North Zone	40	36	57	45	36

North Zone results have been impacted by the temporary closure of Northern Lights Regional Hospital and displacement in Fort McMurray due to the wildfires in Q1.

Mental Health Readmissions

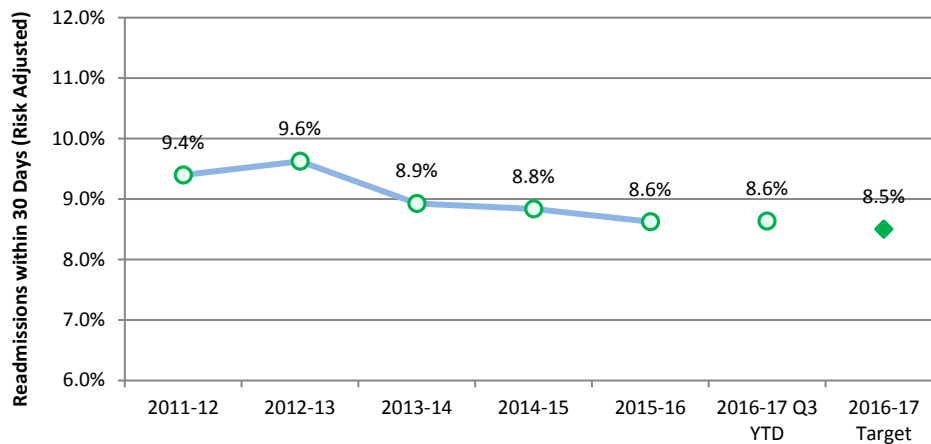
Measure Definition

The percentage of patients who have mental health disorders with unplanned readmission to hospital within 30 days of leaving hospital. Excludes patients who have mental health disorders who require scheduled followup care.

Understanding this Measure

Hospital care for people diagnosed with a mental illness typically aims to stabilize acute symptoms. Once stabilized, the individual can be discharged, and subsequent care and support are ideally provided through primary care, outpatient and community programs in order to prevent relapse or complications. While not all readmissions can be avoided, monitoring readmissions can assist in appropriateness of discharge and followup care. Note: This measure is reported a quarter later due to the requirement to followup with patients after the end of the reporting quarter.

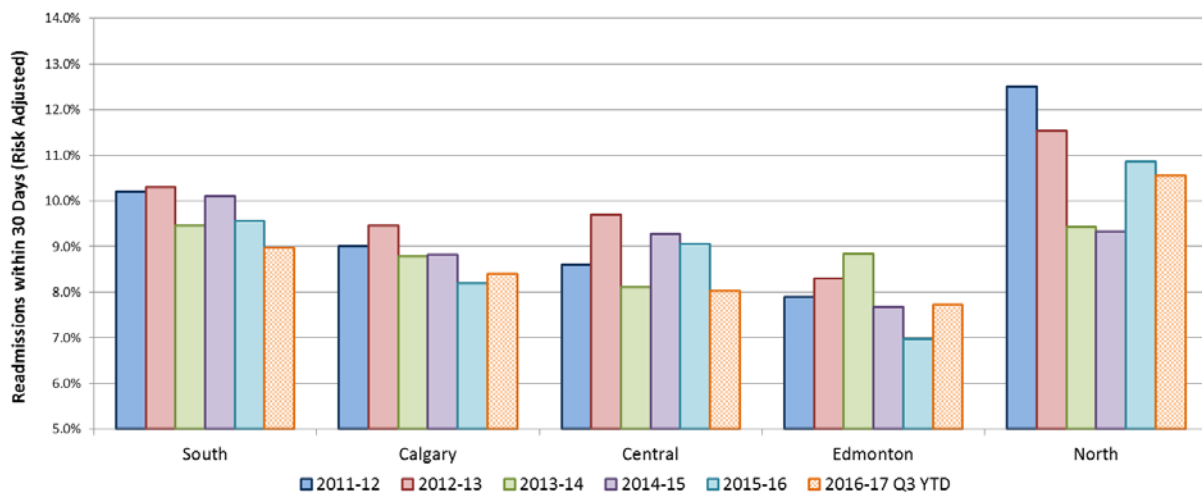
Mental Health Readmissions - Annual



How Do We Compare?

Alberta ranked 2nd best nationally out of ten provinces and better than the national rate in 2014-15.

Mental Health Readmissions - Zone



Note: North Zone results have been impacted by the temporary closure of Northern Lights Regional Hospital and displacement in Fort McMurray due to the wildfires in Q1.

Mental Health Readmissions

HIGHLIGHTS

AHS will continue to reduce readmission rates for patients with severe and persistent mental health problems by continuing to use Community Treatment Orders (CTOs). CTOs are an important tool to supporting individuals with serious and persistent mental health illness to stay in the community. A treatment and care plan is set up, outlining service providers and supports required for the client to stay well in the community.

Telemental health uses technology to ensure clients receive help without leaving their community by linking them to mental health professionals. The utilization of telemental health events increased by 36% from 2015-16 to over 10,000 events

Zone initiatives include:

- Calgary Zone patients are contacted within seven days of discharge to provide post-discharge support and reinforcement of discharge recommendations.
- Central Zone continues multiple initiatives including the Discharge Continuity Project to link inpatient and community services and addresses the suicide risk management policy, enhanced mental health liaisons, enhanced discharge planning/transition occurring via Centennial Centre for persons with Development Disabilities, and partner with Child and Family Services for community living.
- Individuals in Medicine Hat who experience mental health, addiction or psychosocial crises and are at risk will now be identified for treatment by a Police and Crisis Team (PACT). PACT, a partnership between AHS and the Medicine Hat Police Service, pairs a mental health clinician and a police officer who attend emergency calls to assist individuals in crisis and diverts individuals toward the most appropriate community services and resources to stabilize them.
- Crisis Response EMS (CREMS) team in the Edmonton Zone works with mental health therapists to respond to clients in mental health crisis and has the ability to use primary care and existing community supports, addiction and mental health clinics and inpatient beds to best meet a client's immediate needs.
- North Zone implemented the Integrated Crisis and Access Team in Grande Prairie to offer access to triage and intake assessments. A pull system was established where a nurse at the Medical Detox Unit (MDU) calls to enquire about ED patients requiring medical detoxification and transport to MDU.

SUMMARY OF RESULTS

The most recent data for this measure is a quarter behind. This analysis is based on Q3 YTD 2016-17.

South, Calgary and Central Zones achieved target for Q3 YTD. Provincial and North Zone remained stable compared to the same period as last year. Edmonton Zone deteriorated from the same period as last year. A deeper analysis of data (not shown) finds that, Edmonton Zone has noted improvement quarter over quarter (Q2 = 9.6% to Q3 = 7.9%). Edmonton Zone mental health readmission rates remain amongst the lowest in the province.

In the Edmonton Zone, the 30-day readmission rate is 5.2% for patients discharged only from acute mental health beds. The reported 7.7% 30-day readmission rate is due almost exclusively to patients with a mental health diagnosis who receive medical treatment in non-mental health beds. Edmonton Zone mental health readmission rates remain amongst the lowest in the province.

Mental Health Readmissions

The percentage of patients who have mental health disorders with unplanned readmission to hospital within 30 days of leaving hospital. Excludes patients who have mental health disorders who require scheduled followup care.

Mental Health Readmissions within 30 Days (Risk Adjusted)	2013-14	2014-15	2015-16	Q3 YTD		Trend	2016-17 Target
				2015-16 Last Year	2016-17 Current		
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable; ✖ Performance not improving							
Provincial	8.9%	8.8%	8.6%	8.6%	8.6%	⇔	8.5%
South Zone	9.5%	10.1%	9.6%	9.5%	9.0%	★	9.0%
Calgary Zone	8.8%	8.8%	8.2%	8.6%	8.4%	★	8.5%
Central Zone	8.1%	9.3%	9.1%	9.0%	8.0%	★	9.0%
Edmonton Zone	8.8%	7.7%	7.0%	6.4%	7.7%	✖	7.0%
North Zone	9.4%	9.3%	10.9%	10.5%	10.6%	⇔	10.0%

North Zone results have been impacted by the temporary closure of Northern Lights Regional Hospital and displacement in Fort McMurray due to the wildfires in Q1.

* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.

Mental Health Discharges (Index)*	2013-14	2014-15	2015-16	Q3 YTD	
				2015-16 Last Year	2016-17 Current
Provincial	13,455	13,887	14,690	10,885	11,639
South Zone	1,503	1,485	1,511	1,112	1,206
Calgary Zone	4,716	5,099	5,384	3,988	4,076
Central Zone	1,483	1,615	1,893	1,423	1,417
Edmonton Zone	3,427	3,408	3,532	2,618	3,012
North Zone	2,326	2,280	2,370	1,744	1,928

*Total number of hospital stays for select Mental Health diagnoses. Excludes standalone psychiatric facilities such as Southern Alberta Forensic Psychiatric Centre (SAFPC) and Claresholm Centre for Mental Health and Addictions in Calgary Zone and Centennial Centre for Mental Health and Brain Injury (CMHBI) in Central Zone.

North Zone results have been impacted by the temporary closure of Northern Lights Regional Hospital and displacement in Fort McMurray due to the wildfires in Q1.

Surgical Readmissions

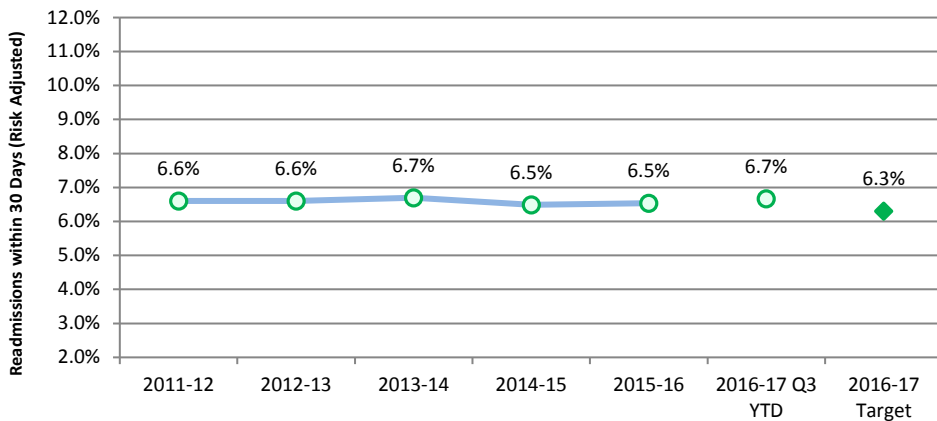
Measure Definition

The percentage of surgical patients with unplanned readmission to hospital within 30 days of leaving the hospital. Excludes surgical patients who require scheduled followup care.

Understanding this Measure

Unplanned readmissions to hospitals are used to measure quality of surgical care and followup. Readmission rates are also influenced by a variety of other factors, including the effectiveness of the care transition to the community. Note: This measure is reported a quarter later due to the requirement to followup with patients after the end of the reporting quarter.

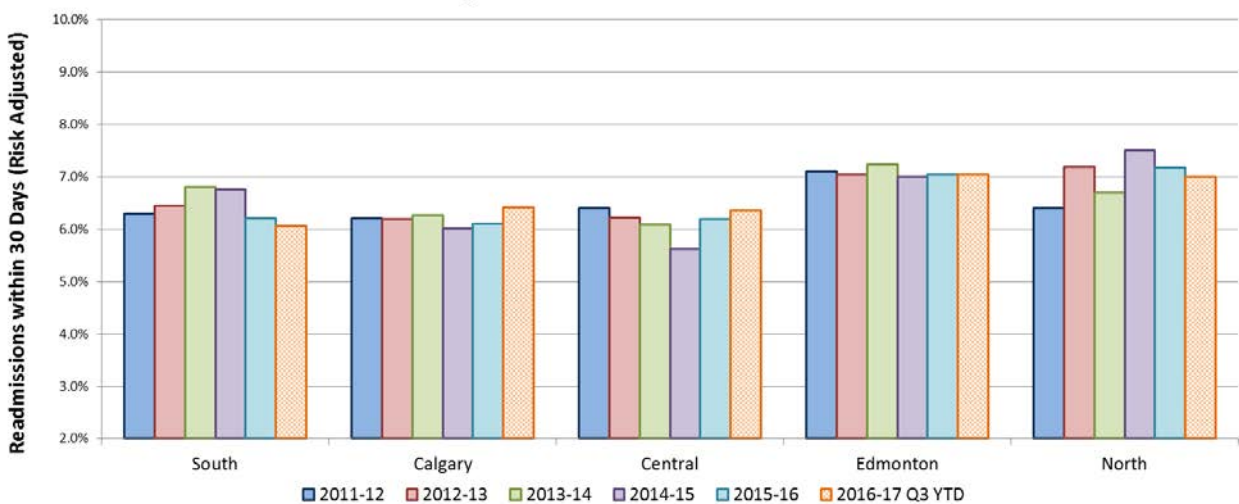
Surgical Readmissions - Annual



How Do We Compare?

Alberta ranked 5th best nationally out of ten provinces and the same as the national rate in 2014-15.

Surgical Readmissions - Zone



Note: North Zone results have been impacted by the temporary closure of Northern Lights Regional Hospital and displacement in Fort McMurray due to the wildfires in Q1.

Surgical Readmissions

HIGHLIGHTS

AHS is working with its Strategic Clinical Networks to ensure quality of surgical care and follow-up, which can reduce the frequency with which patients return to the hospital thereby improving care and lowering healthcare costs.

Enhanced Recovery After Surgery (ERAS) program standardizes care before, during and after surgery to get patients back on their feet quicker while shortening hospital stays and reducing complications after surgery. This program started with one pathway (colon/rectal cancer) at two sites, then 10 pathways at 16 sites and is now spreading to over 50 sites.

The National Surgery Quality Improvement Program (NSQIP) uses clinical data to measure and improve performance thereby reducing the rate of preventable surgical complications. NSQIP studies show half or more of all complications occur after the patient leaves the hospital, often leading to costly readmissions. NSQIP tracks patients for 30 days after their operation, providing a more complete picture of their care. This information helps inform best practice guidelines to help hospitals target problem areas and improve surgical outcomes. The additional tracking provides insight as to why patients are readmitted, how readmissions can be avoided and in some cases, a NSQIP follow-up phone call by a nurse can avoid readmission.

Elder-friendly Approaches to the Surgical Environment (EASE) is a clinical research study – a collaboration between AHS and the Faculty of Medicine & Dentistry at the University of Alberta – that aims to implement elder-friendly practices during and after surgery to better support the older patient through their hospital stay, thereby improving post-operative outcomes.

SUMMARY OF RESULTS

The most recent data for this measure is a quarter behind. This analysis is based on Q3 YTD 2016-17.

South and North Zones achieved target for Q3 YTD. Central and Edmonton Zones showed improvement from the same period as last year. Provincial results remained stable compared to the same period as last year. A deeper analysis of data (not shown) finds that Calgary Zone deteriorated from the same period as last year but has seen improvement quarter over quarter (Q2 = 6.8% to Q3 = 6.2%). In addition, Calgary Zone surgical readmission rates remain amongst the lowest in the province.

One way to reduce readmissions is to ensure patients are informed and educated on their procedure and follow-up care even before they are admitted. Pre-admission clinics assist the patient and families in being adequately prepared for elective surgery. Patients are taught about their surgery, anesthesia and recovery period.

Surgical Readmissions

The percentage of surgical patients with unplanned readmission to hospital within 30 days of leaving the hospital. Excludes surgical patients who require scheduled followup care.

