

Inpatient Quality Indicators

Technical Report

Hospital Performance Dashboard

A Supplement to the

Hospital Performance Report

2019 Data

Health Care Quality Assessment

**Office of Population Health
New Jersey Department of Health**

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Executive Summary

The Office of Health Care Quality Assessment (HCQA) of the New Jersey Department of Health assesses health care quality using qualitative and quantitative data reported by hospitals to support performance monitoring related to patient care and safety. Specifically, HCQA produces consumer reports on cardiac surgery, hospital performance, and hospital quality indicators; reviews confidential reports and root-cause analyses of reportable medical errors; and maintains several databases to support licensure requirements. In order to enhance information that the Department provides to the public regarding quality of hospital care, HCQA staff apply statistical tools developed by the Federal Agency for Healthcare Research and Quality (AHRQ) to the New Jersey hospital discharge data commonly known as Uniform Billing (UB) data. This report presents findings resulting from the application of a statistical tool known as the Inpatient Quality Indicator (IQI) module to the 2019 New Jersey hospital discharge data.

Inpatient Quality Indicators (IQIs) are a set of measures developed at the national level by the [Agency for Health Care Research and Quality \(AHRQ\)](#) to provide a perspective on the quality of patient care given by hospitals. Quality of care is measured using: 1) in-hospital mortality for certain procedures and medical conditions; 2) utilization of procedures for which there are questions of overuse, underuse, or misuse; and 3) volume of procedures for which there is some evidence that a higher volume of procedures is associated with lower mortality. AHRQ spent years of research and analysis to define these indicators as measures of healthcare quality.

Since 2009, the Department has been reporting on **heart attack, heart failure, pneumonia and stroke** mortality levels as part of the ‘**Outcome of Care Measures**’. These indicators were recommended by the “The Governor’s Commission on Rationalizing Health Care Resources” to create the ‘Hospital Performance Dashboard’ as a supplement to the Hospital Performance Report.

The data in this report present mortality during hospitalization in each of the 72 licensed hospitals currently operating in the state. For each of the four selected IQIs, risk-adjusted rates are provided along with confidence intervals to help make a statistical assessment of patient care in the hospital. Statewide and national estimates are also provided to help compare hospital performance to the state or to the national rates.

Comparison of a hospital’s rate to the statewide rate (presented in the top row of each of the IQIs tables) is one way to assess how well that hospital performed among its peers in the state. A hospital’s peers could be defined at many levels (e.g., teaching hospitals, urban hospitals, suburban hospitals, etc.). It is suggested that a hospital’s performance be assessed by looking at its performance across the four IQIs estimates presented in the tables.

The 2019 New Jersey data shows that there are substantial variations in risk-adjusted rates of outcome by hospital. Some hospitals exhibit significantly higher risk-adjusted rates than the corresponding statewide rates while others have significantly lower rates than the statewide rates.

Some Highlights

- Statewide, in 2019, there were a total of 890 in-hospital deaths due to ACUTE MYOCARDIAL INFARCTION – AMI for a risk-adjusted mortality rate of 5.2 per 100 discharges (for patients ages 18 years and older) with a principal ICD-10-CM diagnosis code for AMI. Table 1 shows the distribution of these heart attack (AMI) deaths by hospital.
- Statewide, there were 441 in-hospital deaths from PNEUMONIA in 2019, for a risk-adjusted rate of 2.6 per 100 discharges (for patients ages 18 years and older) with a principal ICD-10-CM diagnosis code for pneumonia. Hospital-specific rates for this indicator ranged from a low of 0.0 to a high of 7.6 per 100 discharges with pneumonia.
- Overall, there were 1,001 deaths from HEART FAILURE during hospitalization in 2018, for a risk-adjusted mortality rate of 2.8 per 100 discharges (for patients ages 18 years and older), with a principal ICD-10-CM diagnosis code for heart failure. Table 2 shows the distribution of these Heart Failure deaths by hospital.
- Statewide, there were 1,228 ACUTE STROKE in-hospital deaths in 2019, for a risk-adjusted rate of 6.6 per 100 discharges (for patients ages 18 years and older) and with a principal ICD-10-CM diagnosis code for subarachnoid hemorrhage or intracerebral hemorrhage or ischemic stroke. Hospital-specific rates for this indicator ranged from a low of 0.0 to a high of 17.0 per 100 patients with stroke diagnosis. Table 4 shows the distribution of these total acute stroke deaths by hospital, while Tables 4.A, 4.B and 4.C present the breakdown of these deaths by SUBARACHNOID HEMORRHAGE STROKE, INTRACEREBRAL HEMORRHAGIC STROKE, and ISCHEMIC HEMORRHAGIC STROKE, by hospital.
- Compared to the national estimates, New Jersey appeared to have rates that are almost similar to the national averages for all the 4 indicators that are selected for the Hospital Performance Dashboard.

References:

Updated Technical Specifications for each of the 4 IQIs presented in this report can be accessed on the AHRQ site below:

https://www.qualityindicators.ahrq.gov/Modules/IQI_TechSpec_ICD10_v2020.aspx

Basic Information about the IQIs Rates Calculations

The AHRQ Inpatient Quality Indicators (IQI) module software produces *observed rates*, *expected rates*, and *risk-adjusted rates* for mortality and utilization indicators. Explanation of these rates follows:

Observed Rates - An observed mortality rate is defined as the number of patient deaths for a specific condition or surgical procedure divided by the total number of patients admitted for the condition or surgical procedure being treated. Similarly, an observed utilization rate is defined as the number of patient cases for a specific procedure divided by the total number of patients admitted for the condition being treated. Consumers can consider observed rates as crude measures of performance. By comparing observed rates to risk-adjusted rates, consumers can see the impact of patient case-mix on that hospital's performance.

Expected Rates - Unlike observed rates, expected rates are derived from applying the average case-mix of a reference population file that reflects a large proportion of the U.S. hospitalized or residential population. The expected mortality rate for a hospital is the hospital's observed rate divided by the hospital's risk-adjusted rate, multiplied by the state average risk-adjusted rate. This adjustment is done to reflect an expectation of hospital performance if that hospital had performed at the level of the state average. While comparing a hospital's risk-adjusted rate to its expected mortality rate provides a measure of the hospital's performance, this comparison will not show if a hospital's mortality rate is statistically significantly different from the state's average mortality rate.

Risk-adjusted rates - In order for provider performance profiles to present an accurate indicator of quality of care, the data must be adjusted to account for differences in patients' severity of illness and risk of mortality. "All Patient Refined Diagnosis Related Groups" ("APR-DRGs") is a proprietary tool of the 3M Health Information Systems Corporation designed to use UB data to adjust for these patient differences. The AHRQ quality indicators methodology requires use of APR-DRGs in the analysis of UB data. APR-DRG variables take advantage of available UB data on patient co-morbidities and non-operating room procedures and allow the interaction of the patient's secondary diagnoses, principal diagnoses, and age to influence the assignment of that patient to one of four classes of severity and risk of mortality classes: low, moderate, high and very high. This risk adjustment enables comparisons among hospitals, counties, and/or states with different mixes of patients.

AHRQ's risk-adjusted rates are derived from applying to the observed rates, the average case-mix of a baseline data file derived from the HCUP State Inpatient Data (SID) from all participating States (i.e. 48 States as of 2017). The risk-adjusted rate is the best estimate of what the hospital's rates would have been if the hospital had a mix of patients identical to a national-average patient mix for the year in question. The risk-adjusted rates reflect the age and sex distribution as well as the APR-DRG distribution of the data in the baseline file. This risk adjustment procedure enables comparisons among hospitals,

counties, and/or states with different mixes of patients. Now that hospitals report present on admission (POA) indicators, the 3M APR DRG Software calculates an “admission APR DRG” for each patient to enable quality improvement professionals use the POA and admission APR-DRG data to organize efforts to reduce hospital-acquired conditions and other complications. POA also makes it possible to measure risk of mortality at admission, helping hospitals adopt more meaningful mortality reduction strategies.

Comparing Observed Rates with Risk-adjusted Rates - The purpose of the analysis determines which rates the user should look at in evaluating the performance of a provider. If the user’s primary interest is to focus on a particular provider without any comparisons to other providers, then he/she can simply examine the overall observed rate for the entire provider, as well as further breakdowns by age, sex, payer, and race/ethnicity. If the purpose of the analysis is to compare the performance of a particular provider with national, state, or regional averages or performances of other selected providers, then both the observed and risk-adjusted rates should be examined. Variation in observed rates across providers is attributable to a variety of factors including differences in patient case-mix or population demographics, disparity in access to and quality of care, and other provider characteristics. Comparing observed and risk-adjusted rates can reveal if there is any difference between the provider’s patient population and the patient population of other providers.

Users can use this information to assess the quality of care inside a hospital, which is useful when making decisions about where to go for treatment. This information, however, is not intended to be used alone when making these decisions. Consider the results of all the different data sources that measure quality of care within a hospital. Since IQIs use hospital inpatient discharge data, hospitals can use the IQIs to identify areas within the hospital that need improvement.

The footnote labels, “better than statewide average” and “worse than statewide average”, shown at the bottom of each table describe the interpretation of the IQI mortality rates in a meaningful way. These labels help identify hospitals that have better than average, average, or worse than average performances compared to the statewide performance, which is shown on the top row of the table and labeled “Statewide Rate.”

When a hospital’s rate is marked by a single asterisk, it means the hospital’s performance is better than the statewide average, meaning fewer deaths than the statewide average deaths for a given condition. Likewise, when a hospital’s rate is marked by double asterisks, it means the hospital’s performance is worse than the statewide average, meaning more deaths than the statewide average. When a hospital’s rate is not marked by an asterisk, it means the hospital’s performance is the same as or similar to the statewide rate.

