

Ambulatory Care Sensitive Conditions

Name	Ambulatory Care Sensitive Conditions
Short/Other Names	Not applicable
Description	Age-standardized acute care hospitalization rate for conditions where appropriate ambulatory care prevents or reduces the need for admission to hospital, per 100,000 population younger than age 75. For further details, please see the General Methodology Notes (PDF) .
Interpretation	Low rates are desirable.
HSP Framework Dimension	Health System Outputs: Appropriate and effective
Areas of Need	Living With Illness, Disability or Reduced Function
Geographic Coverage	All provinces/territories
Reporting Level /Disaggregation	National, Province/Territory, Region, Neighbourhood Income Quintile
Indicator Results	Accessing Indicator Results on Your Health System: In Depth

Identifying Information

Name Ambulatory Care Sensitive Conditions
Short/Other Names Not applicable

Indicator Description and Calculation

Description: Age-standardized acute care hospitalization rate for conditions where appropriate ambulatory care prevents or reduces the need for admission to hospital, per 100,000 population younger than age 75.

For further details, please see the [General Methodology Notes \(PDF\)](#).

Calculation:

$$\frac{\text{Total number of acute care hospitalizations for ambulatory care sensitive conditions in patients younger than age 75}}{\text{total mid-year population younger than age 75}} \times 100,000 \text{ (age-adjusted)}$$

Calculation:

Calculation:

Geographic:

Place of residence

Assignment:

Calculation:

Calculation:

Rate - per 100,000

Measurement:

Calculation:

Calculation:

Age-adjusted

Applied:

Calculation:

Calculation:

Method: Direct Standardization
Standard Population:

of Canada 2011

Adjusted:

Denominator:

Description:

Total mid-year population younger than age 75

Description:

Total number of acute care hospitalizations for ambulatory care sensitive conditions in patients younger than age 75

Inclusions:

1. Hospitalization for an ambulatory care sensitive condition is identified as any most responsible diagnosis code of
 - a. Grand mal status and other epileptic convulsions
ICD-9/9-CM: 345
ICD-10-CA: G40, G41
 - b. Chronic obstructive pulmonary disease (COPD)
 - i. Any most responsible diagnosis (MRDx) code of
ICD-9/9-CM: 491, 492, 494, 496
ICD-10-CA: J41, J42, J43, J44, J47
 - ii. MRDx of acute lower respiratory infection, only when a secondary diagnosis* of J44 in
ICD-10-CA or 496 in ICD-9/9-CM is also present
ICD-9/9-CM: 466, 480–486, 487.0
ICD-10-CA: J10.0, J11.0, J12–J16, J18, J20, J21, J22
*Secondary diagnosis refers to a diagnosis other than the most responsible one.
 - c. Asthma
ICD-9/9-CM: 493
ICD-10-CA: J45
 - d. Diabetes
ICD-9: 250.0, 250.1, 250.2, 250.7
ICD-9-CM: 250.0, 250.1, 250.2, 250.8
ICD-10-CA: E10.0, E10.1, E10.63, E10.64, E10.9
E11.0, E11.1, E11.63, E11.64, E11.9
E13.0, E13.1, E13.63, E13.64, E13.9
E14.0, E14.1, E14.63, E14.64, E14.9
 - e. Heart failure and pulmonary edema†
ICD-9/9-CM: 428, 518.4
ICD-10-CA: I50, J81
 - f. Hypertension†
ICD-9/9-CM: 401.0, 401.9, 402.0, 402.1, 402.9
ICD-10-CA: I10.0, I10.1, I11
 - g. Angina†
ICD-9: 411, 413
ICD-9-CM: 411.1, 411.8, 413
ICD-10-CA: I20, I23.82, I24.0, I24.8, I24.9
 - h. Excluding cases with cardiac procedures.
List of cardiac procedure codes for exclusion:
CCP: 47^, 480^–483^, 489.1, 489.9, 492^–495^, 497^, 498^
ICD-9-CM: 336, 35^, 36^, 373^, 375^, 377^, 378^, 379.4–379.8
CCI: 1.HA.58.^, 1.HA.80.^, 1.HA.87.^, 1.HB.53.^, 1.HB.54.^, 1.HB.55.^, 1.HB.87.^, 1.HD.53.^, 1.HD.54.^, 1.HD.55.^, 1.HH.59.^, 1.HH.71.^, 1.HJ.76.^, 1.HJ.82.^, 1.HM.57.^, 1.HM.78.^, 1.HM.80.^, 1.HN.71.^, 1.HN.80.^, 1.HN.87.^, 1.HP.76.^, 1.HP.78.^, 1.HP.80.^, 1.HP.82.^, 1.HP.83.^, 1.HP.87.^, 1.HR.71.^, 1.HR.80.^, 1.HR.84.^, 1.HR.87.^, 1.HS.80.^, 1.HS.90.^, 1.HT.80.^, 1.HT.89.^, 1.HT.90.^, 1.HU.80.^, 1.HU.90.^, 1.HV.80.^, 1.HV.90.^, 1.HW.78.^, 1.HW.79.^, 1.HX.71.^, 1.HX.78.^, 1.HX.79.^, 1.HX.80.^, 1.HX.83.^, 1.HX.86.^, 1.HX.87.^, 1.HY.85.^, 1.HZ.53 rubric (except 1.HZ.53.LA-KP), 1.HZ.54.^, 1.HZ.55 rubric (except 1.HZ.55.LA-KP), 1.HZ.56.^, 1.HZ.57.^, 1.HZ.59.^, 1.HZ.80.^, 1.HZ.85.^, 1.HZ.87.^, 1.IF.83.^, 1.IJ.50.^, 1.IJ.54.GQ-AZ, 1.IJ.55.^, 1.IJ.57.^, 1.IJ.76.^, 1.IJ.80.^, 1.IJ.86.^, 1.IK.50.^, 1.IK.57.^, 1.IK.80.^, 1.IK.87.^, 1.IN.84.^, 1.LA.84.^, 1.LC.84.^, 1.LD.84.^, 1.YY.54.LA-NJ, 1.YY.54.LA-FS, 1.YY.54.LA-NM, 1.YY.54.LA-FR, 1.YY.54.LA-FU
Note: Code may be coded in any position. Procedures coded as abandoned after onset (Intervention Status Attribute = A) are excluded.
2. Admission to an acute care institution (Facility Type Code = 1)
3. Age at admission younger than 75
4. Sex recorded as male or female