Surgical Readmissions within 30 days (Risk Adjusted)	2013-14	2014-15	2015-16	Q3 YTD		Trend	2016-17 Target
				2015-16 Last Year	2016-17 Current		
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable; ✖ Performance not improving							
Provincial	6.7%	6.5%	6.5%	6.6%	6.7%	⇔	6.3%
South Zone Total	6.8%	6.8%	6.2%	6.3%	6.0%	★	6.0%
Chinook Regional Hospital	6.7%	7.8%	5.8%	5.9%	5.8%	★	6.6%
Medicine Hat Regional Hospital	7.2%	5.1%	6.7%	6.8%	6.3%	✓	5.2%
All Other Hospitals	4.9%	5.9%	8.5%	8.7%	7.6%	✓	5.4%
Calgary Zone Total	6.3%	6.0%	6.1%	6.2%	6.4%	✖	5.9%
Foothills Medical Centre	6.8%	6.1%	6.4%	6.4%	6.7%	✖	6.0%
Peter Lougheed Centre	5.6%	6.0%	6.2%	6.3%	6.4%	⇔	5.9%
Rockyview General Hospital	6.2%	6.2%	5.9%	5.9%	6.1%	★	6.1%
South Health Campus	N/A	5.9%	6.1%	6.5%	7.2%	✖	5.7%
All Other Hospitals	2.5%	1.6%	1.5%	1.8%	1.7%	★	1.7%
Central Zone Total	6.1%	5.6%	6.2%	6.6%	6.3%	✓	5.8%
Red Deer Regional Hospital Centre	6.1%	5.9%	6.3%	6.7%	6.8%	⇔	5.8%
All Other Hospitals	6.0%	4.6%	5.7%	6.1%	5.0%	★	5.8%
Edmonton Zone Total	7.2%	7.0%	7.0%	7.1%	7.0%	✓	6.5%
Grey Nuns Community Hospital	5.9%	5.8%	6.4%	6.6%	6.8%	✖	5.7%
Misericordia Community Hospital	6.9%	7.3%	6.6%	6.6%	6.6%	★	6.8%
Royal Alexandra Hospital	7.5%	7.0%	6.9%	6.9%	6.8%	★	6.8%
Sturgeon Community Hospital	5.5%	5.9%	5.9%	5.9%	5.9%	⇔	5.7%
University of Alberta Hospital	8.2%	7.7%	8.0%	8.0%	7.9%	✓	7.3%
All Other Hospitals	4.1%	4.7%	4.7%	4.8%	4.3%	★	4.7%
North Zone Total	6.7%	7.5%	7.2%	7.7%	7.0%	★	7.1%
Northern Lights Regional Health Centre	6.5%	7.6%	6.6%	6.9%	7.7%	✖	6.8%
Queen Elizabeth II Hospital	7.2%	7.8%	7.4%	7.9%	6.8%	★	7.4%
All Other Hospitals	6.0%	7.0%	7.0%	7.6%	6.9%	✓	6.8%

North Zone results have been impacted by the temporary closure of Northern Lights Regional Hospital and displacement in Fort McMurray due to the wildfires in Q1.

* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.

Eligible Surgical Cases (Index)*	2013-14	2014-15	2015-16	Q3 YTD	
				2015-16 Last Year	2016-17 Current
Provincial	90,811	92,530	93,178	69,559	70,329
South Zone	5,471	5,432	5,396	4,059	4,063
Calgary Zone	36,315	37,846	38,972	29,062	29,325
Central Zone	7,784	7,859	7,835	5,905	6,144
Edmonton Zone	36,295	36,672	36,267	27,047	27,439
North Zone	4,946	4,721	4,708	3,486	3,358

*Total number of hospital stays for surgery for eligible conditions. Transfers are excluded.

North Zone results have been impacted by the temporary closure of Northern Lights Regional Hospital and displacement in Fort McMurray due to the wildfires in Q1.

Satisfaction with Hospital Care

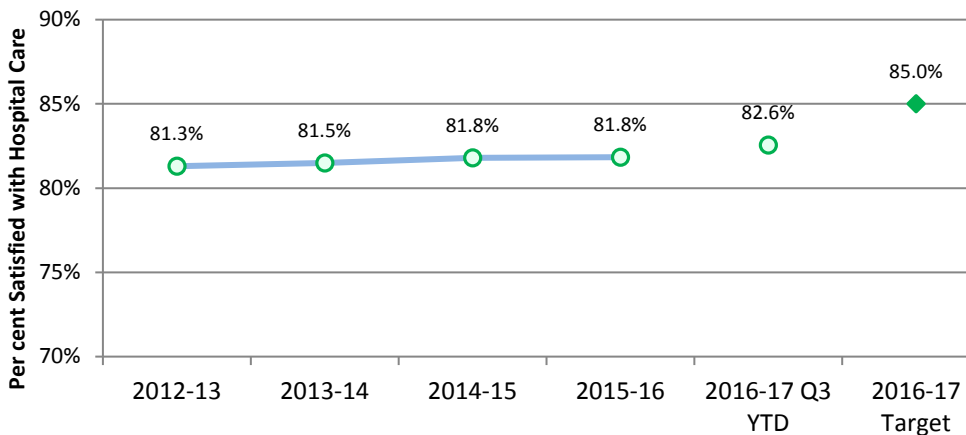
Measure Definition

This measure is the percentage of adults aged 18 years and older discharged from hospitals who rate their overall stay as 8, 9 or 10 out of 10, where zero is the lowest level of satisfaction possible and 10 is the best.

Understanding this Measure

Feedback gathered from individuals using hospital services is critical to improving the health system. This measure reflects patients' overall experience with their hospital care. Telephone interviews are conducted with a random sample of patients within six weeks of their discharge date from hospital. Source: Hospital-Consumer Assessment of Healthcare Providers and Systems (H-CAHPS) Survey. Note: This measure is reported a quarter later due to the requirement to followup with patients after the end of the reporting quarter.

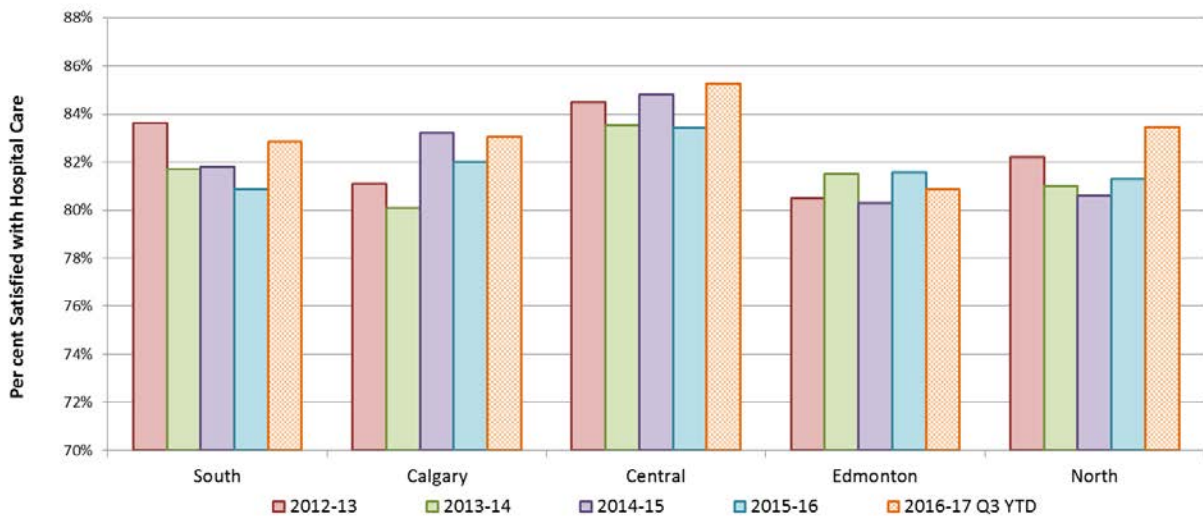
Satisfaction with Hospital Care - Annual



How Do We Compare?

Comparable national data is not available for this measure.

Satisfaction with Hospital Care - Zone



Note: North Zone results have been impacted by the temporary closure of Northern Lights Regional Hospital and displacement in Fort McMurray due to the wildfires in Q1.