Hospital rates are determined after adjusting for the risk factors of their patients. A hospital’s rate is ‘worse than average’ if its 95% confidence interval falls completely above the statewide rate. By comparison, a hospital’s rate is ‘better than average’ if its 95% confidence interval falls completely below the statewide rate.

Some rates that appear very large are not marked as ‘worse than average’ while others that appear very small are not marked as ‘better than average’. The reason for such cases may be, that rates calculated from small numbers of events tend to have wider confidence intervals that make the statewide rate fall within the interval, giving the appearance of good performance by that hospital compared to a hospital whose rate is based on a higher volume.

If observed rate > risk-adjusted rate then: the provider’s patient population for the condition or procedure has a *higher* risk of mortality due to its case-mix (for example, older patients or a greater proportion of a higher-risk APR-DRG).

If observed rate < Risk-adjusted rate then: the provider’s patient population for the condition or procedure has a *lower* risk of mortality due to its case-mix (for example, younger or a greater proportion of a lower-risk APR-DRG).

If observed rate = risk-adjusted rate then: the provider’s patient case-mix for the condition or procedure is similar to other providers’, suggesting that patient composition is not a contributing factor to the provider’s performance for the mortality indicator.

The tables in this report present results of analysis made on the IQIs recommended for “Hospital Performance Dashboard” based on the 2018 UB data. The tables show the number of in-hospital deaths (numerator), the number of discharges (denominator), the observed, the expected, and the risk-adjusted mortality rates for each of the four indicators selected for the dashboard. Risk-adjusted rates are given along with their respective 95% confidence intervals.

Basic Descriptions of the IQIs - Heart Attack, Pneumonia, Heart Failure, and Stroke

This section presents brief descriptions of each of the 4 IQIs and why it is important to report them publicly. As stated earlier, these indicators of healthcare quality are recommended to be reported as part of the “Outcome of Care” measures alongside other indicators presented in the Hospital Performance Report. Evidence has shown that with good care, deaths from these conditions can be minimized considerably.

Acute Myocardial Infarction (AMI)

AMI is a heart attack and can occur if the arteries supplying blood to the heart are blocked, and the blood supply is slowed or stopped. When arteries are blocked, the heart can’t get the oxygen and nutrients it needs to function properly. **Symptoms** of AMI can include chest pain (crushing, squeezing or burning pain in the center of the chest which may radiate to the arm or jaw), shortness of breath, dizziness, faintness, chills, sweating or

nausea. Skin may feel cold or clammy, and patients may appear gray and look ill. Sometimes there are no symptoms.

This indicator measures the chance or likelihood that a heart attack patient admitted in a given hospital will die from that condition during hospitalization. According to the American Heart Association, if a heart attack victim gets to an emergency room fast enough, prompt care dramatically reduces heart damage. Timely and effective treatments for acute myocardial infarction (AMI), which are essential for patient survival, include appropriate use of revascularization or thrombolytic therapy. The indicator is defined as the number of deaths per 100 patients with a principal diagnosis code (ICD-10-CM) of AMI (age 18 years and older). For inclusion and exclusion criteria in calculating this rate, visit: http://www.qualityindicators.ahrq.gov/Modules/IQI_TechSpec.aspx

This information is important because it tells you how well hospitals take care of their heart attack patients. This measure takes into consideration several factors such as how quickly hospital staff treats a heart attack patient once they are in the emergency room.

Pneumonia

Pneumonia is an inflammation of the lungs caused by an infection. Many different organisms can cause pneumonia, including bacteria, viruses and fungi. Pneumonia can range from very mild to very severe, even fatal, depending on the type of organism causing it as well as the age and current health of the individual. **Symptoms** for pneumonia can include fever, fatigue, difficulty breathing, chills, “wet” cough and chest pain. Pneumonia typically is treated with antibiotics, sometimes in an outpatient setting. However, death may occur even when the patient is in the hospital, especially in patients with weakened respiratory systems or other chronic health problems. There is a significant impact on outcomes from patient co-morbid factors as well as physician admitting practices (since there is variation in the criteria physicians use to admit patients for inpatient treatment).

This indicator measures the chance or likelihood that a pneumonia patient admitted in a given hospital will die from that condition during hospitalization. In-hospital pneumonia mortality rate is defined as deaths per 100 discharges with principal (ICD-10-CM) diagnosis code of pneumonia (age 18 years and older). For inclusion and exclusion criteria in calculating this rate,

visit: http://www.qualityindicators.ahrq.gov/Modules/IQI_TechSpec.aspx

This information is important because it tells you how well hospitals take care of their pneumonia patients.

Heart Failure (HF)

HF is a weakening of the heart's muscle which reduces its pumping power. Your body doesn't get the oxygen and nutrients it needs when the heart muscles are weak to pump blood in a normal flow. Your heart tries to pump more blood, but over time the heart muscle walls weaken thereby causing heart failure. **Symptoms** for HF can include shortness of breath from fluid in the lungs, dizziness, fatigue, weakness, cold and clammy skin, or rapid and irregular heartbeat. HF can result from coronary artery disease, heart attack, cardiomyopathy (heart muscle damage from infection, alcohol or drugs), or an overworked heart bit caused by high blood pressure, kidney disease, diabetes, or a defect from birth. HF is one of the most common and severe heart diseases affecting Americans, and one of the most common reasons for hospitalization. Congestion is the presence of an abnormal amount of fluid in the tissues, usually because of limitations in the body's ability to return the flow of blood from the arms or legs to the heart and lungs. Though HF has many possible underlying causes, the end result is an inability of the heart muscle to function well enough to meet the demands of the rest of the body.

This indicator measures the chance or likelihood that a HF patient admitted in a given hospital will die from that condition during hospitalization. The mortality rate for this measure is defined as the number of deaths per 100 patients with principal (ICD-10-CM) diagnosis code of CHF (age 18 years and older). For inclusion and exclusion criteria in calculating this rate,

visit: http://www.qualityindicators.ahrq.gov/Modules/IQI_TechSpec.aspx

This information is important because it tells you how well hospitals take care of their heart failure (HF) patients. Since HF mortality is affected by other medical problems, including lung disease, high blood pressure, cancer and liver disease, the score measures how well the hospital can control these influences.

Acute Stroke

Acute Stroke is a disruption in the blood supply to the brain. A stroke occurs when a blood vessel (artery) bringing oxygen and nutrients to the brain bursts or is blocked by a blood clot or some other particle. Within minutes, the nerve cells in that area of the brain are damaged and may die within a few hours. As a result, the part of the body controlled by the damaged section of the brain cannot function properly. There are different types of strokes (ischemic, subarachnoid, and hemorrhagic). Treatment for stroke must be timely and efficient to prevent brain tissue death and differs significantly based on which of the three types of stroke a patient has suffered. For example, clot-busting drugs are appropriate for strokes caused by clots but could be fatal in the case of a burst blood vessel. **Symptoms** for acute stroke can include sudden numbness or weakness of the face, arm or leg, particularly on one side of the body; sudden confusion, trouble speaking

or understanding, sudden trouble seeing in one or both eyes, sudden trouble walking, dizziness, loss of balance or coordination.

This indicator measures the chance or likelihood that an acute stroke patient admitted in a given hospital will die from that condition during hospitalization. Hospital specific stroke mortality rates will vary based on the cause of the stroke, the severity of the stroke, other patient illnesses, speed of arrival at the hospital, and speed of diagnosis of the type of stroke. Moreover, clinical factors, including use of mechanical ventilation on the first day, may vary by hospital and influence mortality. The mortality rate for Acute Stroke is defined as the number of deaths per 100 patients with principal (ICD-9-CM) diagnosis code of stroke (age 18 years and older). For inclusion and exclusion criteria in calculating this rate, visit: http://www.qualityindicators.ahrq.gov/Modules/IQI_TechSpec.aspx

This information is important because it tells you how well hospitals take care of their stroke patients. Treatment for stroke must be quick and efficient to prevent brain tissue death.

Stratification of Indicator

The indicator is stratified into three groups by the type of stroke. Cases are assigned to strata according to a hierarchy based on risk of mortality, with cases being assigned to the stratum with the highest mortality for which the case qualifies. In the case of Stroke Mortality, the hierarchy is as follows (Strata hierarchy (listed from highest mortality to lowest mortality):

- 1) Intracerebral hemorrhage
- 2) Subarachnoid hemorrhage
- 3) Ischemic stroke

Strata are mutually exclusive. Patients cannot qualify for more than one stratum. If a discharge qualifies for more than one stratum, it will be assigned to the stratum with the highest risk of mortality (Intracerebral Hemorrhage, Subarachnoid Hemorrhage, Ischemic Stroke).

Tables 4.1, 4.2, and 4.3 show the total stroke deaths in 2019 by the three strata stated above.

