

Stroke Mortality

Measure Definition

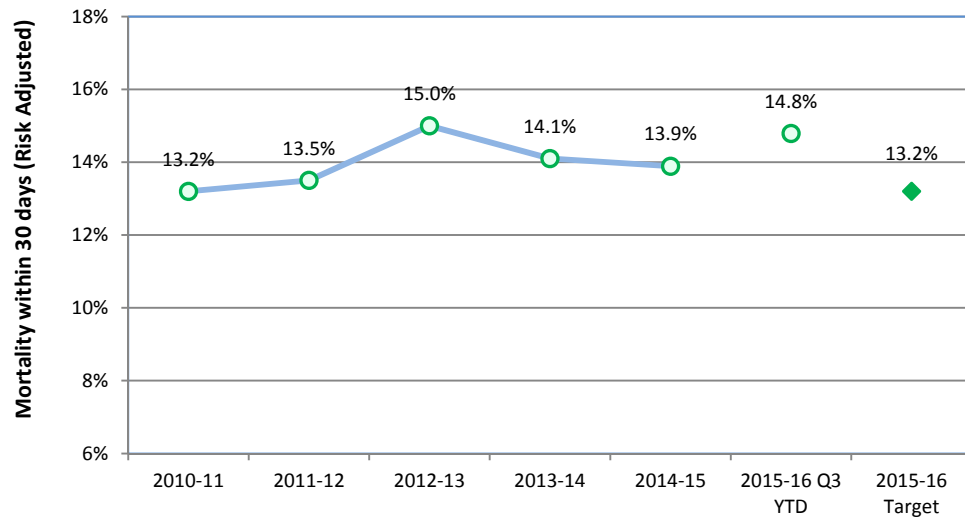
The probability of dying in hospital within 30 days for patients admitted because of stroke. This measure represents hospital deaths occurring within 30 days of first admission to a hospital with a diagnosis of stroke. This measure is adjusted for age, sex and other conditions.

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 relies on patient follow up 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).

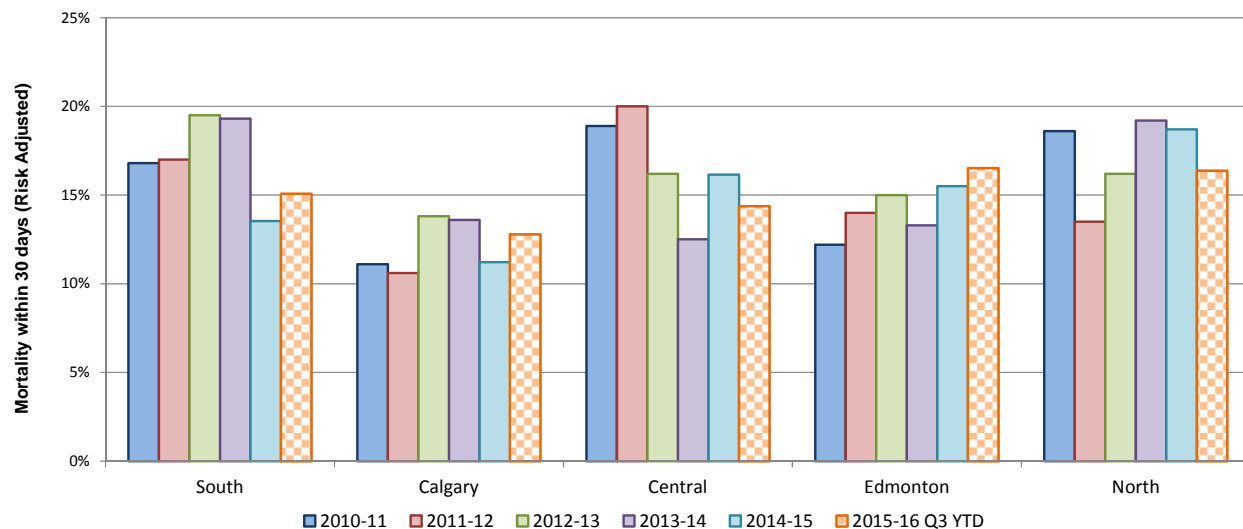
Stroke Mortality - Annual



How Do We Compare?