Satisfaction with Hospital Care

HIGHLIGHTS

Patient satisfaction is important to measure because it relates directly to the work we do. AHS conducts patient experience surveys in various areas, including experience related to hospital care, emergency medical services, family care clinics and addiction mental health. These surveys help us improve care and services, better understand healthcare needs of Albertans and develop future programs and policies in response to what Albertans say.

Patient First Strategy reflects a patient- and family-centred care (PFCC). The strategy will enable AHS to advance healthcare in Alberta by empowering and enabling Albertans to be at the centre of their healthcare team, improving their own health and wellness.

AHS supports many PFCC initiatives across the province and within our zones. Examples include implementing family presence guidelines, recruiting patient and family advisors on zone PFCC committees, and continuing implementation of CoACT elements. Zones also participate in leader rounding which are planned and purposeful conversations between leaders, patients and families to learn about experiences and identify improvement opportunities.

The annual Patient- and Family-Centred Care Week was held across the province in October 2016 and focused on building partnerships between care providers, patients and families. There were also contributions made to the PFCC website including the creation of digital stories. A new Visitation with a Family Presence Focus Policy and Visitor Management Appeal Procedure will be implemented in spring of 2017.

To support patient- and family-centred care for Albertans who do not speak English as their first language, AHS provides interpretation and translation services provincewide. Accurate, two-way communication between patients and healthcare teams is essential in delivering high quality health care. Professional interpretation and translation support helps reduce misunderstandings, enabling patients to get the care they need and helping them understand their diagnosis and treatment. In 2016-17, AHS used over one million minutes of professional over-the-phone interpretation compared to 770,400 in 2015-16, a 30% increase. This service is available 24/7 in over 240 different languages. In 2016-17, professional telephone interpretation was used for approximately 110 languages.

SUMMARY OF RESULTS

The most recent data for this measure is a quarter behind. This analysis is based on Q3 YTD 2016-17.

Provincial, South, Calgary, Central and North Zones showed improvement from the same period as last year. Edmonton Zone results remained stable compared to the same period as last year.

Closer examination of patient experience survey responses at the University of Alberta Hospital (UAH) suggests that there are opportunities to improve communication to patients about their care. Results have improved since last quarter and initiatives are underway (e.g., CoACT optimization) that will help continue to improve patient experience on site.

AHS has processes in place to review and respond to feedback from patients and families regarding care and services. The provincial team works to resolve concerns with patients, families and staff; if a resolution is not possible, a concern will be forwarded to the Patient Concerns Officer for review. All concerns and commendations reported are tracked in the Feedback and Concerns Tracking (FACT) database and monitored to identify areas for broader improvement.

Satisfaction with Hospital Care

Percentage of adults aged 18 years and older discharged from hospitals who rate their overall stay as 8, 9 or 10 out of 10, where zero is the lowest level of satisfaction possible and 10 is the best.

Satisfaction with Hospital Care	2013-14	2014-15	2015-16	Q3 YTD		Trend	2016-17 Target
				2015-16 Last Year	2016-17 Current		
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable; ✖ Performance not improving							
Provincial	81.5%	81.8%	81.8%	82.3%	82.6%	✓	85.0%
South Zone Total	81.7%	81.8%	80.9%	81.1%	82.8%	✓	86.0%
Chinook Regional Hospital	80.5%	76.6%	78.2%	78.3%	83.1%	✓	84.0%
Medicine Hat Regional Hospital	80.7%	85.7%	81.3%	82.4%	81.5%	⇔	86.0%
All Other Hospitals	83.5%	88.3%	87.2%	87.0%	86.2%	⇔	90.0%
Calgary Zone Total	80.1%	83.2%	82.0%	82.7%	83.1%	✓	85.0%
Alberta Children's Hospital	Measure restricted to Adult Sites only						
Foothills Medical Centre	76.6%	80.8%	80.8%	81.4%	80.9%	⇔	82.0%
Peter Lougheed Centre	80.9%	79.9%	77.2%	76.6%	78.7%	✓	81.0%
Rockyview General Hospital	82.9%	85.4%	81.7%	84.0%	84.2%	✓	87.0%
South Health Campus	Opened February 2013		90.1%	90.2%	91.4%	★	90.0%
All Other Hospitals	79.3%	90.3%	92.9%	92.4%	92.2%	★	92.0%
Central Zone Total	83.5%	84.8%	83.4%	83.4%	85.3%	✓	86.0%
Red Deer Regional Hospital Centre	81.1%	83.0%	82.2%	82.1%	83.5%	✓	84.0%
All Other Hospitals	84.5%	86.7%	84.8%	84.7%	86.9%	✓	87.0%
Edmonton Zone Total	81.5%	80.3%	81.6%	82.2%	80.9%	⇔	84.0%
Grey Nuns Community Hospital	86.4%	87.2%	86.1%	87.6%	86.8%	⇔	88.0%
Misericordia Community Hospital	78.5%	75.3%	77.2%	76.9%	79.8%	✓	80.0%
Royal Alexandra Hospital	79.9%	76.5%	77.3%	77.7%	76.9%	⇔	80.0%
Stollery Children's Hospital	Measure restricted to Adult Sites only						
Sturgeon Community Hospital	89.8%	87.6%	89.8%	89.4%	88.1%	★	88.0%
University of Alberta Hospital	77.1%	80.2%	83.5%	84.5%	80.0%	✖	88.0%
All Other Hospitals	70.9%	85.3%	86.3%	88.2%	85.4%	✖	86.0%
North Zone Total	81.0%	80.6%	81.3%	81.9%	83.4%	✓	84.0%
Northern Lights Regional Health Centre	75.4%	74.7%	78.6%	80.3%	83.3%	★	78.0%
Queen Elizabeth II Hospital	76.0%	77.2%	78.6%	79.8%	81.3%	★	81.0%
All Other Hospitals	83.4%	83.7%	83.5%	83.4%	84.6%	✓	85.0%

North Zone results have been impacted by the temporary closure of Northern Lights Regional Hospital and displacement in Fort McMurray due to the wildfires in Q1.

* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.

Total Eligible Discharges	2013-14	2014-15	2015-16	Q3 YTD	
				2015-16 Last Year	2016-17 Current
Provincial	183,462	200,428	218,546	155,888	185,622
South Zone	18,271	19,341	19,737	14,832	14,879
Calgary Zone	45,800	51,199	61,044	39,907	62,597
Central Zone	26,134	28,254	29,272	21,850	22,156
Edmonton Zone	68,913	76,197	82,559	60,034	67,141
North Zone	24,344	25,437	25,934	19,265	18,849

Note: If within the margin of error, trend is not significant and reported to be "stable".
Margin of error: estimated to be accurate within this margin of error, 19 times out of 20.

Heart Attack Mortality

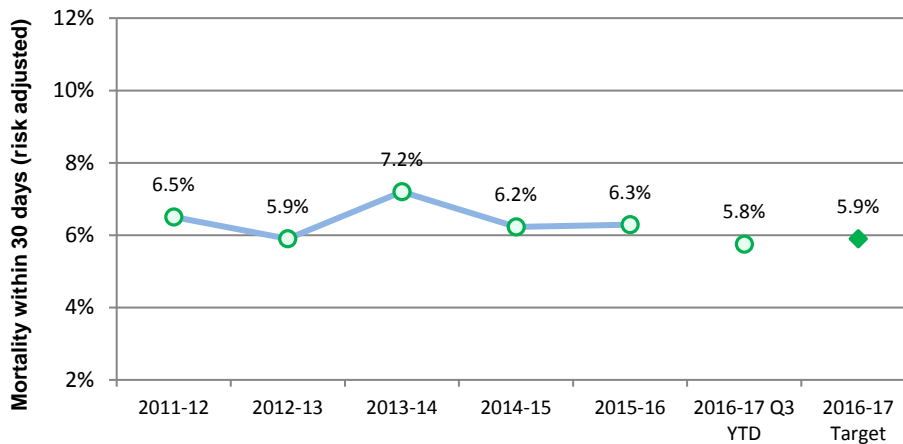
Measure Definition

The probability of dying in hospital within 30 days of being admitted for a heart attack. This measure represents hospital deaths occurring within 30 days of first admission to a hospital with a diagnosis of acute myocardial infarction (AMI), often called a heart attack. This measure is adjusted for age, sex and other conditions.