Table 1: IN-HOSPITAL MORTALITY RATES FOR ACUTE MYOCARDIAL INFARCTION - AMI (Deaths per 100 conditions)
(Indicator Recommended for Hospital Performance Dashboard)

Hospital	# of Deaths	# of Patients	Observed Rate	Expected Rate	Risk-Adjusted Rate	95% Confidence Interval
						LL - UL
National	28,904	576,626	5.0	NA	NA	NA - NA
Statewide	890	15,084	5.9	5.7	5.2	4.9 - 5.5
Atlantic City Medical Center-City Campus	2	50	4.0	6.4	3.1	0.0 - 8.0
Atlantic City Medical Center-Mainland Campus	34	686	5.0	5.8	4.3	2.9 - 5.7
Bayshore Medical Center	12	126	9.5	6.1	7.9	4.7 - 11.0
Bergen New Bridge Medical Center	0	6	0.0	7.3	0.0 ^	0.0 - 12.8
Cape Regional Medical Center, Inc	1	27	3.7	9.0	2.1 ^	0.0 - 7.6
Capital Health Medical Center - Hopewell	11	82	13.4	9.8	6.8	3.8 - 9.8
Capital Health Regional Medical Center - Fuld	1	24	4.2	5.4	3.8 ^	0.0 - 11.8
Carepoint Health - Bayonne Medical Center	8	158	5.1	5.3	4.8	1.8 - 7.8
Carepoint Health - Christ Hospital	15	142	10.6	5.3	10.0 **	6.7 - 13.2
Carepoint Health - Hoboken University MC	2	32	6.3	9.4	3.3	0.0 - 8.3
CentraState Medical Center	6	39	15.4	13.2	5.9	2.2 - 9.5
Chilton Memorial Center	5	107	4.7	4.8	4.9	1.0 - 8.7
Clara Maass Medical Center	9	242	3.7	4.9	3.8	1.3 - 6.4
Community Medical Center	31	502	6.2	5.1	6.1	4.3 - 7.8
Cooper Hospital/University Medical Center	29	626	4.6	4.6	5.0	3.4 - 6.6
Deborah Heart and Lung Center	12	470	2.6	4.8	2.7	0.9 - 4.4
East Orange General Hospital	1	29	3.4	4.1	4.2 ^	0.0 - 12.4
Englewood Hospital and Medical Center	19	336	5.7	6.1	4.6	2.7 - 6.5
Hackensack Meridian Health - Mountainside MC	6	108	5.6	6.9	4.0	0.8 - 7.2
Hackensack Meridian Health - Pascack Valley MC	2	23	8.7	8.2	5.3	0.0 - 11.6
Hackensack University Medical Center	53	907	5.8	7.4	4.0	2.9 - 5.0
Hackettstown Medical Center	2	36	5.6	7.8	3.6	0.0 - 8.9
Holy Name Medical Center	9	204	4.4	5.1	4.4	1.6 - 7.1
Hudson Regional Hospital	0	31	0.0	3.2	0.0	0.0 - 9.6
Hunterdon Medical Center	6	82	7.3	4.9	7.5	3.1 - 11.8
Inspira Medical Center - Elmer	1	31	3.2	7.7	2.1	0.0 - 7.6
Inspira Medical Center - Mullica Hill	.	.	.	.	.	.
Inspira Medical Center - Vineland	15	190	7.9	6.8	5.8	3.4 - 8.2
Inspira Medical Center - Woodbury	14	153	9.2	5.2	8.9 **	5.8 - 12.0
Jefferson Cherry Hill Hospital	2	36	5.6	11.5	2.4	0.0 - 6.6
Jefferson Stratford Hospital	0	14	0.0	8.4	0.0 ^	0.0 - 8.1
Jefferson Washington Township Hospital	13	72	18.1	11.0	8.2	5.2 - 11.3
Jersey City Medical Center	14	325	4.3	3.3	6.6	3.9 - 9.3
Jersey Shore University Medical Center	45	965	4.7	5.0	4.7	3.5 - 6.0
JFK University Medical Center	13	286	4.5	5.4	4.2	2.0 - 6.4
Monmouth Medical Center	4	65	6.2	4.6	6.7	1.6 - 11.9
Monmouth Medical Center - Southern Campus	5	23	21.7	9.0	12.1 **^	6.0 - 18.2
Morristown Medical Center	61	1,138	5.4	5.8	4.7	3.6 - 5.7
Newark Beth Israel Medical Center	18	340	5.3	4.8	5.5	3.3 - 7.7
Newton Medical Center	3	57	5.3	8.0	3.3	0.0 - 7.4
Ocean Medical Center - Brick Division	23	244	9.4	6.7	7.0	4.9 - 9.1

Table 1: IN-HOSPITAL MORTALITY RATES FOR ACUTE MYOCARDIAL INFARCTION - AMI (Deaths per 100 conditions)
(Indicator Recommended for Hospital Performance Dashboard)

Hospital	# of Deaths	# of Patients	Observed Rate	Expected Rate	Risk-Adjusted Rate	95% Confidence Interval
						LL - UL
National	28,904	576,626	5.0	NA	NA	NA - NA
Statewide	890	15,084	5.9	5.7	5.2	4.9 - 5.5
Overlook Medical Center - Summit	11	293	3.8	3.6	5.2	2.6 - 7.9
Palisades Medical Center	7	72	9.7	7.7	6.3	2.6 - 10.0
Penn Medicine Princeton Medical Center	7	119	5.9	7.6	3.9	1.0 - 6.8
Raritan Bay Medical Center - Old Bridge	7	95	7.4	6.8	5.5	2.1 - 8.9
Raritan Bay Medical Center - Perth Amboy	6	131	4.6	4.9	4.7	1.3 - 8.1
Riverview Medical Center	11	187	5.9	4.5	6.6	3.5 - 9.6
RWJ University Hospital	75	838	8.9	5.4	8.4 **	7.1 - 9.6
RWJ University Hospital - Hamilton	10	66	15.2	7.0	10.8 **	6.8 - 14.9
RWJ University Hospital - Rahway	16	109	14.7	7.8	9.5 **	6.5 - 12.4
RWJ University Hospital - Somerset	10	230	4.3	5.2	4.2	1.7 - 6.7
Saint Barnabas Medical Center	19	296	6.4	5.5	5.8	3.7 - 8.0
Saint Clare's Hospital - Dover	1	16	6.3	15.1	2.1 ^	0.0 - 7.5
Saint Clare's Hospital/Denville Campus	16	139	11.5	8.2	7.0	4.5 - 9.6
Saint Michael's Medical Center	5	149	3.4	5.4	3.1	0.0 - 6.2
Saint Peter's University Hospital	3	73	4.1	7.2	2.9	0.0 - 6.6
Salem Medical Center	2	10	20.0	10.9	9.2 ^	1.1 - 17.3
Shore Memorial Hospital	1	22	4.5	6.2	3.7 ^	0.0 - 11.3
Southern Ocean Medical Center	7	86	8.1	6.6	6.1	2.4 - 9.8
St. Francis Medical Center - Trenton	5	290	1.7	2.8	3.1	0.0 - 6.3
St. Joseph's University Medical Center	28	542	5.2	5.4	4.8	3.2 - 6.4
St. Joseph's Wayne Medical Center	1	34	2.9	12.5	1.2 *	0.0 - 5.1
St. Luke' Warren Hospital	0	15	0.0	9.0	0.0 ^	0.0 - 7.5
St. Mary's General Hospital	9	91	9.9	9.8	5.1	2.2 - 7.9
The Valley Hospital	37	465	8.0	6.2	6.5	4.9 - 8.1
Trinitas Regional Medical Center	6	127	4.7	3.8	6.2	2.2 - 10.2
University Hospital	9	133	6.8	8.1	4.2	1.7 - 6.6
Virtua Memorial Hospital - Burlington County	6	193	3.1	5.2	3.0	0.2 - 5.8
Virtua Our Lady of Lourdes Hospital - Camden	52	823	6.3	5.6	5.7	4.4 - 7.0
Virtua West Jersey Hospital Marlton	7	299	2.3	4.4	2.6 *	0.2 - 5.0
Virtua West Jersey Hospital Voorhees	4	103	3.9	5.2	3.7	0.0 - 7.5
Virtua Willingboro Hospital	5	24	20.8	17.6	5.9 ^	1.9 - 10.0

Source: National numbers are derived from 2017 National Inpatient Sample (NIS) Data using the AHRQ SAS Software, Version 2020 while New Jersey's are calculated from the **2019 NJ UB Data** using the same software version.

^ = Rate is based on a denominator less than 30 and should be taken with caution.

* = Statistically significantly below state average, ** = Statistically significantly above state average.

Expected rate is the rate the hospital would have if it had the same case-mix (e.g., age, gender, DRG, and comorbidity categories) as the reference or statewide population. If the observed rate is higher than the expected rate (i.e., the ratio of observed to expected is greater than 1.0), it suggests that the hospital performed worse than the reference population on that indicator.

Table 2: IN-HOSPITAL MORTALITY RATES FOR PNEUMONIA (Deaths per 100 conditions)

(Indicator Recommended for Hospital Performance Dashboard)