Num
erat
or

Exclusions:

1. Records with discharge as death (Discharge Disposition Code = 07, 72*, 73*, 74*)
2. Newborn, stillbirth or cadaveric donor records (Admission Category Code = N, R or S)

Note

*2018–2019 data onward.

Background, Interpretation and Benchmarks

Hospitalization for an ambulatory care sensitive condition is considered to be a measure of access to appropriate primary health care. While not all admissions for these conditions are avoidable, it is assumed that appropriate ambulatory care could prevent the onset of this type of illness or condition, control an acute episodic illness or condition, or manage a chronic disease or condition. A disproportionately high rate is presumed to reflect problems in obtaining access to appropriate primary care.

Interpretation

Low rates are desirable.

HSP

Frame

Health System Outputs: Appropriate and effective

Dimensions

ion

Areas

Living With Illness, Disability or Reduced Function

of Need

Targets /Bench marks	The appropriate level of hospitalization for these conditions is not known, and large regional variations in the rate of hospitalization for these conditions exist. Anderson GM. Common Conditions Considered Sensitive to Ambulatory Care. In Patterns of Health Care in Ontario, 2nd Ed. Eds. V. Goel et al. Ottawa, ON: CMA; 1996: 104-110.
References	Billings J, Anderson GM, Newman LS. Recent Findings on Preventable Hospitalizations. <i>Health Aff (Millwood)</i> 1996(15): 239-249. Billings J, Zeitel L, Lukomnik J, et al. Impact of Socio-Economic Status on Hospital Use in New York City. <i>Health Aff (Millwood)</i> 1993(12): 162-173. Manitoba Centre for Health Policy and Evaluation. Concept: Ambulatory Care Sensitive (ACS) Conditions. http://mchp-appserv.cpe.umanitoba.ca/viewConcept.php?conceptID=1023 . Published September 26, 2007. Accessed December 14, 2010.
Availability of Data Sources and Results	
Data Sources	DAD, HMDB
	Type of Year: Fiscal
Available Data Years	First Available Year: 2010 Last Available Year: 2019
Geographic Coverage	All provinces/territories
Reporting Level/Disaggregation	National, Province/Territory, Region, Neighbourhood Income Quintile
Result Updates	
Update Frequency	Every year
	Web Tool: Your Health System: In Depth
Indicator Results	URL: Accessing Indicator Results on Your Health System: In Depth
Updates	Not applicable
Quality Statement	
Caveats and Limitations	Not applicable
Trending Issues	Not applicable Indicator results are also available in
Comments	<ul style="list-style-type: none"> The Health Indicators e-publication (http://yourhealthsystem.cihi.ca/epub/?language=en), updated annually starting from data year 2001-2002