Understanding this Measure

Heart attacks are one of the leading causes of death in Canada. Breakthroughs in treatments, particularly the timing of re-opening coronary arteries for blood flow, are greatly increasing survival rates. Note: This measure is reported a quarter later due to the requirement to followup with patients after the end of the reporting quarter.

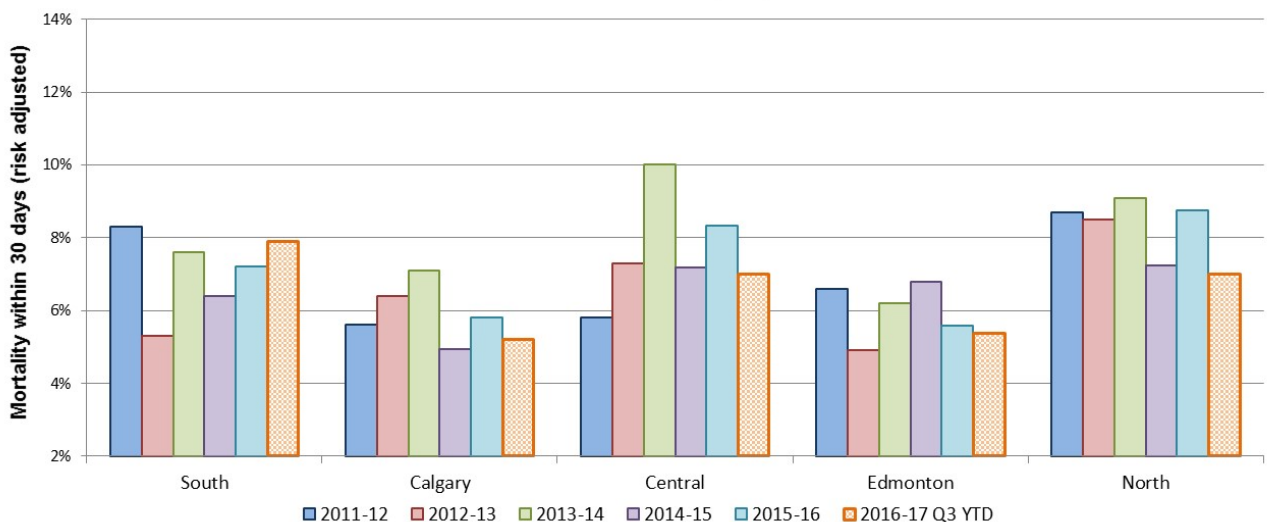
Heart Attack Mortality - Annual



How Do We Compare?

Alberta ranked 4th best nationally out of ten provinces and the same as the national rate in 2014-15.

Heart Attack Mortality - by Zone



Heart Attack Mortality

HIGHLIGHTS

Sites have specific plans to address heart attack mortality including public education and awareness about the signs of a heart attack, ensuring that standard clinical pathways and medication administration guidelines are in place at all sites, and training rural emergency department staff to the current Heart and Stroke ACLS (Advanced Cardiac Life Support) standards.

Working collaboratively with other Strategic Clinical Networks (SCNs), Cardiovascular Health and Stroke SCN is leading projects to reduce heart attack mortality:

- A comprehensive provincial initiative of vascular risk assessment, prevention, management and followup has the potential to prevent heart attacks and strokes, detect unknown cases of hypertension, diabetes and kidney disease, and save lives. Vascular Risk Reduction (VRR) consists of a series of projects with a focus on: 1) vascular risk-factor screening, case finding and early management in various community settings such as pharmacies and industry worksites; 2) integrating approaches to VRR; 3) effective and consistent knowledge translation with common messaging among internal and external stakeholders.
- STEMI (ST-segment elevation myocardial infarction) occurs by developing a complete blockage of a major coronary artery previously affected by atherosclerosis. Work is underway to launch a provincial STEMI reperfusion order set to be used at any site to help staff make efficient and appropriate treatment decisions.
- Heart failure is a chronic condition where the heart muscle does not pump blood sufficiently to meet the body's needs. The condition is associated with high rates of unplanned hospital readmission and mortality. AHS is standardizing care and reducing unnecessary variation in care across the province through the development of a heart failure clinical care pathway. In addition, collaborative work is underway with a similar chronic obstructive pulmonary disease (COPD) pathway that focuses on transitioning patients back to the community.

SUMMARY OF RESULTS

The most recent data for this measure is a quarter behind. This analysis is based on Q3 YTD 2016-17.

Provincial, Calgary, Central, Edmonton and North Zones achieved target for Q3 YTD. South Zone deteriorated from the same period as last year.

This measure shows high sensitivity to variation in number of deaths from quarter to quarter. Working on understanding root cause if present with cases.

In monitoring these measures at a site level, it is important to examine longer term trends over time. We expect there to be fluctuations in hospitals due to smaller sites having low number of discharges and therefore more susceptible to variations. AHS monitors these fluctuations to see if deterioration in performance represents a trend over time or part of expected variation. The fluctuation is within normal range.

Heart Attack Mortality

The probability of dying in hospital within 30 days of being admitted for a heart attack. This measure represents hospital deaths occurring within 30 days of first admission to a hospital with a diagnosis of acute myocardial infarction (AMI), often called a heart attack. This measure is risk adjusted for age, sex and other conditions.

Heart Attack (AMI) Mortality within 30 days	2013-14	2014-15	2015-16	Q3 YTD		Trend	2016-17 Target
				2015-16 Last Year	2016-17 Current		
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable; ✖ Performance not improving							
Provincial	7.2%	6.2%	6.3%	6.2%	5.8%	★	5.9%
South Zone	7.6%	6.4%	7.2%	6.3%	7.9%	✖	6.1%
Chinook Regional Hospital	7.0%	8.3%	7.2%	5.5%	4.2%	★	6.0%
Medicine Hat Regional Hospital	7.4%	3.4%	2.2%	1.7%	11.3%	✖	5.9%
All Other Hospitals	10.1%	6.1%	14.7%	14.4%	13.2%	✓	6.7%
Calgary Zone	7.1%	4.9%	5.8%	6.0%	5.2%	★	5.8%
Foothills Medical Centre	7.4%	5.6%	6.3%	6.1%	4.9%	★	6.6%
Peter Lougheed Centre	5.8%	3.9%	2.8%	3.3%	4.4%	✖	1.7%
Rockyview General Hospital	6.4%	3.4%	5.9%	7.7%	5.3%	✓	4.5%
South Health Campus	N/A	N/A	2.3%	1.6%	8.1%	✖	6.1%
All Other Hospitals	8.2%	3.2%	10.4%	12.0%	6.6%	★	7.0%
Central Zone	10.0%	7.2%	8.3%	7.0%	7.0%	★	7.0%
Red Deer Regional Hospital Centre	10.9%	5.5%	7.4%	4.3%	4.7%	★	6.5%
All Other Hospitals	9.6%	7.9%	8.8%	8.2%	8.3%	★	8.5%
Edmonton Zone	6.2%	6.8%	5.6%	5.7%	5.4%	★	5.7%
Grey Nuns Community Hospital	4.9%	4.6%	5.0%	4.8%	3.0%	★	4.8%
Misericordia Community Hospital	6.4%	8.6%	3.2%	2.5%	4.1%	★	6.0%
Royal Alexandra Hospital	6.7%	6.6%	6.1%	5.9%	6.0%	★	6.0%
Sturgeon Community Hospital	5.7%	5.3%	2.5%	1.9%	5.4%	✖	3.0%
University of Alberta Hospital	6.4%	7.1%	6.6%	7.7%	5.6%	★	6.0%
All Other Hospitals	4.1%	11.2%	7.2%	6.4%	13.3%	✖	10.6%
North Zone	9.1%	7.2%	8.8%	9.2%	7.0%	★	8.1%
Northern Lights Regional Health Centre	13.0%	9.2%	3.9%	4.5%	N/A	N/A	7.6%
Queen Elizabeth II Hospital	4.9%	4.7%	7.9%	9.0%	4.3%	★	5.3%
All Other Hospitals	10.2%	7.8%	9.7%	10.1%	8.2%	★	8.6%

* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.