Hospital	# of Deaths	# of Patients	Observed Rate	Expected Rate	Risk-Adjusted Rate	95% Confidence Interval	
						LL	UL
National	14,164	543,875	2.6	NA	NA	NA	NA
Statewide	441	16,682	2.6	2.7	2.6	2.3	2.8
Atlantic City Medical Center-City Campus	5	233	2.1	2.5	2.2	0.2	4.3
Atlantic City Medical Center-Mainland Campus	15	350	4.3	3.0	3.7	2.2	5.2
Bayshore Medical Center	5	292	1.7	2.5	1.8	0.0	3.5
Bergen New Bridge Medical Center	0	32	0.0	2.4	0.0	0.0	5.6
Cape Regional Medical Center, Inc	2	216	0.9	2.2	1.1	0.0	3.3
Capital Health Medical Center - Hopewell	13	295	4.4	3.3	3.5	2.0	5.1
Capital Health Regional Medical Center - Fuld	3	165	1.8	2.5	1.9	0.0	4.3
Carepoint Health - Bayonne Medical Center	0	97	0.0	1.7	0.0	0.0	3.9
Carepoint Health - Christ Hospital	3	171	1.8	1.7	2.8	0.0	5.7
Carepoint Health - Hoboken University MC	3	64	4.7	1.8	6.6	2.1	11.1
CentraState Medical Center	20	510	3.9	2.9	3.6	2.3	4.8
Chilton Memorial Center	6	267	2.2	3.7	1.6	0.0	3.1
Clara Maass Medical Center	6	245	2.4	2.3	2.8	0.7	4.9
Community Medical Center	23	502	4.6	2.5	4.8 **	3.4	6.2
Cooper Hospital/University Medical Center	3	222	1.4	2.5	1.4	0.0	3.5
Deborah Heart and Lung Center	1	43	2.3	2.8	2.2	0.0	6.6
East Orange General Hospital	0	76	0.0	1.1	0.0	0.0	5.5
Englewood Hospital and Medical Center	12	316	3.8	2.9	3.4	1.8	5.0
Hackensack Meridian Health - Mountainside MC	4	195	2.1	2.9	1.9	0.0	3.9
Hackensack Meridian Health - Pascack Valley MC	3	127	2.4	3.0	2.1	0.0	4.5
Hackensack University Medical Center	15	593	2.5	3.7	1.8	0.8	2.8
Hackettstown Medical Center	1	102	1.0	2.8	0.9	0.0	3.8
Holy Name Medical Center	9	326	2.8	2.3	3.1	1.3	4.9
Hudson Regional Hospital	2	65	3.1	1.9	4.2	0.0	8.7
Hunterdon Medical Center	2	254	0.8	3.0	0.7	0.0	2.4
Inspira Medical Center - Elmer	0	115	0.0	3.0	0.0	0.0	2.6
Inspira Medical Center - Mullica Hill	.	.	.	.	.	.	.
Inspira Medical Center - Vineland	11	431	2.6	3.3	2.0	0.7	3.3
Inspira Medical Center - Woodbury	11	272	4.0	4.2	2.5	1.1	3.9
Jefferson Cherry Hill Hospital	0	81	0.0	1.7	0.0	0.0	4.3
Jefferson Stratford Hospital	0	87	0.0	2.0	0.0	0.0	3.7
Jefferson Washington Township Hospital	1	150	0.7	2.5	0.7	0.0	3.2
Jersey City Medical Center	7	242	2.9	1.3	5.9 **	3.1	8.7
Jersey Shore University Medical Center	14	363	3.9	2.9	3.4	1.9	4.9
JFK University Medical Center	12	458	2.6	2.5	2.7	1.3	4.1
Monmouth Medical Center	6	149	4.0	2.3	4.6	2.0	7.2
Monmouth Medical Center - Southern Campus	3	144	2.1	1.7	3.1	0.0	6.3
Morristown Medical Center	15	424	3.5	4.0	2.3	1.1	3.5
Newark Beth Israel Medical Center	9	232	3.9	1.8	5.6 **	3.2	8.0
Newton Medical Center	2	233	0.9	3.0	0.7	0.0	2.6
Ocean Medical Center - Brick Division	11	543	2.0	2.5	2.1	0.8	3.4
Overlook Medical Center - Summit	19	455	4.2	3.2	3.4	2.1	4.6

Table 2: IN-HOSPITAL MORTALITY RATES FOR PNEUMONIA (Deaths per 100 conditions)
(Indicator Recommended for Hospital Performance Dashboard)

Hospital	# of Deaths	# of Patients	Observed Rate	Expected Rate	Risk-Adjusted Rate	95% Confidence Interval	
						LL	UL
National	14,164	543,875	2.6	NA	NA	NA	NA
Statewide	441	16,682	2.6	2.7	2.6	2.3	2.8
Palisades Medical Center	7	192	3.6	2.4	3.9	1.7	6.2
Penn Medicine Princeton Medical Center	7	233	3.0	2.8	2.8	0.9	4.7
Raritan Bay Medical Center - Old Bridge	6	222	2.7	2.1	3.3	1.1	5.6
Raritan Bay Medical Center - Perth Amboy	2	160	1.3	2.3	1.4	0.0	3.9
Riverview Medical Center	6	237	2.5	2.4	2.8	0.7	4.8
RWJ University Hospital	13	427	3.0	2.6	3.0	1.6	4.5
RWJ University Hospital - Hamilton	3	218	1.4	2.4	1.5	0.0	3.6
RWJ University Hospital - Rahway	11	177	6.2	2.3	7.1	4.7	9.6
RWJ University Hospital - Somerset	4	179	2.2	2.6	2.3	0.0	4.5
Saint Barnabas Medical Center	15	437	3.4	2.2	4.0	2.5	5.6
Saint Clare's Hospital - Dover	1	70	1.4	3.2	1.2	0.0	4.4
Saint Clare's Hospital/Denville Campus	2	96	2.1	3.7	1.5	0.0	4.0
Saint Michael's Medical Center	0	105	0.0	2.7	0.0	0.0	2.9
Saint Peter's University Hospital	3	167	1.8	2.5	1.9	0.0	4.3
Salem Medical Center	3	99	3.0	2.9	2.7	0.0	5.5
Shore Memorial Hospital	3	185	1.6	1.6	2.6	0.0	5.5
Southern Ocean Medical Center	6	268	2.2	2.9	2.0	0.3	3.8
St. Francis Medical Center - Trenton	1	82	1.2	2.6	1.2	0.0	4.5
St. Joseph's University Medical Center	8	350	2.3	3.5	1.7	0.3	3.1
St. Joseph's Wayne Medical Center	4	126	3.2	2.5	3.2	0.5	6.0
St. Luke' Warren Hospital	1	71	1.4	3.8	1.0	0.0	3.9
St. Mary's General Hospital	2	42	4.8	4.6	2.7	0.0	6.1
The Valley Hospital	8	320	2.5	4.0	1.6	0.3	3.0
Trinitas Regional Medical Center	11	265	4.2	1.4	7.6 **	5.0	10.2
University Hospital	2	157	1.3	2.2	1.5	0.0	4.1
Virtua Memorial Hospital - Burlington County	5	397	1.3	2.0	1.6	0.0	3.4
Virtua Our Lady of Lourdes Hospital - Camden	5	187	2.7	3.5	2.0	0.1	3.9
Virtua West Jersey Hospital Marlton	8	306	2.6	2.6	2.6	0.9	4.3
Virtua West Jersey Hospital Voorhees	16	613	2.6	1.9	3.5	2.1	4.9
Virtua Willingboro Hospital	1	157	0.6	2.4	0.7	0.0	3.2

Source: National numbers are derived from 2017 National Inpatient Sample (NIS) Data using the AHRQ SAS Software, Version 2020 while New Jersey's are calculated from the **2019 NJ UB Data** using the same software version.

^ = Rate is based on a denominator less than 30 and should be taken with caution.

* = Statistically significantly below state average, ** = Statistically significantly above state average.

Expected rate is the rate the hospital would have if it had the same case-mix (e.g., age, gender, DRG, and comorbidity categories) as the reference or statewide population. If the observed rate is higher than the expected rate (i.e., the ratio of observed to expected is greater than 1.0), it suggests that the hospital performed worse than the reference population on that indicator.

Table 3: IN-HOSPITAL MORTALITY RATES FOR HEART FAILURE (Deaths per 100 conditions)**(Indicator Recommended for Hospital Performance Dashboard)**

Hospital	# of Deaths	# of Patients	Observed Rate	Expected Rate	Risk-Adjusted Rate	95% Confidence Interval
						LL - UL
National	29,540	1,086,786	2.7	NA	NA	NA - NA
Statewide	1,001	34,289	2.9	2.8	2.8	2.6 - 3.0
Atlantic City Medical Center-City Campus	6	377	1.6	2.9	1.5	0.0 - 3.0
Atlantic City Medical Center-Mainland Campus	24	747	3.2	3.0	2.9	1.8 - 4.0
Bayshore Medical Center	14	431	3.2	2.9	3.0	1.6 - 4.5
Bergen New Bridge Medical Center	0	20	0.0	3.1	0.0 ^	0.0 - 6.5
Cape Regional Medical Center, Inc	18	366	4.9	3.0	4.5 **	2.9 - 6.0
Capital Health Medical Center - Hopewell	9	403	2.2	2.8	2.2	0.7 - 3.7
Capital Health Regional Medical Center - Fuld	8	308	2.6	2.5	2.8	1.0 - 4.7
Carepoint Health - Bayonne Medical Center	6	276	2.2	1.6	3.7	1.2 - 6.1
Carepoint Health - Christ Hospital	7	348	2.0	1.8	3.0	1.0 - 5.0
Carepoint Health - Hoboken University MC	3	114	2.6	1.8	4.0	0.4 - 7.6
CentraState Medical Center	25	514	4.9	3.0	4.4 **	3.1 - 5.7
Chilton Memorial Center	7	316	2.2	3.6	1.7	0.2 - 3.2
Clara Maass Medical Center	18	716	2.5	2.0	3.4	2.1 - 4.8
Community Medical Center	34	965	3.5	2.2	4.3 **	3.2 - 5.4
Cooper Hospital/University Medical Center	11	861	1.3	2.0	1.7	0.5 - 3.0
Deborah Heart and Lung Center	12	611	2.0	2.4	2.2	0.9 - 3.6
East Orange General Hospital	3	181	1.7	1.6	2.7	0.0 - 5.7
Englewood Hospital and Medical Center	11	514	2.1	2.6	2.2	0.8 - 3.6
Hackensack Meridian Health - Mountainside MC	18	351	5.1	3.3	4.2	2.7 - 5.7
Hackensack Meridian Health - Pascack Valley MC	10	130	7.7	3.8	5.5 **	3.2 - 7.8
Hackensack University Medical Center	38	1,025	3.7	4.2	2.4	1.6 - 3.2
Hackettstown Medical Center	1	209	0.5	3.4	0.4 *	0.0 - 2.3
Holy Name Medical Center	17	569	3.0	2.7	3.0	1.7 - 4.3
Hudson Regional Hospital	3	79	3.8	1.9	5.3	1.1 - 9.5
Hunterdon Medical Center	6	253	2.4	4.7	1.4	0.0 - 2.8
Inspira Medical Center - Elmer	3	143	2.1	3.9	1.5	0.0 - 3.6
Inspira Medical Center - Mullica Hill	.	.	.	.	.	. - .
Inspira Medical Center - Vineland	25	853	2.9	3.1	2.6	1.6 - 3.6
Inspira Medical Center - Woodbury	5	420	1.2	3.6	0.9 *	0.0 - 2.2
Jefferson Cherry Hill Hospital	5	238	2.1	2.4	2.4	0.2 - 4.6
Jefferson Stratford Hospital	4	251	1.6	2.2	2.0	0.0 - 4.2
Jefferson Washington Township Hospital	12	606	2.0	2.5	2.1	0.8 - 3.4
Jersey City Medical Center	12	495	2.4	1.5	4.5	2.6 - 6.4
Jersey Shore University Medical Center	32	1,171	2.7	3.4	2.2	1.4 - 3.0
JFK University Medical Center	21	756	2.8	2.9	2.6	1.5 - 3.7
Monmouth Medical Center	13	271	4.8	2.3	5.6 **	3.6 - 7.7
Monmouth Medical Center - Southern Campus	10	239	4.2	2.5	4.6	2.5 - 6.7
Morristown Medical Center	57	1,333	4.3	3.7	3.1	2.4 - 3.9
Newark Beth Israel Medical Center	36	984	3.7	1.8	5.6 **	4.4 - 6.8
Newton Medical Center	7	355	2.0	3.1	1.8	0.2 - 3.3
Ocean Medical Center - Brick Division	18	881	2.0	3.1	1.8	0.8 - 2.8
Overlook Medical Center - Summit	35	850	4.1	3.3	3.4	2.4 - 4.3