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

Stroke Mortality - by Zone



Stroke Mortality – Actions

Provincial/ Strategic Clinical Network (SCN)	<ul style="list-style-type: none"> The Cardiovascular Health & Stroke SCN’s Stroke Unit Equivalent Care project is based on a multidisciplinary model of care that has been proven to prevent death and disability. This project has been transferred to clinical operations. Redesign aspects of the provincial stroke system of care to improve access to endovascular therapy. The Door-to-Needle (DTN) quality improvement initiative, currently underway, aims to improve stroke outcomes through rapid clinical and imaging evaluation and treatment with anticoagulation therapy. Across Alberta, 17 hospitals are participating in QuICR. The new Stroke Ambulance treats patients from centres with thrombolysis by having a portable CT scanner in an ambulance, with qualified staff able to diagnose and treat, and able to travel to patients across Northern Alberta on short notice. Initiatives are also in place to increase the use of standardized stroke order sets to ensure best practices are implemented.
South	<ul style="list-style-type: none"> Continued implementation, monitoring, and evaluation of Rural Stroke Action plan: ESD, SUEC and community support of stroke patients. Continue work with SCN to implement best practices in stroke care.
Calgary	<ul style="list-style-type: none"> Continued improvement in DTN times for tPA for acute stroke; and a reduction in median DTN times. Incorporate quality review of Alberta stroke strategy guidelines in the action plan including SUEC at primary stroke centres. Significant increase in access to endovascular therapy for patients at Foothills Medical Centre.
Central	<ul style="list-style-type: none"> DTN times for tPA administration in suitable stroke candidates continues to show marked improvement through the QuICR study with several times under 30 minutes. Standardized education and process review of Hyperacute Stroke Algorithms was delivered via tele-education to other Primary Stroke Centers and urban facilities. Interdisciplinary stroke rounds continue to support improved communication of patient status at Red Deer Regional Hospital Centre (RDRHC). Stroke Early Supportive Discharge Program continues at RDRHC. Stroke Rehab services continue at RDRHC and Two Hills, as well as Primary Stroke Centers’ services in Wainwright, Lloydminster and Camrose.
Edmonton	<ul style="list-style-type: none"> Completed TIA (Transient Ischemic Attack) urgent imaging order sets and process maps for evaluation. Stroke Clinic Triage process changed to allow registered nurses to triage rather than waiting for the fellow or physician. This allows for patients to be triaged and booked into clinic on the same day. Stroke database established at all stroke sites.
North	<ul style="list-style-type: none"> Continue to reinforce use of stroke order sets at all sites. All primary stroke sites are continuing to make improvements through QuICR. There were 50 tPA administrations in 2015 – up from 33 in 2014.

IN SUMMARY

Two zones have shown an improvement in Q3 year to date compared to the same time as last year.

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.

DID YOU KNOW

*The **Stroke Action Plan** addresses the quality of and access to stroke care in rural and small urban stroke centres across Alberta.*

***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.*

Quality Improvement & Clinical Research (QuICR), Alberta Stroke Program, aims to improve stroke outcomes through rapid diagnosis and treatment. The faster patients are treated, the greater the probability for improved functional health outcomes.

Stroke Mortality – Zone Details

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 risk adjusted for age, sex and other conditions.

Stroke Mortality within 30 days	2012-13	2013-14	2014-15	Q3 YTD		Trend *	2015-16 Target
				2014-15 Last Year	2015-16 Current		
Provincial	15.0%	14.1%	13.9%	14.0%	14.8%	↓	13.2%
South Zone	19.5%	19.3%	12.5%	13.5%	15.1%	↓	14.8%
Calgary Zone	13.8%	13.6%	11.7%	11.2%	12.8%	↓	12.3%
Central Zone	16.2%	12.5%	16.3%	16.2%	14.4%	↑	14.3%
Edmonton Zone	15.0%	13.3%	14.7%	15.5%	16.5%	↓	13.3%
North Zone	16.2%	19.2%	20.3%	18.7%	16.4%	↑	14.5%

*Trend: ↑ Improvement → Stability ↓ Area requires additional focus

Stroke Cases (Index)*	2012-13	2013-14	2014-15	Q3 YTD	
				2014-15 Last Year	2015-16 Current
Provincial	3,329	3,316	3,568	2,706	2,732
South Zone	198	242	285	219	190
Calgary Zone	1,313	1,251	1,311	995	1,017
Central Zone	314	299	326	238	267
Edmonton Zone	1,265	1,305	1,410	1,082	1,098
North Zone	239	219	236	172	160

*Total number of hospital stays where a first stroke was diagnosed.