Heart Attack Cases (Index)*	2013-14	2014-15	2015-16	Q3 YTD	
				2015-16 Last Year	2016-17 Current
Provincial	5,475	5,408	5,387	4,046	4,106
South Zone	320	315	297	218	232
Calgary Zone	1,951	1,876	1,876	1,421	1,450
Central Zone	509	544	514	378	396
Edmonton Zone	2,334	2,304	2,339	1,760	1,786
North Zone	361	369	361	269	242

Stroke Mortality

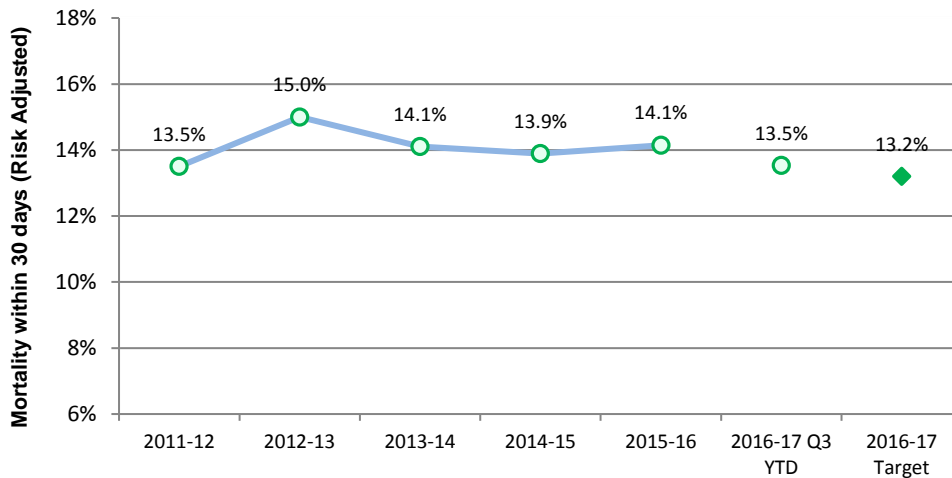
Measure Definition

The probability of dying in hospital within 30 days for patients admitted because of stroke. This measure represents hospital deaths occurring within 30 days of first admission to a hospital with a diagnosis of stroke. This measure is adjusted for age, sex and other conditions.

Understanding this Measure

Stroke is a significant cause of death and disability in the Canadian population. This rate may be influenced by a number of factors, including effectiveness of emergency treatments and quality of care in hospitals. Note: This measure is reported a quarter later due to the requirement to followup with patients after the end of the reporting quarter.

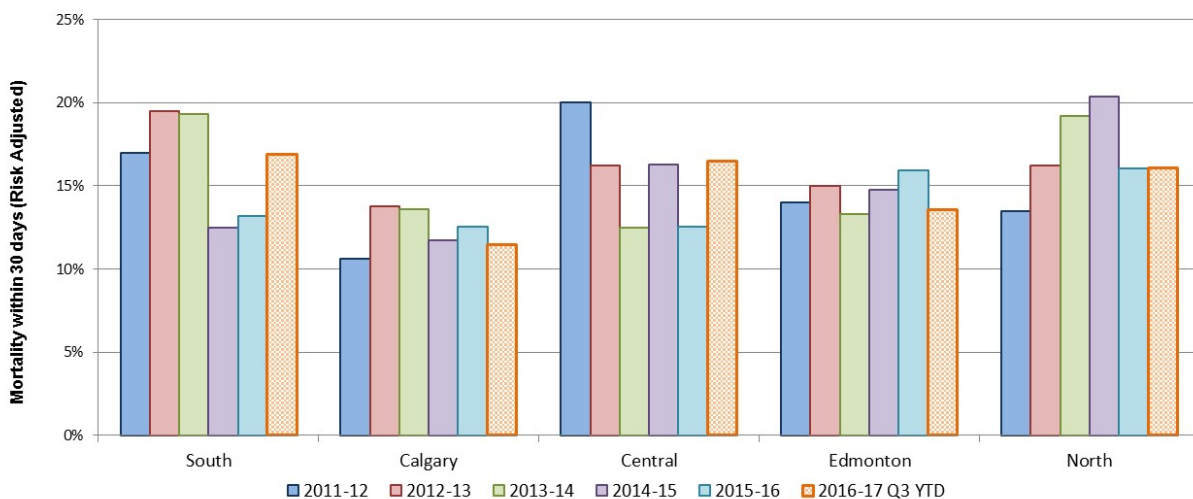
Stroke Mortality - Annual



How Do We Compare?

Alberta ranked 4th best nationally out of ten provinces, and the same as the national rate in 2014-15.

Stroke Mortality - by Zone



Stroke Mortality

HIGHLIGHTS

AHS aims to reduce median door-to-needle (DTN) time—the total time from when a patient enters the emergency room, is given a stroke diagnosis, and receives tPA—to 60 minutes or less. Administering the clot-busting drug tPA within 60 minutes of a stroke has shown to reduce mortality, reduce treatment complications, lessen disabilities and shorten inpatient hospital stays.

The Cardiovascular Health and Stroke Strategic Clinical Network has undertaken several initiatives related to improving stroke outcomes:

- Roll-out of the University of Calgary's Quality Improvement & Clinical Research (QuICR) initiative to complete work with AHS sites to reduce median DTN time to improve stroke outcomes. The faster patients are treated, the greater the probability for improved functional health outcomes. Results show that the median DTN time improved from 45 minutes with 65% treated in 60 minutes or less (October 2015) to 36 minutes with 82% treated in 60 min or less (February 2017).
- Endovascular therapy is a stroke treatment that removes the large stroke-causing clots from the brain, and substantially improves the chance for a better outcome for patients. The Endovascular Reperfusion Alberta project was implemented in the zones to improve endovascular therapy access for patients with acute ischemic stroke to reduce mortality and disability.
- The Stroke Action Plan (SAP) addresses the quality of and access to stroke care in rural and small urban stroke centres across Alberta. SAP includes initiatives such as creating standards for stroke unit equivalent care for small rural centres and facilitating early supported discharge from acute care by delivering expert stroke rehabilitation into community-based services. This project has transitioned to zone operations for implementation.
- Vascular Risk Reduction (VRR) consists of a series of projects with a focus on: 1) vascular risk-factor screening, case finding and early management in various community settings such as pharmacies and industry worksites; 2) integrating approaches to VRR; 3) effective and consistent knowledge translation with common messaging among internal and external stakeholders.

SUMMARY OF RESULTS

The most recent data for this measure is a quarter behind. This analysis is based on Q3 YTD 2016-17.

Calgary Zone achieved target for Q3 YTD. Provincial, Edmonton and North Zones showed improvement from the same period as last year. South and Central Zone results deteriorated compared to the same period as last year.

This measure shows high sensitivity to variation in number of deaths from quarter to quarter. Working on understanding root cause if present with cases.

In monitoring these measures at a site level, it is important to examine longer term trends over time. We expect there to be fluctuations in hospitals due to smaller sites having low number of discharges and therefore more susceptible to variations. AHS monitors these fluctuations to see if deterioration in performance represents a trend over time or part of expected variation. The fluctuation is within normal range.

Stroke Mortality

Stroke is a significant cause of death and disability in the Canadian population. This rate may be influenced by a number of factors, including effectiveness of emergency treatments and quality of care in hospitals. NOTE: This measure relies on patient followup after a patient's original discharge date for a period up to 90 days. Therefore reporting results reflect patients discharged in an earlier time period (i.e., Q3 YTD).