Table 3: IN-HOSPITAL MORTALITY RATES FOR HEART FAILURE (Deaths per 100 conditions)**(Indicator Recommended for Hospital Performance Dashboard)**

Hospital	# of Deaths	# of Patients	Observed Rate	Expected Rate	Risk-Adjusted Rate	95% Confidence Interval
						LL - UL
National	29,540	1,086,786	2.7	NA	NA	NA - NA
Statewide	1,001	34,289	2.9	2.8	2.8	2.6 - 3.0
Palisades Medical Center	8	307	2.6	3.5	2.0	0.5 - 3.6
Penn Medicine Princeton Medical Center	21	442	4.8	3.5	3.7	2.4 - 5.0
Raritan Bay Medical Center - Old Bridge	9	313	2.9	2.4	3.3	1.4 - 5.1
Raritan Bay Medical Center - Perth Amboy	6	276	2.2	2.7	2.2	0.3 - 4.0
Riverview Medical Center	6	384	1.6	3.7	1.1 *	0.0 - 2.5
RWJ University Hospital	50	1,079	4.6	2.8	4.6 **	3.6 - 5.5
RWJ University Hospital - Hamilton	8	457	1.8	2.8	1.7	0.3 - 3.2
RWJ University Hospital - Rahway	16	428	3.7	2.0	5.0 **	3.3 - 6.7
RWJ University Hospital - Somerset	23	675	3.4	2.9	3.2	2.0 - 4.3
Saint Barnabas Medical Center	41	910	4.5	2.3	5.4 **	4.2 - 6.5
Saint Clare's Hospital - Dover	2	168	1.2	3.0	1.1	0.0 - 3.3
Saint Clare's Hospital/Denville Campus	9	322	2.8	3.2	2.4	0.8 - 4.0
Saint Michael's Medical Center	1	416	0.2	2.0	0.3 *	0.0 - 2.1
Saint Peter's University Hospital	0	331	0.0	2.9	0.0 *	0.0 - 1.7
Salem Medical Center	2	116	1.7	1.8	2.6	0.0 - 6.2
Shore Memorial Hospital	10	376	2.7	2.1	3.4	1.6 - 5.2
Southern Ocean Medical Center	13	379	3.4	3.5	2.7	1.3 - 4.1
St. Francis Medical Center - Trenton	3	212	1.4	2.2	1.7	0.0 - 4.1
St. Joseph's University Medical Center	16	891	1.8	3.1	1.6	0.6 - 2.6
St. Joseph's Wayne Medical Center	8	275	2.9	3.5	2.2	0.6 - 3.9
St. Luke' Warren Hospital	5	259	1.9	3.3	1.6	0.0 - 3.4
St. Mary's General Hospital	5	333	1.5	3.3	1.2	0.0 - 2.8
The Valley Hospital	46	827	5.6	4.6	3.3	2.5 - 4.1
Trinitas Regional Medical Center	22	377	5.8	1.4	11.7 **	9.5 - 14.0
University Hospital	3	245	1.2	2.0	1.7	0.0 - 4.0
Virtua Memorial Hospital - Burlington County	13	776	1.7	2.5	1.9	0.7 - 3.0
Virtua Our Lady of Lourdes Hospital - Camden	12	672	1.8	2.4	2.0	0.7 - 3.3
Virtua West Jersey Hospital Marlton	20	531	3.8	2.8	3.6	2.3 - 4.9
Virtua West Jersey Hospital Voorhees	15	681	2.2	2.4	2.5	1.2 - 3.8
Virtua Willingboro Hospital	4	301	1.3	2.1	1.7	0.0 - 3.8

Source: National numbers are derived from 2017 National Inpatient Sample (NIS) Data using the AHRQ SAS Software, Version 2020 while New Jersey's are calculated from the **2019 NJ UB Data** using the same software version.

^ = Rate is based on a denominator less than 30 and should be taken with caution.

* = Statistically significantly below state average, ** = Statistically significantly above state average.

NA = National Rates are not risk-adjusted.

Expected rate is the rate the hospital would have if it had the same case-mix (e.g., age, gender, DRG, and comorbidity categories) as the reference or statewide population. If the observed rate is higher than the expected rate (i.e., the ratio of observed to expected is greater than 1.0), it suggests that the hospital performed worse than the reference population on that indicator.

Table 4: IN-HOSPITAL MORTALITY RATES FOR ACUTE STROKE (Deaths per 100 conditions)**(Indicator Recommended for Hospital Performance Dashboard)**

Hospital	# of Deaths	# of Patients	Observed Rate	Expected Rate	Risk-Adjusted Rate	95% Confidence Interval	
						LL	UL
National	43,216	583,655	7.4	NA	NA	NA	NA
Statewide	1,228	17,793	6.9	7.5	6.6	6.3	6.9
Atlantic City Medical Center-City Campus	79	475	16.6	11.6	10.4 **	8.9	11.9
Atlantic City Medical Center-Mainland Campus	6	166	3.6	5.3	4.9	1.0	8.9
Bayshore Medical Center	5	133	3.8	4.3	6.3	1.3	11.2
Bergen New Bridge Medical Center	1	6	16.7	1.5	81.2 ***^	34.4	100.0
Cape Regional Medical Center, Inc	10	142	7.0	3.0	17.0 **	11.0	23.1
Capital Health Medical Center - Hopewell	2	101	2.0	2.6	5.4	0.0	13.2
Capital Health Regional Medical Center - Fuld	69	554	12.5	12.8	7.0	5.7	8.4
Carepoint Health - Bayonne Medical Center	7	98	7.1	7.6	6.7	2.5	11.0
Carepoint Health - Christ Hospital	10	86	11.6	9.3	9.1	5.1	13.0
Carepoint Health - Hoboken University MC	2	67	3.0	2.4	8.9	0.0	19.3
CentraState Medical Center	21	255	8.2	5.9	10.1 **	7.1	13.1
Chilton Memorial Center	4	176	2.3	7.8	2.1 *	0.0	5.3
Clara Maass Medical Center	10	251	4.0	5.1	5.7	2.3	9.0
Community Medical Center	40	539	7.4	5.3	10.1 **	8.0	12.3
Cooper Hospital/University Medical Center	49	689	7.1	8.4	6.1	4.6	7.7
Deborah Heart and Lung Center	0	1 @	0.0	.	.	.	.
East Orange General Hospital	0	40	0.0	3.0	0.0	0.0	11.7
Englewood Hospital and Medical Center	19	314	6.1	5.3	8.2	5.3	11.1
Hackensack Meridian Health - Mountainside MC	13	164	7.9	9.4	6.1	3.3	8.9
Hackensack Meridian Health - Pascack Valley MC	2	46	4.3	5.5	5.7	0.0	13.5
Hackensack University Medical Center	62	803	7.7	11.7	4.8 *	3.6	5.9
Hackettstown Medical Center	1	94	1.1	3.4	2.3	0.0	9.2
Holy Name Medical Center	20	259	7.7	6.1	9.1	6.2	12.0
Hudson Regional Hospital	0	23	0.0	1.9	0.0 ^	0.0	20.0
Hunterdon Medical Center	8	170	4.7	5.2	6.6	2.6	10.5
Inspira Medical Center - Elmer	2	46	4.3	4.2	7.5	0.0	16.2
Inspira Medical Center - Mullica Hill	.	.	.	.	.	.	.
Inspira Medical Center - Vineland	10	306	3.3	4.7	5.0	1.9	8.1
Inspira Medical Center - Woodbury	6	172	3.5	4.1	6.1	1.6	10.6
Jefferson Cherry Hill Hospital	4	102	3.9	4.8	5.9	0.3	11.5
Jefferson Stratford Hospital	4	94	4.3	6.0	5.1	0.1	10.1
Jefferson Washington Township Hospital	33	459	7.2	6.9	7.5	5.4	9.6
Jersey City Medical Center	25	298	8.4	7.1	8.6	6.1	11.0
Jersey Shore University Medical Center	53	791	6.7	12.4	3.9 *	2.8	5.0
JFK University Medical Center	26	895	2.9	6.0	3.5 *	1.9	5.1
Monmouth Medical Center	7	155	4.5	3.7	8.7	3.6	13.9
Monmouth Medical Center - Southern Campus	1	71	1.4	2.7	3.8	0.0	13.2
Morristown Medical Center	33	577	5.7	8.1	5.1	3.4	6.8
Newark Beth Israel Medical Center	16	265	6.0	5.8	7.5	4.6	10.5
Newton Medical Center	4	180	2.2	3.4	4.7	0.0	9.6
Ocean Medical Center - Brick Division	3	268	1.1	4.5	1.8 *	0.0	5.3
Overlook Medical Center - Summit	74	858	8.6	10.8	5.8	4.6	7.0

Table 4: IN-HOSPITAL MORTALITY RATES FOR ACUTE STROKE (Deaths per 100 conditions)**(Indicator Recommended for Hospital Performance Dashboard)**

Hospital	# of Deaths	# of Patients	Observed Rate	Expected Rate	Risk-Adjusted Rate	95% Confidence Interval	
						LL	UL
National	43,216	583,655	7.4	NA	NA	NA	NA
Statewide	1,228	17,793	6.9	7.5	6.6	6.3 - 6.9	
Palisades Medical Center	8	159	5.0	9.4	3.9	0.9 - 6.9	
Penn Medicine Princeton Medical Center	12	228	5.3	8.3	4.6	2.0 - 7.2	
Raritan Bay Medical Center - Old Bridge	2	81	2.5	2.8	6.3	0.0 - 14.7	
Raritan Bay Medical Center - Perth Amboy	1	77	1.3	5.0	1.9	0.0 - 8.3	
Riverview Medical Center	9	206	4.4	6.5	4.9	1.6 - 8.2	
RWJ University Hospital	102	774	13.2	9.8	9.7 **	8.4 - 11.0	
RWJ University Hospital - Hamilton	1	148	0.7	2.8	1.8	0.0 - 8.0	
RWJ University Hospital - Rahway	2	128	1.6	4.3	2.6	0.0 - 7.7	
RWJ University Hospital - Somerset	27	275	9.8	6.5	11.0 **	8.2 - 13.8	
Saint Barnabas Medical Center	41	518	7.9	5.9	9.8 **	7.6 - 11.9	
Saint Clare's Hospital - Denville	2	140	1.4	5.6	1.8 *	0.0 - 6.0	
Saint Clare's Hospital - Dover	2	70	2.9	2.9	7.0	0.0 - 16.3	
Saint Michael's Medical Center	4	100	4.0	5.0	5.8	0.3 - 11.3	
Saint Peter's University Hospital	4	148	2.7	5.4	3.6	0.0 - 7.7	
Salem Medical Center	1	11	9.1	4.2	15.7 ^	0.0 - 34.6	
Shore Memorial Hospital	4	119	3.4	3.3	7.4	1.5 - 13.3	
Southern Ocean Medical Center	5	150	3.3	3.7	6.6	1.3 - 11.8	
St. Francis Medical Center - Trenton	0	34	0.0	2.0	0.0	0.0 - 15.7	
St. Joseph's University Medical Center	61	567	10.8	10.2	7.6	6.1 - 9.1	
St. Joseph's Wayne Medical Center	3	96	3.1	5.3	4.3	0.0 - 9.6	
St. Luke' Warren Hospital	3	74	4.1	6.0	4.9	0.0 - 10.8	
St. Mary's General Hospital	0	70	0.0	4.5	0.0	0.0 - 7.1	
The Valley Hospital	43	525	8.2	9.3	6.4	4.8 - 8.0	
Trinitas Regional Medical Center	11	152	7.2	7.3	7.2	3.7 - 10.7	
University Hospital	74	603	12.3	10.0	8.8 **	7.3 - 10.3	
Virtua Memorial Hospital - Burlington County	8	279	2.9	2.9	7.0	2.6 - 11.5	
Virtua Our Lady of Lourdes Hospital - Camden	46	389	11.8	9.3	9.1 **	7.3 - 11.0	
Virtua West Jersey Hospital Marlton	4	176	2.3	3.7	4.4	0.0 - 9.4	
Virtua West Jersey Hospital Voorhees	5	224	2.2	2.6	6.2	1.0 - 11.3	
Virtua Willingboro Hospital	2	83	2.4	4.0	4.3	0.0 - 10.7	

Source: National numbers are derived from 2017 National Inpatient Sample (NIS) Data using the AHRQ SAS Software, Version 2020 while New Jersey's are calculated from the **2019 NJ UB Data** using the same software version.

^ = Rate is based on a denominator less than 30 and should be taken with caution.

* = Statistically significantly below state average, ** = Statistically significantly above state average.

Missing (.) = Hospital did not perform the procedure during the year in question; or it performed less than 3 procedures (rate is not computed when the denominator is less than 3).

Expected rate is the rate the hospital would have if it had the same case-mix (e.g., age, gender, DRG, and comorbidity categories) as the reference or statewide population. If the observed rate is higher than the expected rate (i.e., the ratio of observed to expected is greater than 1.0), it suggests that the hospital performed worse than the reference population on that indicator.

Table 4.1: IN-HOSPITAL MORTALITY RATES FOR INTRACEREBRAL HEMORRHAGIC STROKE (Deaths per 100)**(Indicator Recommended for Hospital Performance Dashboard)**

Hospital	# of Deaths	# of Patients	Observed Rate	Expected Rate	Risk-Adjusted Rate	95% Confidence Interval	
						LL	UL
National	19,225	95,272	20.2	NA	NA	NA	NA
Statewide	536	2,674	20.0	21.1	19.0	17.8	20.3
Atlantic City Medical Center-City Campus	41	101	40.6	27.7	29.4 **	24.0	34.8
Atlantic City Medical Center-Mainland Campus	3	6	50.0	40.1	25.0 ^	8.2	41.8
Bayshore Medical Center	1	11	9.1	15.7	11.6 ^	0.0	34.2
Bergen New Bridge Medical Center	.	.	.	.	.	.	.
Cape Regional Medical Center, Inc	2	2	100.0	.	.	.	.
Capital Health Medical Center - Hopewell	.	.	.	.	.	.	.
Capital Health Regional Medical Center - Fuld	33	124	26.6	25.9	20.6	15.5	25.8
Carepoint Health - Bayonne Medical Center	3	23	13.0	19.9	13.2 ^	0.0	27.0
Carepoint Health - Christ Hospital	5	21	23.8	18.2	26.3 ^	11.3	41.3
Carepoint Health - Hoboken University MC	0	4	0.0	7.5	0.0 ^	0.0	68.5
CentraState Medical Center	8	35	22.9	20.2	22.7	11.8	33.5
Chilton Memorial Center	0	10	0.0	16.2	0.0 ^	0.0	24.3
Clara Maass Medical Center	5	31	16.1	18.3	17.7	5.2	30.2
Community Medical Center	18	57	31.6	19.8	32.1 **	23.5	40.6
Cooper Hospital/University Medical Center	23	113	20.4	22.0	18.6	12.7	24.4
Deborah Heart and Lung Center	.	.	.	.	.	.	.
East Orange General Hospital	0	1	0.0	.	.	.	.
Englewood Hospital and Medical Center	7	39	17.9	14.0	25.7	12.9	38.5
Hackensack Meridian Health - Mountainside MC	8	33	24.2	28.1	17.3	8.4	26.2
Hackensack Meridian Health - Pascack Valley MC	0	1	0.0	.	.	.	.
Hackensack University Medical Center	25	155	16.1	25.0	13.0 *	8.3	17.6
Hackettstown Medical Center	0	2	0.0	.	.	.	.
Holy Name Medical Center	10	42	23.8	17.8	26.8	15.9	37.7
Hudson Regional Hospital	.	.	.	.	.	.	.
Hunterdon Medical Center	3	16	18.8	23.0	16.3 ^	1.9	30.8
Inspira Medical Center - Elmer	0	7	0.0	4.8	0.0 ^	0.0	65.7
Inspira Medical Center - Mullica Hill	.	.	.	.	.	.	.
Inspira Medical Center - Vineland	6	28	21.4	20.9	20.5 ^	8.8	32.3
Inspira Medical Center - Woodbury	1	15	6.7	17.4	7.7 ^	0.0	26.5
Jefferson Cherry Hill Hospital	1	10	10.0	11.1	18.0 ^	0.0	46.6
Jefferson Stratford Hospital	3	9	33.3	25.4	26.4 ^	7.0	45.8
Jefferson Washington Township Hospital	16	78	20.5	18.0	22.9	14.6	31.2
Jersey City Medical Center	16	58	27.6	21.1	26.3	17.9	34.7
Jersey Shore University Medical Center	24	170	14.1	26.3	10.8 *	6.5	15.0
JFK University Medical Center	9	135	6.7	15.4	8.7 *	2.0	15.4
Monmouth Medical Center	3	27	11.1	9.7	22.9 ^	3.0	42.9
Monmouth Medical Center - Southern Campus	0	1	0.0	.	.	.	.
Morristown Medical Center	10	84	11.9	20.4	11.7 *	4.7	18.7
Newark Beth Israel Medical Center	8	34	23.5	21.8	21.7	10.8	32.5
Newton Medical Center	2	4	50.0	43.4	23.1 ^	2.5	43.7
Ocean Medical Center - Brick Division	1	19	5.3	18.5	5.7 ^	0.0	21.8
Overlook Medical Center - Summit	27	183	14.8	21.9	13.5 *	8.8	18.2

Table 4.1: IN-HOSPITAL MORTALITY RATES FOR INTRACEREBRAL HEMORRHAGIC STROKE (Deaths per 100)
(Indicator Recommended for Hospital Performance Dashboard)