Stroke Mortality within 30 days	2013-14	2014-15	2015-16	Q3 YTD		Trend	2016-17 Target
				2015-16 Last Year	2016-17 Current		
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable; ✖ Performance not improving							
Provincial	14.1%	13.9%	14.1%	14.8%	13.5%	✓	13.2%
South Zone	19.3%	12.5%	13.2%	15.1%	16.9%	✖	13.8%
Chinook Regional Hospital	22.2%	12.4%	15.2%	17.7%	17.5%	✓	14.9%
Medicine Hat Regional Hospital	11.4%	6.7%	12.0%	12.8%	9.7%	★	10.3%
All Other Hospitals	23.6%	27.2%	8.4%	10.6%	29.5%	✖	18.3%
Calgary Zone	13.6%	11.7%	12.6%	12.8%	11.5%	★	12.9%
Foothills Medical Centre	13.0%	12.1%	12.4%	12.6%	11.7%	★	13.0%
Peter Lougheed Centre	21.9%	7.0%	14.9%	15.4%	20.1%	✖	17.6%
Rockyview General Hospital	7.3%	8.5%	11.3%	13.6%	8.3%	★	9.1%
South Health Campus	21.9%	12.0%	10.8%	8.5%	9.9%	★	12.1%
All Other Hospitals	25.4%	21.6%	20.9%	23.4%	8.4%	★	13.0%
Central Zone	12.5%	16.3%	12.5%	14.4%	16.5%	✖	14.1%
Red Deer Regional Hospital Centre	12.2%	13.8%	10.2%	11.6%	13.8%	★	13.8%
All Other Hospitals	12.9%	18.7%	17.2%	19.7%	21.7%	✖	14.4%
Edmonton Zone	13.3%	14.7%	15.9%	16.5%	13.6%	✓	13.4%
Grey Nuns Community Hospital	8.9%	9.5%	7.8%	8.3%	8.1%	★	10.0%
Misericordia Community Hospital	12.5%	13.3%	11.9%	15.1%	2.7%	★	13.0%
Royal Alexandra Hospital	16.7%	19.6%	11.8%	13.5%	14.1%	★	15.1%
Sturgeon Community Hospital	17.6%	16.0%	14.2%	14.1%	4.3%	★	18.8%
University of Alberta Hospital	13.6%	15.3%	18.8%	18.9%	16.2%	✓	13.9%
All Other Hospitals	17.3%	7.0%	22.5%	23.4%	9.4%	★	14.0%
North Zone	19.2%	20.3%	16.1%	16.4%	16.1%	✓	13.2%
Northern Lights Regional Health Centre	9.4%	0.0%	0.0%	0.0%	N/A	N/A	8.4%
Queen Elizabeth II Hospital	23.6%	23.5%	16.6%	15.7%	13.5%	★	15.0%
All Other Hospitals	18.4%	22.8%	18.2%	18.9%	16.1%	✓	13.3%

* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.

Stroke Cases (Index)*	2013-14	2014-15	2015-16	Q3 YTD	
				2015-16 Last Year	2016-17 Current
Provincial	3,316	3,568	3,725	2,733	2,793
South Zone	242	285	249	190	199
Calgary Zone	1,251	1,311	1,392	1,017	992
Central Zone	299	326	372	267	270
Edmonton Zone	1,305	1,410	1,493	1,099	1,126
North Zone	219	236	219	160	206

Satisfaction with Long-Term Care

Measure Definition

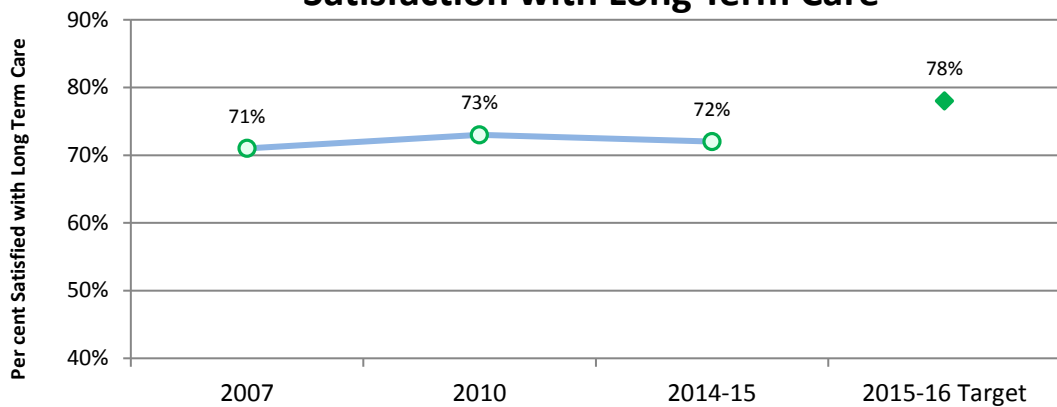
This measures the percentage of families of long-term care residents who rate their overall care as 8, 9 or 10 out of 10, where zero is the lowest level of satisfaction possible and 10 is the best. Information for this measure is collected through a survey of family members whose relative is a resident in long-term care.

Reported every three years, 2014-15 the most recent survey.

Understanding this Measure

Measuring family satisfaction with the care that is being delivered to residents is an important component of managing the quality of Alberta's long-term care services. The survey is administered by the Health Quality Council of Alberta every two – three years.

Satisfaction with Long Term Care



How Do We Compare?

Comparable national data is not available for this measure.

Satisfaction with Long Term Care	2007	2010	2014-15	2015-16 Target
Provincial	71%	73%	72%	78%
South Zone	80%	80%	80%	81%
Calgary Zone	65%	70%	70%	76%
Central Zone	78%	80%	77%	81%
Edmonton Zone	67%	70%	70%	76%
North Zone	80%	82%	76%	83%

Satisfaction with Long-Term Care

HIGHLIGHTS

In June 2015, the Canadian Institute for Health Information (CIHI) included nine new Quality Indicators (QIs) relevant to the Continuing Care Sector of AHS. Specifically, the nine QIs focus on three themes: safety, health status of residents and appropriateness and effectiveness of care. The nine indicators are:

- Safety: Falls in the Last 30 Days in Long-Term Care
- Safety: Worsened Pressure Ulcer in Long-Term Care
- Appropriateness and Effectiveness: Potentially Inappropriate Use of Antipsychotics in Long-Term Care
- Appropriateness and Effectiveness: Restraint Use in Long-Term Care
- Health Status: Improved Physical Functioning in Long-Term Care
- Health Status: Worsened Physical Functioning in Long-Term Care
- Health Status: Worsened Depressive Mood in Long-Term Care
- Health Status: Experiencing Pain in Long-Term Care
- Health Status: Experiencing Worsened Pain in Long-Term Care

Continuing Care Quality Indicator Working Group meets regularly to provide expertise and advice to support continuous improvement of continuing care measures for quality assurance and quality improvement. Sharing information about health service quality and success stories are ways that quality of care can be reviewed, monitored and improved. The Alberta Long-Term Care Quality Indicators report is available on the AHS website and complements CIHI data. It illustrates how Alberta is doing compared to national averages, shows comparisons between zones and describes actions undertaken or underway to improve care for residents in the zones. The ongoing public reporting raises awareness of good, quality care and flags areas for improvement.

Improvement strategies and action plans for sites with lower satisfaction levels were implemented. For example, staff practice compassionate communication and active listening to better tailor interventions for residents in Central Zone facilities.

SUMMARY OF RESULTS

The most recent data for this measure is from 2014-15. HQCA conducts the survey every three years.

Health Quality Council of Alberta (HQCA) conducts surveys with family members of residents in long-term care facilities across Alberta, which is an integral part of HQCA's mandate to measure, monitor, and report to Albertans about their experience and satisfaction with the quality of health services they receive. The information collected and analyzed is shared with each long term care facility, Alberta Health Services and the government to help inform future improvements.

In 2014-15, the HQCA began data collection for its third long-term care family experience survey since 2008. Family members of residents in long-term care facilities across Alberta were asked about their experience and satisfaction with the quality of health services their family members receive. HQCA published the results in the fall of 2015, distributed a summary of the results to all family members who received the survey, and provided facility-level results to 158 participating facilities. The full survey is available on the HQCA website.