Hospital	# of Deaths	# of Patients	Observed Rate	Expected Rate	Risk-Adjusted Rate	95% Confidence Interval	
						LL	UL
National	19,225	95,272	20.2	NA	NA	NA	NA
Statewide	536	2,674	20.0	21.1	19.0	17.8 - 20.3	
Palisades Medical Center	2	11	18.2	25.4	14.4 ^	0.0 - 31.3	
Penn Medicine Princeton Medical Center	5	37	13.5	21.8	12.4	2.3 - 22.6	
Raritan Bay Medical Center - Old Bridge	0	3	0.0	6.2	0.0 ^	0.0 - 88.6	
Raritan Bay Medical Center - Perth Amboy	.	.	.	.	.	. - .
Riverview Medical Center	6	34	17.6	17.5	20.3	8.1 - 32.4	
RWJ University Hospital	45	176	25.6	22.3	23.0	18.3 - 27.6	
RWJ University Hospital - Hamilton	0	12	0.0	11.0	0.0 ^	0.0 - 27.3	
RWJ University Hospital - Rahway	1	5	20.0	28.5	14.1 ^	0.0 - 37.9	
RWJ University Hospital - Somerset	11	47	23.4	18.0	26.1	15.8 - 36.4	
Saint Barnabas Medical Center	18	79	22.8	14.6	31.4 **	22.3 - 40.5	
Saint Clare's Hospital - Denville	0	13	0.0	19.2	0.0 ^	0.0 - 17.8	
Saint Clare's Hospital - Dover	0	2	0.0	.	.	. - .	
Saint Michael's Medical Center	1	6	16.7	22.5	14.9 ^	0.0 - 41.2	
Saint Peter's University Hospital	3	22	13.6	20.8	13.1 ^	0.0 - 26.9	
Salem Medical Center	.	.	.	.	.	. - .
Shore Memorial Hospital	2	10	20.0	16.2	24.8 ^	3.9 - 45.7	
Southern Ocean Medical Center	2	3	66.7	24.8	53.9 ^	20.6 - 87.1	
St. Francis Medical Center - Trenton	.	.	.	.	.	. - .
St. Joseph's University Medical Center	24	98	24.5	22.5	21.8	15.6 - 28.1	
St. Joseph's Wayne Medical Center	2	2	100.0	.	.	. - .	
St. Luke' Warren Hospital	0	2	0.0	.	.	. - .	
St. Mary's General Hospital	0	6	0.0	13.6	0.0 ^	0.0 - 32.2	
The Valley Hospital	15	79	19.0	26.2	14.5	8.4 - 20.7	
Trinitas Regional Medical Center	8	36	22.2	14.1	31.6	17.8 - 45.3	
University Hospital	37	157	23.6	20.6	22.9	17.6 - 28.3	
Virtua Memorial Hospital - Burlington County	3	33	9.1	9.7	18.8	0.6 - 36.9	
Virtua Our Lady of Lourdes Hospital - Camden	28	99	28.3	21.3	26.6 **	20.4	32.9
Virtua West Jersey Hospital Marlton	0	7	0.0	11.1	0.0 ^	0.0	36.3
Virtua West Jersey Hospital Voorhees	0	5	0.0	26.2	0.0 ^	0.0 - 22.9	
Virtua Willingboro Hospital	1	1	100.0	.	.	. - .	

Source: National numbers are derived from 2017 National Inpatient Sample (NIS) Data using the AHRQ SAS Software, Version 2020 while New Jersey's are calculated from the 2019 NJ UB Data using the same software version.

^ = Rate is based on a denominator less than 30 and should be taken with caution.

* = Statistically significantly below state average, ** = Statistically significantly above state average.

Missing (.) = Hospital did not perform the procedure during the year in question; or it performed less than 3 procedures (rate is not computed when the denominator is less than 3).

Expected rate is the rate the hospital would have if it had the same case-mix (e.g., age, gender, DRG, and comorbidity categories) as the reference or statewide population. If the observed rate is higher than the expected rate (i.e., the ratio of observed to expected is greater than 1.0), it suggests that the hospital performed worse than the reference population on that indicator.

Table 4.2: IN-HOSPITAL MORTALITY RATES FOR SUBARACHNOID HEMORRHAGE STROKE (Deaths per 100 conditions)**(Indicator Recommended for Hospital Performance Dashboard)**

Hospital	# of Deaths	# of Patients	Observed Rate	Expected Rate	Risk-Adjusted Rate	95% Confidence Interval	
						LL	UL
National	4,273	22,426	19.1	NA	NA	NA	NA
Statewide	121	637	19.0	18.3	19.8	17.2 - 22.4	
Atlantic City Medical Center-City Campus	7	24	29.2	21.9	25.3	13.6 - 37.1	
Atlantic City Medical Center-Mainland Campus	.	.	.	.	.	. - .
Bayshore Community Hospital	1	2	50.0	.	.	. - .	
Bergen Regional Medical Center	.	.	.	.	.	. - .
Cape Regional Medical Center Inc	.	.	.	.	.	. - .
Capital Health Medical Center - Hopewell	.	.	.	.	.	. - .
Capital Health Regional Medical Center - Fuld	11	37	29.7	22.0	25.7	15.6 - 35.9	
Carepoint Health - Bayonne Medical Center	0	1	0.0	.	.	. - .	
Carepoint Health - Christ Hospital	3	5	60.0	29	39 ^	18 - 61	
Carepoint Health - Hoboken University Medical Center	.	.	.	.	.	. - .
CentraState Medical Center	.	.	.	.	.	. - .
Chilton Memorial Center	0	1	0.0	.	.	. - .	
Clara Maass Medical Center	0	2	0.0	.	.	. - .	
Community Medical Center	0	5	0.0	20.4	0.0 ^	0.0 - 27.4	
Cooper Hospital/University Medical Center	9	33	27.3	23.4	22.2	12.3 - 32.1	
Deborah Heart and Lung Center	.	.	.	.	.	. - .
East Orange General Hospital	.	.	.	.	.	. - .
Englewood Hospital and Medical Center	2	7	28.6	24	23 ^	2 - 44	
Hackensack Meridian Health - Mountainside MC	.	.	.	.	.	. - .
Hackensack Meridian Health - Pascack Valley MC	.	.	.	.	.	. - .
HackensackUMC - Mountainside	10	59	16.9	20.6	15.7	7.9 - 23.4	
Hackettstown Community Hospital	.	.	.	.	.	. - .
Holy Name Medical Center	0	1	0.0	.	.	. - .	
Hudson Regional Hospital	.	.	.	.	.	. - .
Hunterdon Medical Center	1	4	25	6	74 ^	3 - 100	
Inspira Medical Center - Elmer	.	.	.	.	.	. - .
Inspira Medical Center - Mullica Hill	.	.	.	.	.	. - .
Inspira Medical Center - Vineland	0	3	0.0	25	0 ^	0 - 31	
Inspira Medical Center - Woodbury	0	1	0.0	.	.	. - .	
Jefferson Cherry Hill Hospital	0	1	0.0	.	.	. - .	
Jefferson Stratford Hospital	0	1	0.0	.	.	. - .	
Jefferson Washington Township Hospital	2	17	11.8	8.9	25.3 ^	0.0 - 52.1	
Jersey City Medical Center	1	7	14.3	29.7	9.2 ^	0.0 - 26.1	
Jersey Shore University Medical Center	10	53	18.9	24.6	14.6	6.7 - 22.5	
JFK MC - Anthony M. Yelensics Community	4	30	13.3	18.7	13.6	1.8 - 25.3	
Monmouth Medical Center	0	4	0	3	0 ^	0 - 100	
Monmouth Medical Center - Southern Campus	.	.	.	.	.	. - .
Morristown Medical Center	1	12	8.3	16	10 ^	0 - 31	
Newark Beth Israel Medical Center	2	4	50.0	46.9	20.3 ^	3.5 - 37.1	
Newton Medical Center	.	.	.	.	.	. - .
Ocean Medical Center - Brick Division	1	4	25	21	22 ^	0 - 53	
Overlook Medical Center - Summit	13	70	18.6	19	19	11 - 27	

Table 4.2: IN-HOSPITAL MORTALITY RATES FOR SUBARACHNOID HEMORRHAGE STROKE (Deaths per 100 conditions)**(Indicator Recommended for Hospital Performance Dashboard)**

Hospital	# of Deaths	# of Patients	Observed Rate	Expected Rate	Risk-Adjusted Rate	95% Confidence Interval	
						LL	UL
National	4,273	22,426	19.1	NA	NA	NA	NA
Statewide	121	637	19.0	18.3	19.8	17.2	22.4
Palisades Medical Center	.	.	.	.	.	.	.
Penn Medicine Princeton Medical Center	1	3	33.3	29.8	21.3 ^	0.0	44.9
Raritan Bay Medical Center-Old Bridge	.	.	.	.	.	.	.
Raritan Bay Medical Center-Perth Amboy	.	.	.	.	.	.	.
Riverview Medical Center	0	4	0	7	0	0	69
RWJ University Hospital	9	59	15	11	26	14	38
RWJ University Hospital - Hamilton	0	3	0.0	4.3	0.0 ^	0.0	100.0
RWJ University Hospital - Rahway	.	.	.	.	.	.	.
RWJ University Hospital - Somerset	1	5	20.0	17	22 ^	0	52
Saint Barnabas Medical Center	9	46	19.6	11	35	21	48
Saint Clare's Hospital - Denville	.	.	.	.	.	.	.
Saint Clare's Hospital - Dover	.	.	.	.	.	.	.
Saint Michael's Medical Center	.	.	.	.	.	.	.
Saint Peter's University Hospital	0	1	0.0	.	.	.	.
Salem Medical Center	.	.	.	.	.	.	.
Shore Memorial Hospital	0	1	0.0	.	.	.	.
Southern Ocean Medical Center	.	.	.	.	.	.	.
St. Francis Medical Center - Trenton	.	.	.	.	.	.	.
St. Joseph's University Medical Center	8	32	25.0	19.1	25.0	14.2	35.8
St. Joseph's Wayne Medical Center	.	.	.	.	.	.	.
St. Luke' Warren Hospital	.	.	.	.	.	.	.
St. Mary's General Hospital	.	.	.	.	.	.	.
The Valley Hospital	5	17	29.4	19.3	29.0 ^	13.4	44.6
Trinitas Regional Medical Center	0	5	0.0	26.1	0.0 ^	0.0	21.3
University Hospital	5	47	10.6	14.6	13.9	3.1	24.6
Virtua Memorial Hospital - Burlington County	.	.	.	.	.	.	.
Virtua Our Lady of Lourdes Hospital - Camden	4	23	17.4	19.4	17.1 ^	4.1	30.0
Virtua West Jersey Hospital Marlton	1	1	100.0	.	.	.	.
Virtua West Jersey Hospital Voorhees	0	2	0.0	.	.	.	.
Virtua Willingboro Hospital	.	.	.	.	.	.	.

Source: National numbers are derived from 2017 National Inpatient Sample (NIS) Data using the AHRQ SAS Software, Version 2020 while New Jersey's are calculated from the 2019 NJ UB Data using the same software version.

^ = Rate is based on a denominator less than 30 and should be taken with caution.

* = Statistically significantly below state average, ** = Statistically significantly above state average.

Missing (.) = Hospital did not perform the procedure during the year in question; or it performed less than 3 procedures (rate is not computed when the denominator is less than 3).

Expected rate is the rate the hospital would have if it had the same case-mix (e.g., age, gender, DRG, and comorbidity categories) as the reference or statewide population. If the observed rate is higher than the expected rate (i.e., the ratio of observed to expected is greater than 1.0), it suggests that the hospital performed worse than the reference population on that indicator.

Table 4.3: IN-HOSPITAL MORTALITY RATES FOR ISCHEMIC HEMORRHAGIC STROKE (Deaths per 100)**(Indicator Recommended for Hospital Performance Dashboard)**

Hospital	# of Deaths	# of Patients	Observed Rate	Expected Rate	Risk-Adjusted Rate	95% Confidence Interval	
						LL	UL
National	19,515	478,025	4.1	NA	NA	NA	NA
Statewide	571	14,482	3.9	4.6	3.5	3.3	3.8
Atlantic City Medical Center-City Campus	31	350	8.9	6.2	5.8 **	4.3	7.3
Atlantic City Medical Center-Mainland Campus	3	160	1.9	4.0	1.9	0.0	4.7
Bayshore Medical Center	3	120	2.5	2.8	3.7	0.0	7.6
Bergen New Bridge Medical Center	1	6	16.7	1.5	45.9 **^	19.4	72.3
Cape Regional Medical Center, Inc	8	140	5.7	2.6	8.9 **	5.2	12.7
Capital Health Medical Center - Hopewell	2	101	2.0	2.6	3.1	0.0	7.5
Capital Health Regional Medical Center - Fuld	25	393	6.4	7.8	3.3	2.1	4.6
Carepoint Health - Bayonne Medical Center	4	74	5.4	3.8	5.8	1.5	10.1
Carepoint Health - Christ Hospital	2	60	3.3	4.5	3.0	0.0	7.4
Carepoint Health - Hoboken University MC	2	63	3.2	2.1	6.2	0.0	12.7
CentraState Medical Center	13	220	5.9	3.6	6.6 **	4.1	9.2
Chilton Memorial Center	4	165	2.4	7.0	1.4 *	0.0	3.4
Clara Maass Medical Center	5	218	2.3	3.2	2.9	0.2	5.7
Community Medical Center	22	477	4.6	3.4	5.5 **	3.8	7.3
Cooper Hospital/University Medical Center	17	543	3.1	4.6	2.8	1.4	4.2
Deborah Heart and Lung Center μ	0	1	0.0	.	.	.	.
East Orange General Hospital	0	39	0.0	2.8	0.0	0.0	6.9
Englewood Hospital and Medical Center	10	268	3.7	3.6	4.2	1.9	6.5
Hackensack Meridian Health - Mountainside MC	5	131	3.8	4.7	3.3	0.4	6.1
Hackensack Meridian Health - Pascack Valley MC	2	45	4.4	5.4	3.4	0.0	7.9
Hackensack University Medical Center	27	589	4.6	7.3	2.6	1.5	3.6
Hackettstown Medical Center	1	92	1.1	2.6	1.7	0.0	6.5
Holy Name Medical Center	10	216	4.6	3.5	5.3	2.7	8.0
Hudson Regional Hospital	0	23	0.0	1.9	0.0 ^	0.0	11.3
Hunterdon Medical Center	4	150	2.7	3.2	3.4	0.1	6.6
Inspira Medical Center - Elmer	2	39	5.1	4.1	5.1	0.0	10.4
Inspira Medical Center - Mullica Hill	.	.	.	.	.	.	.
Inspira Medical Center - Vineland	4	275	1.5	2.9	2.1	0.0	4.7
Inspira Medical Center - Woodbury	5	156	3.2	2.9	4.5	1.1	7.9
Jefferson Cherry Hill Hospital	3	91	3.3	4.1	3.3	0.0	7.0
Jefferson Stratford Hospital	1	84	1.2	4.0	1.2	0.0	5.2
Jefferson Washington Township Hospital	15	364	4.1	4.5	3.7	2.0	5.5
Jersey City Medical Center	8	233	3.4	2.9	4.8	2.1	7.5
Jersey Shore University Medical Center	19	568	3.3	7.1	1.9 *	0.8	3.0
JFK University Medical Center	13	730	1.8	3.7	2.0 *	0.6	3.3
Monmouth Medical Center	4	124	3.2	2.5	5.3	1.2	9.5
Monmouth Medical Center - Southern Campus	1	70	1.4	2.6	2.3	0.0	7.7
Morristown Medical Center	22	481	4.6	5.8	3.2	1.9	4.5
Newark Beth Israel Medical Center	6	227	2.6	2.7	4.1	1.1	7.1
Newton Medical Center	2	176	1.1	2.5	1.8	0.0	5.3
Ocean Medical Center - Brick Division	1	245	0.4	3.1	0.5 *	0.0	3.2
Overlook Medical Center - Summit	34	605	5.6	6.5	3.5	2.4	4.6

Table 4.3: IN-HOSPITAL MORTALITY RATES FOR ISCHEMIC HEMORRHAGIC STROKE (Deaths per 100)
(Indicator Recommended for Hospital Performance Dashboard)

Hospital	# of Deaths	# of Patients	Observed Rate	Expected Rate	Risk-Adjusted Rate	95% Confidence Interval	
						LL	UL
National	19,515	478,025	4.1	NA	NA	NA	NA
Statewide	571	14,482	3.9	4.6	3.5	3.3	3.8
Palisades Medical Center	6	148	4.1	8.2	2.0	0.1	4.0
Penn Medicine Princeton Medical Center	6	188	3.2	5.3	2.4	0.2	4.6
Raritan Bay Medical Center - Old Bridge	2	78	2.6	2.7	3.9	0.0	8.8
Raritan Bay Medical Center - Perth Amboy	1	77	1.3	5.0	1.1	0.0	4.7
Riverview Medical Center	3	168	1.8	4.2	1.7	0.0	4.5
RWJ University Hospital	48	539	8.9	5.6	6.5 **	5.2	7.7
RWJ University Hospital - Hamilton	1	133	0.8	2.0	1.5	0.0	6.1
RWJ University Hospital - Rahway	1	123	0.8	3.4	1.0	0.0	4.4
RWJ University Hospital - Somerset	15	223	6.7	3.8	7.3 **	4.8	9.7
Saint Barnabas Medical Center	14	393	3.6	3.5	4.1	2.2	6.0
Saint Clare's Hospital - Denville Campus	2	127	1.6	4.3	1.5	0.0	4.6
Saint Clare's Hospital - Dover	2	68	2.9	2.8	4.3	0.0	9.8
Saint Michael's Medical Center	3	94	3.2	3.8	3.4	0.0	7.2
Saint Peter's University Hospital	1	125	0.8	2.7	1.2	0.0	5.1
Salem Medical Center	1	11	9.1	4.2	8.8	0.0	19.6
Shore Memorial Hospital	2	108	1.9	2.1	3.6	0.0	8.5
Southern Ocean Medical Center	3	147	2.0	3.2	2.6	0.0	5.9
St. Francis Medical Center - Trenton	0	34	0.0	2.0	0.0	0.0	8.9
St. Joseph's University Medical Center	29	437	6.6	6.8	4.0	2.7	5.3
St. Joseph's Wayne Medical Center	1	94	1.1	4.2	1.0	0.0	4.6
St. Luke' Warren Hospital	3	72	4.2	6.0	2.8	0.0	6.2
St. Mary's General Hospital	0	64	0.0	3.6	0.0	0.0	4.9
The Valley Hospital	23	429	5.4	5.8	3.8	2.4	5.2
Trinitas Regional Medical Center	3	111	2.7	4.2	2.6	0.0	5.9
University Hospital	32	399	8.0	5.3	6.1 **	4.6	7.7
Virtua Memorial Hospital - Burlington County	5	246	2.0	2.0	4.1	0.7	7.4
Virtua Our Lady of Lourdes Hospital - Camden	14	267	5.2	4.0	5.3	3.1	7.5
Virtua West Jersey Hospital Marlton	3	168	1.8	3.4	2.2	0.0	5.2
Virtua West Jersey Hospital Voorhees	5	217	2.3	2.1	4.6	1.1	8.1
Virtua Willingboro Hospital	1	82	1.2	3.3	1.5	0.0	5.8

Source: National numbers are derived from 2017 National Inpatient Sample (NIS) Data using the AHRQ SAS Software, Version 2020 while New Jersey's are calculated from the 2019 NJ UB Data using the same software version.

^ = Rate is based on a denominator less than 30 and should be taken with caution. μ = Could be Coding Error.

* = Statistically significantly below state average, ** = Statistically significantly above state average.

Missing (.) = Hospital did not perform the procedure during the year in question; or it performed less than 3 procedures (rate is not computed when the denominator is less than 3).

Expected rate is the rate the hospital would have if it had the same case-mix (e.g., age, gender, DRG, and comorbidity categories) as the reference or statewide population. If the observed rate is higher than the expected rate (i.e., the ratio of observed to expected is greater than 1.0), it suggests that the hospital performed worse than the reference population on that indicator.