In 2014-15, the HQCA continued its work developing a home care client experience survey for the province. In March 2015, in cooperation with Alberta Health and AHS, HQCA began data collection across Alberta. Focusing on clients over the age of 65 who receive long term supportive and maintenance home care services, the information gathered will be used to better understand the quality of care and services these clients received. HQCA published the survey results on its website.

Early Detection of Cancer

Measure Definition

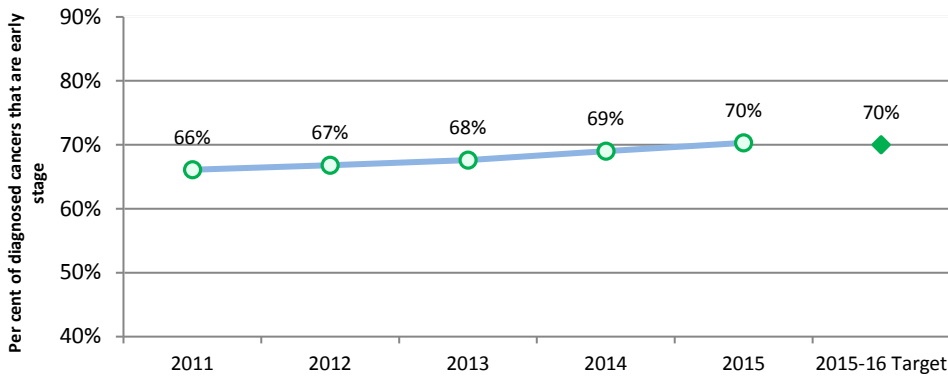
The percentage of patients with breast, cervical and colorectal cancers who were diagnosed at early stages 1 or 2. This measure covers the three most common cancers; breast, cervical and colorectal. It represents the percentage of invasive cancer cases diagnosed in the stages (Stage I, and II (and stage 0 for breast cancer)) in relation to all patients diagnosed with these diseases in all stages.

The most recent data for this measure is from 2015.

Understanding this Measure

Patients whose cancers are captured at early stages have higher survival rates than those who were diagnosed at later stages. Provincial cancer screening programs aim to diagnose cancers at the earliest stage possible in the target population. This measure is developed to reflect both screening effectiveness and efficiency of clinical diagnosis pathways. Note: 2014 most recent data available. Source: Alberta Cancer Registry.

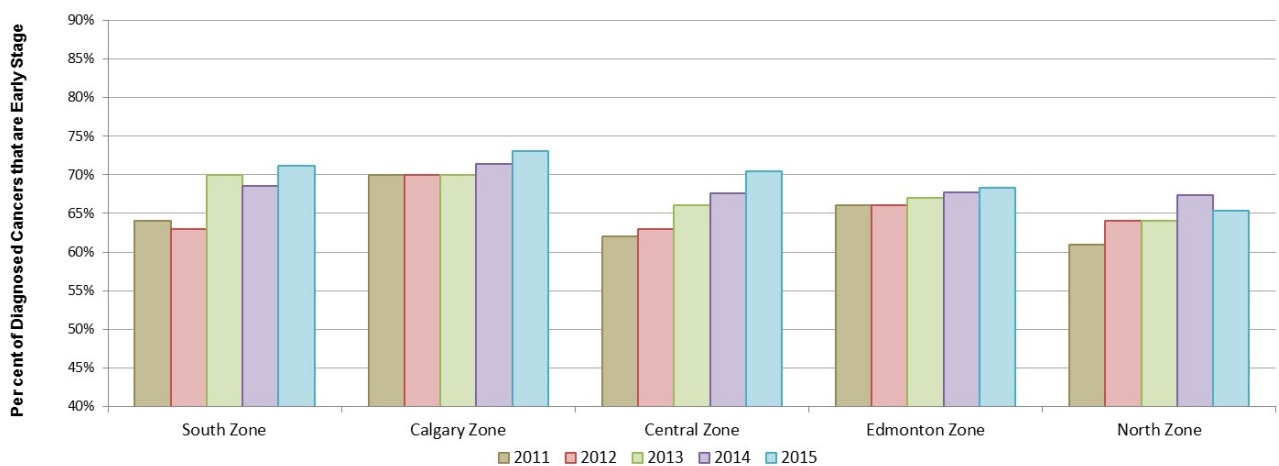
Early Detection of Cancer - Annual



How Do We Compare?

Alberta ranked 2nd best nationally for breast cancers and 8th nationally for colorectal cancers diagnosed in early stages out of nine provinces in 2010. AHS' improvement activity is focused on colorectal cancer.

Early Detection of Cancer - Zone



Early Detection of Cancer

HIGHLIGHTS

The Screening for Life program — which aims to reduce the number of Albertans who die from cancers, including breast and colorectal — provides information, education and support to Albertans, empowering them to make informed decisions and to take action to secure their own health by getting screened for cancer.

Alberta cancer screening programs (breast, cervical and colorectal cancers) continue to provide education and awareness across the province. For example, collaborative work is underway with Primary Care Networks to understand diverse populations and address access to services.

Screen Test celebrated 25 years of mobile breast cancer screening services, reaching over 117 communities, including 26 Indigenous communities (New Sarepta, Fort McMurray First Nation, Kehewin Cree Nation and Alexander First Nation added this year). Screen Test has seen a 67% increase in First Nations clients since 2013. This year, Screen Test sent approximately 800,000 letters to Albertans and their healthcare providers on cancer screening status and recommended actions; as well, 135,260 visits to www.screeningforlife.ca were recorded.

AlbertaPreventsCancer.ca connects Albertans to useful resources and strategies they can use to reduce the risk of cancer, or detect cancer earlier. It provides online tools and resources to support cancer prevention, screening and research. Total number of visitors to AlbertaPreventsCancer.ca was 114,859, a 23% increase from 2015-16. New content and enhancements made to the website to improve user experience include:

- Upgrade to the Human Papilloma Virus (HPV) vaccine decision tool, a tool for parents of children who are eligible for the HPV vaccine. A significant increase was seen from 2015-16 in the number of site visits (2,017 compared to 47,564) and tool completion rates (15.5% vs 18.1%).
- BeSensible website was optimized to better support employers of outdoor workers to incorporate sun safety into their occupational health and safety practices; site visits increased 70% from 2015-16.
- Online community cancer prevention and screening dashboard was launched. Albertans can access information on how to reduce cancer risk in their communities and compare how their community is performing in relation to others.

SUMMARY OF RESULTS

The most recent data for this measure is from 2014. The data source is the Canadian Community Health Survey (CCHS).

Alberta's cancer incidence rates have declined by about 0.6% annually between 2001 and 2014. Mortality rates have also decreased over the past 20 years, falling on average by 2.1% annually between 2004 and 2014. The data in the 2014 Report on Cancer Statistics in Alberta – released February 2017 - shows the significant impact early detection and cancer screening can have on a rate of survival and years lived. AHS continues to support a number of effective screening and prevention programs, and continues to expand these services every year.

Early Detection of Cancer

The percentage of patients with breast, cervical and colorectal cancers who were diagnosed at early stages 1 or 2. This measure covers the three most common cancers; breast, cervical and colorectal. It represents the percentage of invasive cancer cases diagnosed in the stages (Stage I, and II (and stage 0 for breast cancer)) in relation to all patients diagnosed with these diseases in all stages.

Early Detection of Cancer	2008	2009	2010	2011	2012	2013	2014	2015	Trend	2015-16 Target
Trend: ★ Target Achieved; ✓ Improving; ⇔ Stable; ✖ Performance not improving										
Provincial	64%	65%	67%	66%	67%	68%	69%	70%	★	70%
South Zone	60%	66%	68%	64%	63%	70%	69%	71%	★	70%
Calgary Zone	66%	69%	66%	70%	70%	70%	71%	73%	★	71%
Central Zone	62%	61%	63%	62%	63%	66%	68%	71%	★	69%
Edmonton Zone	65%	65%	69%	66%	66%	67%	68%	68%	⇔	70%
North Zone	65%	61%	65%	61%	64%	64%	67%	65%	⇔	69%

* "Stable" trend indicates when current period performance is ≤ 3% from the same time period as last year.